



Development:	BusConnects Belfield/Blackrock to City Centre Core Bus Corridor Scheme
Location:	From Junction between Mount Street Upper and Merrion Square East/North, to the R113 at Temple Hill/Stradbrook Road, and from Stillorgan Road to Merrion Road along Nutley Lane, Co. Dublin
Planning Authorities:	Dublin City Council and Dun Laoghaire Rathdown County Council
Applicant:	National Transport Authority
Type of Application:	Approval under Section 51(2) of the Roads Act 1993 (as amended), and associated CPO
Prescribed	Prescribed bodies to which the details of the Proposed
Bodies:	 Scheme were circulated are listed in section 1.4 of Report. Prescribed bodies who have made submissions are: 1. Dun Laoghaire Rathdown County Council 2. Dublin City Council 3. Department of Housing, Local Government and Heritage (Development Applications Unit)

Observers to Application:	Listed in Appendix I	
Observers to CPO	1. Merrion Land Ltd. 2.	Blackrock Clinic/Blackrock Health
	3. Blue Infinity PropCo Ltd. 4.	Blackrock College
	5. BreastCheck 6.	Dalata Group Plc.
	7. Rhonda Draper 8.	Elm Court Management DAC.
	9. Elm Park Golf and 10. Sports Club	Elmpark Green Development (/Davy Platform ICAV/Elm Real Estate Investments)
	11. Caroline Farrell 12	. Veronica Freeman
	13. Gas Networks Ireland 14	. Anthony Harrison
	15. Lamtos Unlimited Co 16	. Helen Long
	17. Management Company 18 31-33 Merrion Road CLG	. Shauna McGivern
	19. Laura Quinn 20	. Richard Sallinger
	21. Tesco Ireland Ltd. 22	. Eileen Vaughan
	23. Wappinger Food Corporation Ltd.	
Date of Site Inspections:	26 th May 2023 and 1 st Augus	t 2023~
Inspector:	limmy Groop	

Inspector: Jimmy Green

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1.0 Introduction

1.1. Overview

- 1.1.1. The National Transport Authority (NTA) has applied under the provisions of Section 51(2) of the Roads Act 1993 (as amended) ("the Roads Act") to An Bord Pleanála ("the Board") for approval in relation to the development of a sustainable transport corridor consisting of the Belfield/Blackrock to City Centre Core Bus Corridor (CBC) Scheme. The Proposed Scheme is intended to make alterations to the transportation infrastructure with the intention of providing more priority to bus traffic (thus improving reliability and punctuality of public transport while reducing journey times) as well as improving pedestrian and cycling facilities. The Proposed Scheme has an overall length of c. 8.3km and is one of 12 CBC schemes forming the BusConnects programme for Dublin, a detailed description is provided in Section 2 of this report below.
- 1.1.2. This report considers two concurrent cases: ABP 313509-22 (the application for the Proposed Scheme) and ABP 313565-22 (the Compulsory Purchase Order (CPO) for the Proposed Scheme), the details of each are summarised below:
 - Under ABP-313509-22 the NTA has applied for approval for the Proposed Scheme from the Board under Section 51(2) of the Roads Act. The documentation accompanying this application includes an Environmental Impact Assessment Report (EIAR), and a Natura Impact Statement (NIS) in accordance with the requirements of Section 50 of the Roads Act and Part XAB of the Planning and Development Act 2000 (as amended) ("the Planning Act") respectively. This application was submitted to the Board on the 6th May 2022. Ninety-six third-party submissions and three submissions from prescribed bodies were received in relation to the Proposed Scheme, with a further 24 submissions received following the circulation of the NTA's response to the submissions.
 - Under ABP-313565-22 the NTA has sought confirmation of a Compulsory Purchase Order (CPO) which, if approved by the Board, will facilitate the development of the Proposed Scheme as set out above. The orders were made pursuant to the powers conferred on the NTA by the Housing Act 1966

(as amended), the Roads Act, the Planning and Development Act, 2000 (as amended), Local Government Act 2001 and the Dublin Transport Authority Act 2008 (as amended) combined with relevant updating and amending legislation. If confirmed the order will authorise the NTA to acquire compulsorily land and/or rights described in Parts I, II and III of the associated schedule and shown on the deposit maps received by the Board on the 13th of May 2022. The CPO, if approved will authorise the NTA to also temporarily acquire lands and rights for the purpose of constructing the Proposed Scheme. Twenty-three submissions were received from third parties during the first consultation period for the CPO with a further seven submissions received following the circulation of the NTAs response to the initial submissions. (All of which are summarised, discussed, and set out in Section 5.4 of my report below)

1.1.3. The applicant entered into pre-application discussions with the Board (file reference ABP-309584-21 refers) in relation to the BusConnects programme under Section 51A of the Roads Act, 1993 (as amended). These were formally closed by the Board in their Direction and confirming letter issued in August 2021.

1.2. Legislative Provisions

1.2.1. The Proposed Scheme

- 1.2.1.1. Section 51(1) of the Roads Act, 1993 (as amended) states that a proposed road development shall not be carried out unless An Bord Pleanála has approved (or modified) it. Section 51(2) of the same Act states that the relevant authority shall apply to the Board for the approval of a proposed road development and shall submit to the Board an EIAR in respect of the development.
- 1.2.1.2. Before approval of the proposed road development, section 51(5) of the Roads Act states that An Bord Pleanála must take into account the EIAR, any additional information, any submissions made in relation to the likely effects on the environment of the proposed road development, the results of any consultations with Northern Ireland authorities (if relevant) and the report and any recommendation of a person conducting any inquiry. It should be noted that no oral hearing/inquiry has been held in the current case. Having taken the preceding into account the Board

shall reach a "reasoned conclusion on the significant effects of the proposed road development on the environment"¹. Where any application for approval under Section 51 relates to a proposed road development and a CPO submitted for confirmation which relates wholly or partly to the same development, a decision on such approval and of such CPO shall be made at the same time.²

1.2.2. Compulsory Purchase Order

- 1.2.3. In relation to the Compulsory Purchase Order (CPO) under Section 44(1)(c) of the Dublin Transport Authority Act, 2008 (as amended), the National Transport Authority (NTA) functions include the following *"to acquire and facilitate the development of land adjacent to any public transport infrastructure where such acquisition and development contribute to the economic viability of the said infrastructure whether by agreement or by means of a compulsory purchase order made by the Authority in accordance with Part XIV of the Act of 2000."³*
- 1.2.4. The process of acquisition is set out under Section 213(2)(a) of Part XIV of the Planning Act, which notes that an authority may, for the purposes of performing any of its functions (whether conferred by or under this Act, or any other enactment passed before or after the passing of this Act), including giving effect to or facilitating the implementation of its development plan, acquire land, permanently or temporarily, by agreement or compulsorily.
- 1.2.5. Compulsory Purchase Orders are made pursuant to the powers conferred on the local authority by section 76 of the Housing Act, 1966, and the Third Schedule thereto, as extended by section 10 of the Local Government (No. 2) Act, 1960, (as substituted by section 86 of the Housing Act 1966), as amended by section 6 and the Second Schedule to the Roads Act, 1993, and as amended by the Planning and Development Act, 2000 (as amended). Orders are served on owners, lessees, and occupiers in accordance with Article 4(b) of the Third Schedule to the Housing Act, 1966 (as amended).

¹ Section 51(5)(c) of the Roads Act, 1993 (as amended) refers.

² Section 51(7)(b) of the Roads Act, 1993 (as amended) refers.

³ The Planning and Development Act, 2000 (as amended).

1.3. Documentation

1.3.1. Application Documentation

- 1.3.2. The application documentation for the Proposed Scheme includes the following:
 - Copies of relevant statutory public notices and prescribed body notifications
 - Environmental Impact Assessment Report and Appendices (four volumes)
 - AA Screening Report
 - Natura Impact Statement
 - Location mapping and design drawings
 - Preferred Route Corridor Report
 - Public Consultation Report
 - Preliminary Design Report

1.3.3. CPO Documentation

- 1.3.4. The documentation submitted in relation to the CPO includes the following:
 - CPO Deposit Maps setting out all the plots subject to temporary and permanent acquisition.
 - The CPO Order and Schedule setting out -
 - Lands being permanently acquired (Schedule Part I).
 - Lands being temporarily acquired (Schedule -Part II).
 - Description of public rights of way to be extinguished (Part III Section A) none are listed in this section.
 - Description of public rights of way to be restricted or otherwise interfered with (Part III – Section B).
 - Description of private rights to be acquired (Part IV Section A).
 - Description of private rights to be restricted or otherwise interfered with (Part IV – Section B).

- Description of private rights to be temporarily restricted or otherwise interfered with (Part IV – Section C).
- Official Seal
- Newspaper notices.
- Copy of the type and form of notice sent to all Owners, Lessees and Occupiers of land referred to in the CPO and a list of all those to whom notices have been sent by registered post.
- Copy of site notices erected at specific locations along the CBC as shown on an enclosed map.

1.4. Prescribed Bodies

- 1.4.1. The applicants circulated details of the Proposed Scheme to the following prescribed bodies:
 - The Minister for Housing, Local Government and Heritage,
 - The Development Applications Unit (DAU) of the Department of Housing, Local Government and Heritage (DHLGH),
 - The Minister of Tourism, Culture, Arts, Gaeltacht, Sports, and Media,
 - Fáilte Ireland,
 - An Taisce,
 - The Environmental Protection Agency,
 - The Heritage Council,
 - An Comhairle Ealaion The Arts Council,
 - Dublin City Council,
 - Dun Laoghaire-Rathdown County Council,
 - Fingal County Council,
 - South Dublin County Council,
 - Wicklow County Council,
 - The Eastern and Midland Regional Assembly,

- The Minister of the Department Environment, Climate and Communications,
- The Minister of the Department of Transport,
- Inland Fisheries Ireland,
- Waterways Ireland,
- Coras Iompair Eireann (CIE),
- Transport Infrastructure Ireland,
- The Health Service Executive,
- Iarnrod Eireann,
- The Commission for Railway Regulation,
- Irish Water,
- The Office of Public Works,
- Bat Conservation Ireland,
- Dublin Civic Trust,
- Department of Agriculture, Food, and the Marine,
- Bord Gais Energy,
- ESB Networks,
- Eirgrid,
- Badger Watch Ireland, and
- Birdwatch Ireland.

2.0 Site Location and Description

2.1.1. The Proposed Scheme constitutes the provision of the Bellfield/Blackrock to City Centre CBC scheme, which comprises a range of infrastructure improvements for pedestrians and cyclists, as well as providing bus priority measures along an overall corridor length of 8.3km. The location of the Proposed Scheme is along existing streets and roads in Dublin and follows two interlinked corridors as follows:

- Blackrock to the City Centre, which starts on the R113 at Temple Hill and runs northwest along the N31 Frascati Road, R118 Rock / Merrion / Pembroke Roads before turning slightly further west onto the R816 Pembrooke Road, along Baggot Street (upper and lower), then turning northeast onto Fitzwilliam Street Lower and culminating at the junction between Mount Street Upper and Merrion Square East/South. This corridor extends for approximately 7.4 kilometres.
- Stillorgan Road (R138) to Merrion Road, which runs along the entirety of Nutley Lane for approximately 900m before joining with the Blackrock to City Centre corridor described above at the junction between Nutley Lane and Merrion Road.
- 2.2. The Proposed Scheme passes through the suburbs of the city and runs along/through a range of roads/streets which have a variety of different characteristics accommodating a range of commercial, residential, educational, as well as amenity uses. From its southernmost extent the route runs northwest passing Blackrock Village Centre, the Frascati Centre, Blackrock Park, Blackrock Clinic, Blackrock College, Booterstown Park, Booterstown Marsh (part of an SPA), the Elmpark Green Development, St. Marys Nursing Home, through the Merrion/Strand Road (Merrion Gates) junction, past St. Vincent's Hospital, the Merrion Shopping Centre, through Merrion village, passed the RDS, and Ballsbridge village (where it crosses the River Dodder). From here the runs along Pembroke Road, passing through Baggot Street Upper and Lower (crossing the Grand Canal at McCartney Bridge) before turning onto Fitzwilliam Street lower and culminating at Merrion Square. The Nutley Lane section of the route commences at the junction between the Lane and Stillorgan Road, running in a northeast direction past RTE, a number of residential dwellings, the Elm Park Golf and Sports Club, St. Vincent's University Hospital, and the Merrion Shopping Centre before reaching the Merrion Road portion of the route.
- 2.3. There are also satellite elements of the Proposed Scheme which are not contiguous to the corridor where additional traffic control/restriction signage is proposed, these are:
 - On Clyde Road in the vicinity of the junctions with Raglan and Clyde Lanes,
 - At the junction of Pembroke Park and Herbert Park Roads,
 - On Georges Avenue just north-east of its junction with Frascati Park, and

- At Seafort Parade.
- 2.4. Overall, the site of the Proposed Scheme is located within a highly urbanised environment primarily along an existing busy transport corridor which already accommodates significant amounts of bus, cycle, and general traffic as well as a large number of pedestrian movements daily. There is a mix of uses along either site of the route including significant retail developments, residential development (in a number of forms including one-off substantial dwellings, apartment schemes and suburban formats as well as protected structures), foreign embassies, village centres, community, institutional, educational, enterprise and employment uses, as well as significant amenity/open space areas. There are a number of protected structures along and in the vicinity of the route which also runs through conservation areas identified in the Dublin City Development Plan.
- 2.5. The site is located within the functional area of Dublin City Council from north of the Trimleston Avenue Rock Road junction to its culmination point at Merrion Square (including the Nutley Lane corridor) and is in the functional area of Dun Laoghaire Rathdown County Council (DLRCC) for the remainder (from Trimleston Avenue south).
- 2.6.A temporary construction compound is proposed at Booterstown Car park (which is currently not in use) opposite the entrance to Willow Terrace near Blackrock Park, on the Rock Road. The total construction phase is stated to take approximately 24 months which will be broken up into phases for the provision of each of the sections of the Proposed Scheme.

3.0 **Proposed Scheme Development Description**

3.1. Overview

- 3.1.1. In general, the Proposed Belfield/Blackrock to City Centre Core Bus Corridor Scheme ("the Proposed Scheme") provides upgrades to, and expansion/increase of the bus priority measures, cycling infrastructure and pedestrian facilities throughout the corridor. The measures being proposed include the provision of bus lanes, upgraded/relocated and additional bus stops, amendments to junctions, bus prioritisation through traffic management, segregated cycle tracks, amendments to parking and loading bay provisions (including reductions to and relocation of such areas), as well as improving pedestrian facilities (footpaths, signal crossings etc.), the provision/amendment of Toucan crossings to facilitate pedestrian and cyclist movements and the provision of landscaping/public realm improvements. (Toucan crossings are provided at signalised junctions which cannot accommodate segregated cycle crossings, i.e. crossing facilities for pedestrians and cyclists are shared). Throughout the scheme, junction arrangements for general traffic are consolidated with turning radii reduced to slow traffic, left turning filter lanes omitted (to reduce unsafe conflicts between general traffic and cyclists/pedestrians), and specific junction crossing arrangements provided for pedestrians and cyclists. On minor junctions along the route raised table crossings are being provided to facilitate pedestrian and cyclist crossing movements. The overall design approach for the Proposed Scheme, is set out in the Preliminary Design Guidance Booklet for BusConnect Core Bus Corridors which is included in the application documentation (Appendix A4.1 of the EIAR refers).
- 3.1.2. Junctions within the entire BusConnects Core Bus Corridor programme have been categorised into 4 general types, and each is described in Appendix A4.1 of the submitted EIAR (BusConnects Preliminary Design Guidance Booklet BPDG). It is important to note that of these four options only Type 1 or Type 3 junctions (Section 7.4.1 and 7.4.3 of the BPDG refers) are proposed within the Proposed Scheme. Appendix A6.3 of the EIAR specifically sets out the junction design adopted for each junction. Both type 1 and 3 junction arrangements offers protection for cyclists (and pedestrians) at all junctions with protected kerbing provided on the corner of

junctions, tighter turning radii are also provided at all junctions to force left-turning vehicles to slow down more, and the kerbing and cycle lane arrangements will require right-turning and straight-ahead cyclists to stay on the raised and segregated cycle track right up to the junction and will thus avoid traffic conflicts from weaving through lanes. The main differences between Type 1 and type 3 junctions are that (a) the bus lanes in type 3 are terminated just short of the junction to allow left-turners to turn left from a short left-turn pocket in front of the bus lanes (buses can still proceed forward from this lane where there is a receiving lane). A type 3 junction is proposed where the volume of left turning vehicles is less than 100PCUs per hour and a type 1 junction is provided where left-turning vehicle volumes are greater than 100-PCUs per hour. There are also differences in traffic management controls, with type 1 junctions and type 3 junctions differing in the timing of when cyclists, buses and general traffic are released to proceed.

3.1.3. At bus stops it is generally proposed to provide bus shelters, and the stops are one of three typologies. There is a hierarchy in bus stop design options starting with the preferred "island bus stop", followed by the "shared bus stop landing zone", and then finally the "lay-by bus stop", each of these are described with images in section 4.6.4.5 of the EIAR and section 11 of the Preliminary Design Guidance Booklet (Appendix A4.1 of the EIAR). There is one inline bus stop proposed (at RTE along Nutley Lane) where users departing the bus exit straight onto the footpath, this approach can be used where there are no cycle lanes to accommodate. The island bus stop features the deflection of the cycle track behind the bus stop and any associated shelter which will be provided on a c. 3m wide island offering direct access and egress from buses. The deflected cycle track will be ramped and narrowed to reduce speeds and marked/lit to highlight pedestrian activity. A pedestrian priority crossing point is provided with part-time signals to avoid cyclist/pedestrian conflicts for access to the bus stop area. Visually impaired pedestrians may call on part time signals within this arrangement, where necessary. In the shared bus stop landing zone arrangement the cycle track is again deflected behind the bus landing/access zone (but runs between the bus shelter/footpath area and the bus loading/offloading zone) with the same speed controls for cyclists augmented by corduroy tactile paving and additional narrowing of the track, and signage highlighting the presence of bus passenger traffic. There are no dedicated

pedestrian priority signals in the shared bus stop landing zone although pedestrian priority is provided through design to allow crossing of the cycle track to a 1m wide dwell area where passengers can get on and off the bus. Lay-by bus stops are similar to island bus stops in terms of the arrangements between cycle tracks, bus shelter and bus access/egress, however, in this arrangement the bus pulls in off the carriageway/bus lane – such stops cater for buses with longer dwell times at a stop and allows other buses to continue past on the bus lane).

- 3.1.4. One bus gate is proposed as part of the Proposed Scheme on Pembroke Road between the junctions of Eastmoreland Place and Waterloo Road. A bus gate is a sign-posted short length of stand-alone bus lane which leads into a shared general traffic and bus lane, which in this case extends for approximately 480m along Pembroke Road between Eastmoreland Road and Northumberland Road. General traffic will be directed by signage to divert away to other roads before it can arrive at the bus gate. The Bus gate will be operational from 06.00 to 20.00.
- 3.1.5. Signage throughout the Proposed Scheme will be in accordance with the Traffic Signs Manual. Additional signage will be provided throughout to ensure new traffic arrangements and management is clear and will require the use of specifically designed signage to ensure that road users have clarity on the rights of way and yielding necessary to ensure satisfactory operation of the BusConnects system. Some bespoke signage will be necessary including the use left turn flashing amber arrows to ensure motorists turning left are aware of, and yield to, cyclists. Furthermore, one of the characteristics of the Proposed Scheme is that predominantly there will be a ban on left turns from the bus lanes and accordingly "No Left Turn from Bus Lane" signage will be required (i.e. in most situations general traffic will not be allowed to filter into a bus lane to make a left turn, and taxi's and buses wishing to do so will be required to move into the general lane when approaching type 1 junctions).
- 3.1.6. The Proposed Scheme provides for the following in terms of carriageway and footpath widths:
 - Bus lanes, generally of 3m in width in areas with a speed limit <60kmph and
 3.25m in areas with a speed limit of >60kph.

- General traffic lanes, as above although 2.75m lanes are permissible on straight roads sections with very low HGV traffic.
- Pedestrian paths, generally with a minimum width of 2m, however 1.2m minimum widths being considered appropriate at pinch points.
- Segregated cycle tracks, generally with a width of 2m (one-way), segregation is provided through kerbing between the cycle tracks and pedestrian paths and/or bus lanes/stops.

The overall design allows for deviations from the above specified lane widths over shorter sections to allow for specific physical constraints, e.g. to avoid extant buildings, protection/ avoidance of mature trees, traffic pedestrian safety, or reduce CPO/land-take requirements. The Proposed Scheme does not include bus or traffic lanes of less than 3m in width, where pinch points have to be addressed these are accommodated through deviations (narrowing) in cycle track and pedestrian widths and are discussed further in the section descriptions below.

- 3.1.7. The Proposed Scheme will result in the following along the route:
 - The number of pedestrian signal crossings are proposed to increase by 41% from 68 to 96.
 - The proportion of segregated cycle facilities are proposed to increase from 4% on the existing corridor to 100%.
 - The proposed of the route having bus priority measures is proposed to increase from 37% to 100%.
 - Landscaping/planting alterations including the removal/loss of mature established trees and planting.
- 3.1.8. Specific works proposed within the development include the following:
 - Increase dedicated inbound bus lane in length from 3.2km to 7.4km and from 2.9km (existing) to 7.3km (proposed) of outbound bus lane. Provision of 0.9km and 1.0km respectively of inbound and outbound bus priority through traffic management (such as bus gate/priority signalling - currently there are no such measures on the corridor). Thus, bus priority infrastructure and traffic management will be provided over a total of 16.6km (both in-bound and outbound along the corridor).

- 16.6km (total both directions) of segregated cycle track infrastructure and supporting facilities – i.e. bike stands.
- Provision of new / refurbished pedestrian facilities and footpaths along the scheme and associated ancillary works.
- Provision of 27no. key junction upgrades and associated ancillary works.
- Provision of 55 new / refurbished raised table crossings on side-road entries onto the main corridor (i.e., access roads at minor junctions).
- Reconfiguration of existing bus stops and relocation of others resulting in provision of a total of 49 no. stops (a reduction from the 54 in place) along the corridor which will have Real Time Passenger Information (RTPI), provision of shelter and seating at all stops.
- Public Realm works including landscaping, planting, street furniture, street lighting, retaining walls, boundary walls, and sustainable urban drainage measures. Landscaping and ancillary works include the removal of c. 1,040m of hedgerow and c. 4,157m of treeline (c.329 trees)⁴ and planting of 558m of hedgerow, 349 street trees, 1,241m² of species rich grassland, 4,990m² of ornamental planting, 176m² of native planting and 2,928m² of amenity grassland planting along the corridor.
- Roads associated earthworks including excavation of unacceptable material, importation of material, temporary storage of materials.
- Provision of road pavement, signing, lining and ancillary works.
- Provision of gates, fencing and boundary treatment works, including where necessary/appropriate reuse, relocation and recording of protected features, gates, and archways.
- Construction of accommodation works including boundary treatment and ancillary grading and landscaping works together with all associated ancillary and consequential works.
- 3.1.9. For ease of discussion (and to be consistent with the route descriptions provided in the submitted EIAR) the description of the Proposed Scheme has been split into 5

⁴ Table 12.13 of the EIAR refers.

separate sections both for the purposes of my assessment and within the submitted EIAR:

- Section 1: Stradbrook Road to Booterstown Avenue,
- Section 2: Booterstown Avenue to Nutley Lane,
- Section 3: Nutley Lane to Ballsbridge,
- Section 4: Ballsbridge to Merrion Square
- Section 5: Nutley Lane

These are described further below.

3.2. Section 1: Stradbrook Road to Booterstown Avenue

- 3.2.1. The Proposed Scheme commences from its southernmost point on Stradbrook Road, c. 100m south of the Monkstown Rd./Temple Hill junction. From here (moving north towards the City Centre) towards Booterstown Avenue it is proposed to provide a segregated cycle track, dedicated bus lane and a single general traffic lane in each direction (i.e. both outbound from the city centre and inbound towards it). This section of the Proposed Scheme is c. 2.4km in length and is located entirely within the functional area of DLRCC.
- 3.2.2. The existing (inbound) bus stop to the south of the Temple Hill/Monkstown Rd. junction is to be relocated to its north. At the junction a dedicated on-demand right turn phase for buses only onto Monkstown Road will be provided as will a new pedestrian crossing on the northern (Temple Hill) arm.
- 3.2.3. The inbound access to St. Vincent's Park will be provided with a raised table treatment, as will the Temple Park Avenue entrance.
- 3.2.4. The Newtown Ave, and Temple Road Junction will have expanded yellow boxes, removal of left turning filter lane (onto Newtown Ave.) as well as the provision of dedicated cycle crossings of the main Temple Hill/Road carriageways. The pedestrian crossing on the outward leg of Temple Road will be relocated further north but will continue to be staggered with the existing inward leg pedestrian crossing.

- 3.2.5. The inward and outward bus lanes, general traffic lanes and segregated cycle tracks are proposed to continue along Temple Road maintaining the extant generous planted median.
- 3.2.6. The Temple Road/Frascati Road junction will be amended by the provision of dedicated cycle lane crossings, removal of the left-filter into Barclay Court, provision of a new bus stop on inbound leg of Frascati Road, and consolidation of turning lanes.
- 3.2.7. The inward and outward bus lanes, general traffic lanes and segregated cycle tracks are proposed to continue along Frascati Road maintaining the medians and associated planting. Raised table treatments are to be provided to Sweetman's Avenue, while Carrysfort Avenue will be provided with cycle crossings over the main inbound/outbound carriageways and the northeast approach to the Frascati Road junction being consolidated into a single all-turning lane.
- 3.2.8. Georges Avenue (southeast access) left turn onto Frascati Road is proposed to be restricted to bicycles and authorised vehicles only. Advanced traffic signs are proposed just northeast of the Georges Avenue /Frascati Park junction. Bicycle crossing facilities across Frascati Road are also proposed and the existing pedestrian crossings will be retained.
- 3.2.9. At the Rock Hill/Road junction the left filter lane onto Rock Hill is proposed to be removed and replaced with additional landscaping/cycle lane/pedestrian facilities. Cycle lanes crossing all carriageways are also proposed with pedestrian crossings maintained across Rock Hill. The tabled/ramped pedestrian crossing across the Frascati Road to the south of the junction (between the Frascati Centre and Blackrock Village Centre) is to be retained.
- 3.2.10. The Mount Merrion Avenue/Rock Rd. junction will be altered to tighten the turning radii for general traffic, omit the left turning filter lane onto Mount Merrion Avenue to facilitate separate cycleway crossing and provide additional landscaping while retaining/enhancing the pedestrian environment. Public realm improvements and additional planting is also proposed.
- 3.2.11. The Rock Road is to be widened slightly predominantly along the frontage of Blackrock Park (but also requiring the set back of a residential property's

(secondary) access gate and fence – Lios an Uisce (which is on the Record of Protected Structures – RPS), the relevant lands are subject to CPO).

- 3.2.12. A new retaining wall structure will be required along the interface with Blackrock Park in order to accommodate widening associated with the two bus lanes, two general vehicle, cycles paths and pedestrian facilities at this location. This area is currently a steep embankment with scrub/planting in place. The existing median at the Castledawson junction is to be planted and a tabled vehicular access/pedestrian crossing with reduced turning radii to slow traffic speeds is also proposed at this junction.
- 3.2.13. Route widening is proposed at the Blackrock Clinic and Blackrock College with existing front boundaries of these facilities to be set back to facilitate the Proposed Scheme. This will require the provision of a retaining wall structure to the front of Glenalla building within the Blackrock Clinic grounds and the setting back of the railings and plinth along the frontage of Blackrock College. The existing pedestrian crossing north of the Blackrock Clinic entrance will be converted to a Toucan crossing and an additional toucan crossing will be included to the south of that entrance. Castledawson Avenue, Seafort Parade, and Phoenix Terrace are to be provided with raised table crossings onto the Rock Road. Seafort Parade will remain one-way; however, the direction will be reversed with changed signage and road markings being provided as part of the Proposed Scheme.
- 3.2.14. The entrance to Blackrock College is to be altered through the rotation and reinstatement of the school entrance gate (gates are on the RPS) and the provision of a raised table and a toucan crossing to the north on Rock Road. The repositioning of the gate will allow the retention of the existing relationship with the relocated railings and associated plinth along the frontage of the College. Additional landscaping is to be provided in the vicinity of the access to Willow Terrace. The entrance to Willow Park Junior School will be provided with a raised table access, additional landscaping and it is proposed to remove the yellow box in the Rock Road at this location while providing a dedicated right-hand turning lane into the school, which will require alterations to the extant central median.
- 3.2.15. Road widening is to be accommodated along the Rock Road (opposite Willow Terrace) along the frontage of an existing but disused car park) which is to be used

as a temporary construction compound during the proposed construction phase. Upon completion this compound is proposed to be returned to its existing condition.

- 3.2.16. Between the entrance to Willow Park school and Booterstown Avenue it is proposed to relocate the in-bound bus stop, provide a coach lay-by, increase the width of pathways, and provide grassed areas. This will necessitate the removal of existing car parking. Additional planting is also proposed along the central median at the junction. The interface between the route and the parkland to the north at this location is to remain largely as it currently is.
- 3.2.17. The Stradbrook Road to Booterstown Avenue section of the Proposed Scheme will provide full physical bus priority along its entirety through the provision of continuous inbound and outbound bus lanes. The Proposed Scheme includes the provision of the following:
 - Inbound one additional network bus stop (north of the entrance to Barclay Court) is proposed, two coach-bays, and the relocation of three network bus stops, the remaining two existing bus stops will be upgraded in accordance with the proposed design scheme. Three of the stops will be island bus stops, a further three of the stops will be lay-by bus stops and the remaining two bus stops will be of the shared-landing typology.
 - Outbound existing seven bus stops will be upgraded in place in accordance with the proposed design scheme. Four will be island bus-stops and the remaining three will be of the shared-landing typology.
- 3.2.18. This section of the Proposed Scheme includes five deviations below the minimum stated infrastructure widths, as follows:
 - Outbound Cycle track, reduced to a width of 1.5m for a distance of c. 20m at southernmost extent of the route (Stradbrook Road) to facilitate transition and tie-in with existing facilities.
 - Inbound footway, reduced to 1.8m for approximately 25m where the existing footpath is being retained north of St. Vincent's Park access road.
 - Outbound footway, reduced to 1.8m for c. 55m where the existing footpath is being retained south of St. Annes Square.

- Inbound Cycle track, reduced to 1.5m for c. 70m to minimise the required land-take impacting private property (Blackrock Clinic).
- Inbound and Outbound cycle track, reduced to 1.5m for approximately 225m to minimise land-take impacting private property (Blackrock College).
- 3.2.19. Segregated cycle tracks are proposed throughout the entirety of the Stradbrook Road to Booterstown Avenue section of the Proposed Scheme, with a new Toucan crossing proposed north of Blackrock College gates. Cycle stands are generally provided proximate to bus stops where appropriate, to view locations of these the Board is referred to the Landscaping General Arrangement drawings (Volume 3 of the EIAR). Seven Sheffield cycle stands are proposed just south of Monkstown Road/Temple Hill junction, 11 no. cycle stands on the Frascati Road near the Temple Road Junction (4 no.) and near Georges Avenue (7 no.), 30 no. on the Rock Road - near the entrance to Blackrock Park (8 no.) and near Ben Inagh Park (5 no.), opposite Blackrock Clinic (7 no.), opposite Blackrock College (5 no.) and south of Booterstown Avenue (5 no.).
- 3.2.20. The Proposed Scheme will result in a reduction of a total of 12 car parking spaces (between Phoenix Terrace and Castledawson Avenue – (3 no. outbound removed), adjacent to Seafort Parade (3 no. removed) and South of Booterstown Avenue (6 no. inbound removed).
- 3.2.21. In terms of the public realm the Proposed Scheme will have minimal impact on the southern section where there is already a dual carriageway and cycle lanes in place, the primary intervention here is reallocation of general traffic lanes to bus lanes. At the Rock Hill and Mount Merrion Avenue junctions onto Rock Road, additional hard and soft landscaping is being proposed.

3.3. Section 2: Booterstown Avenue to Nutley Lane

3.3.1. This section of the Proposed Scheme runs from the Booterstown Avenue – Rock Road junction northwest along the Rock and Merrion Roads to the Nutley Lane / Merrion Road junction. This section of the Proposed Scheme extends for approximately 1.6km and crosses from the functional area of DLRCC to Dublin City Council (DCC) just north of Trimleston Avenue.

- 3.3.2. A cycle track is proposed for the entirety of this section of the route, both inbound and outbound. The inbound (western side) of the route has a single lane cycle track while the outbound (eastern side) from the Booterstown Dart station access road and the Strand Road/Merrion Road Junction has a two-way cycle track where it overlaps with the East Coast Trail (Sutton to Sandycove Greenway).
- 3.3.3. The Booterstown junction is proposed to be provided with cycle crossing facilities and additional landscaping, with revised parking bay arrangements and landscaping on the inbound leg between Booterstown Avenue and St. Helens Road junctions. The eastern side of the corridor at this location runs along the boundary of the South Dublin Bay and River Tolka Estuary SPA [site code: 004024] and there is a minor overlap at this location with the Booterstown Marsh NHA [site code: 001205], however, the corridor boundary is not being altered at this location and existing bus stops will be retained, albeit they are proposed to be redesigned. Both St. Helens Road junctions and the Grotto Avenue junction will be provided with raised table treatment to facilitate cycle and pedestrian crossing. The dedicated right turning lane into the western access to St. Helen's Road is proposed to be omitted with this traffic movement to be permitted and accommodated from the general traffic lane.
- 3.3.4. The Trimleston Avenue junction is proposed to be provided with cycle crossing facilities, will retain the pedestrian crossing on the southern arm and a new pedestrian crossing will be provided on the northern arm. Right-turns into the avenue will still be facilitated from the general traffic lane although the dedicated right turning lane will be omitted.
- 3.3.5. From the approximate location of Trimleston Avenue up to and including the access into the Elmpark Green development the corridor is proposed to be widened with the existing wall on the eastern side to be set back and replaced with a new wall to accommodate the Proposed Scheme works. Belleview Avenue will be provided with a raised table junction.
- 3.3.6. The access junction into the Elmpark Green development from Merrion Road is proposed to be consolidated with the removal of the dedicated (in and out) left turn filter lanes (and their associated splitter islands), a reduction in turning radii, provision of cycling crossings and pedestrian crossings on all arms (currently there is no pedestrian crossing on the northern arm). The dedicated right turning lane from

the outbound leg is retained and the central medians are proposed to be omitted. Bus stops in the vicinity of this location are to be relocated.

- 3.3.7. Moving north, the access to St. Mary's Nursing Home is to be consolidated with reduced turning radii and provided with a raised table treatment.
- 3.3.8. The "Merrion Gates" junction (between Strand Road and Merrion Road) is proposed to be provided with a two-way cycle crossing (on the northern approach), the left turning filter/slip lane onto Merrion Road is proposed to be omitted and replaced with additional pedestrian and cycling facilities as well as landscaping/planting and the provision of a parking bay. Traffic exiting Strand Road is also proposed to be controlled using traffic signals (currently only signals are level crossing on this arm) and the existing restriction for traffic turning right will remain. To accommodate these works it is proposed to widen the junction to the south which will require the set back of the existing wall including an existing archway and plaque.
- 3.3.9. The Merrion Gates junction will also incorporate a controlled bus priority signalling as there is a portion of three-lane carriageway (i.e. no dedicated inbound bus lane) on the north-western arm i.e. between the junction and the Elm Court Apartments, for a distance of approximately 100m. The space constraints at this location arises from the proximity of existing private residential dwellings being located proximate to the existing footpath edge at this location. A parking strip is also proposed on the outbound leg in this vicinity.
- 3.3.10. From the Elm Court Apartments to Estate Avenue it is proposed to widen the corridor to accommodate the Proposed Scheme, this will necessitate setting back of front boundary walls along 4 residential dwellings (no.'s 151, 153, 155 and 157 Merrion Road no.'s 151 and 153 are protected structures) as well as land-take from the frontage of the Elm Court apartments (although not extending beyond its established front boundary wall/hedge).
- 3.3.11. Estate Avenue and Herbert Avenue junctions will be provided with raised table treatments with additional landscaping/planting being provided at the Herbert Avenue junction.
- 3.3.12. Corridor widening is also proposed between Herbert Avenue and the entrance to St. Vincent's University Hospital (SVUH), this will require setting back the existing southern boundary wall and the relocation of the existing stone masonry archway

("Bloomfield Gate" – former entrance to Bloomfield house, now forms the front boundary of the Gas Networks Ireland facility), to a location further north prior to the Nutley Lane/Merrion Road junction.

- 3.3.13. The Merrion Road/Merrion Avenue/SVUH junction is proposed to be provided with cycle crossing facilities on all arms, as well as a new pedestrian crossing on the southern approach (the northern approach will retain its pedestrian crossing). Additional landscaping is proposed along the SVUH leg with a reduction in the radius of the left turn onto Merrion Road (overall the junction is consolidated with less carriageway widths being provided for general traffic). A coach bay is proposed between the revised bus stop arrangement and the Nutley Lane junction on the inbound leg.
- 3.3.14. The Nutley Lane junction's turning radii are proposed to be reduced along with a reduction in the number of general traffic lanes to improve priority to other modes.
- 3.3.15. The Booterstown Avenue to Nutley Lane section of the Proposed Scheme will provide full bus priority (but not continuous bus lanes due to their omission for approximately 100m just north of Merrion Gates due to carriageway width restrictions) along its entirety through the provision of inbound and outbound bus lanes as well as the provision of bus priority signalling at the Merrion Gates junction. The Proposed Scheme includes the provision of the following:
 - Inbound Four existing bus stops which will be upgraded in accordance with the scheme design, two of which will be provided at relocated positions. Of these, three will be shared-landing style stops with one island stop. One additional lay-by coach stop is also proposed (at SVUH).
 - Outbound existing four bus stops will be upgraded in accordance with the proposed design scheme with two being provided at relocated positions. One island type bus stop is provided with the remainder all proposed to be shared landing.
- 3.3.16. This section of the Proposed Scheme includes a single deviation from the minimum stated infrastructure widths, as follows:
 - Outbound and inbound Cycle tracks reduced to a width of 1.5m for a distance of c. 300m from the Merrion Gates junction to the Merrion Avenue junction.

- 3.3.17. Segregated cycle tracks are proposed throughout the entirety of this section of the Proposed Scheme, with a two-way section being provided to tie into the East Coast Trail. Bikes stands are proposed along this section on the Rock Road just north of Booterstown Avenue (2 no.), near St. Helens Road junctions (10 no.), on the Merrion Road at St. Marys Nursing Home (9 no.), Merrion Gates (3 no.), outside no. 260 (2 no), and at SVUH (6 no. outside and 7 no. opposite).
- 3.3.18. The Proposed Scheme will result in a net reduction of no. 8 car parking spaces: (North of Booterstown Avenue - 1 no. inbound removed), between Grotto Avenue and St. Helens Road (9 no. removed), while on the route between Trimleston Avenue and Nutley Lane there will be a net increase of 2 official parking spaces provided (13 in total in various bays).
- 3.3.19. In terms of the public realm the Proposed Scheme will provide additional planting areas where practicable with the main areas being North of Booterstown Avenue, the Elmpark Green development, Merrion Gates, SVUH and Nutley Lane junctions. The Proposed Scheme will result in the felling of mature trees, most notably on the seaward side of the Merrion Road from Trimleston Avenue, to the Maldron Hotel, with other individual specimens being felled on both sides of the road between the Strand Road and Nutley Lane junctions.

3.4. Section 3: Nutley Lane to Ballsbridge (River Dodder),

- 3.4.1. Section 3 of the Proposed Scheme runs from the Nutley Lane Merrion Road junction northwest along the Merrion Road to Ballsbridge (the River Dodder Crossing). This section of the route is approximately 1.7km in length and is entirely within the functional area of DCC.
- 3.4.2. Moving north from Nutley Lane it is proposed to provide new pavement and landscaping at the ends of Ailesbury Park and Sydney Parade which are already culde-sacs with no vehicular access onto Merrion Road. A bus priority signal is proposed outbound at the pedestrian crossing adjacent to the Merrion Shopping Centre, this is to facilitate bus priority for turning right onto Nutley Lane.
- 3.4.3. The route is proposed to be widened between the Merrion Shopping Centre and Merrion View Avenue, this necessitates the setting back of the existing boundaries at the shopping centre, the frontage of the residential property at No. 85 Merrion Road,

and the wall along an adjacent side access road adjacent. The extant pillar at the corner of Merrion Road and Merrion View Avenue is to be retained and a raised table treatment and additional landscaping also proposed at this junction. The existing bus stop adjacent to the shopping centre is to be moved to the north of this junction.

- 3.4.4. The Ailesbury and Merrion Roads junction will be consolidated with all left-turning filter lanes omitted, replaced by segregated cycle lanes, cycle crossing facilities and additional landscaping. Turning radii will also be reduced to limit traffic speeds. The southern approach along the Merrion Road will also have a controlled bus priority signal on the inbound leg as there is no dedicated bus lane proposed on the inbound leg for a distance of approximately 250m between Ailesbury Road and the entrance to Wanderers Football Club (WFC) adjacent to no. 65 Merrion Road. An outbound bus lane is proposed along this stretch. Merlyn Park and Merlyn Road junctions are to be provided with raised table treatments. The inbound bus lane recommences at WFC and there is no outbound bus lane proposed from this point for a distance of approximately 305m to the Shrewsbury Road junction where an outbound bus priority-controlled signal is proposed. This c. 555m length of the route will therefore only have one bus lane (changing from outbound and inbound sections with priority signalling for buses), as well as two general traffic lanes (one in each direction), two segregated cycle tracks (one in each direction) and the footpaths.
- 3.4.5. The Shrewsbury Park junction is to be provided with a raised table, while the Shrewsbury Road junction is proposed to be consolidated through the provision of reduced turning radii and the provision of dedicated cycle crossing facilities and pedestrian crossings. The right turning ban from the northern arm onto Shrewsbury Road is to be retained as part of the Proposed Scheme.
- 3.4.6. In-bound and out-bound bus and general traffic lanes (as well as footpaths and cycle tracks) are proposed between the Shrewsbury Road junction and Ballsbridge Park junction. The access into 31-33 Merrion Road and the Sydenham Road junction are both proposed to be provided with raised table treatments.
- 3.4.7. It is proposed to set back the existing corridor boundary (railings and plinth) along the frontage of the Clayton Hotel (RPS) by (approximately 2.5m x 58m) to facilitate route widening and the provision of footpath and cycle track behind existing

established mature trees which are to be retained. The extant bus stop at the Clayton Hotel is also proposed to be relocated to a point north of the Simmonscourt Road/Sandymount Avenue/Merrion Road junction. This junction is to be consolidated, with reduced turning radii, provision of dedicated cycle crossings and wider footpaths and formal pedestrian crossings.

- 3.4.8. The Serpentine Avenue junction is proposed to be consolidated with reduced turning radii, provision of dedicated cycle crossings, pedestrian crossings, and omission of the median (on the Serpentine Avenue arm). A raised table access is also being provided into the Bankscentre development.
- 3.4.9. It is proposed to omit the dedicated left turning lane from Ballsbridge Park onto Merrion Road and consolidate this junction in a similar manner to the others through the provision of reduced turning radii, wider footpaths as well as separate cycling and pedestrian crossings. Amendments are also proposed to Ballsbridge Park/Avenue by locating the entry to the Avenue at the existing exit and providing a new dedicated exit on a raised table to the north. This is being provided to negate the need for local traffic to turn right onto Beatty's Avenue from the Merrion Road.
- 3.4.10. The Anglesea Road junction is proposed to be consolidated through reducing the turning radii, omission of the left turning slip road from Merrion Road, and upgrade of the cycle crossing facilities and the provision of a two-way cycle lane along the western side of the Anglesea Road (to tie in with the Dodder cycle route). The omission of the left-turn slip road into Anglesea Road is proposed and the restriction on right turns from Anglesea to Merrion Road will be retained. The vehicular access to the City of Dublin Education and Training Board Premises (CDETB) the former Pembroke Town Hall which is on the RPS, is to be moved further south on the Anglesea Road for cyclists and pedestrians only. The proposed rearranged access will necessitate works to the boundary and curtilage of this RPS building and provision of a new internal roadway arrangement for access to the on-site car parking.
- 3.4.11. A Toucan crossing is proposed to the north of the Anglesea Road junction and the Beatty's Avenue and Granite Place (archway) accesses are proposed to be provided with raised table treatments.

- 3.4.12. The Nutley Lane to Ballsbridge section of the Proposed Scheme will provide full bus priority along its entirety through the provision of inbound and outbound bus lanes as well as priority signalling alternatively inbound and outbound between the Ailesbury and Shrewsbury Road junctions with Merrion Road. The Proposed Scheme includes the provision of the following:
 - Inbound Of a total of five bus stops two existing bus stops will be upgraded in accordance with the scheme design and three will be relocated, all five will be of the shared-landing type.
 - Outbound Of a total of five bus stops, two existing bus stops will be upgraded in accordance with the proposed design scheme and three will be provided in relocated positions, all five will be of the shared-landing variety.
- 3.4.13. This section of the Proposed Scheme includes the following deviations from the minimum stated infrastructure widths as follows:
 - Inbound footpath reduced to 1.75m wide for less than 2m just southeast of Ailesbury Road junction at St. Michaels College due to presence of pillar.
 - Inbound and outbound cycle tracks have been reduced to a width of 1.5m for a distance of c. 550m on the Merrion Road (between Ailesbury and Shrewsbury Roads) to provide the opportunity to retain existing trees.
 - Outbound cycle track and footpath reduced to a width of 1.2m and 1.4m respectively locally at a pinch point at 100 Merrion Rd. to retain an existing mature tree.
 - Outbound cycle-track and footpath reduced to a width of 1.2m and 1.4m respectively locally to retain mature tree just south of Sandymount Avenue Junction.
 - Inbound cycle track reduced to a width of 1.5m for c. 50m in vicinity of Clayton Hotel to facilitate retention of mature trees and reduce land-take from private properties.
- 3.4.14. Segregated cycle tracks are proposed throughout the entirety of this section of the Proposed Scheme, with a two-way section being provided on Anglesea Road to tie into the Dodder Greenway Route. Bike stands are proposed on the Merrion Road

outside the RDS (5 no.) and outside no. 14 (8 no.) with the 5 no. stands on Ballsbridge Park being retained.

- 3.4.15. Overall Section 3 will have no net change in car parking provision, however, 5 spaces along Merrion Road (outbound opposite Anglesea Road junction) are proposed to be omitted and an additional five spaces provided at Ballsbridge Avenue. The loading bay and accessible car parking space opposite the Anglesea Road junction is to be retained.
- 3.4.16. The Proposed Scheme will result in the felling of a number of mature trees at various locations along Merrion Road on both outbound and inbound sides throughout this section between Ballsbridge and Nutley Lane. Additional alternative planting is proposed where possible. The additional space from consolidation of junctions is proposed to be provided with hard and soft landscaping to improve the public realm, in particular such interventions are proposed at the Nutley Lane, Ailesbury Road, Shrewsbury Road, Ailesbury Road, and the wider area surrounding Ballsbridge village.

3.5. Section 4: Ballsbridge to Merrion Square

- 3.5.1. Section 4 of the Proposed Scheme runs from Ballsbridge (at the Dodder) northwest along Pembroke Road, Baggot Street Upper, crossing the Grand Canal onto Baggot Street Lower, before turning north and cumulating on Fitzwilliam Street Lower adjacent to Merrion Square East/South. This section of the route is approximately 1.7km in length and is entirely within the functional area of DCC.
- 3.5.2. At (and from) Ballsbridge moving north it is proposed to continue the inbound and outbound bus lanes, general traffic lanes, segregated cycle tracks, and pedestrian footways as far as the Lansdowne Road junction. Raised table junctions are proposed at Ballsbridge Terrace and Clyde Lane junctions. The Herbert Park/Shelbourne Road junction is proposed to be realigned and consolidated for traffic with reduced turning radii, additional landscaping, as well as the provision of separate dedicated cycle lane crossings and pedestrian crossings. The Shelbourne Road arm is also consolidated (narrowed) and a cycle lane is proposed to the west, with stone/concrete set parking spaces, additional landscaping is also proposed at the mouth of this junction. The existing ability to turn right (and the associated

dedicated right turning lane) onto Shelbourne Road from Ballsbridge is proposed to be omitted. It is proposed to remove the existing dedicated left turning filter lanes into Elgin Road off Pembroke Road and make Eglin Road left turn entry-only accessible from Pembroke Road (i.e., vehicular traffic will not be allowed to access Pembroke Road from Elgin Road at the American Embassy, a clearway turning area and additional landscaping/planting is proposed at this intersection).

- 3.5.3. The Lansdowne Road, Northumberland Road, and Pembroke Road (as it turns from R118 to R816) junction is to be consolidated through the removal of the left-filter lanes from the R118 Pembroke Road to the R816 Pembroke Road, as well as from Lansdowne Road to the R118. Provision of a dedicated right turning lane from the R118 to Lansdowne Road, additional landscaping, dedicated cycle crossing, relocation of the Kiosk and the provision of a bus priority signal on the Pembroke Road turning from the R118 to R816 is also proposed.
- 3.5.4. There are no dedicated bus lanes proposed on the Pembroke Road from the Lansdowne Road junction to the Waterloo Road junction, except for small sections leading up to the latter. The Raglan Road junction is to be provided with a raised table with its entrance narrowed and additional landscaping, a similar approach is proposed for the Wellington Road junction although its carriageway will be narrowed in the vicinity through the provision of landscaping, with additional perpendicular parking on its eastern side while a loading bay and parallel parking will be provided on its western side.
- 3.5.5. The Eastmoreland Place junction is proposed to have a right turn restriction/ban onto Pembroke Road, a raised table treatment, additional landscaping as well as the provision of a loading bay.
- 3.5.6. A bus gate is proposed on the Pembroke Road between Eastmoreland Place and the Wellington Road junction. This is being proposed to ensure that the only traffic using Pembroke Road (during the hours of operation Monday to Sunday, 06:00 20:00) will be buses and authorised/public service vehicles and bicycles. This bus gate will require the closure of the westernmost vehicular access to 1-11 Pembroke Road (a Georgian terrace which has shared driveway access/communal frontage area off Pembroke Road, all the properties in the terrace are on the RPS). It is proposed to provide an alternative vehicular access/egress point off Waterloo Road

to this terrace's communal front lawn/planted/drive/car parking area, the existing access to be closed will be retained for pedestrian/cyclist use only.

- 3.5.7. Outside the BusConnects route corridor it is proposed to provide traffic management signage (no-entry except bicycles) at Clyde Lane and a right-turning ban at Pembroke Park (onto Herbert Park) to facilitate better traffic management.
- 3.5.8. The Waterloo/Pembroke Road/Baggot Street Upper junction is to be provided with cycle crossing facilities, pedestrian crossings will also be provided, updated (/retained) on all arms. The proposed bus gate on the eastern arm of this junction as well as traffic controls on the western approach (traffic from Baggot Street Upper must turn right) will restrict eastbound general traffic on Baggot Street Upper from accessing Pembroke Road and vice versa.
- 3.5.9. The traffic controls facilitate the proposed general narrowing of the existing vehicular carriageways through Baggot Street Upper which will be shared between bus and general traffic as well as allowing the partial provision of bus lanes at this location. There will also be a general widening of pedestrian facilities on Baggot Street Upper while also providing segregated inbound and outbound cycle tracks. The traffic controls will also reduce traffic levels in favour of local and bus traffic on Pembroke Road, while also facilitating cycle tracks.
- 3.5.10. A controlled bus-priority signal is proposed on Baggot Street Upper on the approach to the Mespil/Haddington Road junction. This is to allow priority for inbound buses over other traffic to cross the McCartney Bridge (also known as -MacCartney Bridge or Baggot Street Bridge). At this junction the existing right turn bans into, and out of, Haddington Road are to be retained, and a new right turning ban from the Mespil Road to Baggot Street Upper is proposed. Cycle crossing lanes are provided and existing pedestrian crossing facilities are proposed to be updated. The Baggot Street Upper arm of this junction is reduced from two to four lanes.
- 3.5.11. On McCartney Bridge it is proposed to accommodate cycle tracks, widen the footpaths, and provide one general traffic lane in each direction (no dedicated bus lanes). At the Herbert Place/Wilton Terrace junction the two-way cycle track is retained along the Grand Canal side of the roads and cycle crossings of this junction are proposed as well as right- and left- turning bans onto the bridge from Wilton Terrace and Herbert Place respectively. Similar to the inbound approach to the

bridge a controlled bus-priority signal is proposed outbound from Baggot Street Lower to allow outbound buses access to the bridge ahead of general traffic.

- 3.5.12. The Proposed Scheme also proposes improvements to the tow path/ramp along the Grand Canal adjacent to Wilton Terrace. No instream works are required although retaining structures and specific works methodologies (due to the presence of underground ESB oil-insulated cabling) have been included in the application.
- 3.5.13. Along Baggot Street Lower a dedicated bus lane and a general traffic lane are proposed in each direction as well as cycle tracks, the existing median and associated lighting columns and trees are to be retained. A Toucan crossing is proposed opposite Scoil Caitrona (Catherin McAuley National School) and some parking bays are provided. Raised table treatment is provided at the junctions with Pembroke Row, Herbert Street, Lad Lane, and James Street East.
- 3.5.14. At the junction with Fitzwilliam Street Upper/Lower dedicated cycle crossings are provided and the proposed route turns north with bus lanes and general traffic lanes provided in both directions except for small portions of merge lanes provided at the southern (inbound) and northern (outbound) ends of this street. New trees are proposed along the frontage of the ESB headquarters along this Georgian street with a bus priority signal provided at the north of the street in proximity to Merrion Square. The proposed works will require the removal of all car parking from Fitzwilliam Street Lower.
- 3.5.15. The Ballsbridge to Merrion Square section of the Proposed Scheme will provide full bus priority along its entirety through the provision of inbound and outbound (but not continuous) bus lanes as well as priority signals at Pembroke Rd., Baggot Street Upper and Lower, and at Fitzwilliam Street Lower. A bus gate is also proposed on Pembroke Road. The Proposed Scheme includes the provision of the following:
 - Inbound Of a total of five bus stops three existing bus stops will be upgraded in accordance with the scheme design and two will be relocated.
 Four will be shared-landing bus-stops with the remaining one as an island bus stop.
 - Outbound Of a total of six existing bus stops, all are to be relocated to varying degrees and provided in accordance with the proposed design scheme (two as island bus-stops, and the remaining four as shared-landing).

- 3.5.16. Section 4 of the Proposed Scheme includes the following deviations from the minimum stated infrastructure widths as follows:
 - Cycle track in both directions is reduced to 1.5m in width for c. 160m on both sides of the Pembroke Road (R118) to facilitate the retention of existing trees.
 - Inbound cycle track reduced to a width of 1.5m for a distance of c. 30m on Baggot Street Lower. Providing the opportunity to reduce impact on existing coal holes and facilitate the retention of the central median its planting and heritage lighting.
 - Outbound cycle track and footpath reduced to a width of 1.5m for c. 65m on Baggot Street Lower to ensure that the central median, its planting and heritage lighting will not be impacted.
- 3.5.17. Segregated cycle tracks are proposed throughout the entirety of this section of the Proposed Scheme, with a tie-in to a number of routes on the GDA cycle network plan including primary route SO1, secondary routes 13B, SO2 and C7 as well as the Grand Canal Greenway Route. Bike stands are proposed at Ballsbridge Terrace (7 no. near the Dodder and 4 no. outside no. 7), Herbert Park 9 no., Shelbourne Road – existing 5 no. retained), Pembroke Road (R118/R816 junction - 9 no.), Baggot Street Upper (31 no. in five different stands), and Baggot Street Lower (10 no. in two different stands).
- 3.5.18. Overall Section 4 will result in a net loss of in in excess of 100 parking spaces along the route corridor. The majority of these are lost from Pembroke Road between Pembroke Lane and Wellington Road (loss of 29 spaces), Baggot Street Upper (loss of 14 spaces), Baggot Street Lower (loss of 36 spaces) and Fitzwilliam Street Lower (loss of 20 spaces), the remaining reductions in car parking occur on Shelbourne Rd. and Eastmoreland Place. Additional parking from that currently in place is proposed on Waterloo and Wellington roads (with an additional 1 no. and 7 no. car parking spaces being provided respectively).
- 3.5.19. Loading Bays are proposed to be removed from Pembroke Road (between Wellington Road and Waterloo Road -1 no.) and Baggot Street Upper (loading bays will be reduced from 10 no. to 6 no.), while an additional 4 no. loading bays are being provided at on the northern side of Eastmoreland Place and 2 being provided at Wellington Road.

3.5.20. Section 4 of the Proposed Scheme will result in the felling of some individual trees at various locations along Pembroke Road (R118) on both outbound and inbound sides, individual trees will also be felled on Baggot Street Upper. The Proposed Scheme also provides for additional planting of trees (in particular along Pembroke Road (R816), Baggot Street Upper and Lower, as well as along the outbound side of Fitzwilliam Street Lower. The Proposed Scheme also incorporates additional landscaping and planting at the Herbert Park junction, along Eglin Road, the Lansdowne Road junction, Wellington Road, as well as widening the footpaths at Baggot Street Upper.

3.6. Section 5: Nutley Lane

- 3.6.1. Section 5 of the Proposed Scheme runs from the signalised junction of the Stillorgan Road northwest along Nutley Lane to its junction with the Merrion Road. This section of the route is approximately 900m in length and is entirely within the functional area of DCC. It is proposed to provide a bus lane and a general traffic lane in both directions along the entirety of Nutley lane (with the omission of a small portion on the outbound leg to accommodate a right turning lane into SVUH), a two-way cycle track is provided on the southern side of the Lane from the Stillorgan Road junction as far as the entrance to SVUH (where there is a proposed Toucan crossing) and from here a one-way cycle track is provided on each side of the Lane. Footpaths are provided along the entire northern side of Nutley Lane but there is no footpath proposed on the southern side between the entrance to the Elm Park Golf and Sports Club (EPGSC) and SVUH.
- 3.6.2. The Proposed Scheme will require widening to provide the infrastructure set out above, this is proposed to be achieved through land acquisition from RTE, Eir and Merrion Shopping Centre (on the northern side of Nutley Lane) and from EPGSC and SVUH (on the southern side). Where widening occurs it is generally proposed that the existing boundary wall will be removed and a new wall constructed along the new boundary line, however, on the southern side widening along the frontage of the EPGSC it is proposed to remove the existing fence and provide a new reinforced concrete wall with climbing vegetation along the new boundary with a hedgerow behind (i.e. on the EPGSC side of the wall). To accommodate the Proposed Scheme

parking existing parallel parking along the southeast of Nutley Lane is proposed to be removed.

- 3.6.3. Toucan crossings are proposed on this section across Nutley Lane just north of the entrance to the EPGSC and just north of the entrance to SVUH. The entrance into SVUH will also be provided with a Toucan crossing.
- 3.6.4. At the Stillorgan Road junction it is proposed to tie into the future Bray to City Centre Bus Connects project, and the Proposed Scheme will omit the left turning filter lane from Nutley Lane, close an existing domestic vehicular access, and provide dedicated cycle-crossings.
- 3.6.5. Raised table treatments are proposed at the junctions of Nutley Park, Nutley Road, Elm Park, and Nutley Avenue, as well as at the entrances to RTE, EPGSC, Brooklands Apartments and the Merrion Shopping Centre.
- 3.6.6. At the entrance to SVUH a right turning lane access from Nutley Lane is proposed which requires the curtailment of the outbound bus lane for c. 80m. At this location bus priority will be maintained into the short general traffic south-bound lane through the provision of a bus priority-controlled signal on the northern arm of the SVUH-Nutley Lane junction.
- 3.6.7. The Nutley Lane section of the Proposed Scheme will provide full bus priority along its entirety through the provision of inbound (continuous) and outbound (non-continuous) bus lanes as well as the use of one bus priority signal on the northern approach to the SVUH junction. The Proposed Scheme includes the provision of the following:
 - Inbound The two existing bus stops are to be retained at the same locations but upgraded in accordance with the scheme design one will be a shared landing type and the other will be inline (there being no cycle tracks proposed at that location – proximate to RTE on the northern side of Nutley Lane).
 - Outbound Both the existing bus stops are to be relocated and will be of the shared landing typology.
- 3.6.8. Section 5 of the Proposed Scheme includes the following deviation from the minimum stated infrastructure widths as follows:

- Two-way cycle track from c. Nutley Park junction to SVUH junction (distance of c.600m) is reduced to 3.0m in width (from 3.25m) to increase the opportunities to retain existing trees and northwestern side kerb line.
- 3.6.9. Segregated cycle tracks (both two-way and single way) are proposed along this section of the Proposed Scheme.
- 3.6.10. Overall Section 5 will result in a loss of 44 car parking spaces that are currently in place along the south-eastern side of Nutley lane along the frontage of the EPGSC (39 no.) as well as along the Nutley Lane frontage of the Merrion Shopping Centre (5 no. including 4 no. accessible spaces). There is no new car parking proposed along this section.
- 3.6.11. Two loading bays are proposed to be removed from the Nutley Lane frontage of the Merrion Shopping Centre.
- 3.6.12. Section 5 of the Proposed Scheme will result in the felling of street trees at various locations along Nutley Lane, the boundary planting in place along its frontage is proposed to be removed to accommodate the route widening. Similarly, along the frontage of EPGSC boundary hedging is proposed to be removed to facilitate route widening. Mature trees in place along the road and existing footpath are also to be removed, as are trees and hedging along the SVUH frontage. Additional hedging is proposed along the new boundary (SVUH) and in the case of EPGSC this is to be provided behind a new boundary wall.

3.7. Drainage

3.7.1. The surface water drainage system for the Proposed Scheme will discharge to 3 surface water receptors: Brewery Stream_10, Dublin Bay, and Ringsend Wastewater Treatment Plant (WwTP), all of which ultimately train to Dublin Bay. The Proposed Scheme will result in a net increase of 3,797m² in the impermeable area discharging to Dublin Bay. The drainage incorporated within the Proposed Scheme has been designed to ensure run off will be attenuated (through use of filter drains, seal drains, tree pits, oversized pipes, and bio retention / rain garden areas) accordingly there will be no net increase in surface water flow discharged to these receptors.

3.8. Construction

- 3.8.1. The construction phase is estimated to last for 24 months and will be carried out in phases along the corridor, in this regard the Board is referred to table 5.2 of the EIAR which sets out the proposed phases, and duration of the construction programme over the total of 16 different sections of the route. The programme and location of works has been designed to provide as much separation between sections under construction at any given time. The main components of each of the construction stages are set out below:
 - Site preparation and clearance,
 - Removal of existing boundaries, pavements, lighting columns, bus stops, and signage,
 - Protection and/or diversion of buried services,
 - Road widening, pavement reconstruction, and kerb improvements,
 - Reconfiguration of traffic lanes throughout,
 - Installation of new bus stops and junction/roundabout modification,
 - Property boundary reinstatement, signage replacement, relocation of and/or installation of lighting columns, and
 - Landscaping and tree planting and reinstatement of temporary land acquisitions.

3.9. Operational Phase

3.9.1. The primary characteristics of the operational phase will be the presence and operation of the relevant road network which should experience significant modal shift both in terms of methods of transport chosen (i.e. increased bus, pedestrian, cycle, e-cycle, and e-scooter traffic, combined with reduced use of the private car traffic), as well as updates in transport/vehicle technology using the route. There will also be additional lighting provided as well as ongoing traffic management and routine maintenance. It is stated that following provision of the routes maintenance and operations will be transferred to the relevant local authorities.

4.0 Planning Policy Context

4.1. Sustainable and Smart Mobility Strategy 2020 (EU Commission 2020)

- 4.1.1. The Smart and Mobility Strategy is part of the EU Green Deal and aims to reduce transport emissions by 90% until 2050. The Commission intends to adopt a comprehensive strategy to meet this target and ensure that the EU transport sector is fit for a clean, digital, and modern economy. Objectives include:
 - increasing the uptake of zero-emission vehicle,
 - making sustainable alternative solutions available to the public & businesses,
 - supporting digitalisation & automation, and
 - improving connectivity & access.

4.2. The Climate Act 2021

4.2.1. The Climate Action and Low Carbon Development (Amendment) Act 2021 (Climate Act, 2021), commits Ireland to a legally binding 51% reduction in overall greenhouse gas emissions by 2030 and to achieving net zero emissions by 2050. As part of its functions the Board must, in so far as practicable, perform its functions in a manner that is consistent with the most recent approved climate action plan, the most recent approved national long term climate action strategy, the national adaptation framework, sectoral plans, furtherance of the national climate objective and the objective of mitigating greenhouse gas emissions and adapting to the effects of climate change in the State⁵.

4.3. Climate Action Plan 2023

4.3.1. The Climate Action Plan 2023 (CAP23) sets out a roadmap to halve emissions by 2030 and reach net zero by 2050. CAP23 is the first to implement carbon budgets and sectoral emissions ceilings that were introduced under the Climate Action and Low Carbon Development (Amendment) Act, 2021. Sector emission ceilings were

⁵ Section 15(1) of the Climate Action and Low Carbon Development Act 2015 (as amended) refers.

approved by Government in July 2022 for a number of sectors which included a 50% reduction in transport emissions.

- 4.3.2. A just transition is embedded in CAP23 to equip people with the skills to benefit from change and to acknowledge that costs need to be shared. Large investment will be necessary through public and private sectors to meet CAP23 targets and objectives.
- 4.3.3. The electricity sector will help to decarbonise the transport sector and will face a huge challenge to meet requirements under its own sectoral emissions ceiling.
 CAP23 reframes the previous pathway outlined in CAP21 under the Avoid-Shift-Improve Framework to achieve a net zero decarbonisation pathway for transport. This is a hierarchical framework which prioritises actions to reduce or avoid the need to travel; shift to more environmentally friendly modes; and improve the energy efficiency of vehicle technology.
- 4.3.4. Road space reallocation is a measure outlined under both 'avoid' and 'shift' to promote active travel and modal shift to public transport. It is recognised that road space reallocation can redirect valuable space from on-street car-parking and public urban roadways to public transport and active travel infrastructure (such as efficient bus lanes, and more spacious footpaths and segregated cycle-lanes), whilst also leading to significant and wide-scale improvements in our urban environments. A National Demand Management Strategy is to be developed⁶ with the aim of reducing travel demand and improving sustainable mobility alternatives.
- 4.3.5. The major public transport infrastructure programme set out in the National Development Plan (NDP) rebalances the share of capital expenditure in favour of new public transport schemes over road projects. BusConnects in each of the five cities, the DART+ Programme and Metrolink will continue to be progressed through public consultations and the planning systems. BusConnects is a key action under the major public transport infrastructure programme to deliver abatement in transport emissions, as outlined in CAP23 for the period 2023-2025.

⁶ With public consultation on the draft strategy intended to commence in early 2024, Answer from Minister for Transport to Oireachtais question 10th October 2023.

4.4. National Development Plan 2021-2030

- 4.4.1. The National Development Plan 2021-2030 (NDP) sets out the Governments overarching investment strategy and budget for the period 2021-2030. The NDP contains a range of investments and measures which will be implemented over the coming years to facilitate the transition to sustainable mobility. These measures include significant expansions to public transport options, including capacity enhancements on current assets and the creation of new public transport links through programmes such as MetroLink.
- 4.4.2. The NDP recognises BusConnects as one of the Major Regional Investments for the Eastern and Midland Region and this scheme is identified as a Strategic Investment Priority within all five of Irelands major cities.
- 4.4.3. Over the NDP period approximately €360 million per annum will be invested in walking and cycling infrastructure in cities, towns, and villages across the country.
- 4.4.4. Transformed active travel and bus infrastructure and services in all five of Ireland's major cities is fundamental to achieving the overarching target of 500,000 additional active travel and public transport journeys by 2030. The NDP notes BusConnects will overhaul the current bus system in all five cities by implementing a network of 'next generation' bus corridors including segregated cycling facilities on the busiest routes to make journeys faster, predictable, and reliable.
- 4.4.5. The NDP states that there will be significant progress made on delivering BusConnects over the lifetime of the Plan with the construction of Core Bus Corridors expected to be substantially complete in all five cities by 2030.

4.5. National Planning Framework Project Ireland 2040

- 4.5.1. The NPF provides policies, actions, and investment to deliver the 10 National Strategic Outcomes (NSOs) and priorities of the National Development Plan. These include compact growth, enhanced regional accessibility, sustainable mobility and transition to a low carbon and climate resilient society.
- 4.5.2. Managing the challenges of future growth is critical to regional development. A more balanced and sustainable pattern of development, with a greater focus on addressing employment creation, local infrastructure needs and addressing the

legacy of rapid growth, must be prioritised. This means that housing development should be primarily based on employment growth, accessibility by sustainable transport modes and quality of life, rather than unsustainable commuting patterns.

- 4.5.3. It is recognised with respect to sustainable mobility that Dublin and major urban areas are too heavily dependent on road and private, mainly car-based transport, with the result that our roads are becoming more and more congested. The NPF encourages the expansion of attractive public transport alternatives to car transport to reduce congestion and emissions and enable the transport sector to cater for the demands associated with longer term population and employment growth in a sustainable manner.
- 4.5.4. NSO 4 of the NPF recognises that Dublin and other cities and major urban areas are too heavily dependent on road and private, mainly car based, transport with the result that our roads are becoming more and more congested. The National Development Plan makes provision for investment in public transport and sustainable mobility solutions to progressively put in place a more sustainable alternative. NSO 4 supports the delivery of the key public transport objectives of the Transport Strategy for the Greater Dublin Area 2016-2035 by investing in projects such as New Metro Link, the DART Expansion Programme, and BusConnects in Dublin as well as key bus-based projects in the other cities and towns. Furthermore NSO 4 provides support to develop a comprehensive network of safe cycling routes in metropolitan areas to address travel needs.

4.6. National Investment Framework for Transportation in Ireland, 2021.

4.6.1. The National Investment Framework for Transportation in Ireland, 2021 (NIFTI) is the strategic framework for future investment decision making in land transport to facilitate the NPF and support climate change policies. The four investment priorities under the NIFTI are decarbonisation, protection and renewal, mobility of people and goods in urban areas, and enhanced regional and rural connectivity. One of the key challenges identified within this document relates to transport and the ability to maintain existing transport infrastructure whilst ensuring resilience of the most strategically important parts of the network. Population projections are expected to increase into the future and a consistent issue identified within the five cities of

Ireland is congestion. Given space constraints, urban congestion will primarily have to be addressed by encouraging modal shift to sustainable modes.

- 4.6.2. Within the cities, frequent and reliable public transport of sufficient capacity and highquality active travel infrastructure can incentivise people to travel using sustainable modes rather than by car.
- 4.6.3. BusConnects is identified as a project which will alleviate congestion and inefficiencies in the bus service. The revised NDP 2021- 2030 sets out details of a new National Active Travel Programme with funding of €360 million annually for the period from 2021 to 2025.

4.7. National Sustainable Mobility Policy

- 4.7.1. This Policy sets out a strategic framework to 2030 for active travel and public transport journeys to help Ireland meet its climate obligations. An Action Plan for sustainable mobility to 2025 is included, which aims to provide safe, green, accessible, and efficient alternatives to car journeys. Action 23 is the commencement of delivery of BusConnects CBC infrastructure works.
- 4.7.2. Safe and green mobility is supported in the Policy by:
 - Continuing to protect and maintain the safety of existing walking, cycling and public transport networks and ensuring that new sustainable mobility infrastructure meets the highest safety standards.
 - Developing pedestrian enhancement plans and cycle network plans to guide investment in new active travel infrastructure and retrofitting of existing infrastructure.
 - Expanding bus capacity and services through the BusConnects Programmes in the five cities of Cork, Dublin, Galway, Limerick, and Waterford; improved town bus services; and the Connecting Ireland programme in rural areas.
 - Rebalancing transport movement in metropolitan areas and other urban centres away from the private car and towards active travel and public transport.

4.8. Regional Spatial Economic Strategy for the Eastern and Midlands Region

- 4.8.1. The Regional Spatial Economic Strategy for the Eastern and Midlands Region (RSES) sets out the strategic plan and investment framework for the region which consists of counties Longford, Westmeath, Offaly, Laois, Louth, Meath, Kildare, Wicklow, Fingal, and Dublin and all their constituent local authorities.
- 4.8.2. Chapter 5 of the RSES refers to the Dublin Metropolitan Area Strategic Plan (MASP). The MASP is an integrated land use and transportation strategy for the Dublin Metropolitan Area that sets out a vision for the future growth of the metropolitan area and key growth enablers. Section 5.3 sets out the guiding principles for the growth of the Dublin Metropolitan Area and includes "Integrated Transport and Land use" which covers a range of issues from focusing growth along existing and proposed high quality public transport corridors to supporting the delivery of BusConnects and other public transport programmes. Regional Policy Objective (RPO) 5.2 refers, which states:

"Support the delivery of key sustainable transport projects including Metrolink, DART and LUAS expansion programmes, BusConnects and the Greater Dublin Metropolitan Cycle Network and ensure that future development maximises the efficiency and protects the strategic capacity of the metropolitan area transport network, existing and planned."

- 4.8.3. RPO 5.3 is also relevant which states: "Future development in the Dublin Metropolitan Area shall be planned and designed in a manner that facilitates sustainable travel patterns, with a particular focus on increasing the share of active modes (walking and cycling) and public transport use and creating a safe attractive street environment for pedestrians and cyclists".
- 4.8.4. Section 5.6 of the RSES 'Integrated Land use and Transportation' references the key transport infrastructure investments in the metropolitan area as set out in national policy which includes ... "Within the Dublin Metropolitan Area, investment in bus based public transport will be delivered through BusConnects, which aims to overhaul the current bus system in the Dublin metropolitan area, including the introduction of Bus Rapid Transit." Chapter 8 'Connectivity' of the RSES also references that bus infrastructure and services will be delivered through

BusConnects (Section 8.4 refers), while RPO 8.18 also references BusConnects as supporting improved access to Dublin Airport.

4.9. Transport Strategy for the Greater Dublin Area 2022-2042

- 4.9.1. The 2022-2042 Transport Strategy sets out a framework for investment in transport infrastructure and services in the Greater Dublin Area (GDA) up to 2042. The Transport Strategy recognises a wide range of challenges for transport underpinned by climate change; the Covid 19 pandemic; servicing the legacy development patterns; revitalising city and town centres; transforming the urban environment; ensuring universal access; serving rural development; improving health and equality; fostering economic development; and delivering transport schemes.
- 4.9.2. The overall aim of the Transport Strategy is "to provide a sustainable, accessible and effective transport system for the Greater Dublin Area which meets the region's climate change requirements, serves the needs of urban and rural communities, and supports the regional economy."
- 4.9.3. Chapters 10, 11 and 12 of the Transport Strategy address walking, accessibility, and the public realm; cycling and personal mobility vehicles; and public transport respectively, and these sections relate both directly and indirectly to the proposed BusConnects programme.
- 4.9.4. Chapter 12 sets out the strategy for an overall public transport system for the region, central to which is the delivery of a comprehensive bus network, based on enhanced level of service and much greater on-street priority. Section 12.2.2 of the Transport Strategy notes that BusConnects Dublin comprises a range of elements including approximately 230km of radial bus priority and 200km of cycle routes, a new bus service network, new bus stops and shelters, low/zero emissions bus fleet, new park and ride interchanges, and a revised fare structure. The Proposed Scheme is one of 12 radial schemes being brought forward under this programme to facilitate faster and more reliable bus journeys on the busiest bus corridors in the Dublin region. Key elements of the Cycle Network Plan will also be delivered along these corridors. The following measures in the Transport Strategy relate to the roll out of BusConnects:

- BUS1 Core Bus Corridor Programme: Subject to receipt of statutory consents, it is the intention of the NTA to implement the 12 Core Bus Corridors as set out in the BusConnects Dublin programme.
- BUS2 Additional Radial Core Bus Corridors: It is the intention of the NTA to evaluate the need for, and deliver, additional priority on radial corridors.
- BUS3 Orbital and Local Bus Routes: It is the intention of the NTA to provide significant improvements to orbital and local bus services in the following ways:
 - Increase frequencies on the BusConnects orbital and local bus services; and
 - Providing bus priority measures at locations on the routes where delays to services are identified.
- 4.9.5. A new Dublin area bus service network will be arranged on the basis on spines radiating from the city centre, orbitals around the city, other city bound routes, local routes, peak only services, and express routes. Periodic review will take place to implement appropriate additions or adjustments to the overall bus system.
- 4.9.6. With respect to walking, accessibility, and the public realm, it is recognised in the Transport Strategy that better urban design and placemaking will encourage more people to walk, cycle or use public transport. Specific measures are outlined to incorporate a high standard of urban design and placemaking into major public transport infrastructure schemes and walking and cycling projects, taking account of architectural heritage (PLAN14 and PLAN15 of the Transport Strategy refer). Furthermore, measure PLAN16 seeks the reallocation of road space to prioritise walking, cycling and public transport use and the placemaking functions of the urban street network. Other specific measures relating to walking, accessibility and public realm include Measure WALK2 Improved Footpaths; Measure WALK4 Improved Junctions; Measure WALK6 Crossing Points; Measure WALK8 Traffic-Free Streets and Pedestrianisation; and Measure WALK9 regarding those with disabilities or mobility impairments.
- 4.9.7. In terms of cycling and personalised mobility vehicles, it is the intention of the NTA and the local authorities to deliver a safe, comprehensive, attractive, and legible

cycle network in accordance with the updated Greater Dublin Area Cycle Network (Measure CYC1 of the Transport Strategy refers). It is noted that some of the cycle provision included in BusConnects schemes examines the appropriateness of emerging international approaches to design standards. As the number of cyclists grows, the requirement to ensure that cyclists can travel unimpeded along their entire journey becomes critical and this needs to be reflected in how cycle infrastructure and other traffic is managed. This is reflected in the Transport Strategy through Measure CYC2 – Cycle Infrastructure Design; Measure CYC3 – Extended Hours of Operation of Cycle Infrastructure; and Measure CYC4 – Maintenance of Cycle Infrastructure.

4.9.8. Chapter 17 provides the outcomes and how the Strategy contributes to an enhanced natural and built environment (consolidated development, public realm and placemaking, reduced impacts of traffic, improved air quality and noise levels); how the Strategy leads to more connected communities and better quality of life (enhanced community interaction, high quality public transport coverage); how the Strategy contributes to a strong and sustainable economy; and how the Strategy fosters an inclusive transport system (equality, health and access to jobs).

4.10. Greater Dublin Area Cycle Network Plan

- 4.10.1. The Greater Dublin Area Cycle Network Plan 2013 consisted of the urban network, inter-urban network, and green route network for each of the seven local authority areas comprising the Greater Dublin Area (GDA) (i.e., DCC, DLRCC, South Dublin, Fingal, Meath, Kildare, and Wicklow County Councils). The key goal of the Cycle Network Plan was to ensure that a cycling culture is developed to an extent that by 2020, 10% of all journeys will be by bike via a high quality and extensive cycle route network. A higher cycling modal share in urban areas is required to compensate for rural areas.
- 4.10.2. Two primary cycle routes were identified along the proposed scheme (Cycle Routes 13 and 13A). There are also a number of secondary, (other primary) and greenway cycle routes which connect with/traverse the Proposed Scheme and which will use junctions that will be subject to works, these routes include 13E/N5, SO3/Dodder Greenway, N10 Grand Canal Greenway/SO1/N10, and C7.

4.10.3. The updated Greater Dublin Area Cycle Network was published along with the Greater Dublin Area Transport Strategy, 2022-2042. It is stated in the Strategy that "while the 2013 Plan has provided a robust framework for such investment to date, evolutions in cycle policy, design guidance and urban form since its publication have prompted an update of the network. This review has ensured that the network proposed is fit for purpose and takes account of the needs of the full spectrum of users and trip types. The revised GDA Cycle Network forms part of the Transport Strategy and is published in full alongside this report." The primary and secondary routes within the updated network plan remain consistent with those of the 2013 plan in relation to the Belfield/Blackrock Core BusConnects route, however, a number of additional feeder cycle routes have also been identified connecting with or traversing the Proposed Scheme.

4.11. Cycle Design Manual, September 2023

- 4.11.1. The Cycle Design Manual 2023 replaced the previous 2011 National Cycle Manual and draws on the experience of cycle infrastructure development over the past decade and international best practice to help deliver safe cycle facilities for people of all ages and abilities. The Manual is intended as a live document that will be updated to reflect emerging best practice.
- 4.11.2. Chapter 2 of the Manual sets out the five main requirements (safety, coherence, directness, comfort, and attractiveness) that designs should fulfil to cater for existing cyclists and to attract new cyclists to the network. Key design principles include a network approach, segregation, and inclusive mobility. Information is also provided on the types of cycle vehicles, cycle links, appropriate facilities, and width calculations.
- 4.11.3. Chapter 3 of the Manual addresses cycle network planning, as well as the planning of cycling in private developments and public infrastructure projects. Designing for cycling is covered in Chapter 4,
- 4.11.4. The Manual makes a single reference to BusConnects under protected junctions, where it is noted that a small number of such junctions have been implemented in Ireland and many more are currently being planned under active travel schemes around the country and on BusConnects corridors in Dublin and regional cities. The

Manual anticipates that the continued rollout of protected junctions will improve junction consistency and coherence on the cycle network.

4.12. Design Manual for Urban Roads and Streets, 2019

- 4.12.1. This Manual provides guidance on how to approach the design of urban streets in a more balanced way. To encourage more sustainable travel patterns and safer streets, the Manual states that designers must place the pedestrian at the top of the user hierarchy, followed by cyclists and public transport, with the private car at the bottom of the hierarchy. The following key design principles are set out to guide a more place-based/ integrated approach to road and street design.
 - To support the creation of integrated street networks which promote higher levels of permeability and legibility for all users, and in particular more sustainable forms of transport.
 - The promotion of multi-functional, place-based streets that balance the needs of all users within a self-regulating environment.
 - The quality of the street is measured by the quality of the pedestrian environment.
 - Greater communication and communication and cooperation between design professionals through the promotion of a plan-led multidisciplinary approach to design.
- 4.12.2. The Manual recommends that bus services should be directed along arterial and link streets and that selective bus detection technology should be considered that prioritises buses. It is noted that under used or unnecessary lanes can serve only to increase the width of carriageways (encouraging greater speeds) and can consume space that could otherwise be dedicated to placemaking /traffic calming measures.

4.13. Dun Laoghaire-Rathdown County Development Plan 2022-2028

4.13.1. Approximately 2.9 kilometres of the Proposed Scheme corridor (from where it commences at Stradbrook/Temple Road to approximately the junction of Trimleston Avenue and Rock Road) lies within the functional area of Dun Laoghaire-Rathdown County Council (DLR). The Dun Laoghaire-Rathdown County Development Plan 2022-2028 (DLRCDP) was adopted by the Elected Members on the 10th of March

2022. The DLRCP is underpinned by the following five interrelated Strategic County Outcomes.

- 1) Creation of a climate resilient County,
- 2) Creation of a compact and connected County,
- 3) Creation of a Network of liveable Towns and Villages,
- 4) Creation of an inclusive and healthy County, and
- 5) Creation of a vibrant economic County.
- 4.13.2. Chapter 5 of the DLRCDP refers to Traffic and Mobility, and the introduction to this chapter states that "A holistic approach to transport is required with the aim to reduce dependency on the private car in favour of walking, cycling and public transport," with the aim of reducing congestion, create a more liveable city and reduce greenhouse gas emissions. The overall policy approach outlined in the DLRCDP is:
 - To adopt the "Avoid-Shift-Improve Approach" to transport, (built around the principles of reducing/avoiding the need to travel, shift to environmentally friendly modes of travel and improving the efficiency of transport modes and vehicle technology).
 - To integrate land use and transport policies.
 - To support the demand management approach which focuses on moving people from the private car to more sustainable modes.
 - To improve permeability for the pedestrian and cyclist.
 - To improve attractive high quality inclusive and connected walking and cycling networks with direct routes to local destinations at public transport hubs.
 - To adopt a balanced approach to road and street design in accordance with the four core principles of the design manual for urban roads and streets (2019) (DMURS) - connected networks multifunctional streets pedestrian focus and a multidisciplinary approach resulting in a more place based/integrated street design.
- 4.13.3. Policy Objectives of the DLRCDP which are relevant in relation to the current Proposed Scheme include the following:

- T1: Integration of Land Use and Transport Policies. It is a policy objective to actively support sustainable modes of transport and ensure that land use and zoning are aligned with the provision and development of high-quality public transport systems.
- T3: Delivery of enabling transport infrastructure. It is a policy objective to support the delivery of enabling transport infrastructure to allow development take place in accordance with the core strategy of this plan and the settlement strategy of the RSES. (In relation to policy objective T3 the DLRCDP lists BusConnects as enabling transport infrastructure).
- T4: Development of Sustainable Travel and Transport. It is a policy objective to promote, facilitate and cooperate with other transport agencies in securing the implementation of the transport strategy for the County and the wider metropolitan area as set out in the Department of Transport's "Smarter Travel, A Sustainable Transport Future 2009 2020" and subsequent updates, the NTA's "Transport Strategy for the Greater Dublin Area 2016-2035" and subsequent updates, the RSES and the MASP.
- T5: Public Transport Improvements. It is a policy objective to expand attractive public transport alternatives to carry transport as set out in "Smarter Travel, A Sustainable Transport Future" and subsequent updates the NTA's "Transport Strategy for the Greater Dublin area 2016 – 2035" and the NTA's "Integrated Implementation Plan 2019 to 2024" and subsequent updates by optimizing existing or proposed transport corridors, interchanges, developing new park and rides, taxi ranks, and cycling network facilities at appropriate locations.
- T6: Quality Bus Network/Bus Connects. It is a policy objective to cooperate with the NTA and other relevant agencies to facilitate the implementation of the bus network measures as set out in the NTA's "Greater Dublin Area Transport 2016 to 2035" and "Integrated Implementation Plan 2019 2024" and the BusConnects programme, and to extend the bus network to other areas where appropriate subject to design, environmental assessment, public transit consultation, approval, finance, and resources.

- T7: Public Transport Interchanges. "It is a Policy Objective to facilitate the provision of quality public transport interchanges at strategic rail, Luas stations and Core Bus Corridors within the County in accordance with national and regional guidelines in order to facilitate focussed access to multiple public transport modes and to maximize the movement of people via sustainable modes."
- **T11: Walking and Cycling.** "It is a policy objective to secure the development of a high quality, fully connected and inclusive walking and cycling network across the county and the integration of walking, cycling and physical activity with placemaking including public realm permeability improvements."
- 4.13.4. The DLRCDP describes BusConnects Dublin as "a programme of integrated projects being progressed by the National Transport Authority, which seeks to overhaul the current bus system in the Dublin area. It comprises several parallel strands of activity, including: Core Bus Corridors (CBCs) Infrastructure Works, including new segregated cycling facilities...." The Plan goes on to identify the following core bus corridors as being relevant radial routes to and from the City Centre:
 - The Bray to City Centre Core Bus Corridor which will run through Shankill and along the N11.
 - The Blackrock to Merrion Core Bus Corridor which will run along Temple Hill, Frascati Road and Rock Road.
 - The UCD to Ballsbridge Core Bus Corridor which will run along the N11 and Nutley Lane.
- 4.13.5. Chapter 11 of the DLRCDP refers to Heritage and Conservation. Policy Objectives HER1 and HER2 refer to the protection of archaeological sites, national monuments, and their settings, as well as expressing the preference for preservation of archaeological material insitu, if this is not possible a minimum of by preservation by record is required.
- 4.13.6. The Proposed Scheme runs by a number of Protected Structures. Section 11.4 of the DLRCP refers to Architectural Heritage and the Record of Protected Structures (RPS). In relation to the RPS Policy Objective HER8 is pertinent, it refers to works to Protected Structures and states that it is a policy objective to:

- i. Protect structures included on the RPS from any works that would negatively impact their special character and appearance.
- Ensure that any development proposals to Protected Structures, their curtilage and setting shall have regard to the 'Architectural Heritage Protection Guidelines for Planning Authorities' published by the Department of the Arts, Heritage, and the Gaeltacht.
- iii. Ensure that all works are carried out under supervision of a qualified professional with specialised conservation expertise.
- iv. Ensure that any development, modification, alteration, or extension affecting a Protected Structure and/or its setting is sensitively sited and designed, and is appropriate in terms of the proposed scale, mass, height, density, layout, and materials.
- v. Ensure that the form and structural integrity of the Protected Structure is retained in any redevelopment and that the relationship between the Protected Structure and any complex of adjoining buildings, designed landscape features, or views and vistas from within the grounds of the structure are respected.
- vi. Respect the special interest of the interior, including its plan form, hierarchy of spaces, architectural detail, fixtures and fittings and materials.
- vii. Ensure that new and adapted uses are compatible with the character and special interest of the Protected Structure.
- viii. Protect the curtilage of protected structures and to refuse planning permission for inappropriate development within the curtilage and attendant grounds that would adversely impact on the special character of the Protected Structure.
- ix. Protect and retain important elements of built heritage including historic gardens, stone walls, entrance gates and piers and any other associated curtilage features.
- Ensure historic landscapes and gardens associated with Protected
 Structures are protected from inappropriate development.

- 4.13.7. Policy HER 13 refers to Architectural Conservation Areas (ACAs), it states that it is a policy objective to, inter alia, protect the character and special interest of ACAs, ensure that development proposals within ACAs are appropriate to the character of the area in terms of design, scale, materials etc., ensure that street furniture is kept to a minimum and of good design. Policy Objective HER16, (relates to public realm and Public Utility works) within ACAs. The Proposed Scheme does not run through any ACAs in the DLR area.
- 4.13.8. Policy Objective HER22 states that historic street furniture is to be retained where it contributes to character of the area and where works are intended to the public realm, it is to be of a high standard of design and workmanship and use appropriate materials.
- 4.13.9. Policy Objective HER23 requires that development proposals must have regard to items identified in the Industrial Heritage Survey and Policy Objective HER24 encourages the retention of features of coastal heritage and for development proposals to have regard to the Coastal Architecture Heritage Survey.
- 4.13.10. Chapter 8 of the DLRCDP relates to Green Infrastructure, Landscape, and Biodiversity. Policy Objective GIB6 refers to views and prospects and states that it is an objective to preserve, protect and encourage the enjoyment of views and prospects of special amenity value or special interest and to prevent development which would block or otherwise interfere with them. There are mapped views/prospects from the Rock Road over Blackrock Park and Booterstown Park (including over the site of the proposed construction compound) towards the sea. GIB8 states that it is a policy objective to upgrade recreational and tourism-related amenities in public parks and harbours along the coastline including improving accessibility.
- 4.13.11. In relation to Biodiversity, GIB18 of the DLRCDP states that it is a policy objective to protect and conserve the environment including, in particular the natural heritage of the Council and Nationally and Internationally important and EU designated sites. (The DLRCDP notes that the implementation of this policy involves inter alia the protection of existing woodlands, trees and hedgerows including those listed under Tree Preservation orders). Policy Objective GIB19 relates to the Habitats Directive to ensure the protection of the Natura 2000 network and GIB2

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which promotes the maintenance and delivery of favourable consideration status to habitats and species within designated sites.

- 4.13.12. GIB22 refers to non-designated areas of biodiversity importance and states that it is a policy objective to protect and promote the conservation of biodiversity (notable sites, habitats, and features of biodiversity) outside designated areas. GIB24 refers to the protection of the natural character of rivers and waterway corridors, GIB25 relates to the protection of hedgerows. OSR7: Trees, Woodland and Forestry, states that it is a policy objective to implement the objectives and policies of the tree policy and the forthcoming tree strategy for the County, to ensure that tree cover in the county is managed, and developed to optimize the environmental, climatic, and educational benefits, which derive from an 'urban forest', and include a holistic 'urban forestry' approach.
- 4.13.13. The Proposed Scheme runs adjacent to a variety of land use zoning objectives including:
 - A: To provide residential development and improve residential amenity while protecting the existing residential amenities.
 - E: To provide for economic development and employment.
 - F: To preserve and provide for open space with ancillary active recreational amenities.
 - DC: To protect, provide for and/or improve mixed-use district centre facilities.
 - SNI: To protect, improve and encourage the provision of sustainable neighbourhood infrastructure.
 - NC: To protect, provide for and-or improve mixed-use neighbourhood centre facilities.

There are a number of protected structures along the route and the Proposed Scheme itself is designated as a Core Bus Corridor in the DLRCDP.

4.14. Blackrock Local Area Plan 2015-2025

4.14.1. The Proposed Scheme runs within the Blackrock Local Area Plan (BLAP) boundary, this plan was adopted in 2015 and in 2020 it's life was extended to March 2025. The

BLAP (consistent with the DLRCDP) designates the route of the Proposed Scheme as a "Proposed Quality Bus Corridor/Bus Priority Route" (along the Frascati Road, Temple Hill and Stradbrook Road, and has provisions for the preservation of views from the Rock Road over Blackrock Park. The following are other relevant policies and objectives of the BLAP:

- BK 12 to promote the principles of sustainable travel both to/from and within the Blackrock Local Area Plan Boundary."
- Junction improvement objectives include improving road safety for motorists, cyclists, and pedestrians in the vicinity of Temple Hill/Stradbrook Road and Newtownpark Avenue Junctions.
- The general provisions in relation to natural, architectural, and archaeological heritage sites and protected structures are consistent with those of the DLRCDP.
- Public Transport Objective PT3 notes that it is an objective (with the agreement of the NTA) to facilitate the provision of appropriate bus routes and stops in co-ordination with the overall Blackrock Transport Network Strategy.
- Objective R18 states that the council will facilitate the future upgrade of the junction at Temple Hill / Newton Avenue / Saint Vincent Park in tandem with the redevelopment of adjoining landholdings.

4.15. Dun Laoghaire-Rathdown County Biodiversity Action Plan 2021-2025

- 4.15.1. The Dun Laoghaire-Rathdown County Biodiversity Action Plan 2021-2025 (DLR Biodiversity Plan) recognises that as an urban environment there are many challenges for biodiversity, nature recovery, restoration and reconnection are the core aims of the plan. The DLR Biodiversity Plan sets out five themes supported by objectives and actions these themes are set out below:
 - 1. Reaching a deeper understanding of the County's Biodiversity.
 - 2. Making good decisions for biodiversity.
 - 3. Powerful actions to protect biodiversity and us.
 - 4. Connecting people and nature and inspire a positive future.

- 5. Strength in working together.
- 4.15.2. Theme 2 is supported by Objective 2 "Mainstream biodiversity into decision-making and improve the management of this valuable resource". The importance of Booterstown Marsh is acknowledged in the DLR Biodiversity Action Plan and Action 3.13 (referring to Theme 3) reflects this by stating "Protect and enhance Booterstown Marsh, an important, unique coastal area within DLR and an EU Natura 2000 site." River/Coastal wildlife corridors are also identified along the coastline in the vicinity of the proposed scheme. Blackrock Park is also noted and identified as a Locally Important Biodiversity Site (LIBS). LIBS are areas that are outside of protected areas, but which form an integral part the ecological network.

4.16. Dublin City Development Plan 2022-2028

- 4.16.1. Approximately 5.5 kilometres of the Proposed Scheme corridor lies within the functional area of Dublin City Council (DCC) from the junction of the Rock Rd./Trimleston Ave. to Fitzwilliam Street Lower (4.6km approx.) and along Nutley Lane (approx. 900m).
- 4.16.2. The main strategic approach of the Dublin City Development Plan 2022-2028⁷ (DCDP) is to develop a city that is low carbon, sustainable and climate resilient. Chapter 8 of the DCDP relates to sustainable movement and transport, and highlights that the sustainable and efficient movement of people and goods is crucial for the success and vitality of the city, along with the need to move away from private car and fossil-fuel-based mobility to reduce the negative impacts of transport and climate change. Towards this end Objective SMTO01 states: *"To achieve and monitor a transition to more sustainable travel modes including walking, cycling and public transport over the lifetime of the development plan, in line with the city mode share targets of 26% walking/cycling/micro mobility; 57% public transport (bus/rail/Luas); and 17% private (car/van/HGV/motorcycle)".*
- 4.16.3. Table 8.1 of the DCDP sets out current and target mode share with cycling expected to increase by 7% by 2028 and public transport (bus, rail, and Luas) by 3% in the same timeline. It is stated that the modest increase in public transport mode share anticipates the construction of major public transport infrastructure that is proposed

⁷ Adopted on the 2nd of November 2022, came into effect 14th December 2022.

to occur over the lifetime of the plan, and accordingly the impact of public transport infrastructure projects on modal share is more likely to come into fruition during the lifespan of the following City plan.

- 4.16.4. Key strategic transport projects such as the proposed Metrolink, DART+, BusConnects programme and further Luas line and rail construction and extension will continue the expansion of an integrated public transport system for the Dublin region and have the potential for a transformative impact on travel modes over the coming years. Dublin City Council actively supports all measures being implemented or proposed by other transport agencies to enhance capacity on existing lines/services and provide new infrastructure. In this regard SMT22 - Key Sustainable Transport Projects, seeks "to support the expeditious delivery of key sustainable transport projects so as to provide an integrated public transport network with efficient interchange between transport modes, serving the existing and future needs of the city and region and to support the integration of existing public transport infrastructure with other transport modes. In particular the following projects subject to environmental requirements and appropriate planning consents being obtained: DART +, Metrolink from Charlemount to Swords, BusConnects Core Bus Corridor projects, Delivery of Luas to Finglas, Progress and delivery of Luas to Poolbeg and Lucan"
- 4.16.5. Section 8.5.3 of the DCDP notes the importance of reducing car dominance and that encouraging walking, cycling and use of public transport as sustainable travel modes requires improving the attractiveness of the environment and public realm within the city and urban villages. It is recognised that there are opportunities for developing the public realm around the City and in the urban villages where new public transport proposals are being developed. The following policies are relevant in this regard:
 - Policy SMT12 Pedestrians and Public Realm: To enhance the attractiveness and liveability of the city through the continued reallocation of space to pedestrians and public realm to provide a safe and comfortable street environment for pedestrians of all ages and abilities.
 - Policy SMT13 Urban Villages and the 15-Minute City: To support the role of the urban villages in contributing to the 15-minute city through improvement of

connectivity in particular for active travel and facilitating the delivery of public transport infrastructure and services, and public realm enhancement.

- Policy SMT14 City Centre Road Space: To manage city centre road-space to best address the needs of pedestrians and cyclists, public transport, shared modes, and the private car, in particular, where there are intersections between DART, Luas and Metrolink and with the existing and proposed bus network.
- 4.16.6. The DCDP acknowledges that kerbside space is being continually reduced in favour of transport infrastructure and public realm improvements, and as such, there is very limited capacity on street to meet the servicing requirements of developments. Policy SMT15 'Last-Mile' Delivery seeks to "...achieve a significant reduction in the number of motorised delivery vehicles in the City through supporting and promoting the use of the 'last-mile' delivery through the development of micro hubs and distribution centres."
- 4.16.7. Figure 8-2 of the DCDP Strategic Pedestrian and Related Connections, illustrates Pembroke Road and Baggot Street Upper as a historic approach while Baggot Street Lower is noted as a secondary street leading to the civic spine of the city. In terms of walking, cycling and active travel, it is a policy of the DCDP (SMT16) "to prioritise the development of safe and connected walking and cycling facilities and prioritise a shift to active travel for people of all ages and abilities, in line with the city's mode share targets." Furthermore, in relation to integration of active travel with public transport, Policy SMT19 seeks "to work with the relevant transport providers, agencies and stakeholders to facilitate the integration of active travel (walking/cycling etc.) with public transport, ensuring ease of access for all."
- 4.16.8. Other transport policies of relevance to the proposed scheme include the following:

SMT25 – On-Street Parking: "To manage on-street car parking to serve the needs of the city alongside the needs of residents, visitors, businesses, kerbside activity and accessible parking requirements, and to facilitate the reorganisation and loss of spaces to serve sustainable development targets such as in relation to, sustainable transport provision, greening initiatives, sustainable urban drainage, access to new developments, or public realm improvements." SMT33 – Design Manual for Urban Roads and Streets: "To design new streets and roads within urban areas in accordance with the principles, approaches and standards contained within the Design Manual for Urban Roads and Streets (DMURS) and to carry out upgrade works to existing road and street networks in accordance with these standards where feasible.

SMT34 – Street and Road Design: To ensure that streets and roads within the city are designed to balance the needs and protect the safety of all road users and promote place making, sustainable movement and road safety providing a street environment that prioritises active travel and public transport whilst ensuring the needs of commercial servicing is accommodated.

4.16.9. The Proposed Scheme does not pass within or alongside any Strategic Development and Regeneration Areas, nor any Architectural Conservation Areas (ACAs), however, it does pass through areas that have been designated as "Z8 Georgian Conservation Areas", Z2 Residential Conservation Areas as well as "red-lined" or "red-hatched" conservation areas in the DCDP. These areas do not have a statutory basis in the same manner as protected structures or ACAs; however, they are recognised within the DCDP as areas that have conservation merit and importance which warrant protection through policy application. The Proposed Scheme passes through such "Red-hatched" conservation areas from the Baggot Street Upper/Waterloo Road junction, along Baggot Street Upper and Fitzwilliam Street Lower to Merrion Square. Furthermore, while the site of the Proposed Scheme is not within Z8 and Z2 zoned areas, it does pass by these at Fitzwilliam Street Lower, Baggot Street Lower, Pembroke Road, and the Merrion Road. Policy BHA9 refers to development in such conservation areas and requires, inter-alia that development in such areas must contribute positively and take opportunities to enhance and protect the character and appearance of the area and it's setting wherever possible. BHA10 presumes against demolition or substantial loss of a structure that contributes to the character of a conservation area.

4.16.10. The proposed scheme passes a number of protected structures, Policy BHA2 of the DCDP relates to development of protected structures and requires that development will conserve and enhance protected structures and their curtilage, and inter-alia:

- Protect structures included on the RPS from any works that would negatively impact their special character and appearance,
- Ensure that any modification affecting a protected structure and/or its setting is sensitively sited and designed and is appropriate in terms of the proposed scale, mass, height, density, layout, and materials.
- Ensure that the form and structural integrity of the protected structure is retained.
- Protect and retain important elements of built heritage including historic gardens, stone walls, entrance gates and piers etc.
- Ensure historic landscapes, gardens, and trees (in good condition) associated with the protected structures are protected from inappropriate development.
- 4.16.11. The Proposed Scheme runs along the existing road through a site on the SMR record, centred on Eastmoreland Place.
- 4.16.12. While the majority of proposed works are within and along the existing public road where there is no specific zoning provided in the DCDP the Proposed Scheme runs adjacent to lands that have been zoned: Z1 (sustainable residential neighbourhoods), Z2 (residential neighbourhoods conservation area), Z3 (neighbourhood centres), Z4 (key urban villages / urban village), Z6 (employment/enterprise), Z9 (Amenity / Open Space / Green Network) and Z15 (Community and Social Infrastructure) under the DCDP.

4.17. Dublin City Biodiversity Action Plan 2021-2025.

- 4.17.1. The Dublin City Biodiversity Action Plan 2021-2025 (DCC Biodiversity Plan) recognises that in addition to legally designated sites there are numerous habitats across the city that have conservation value for biodiversity, including public parks and open spaces, rivers, canals, and embankments. The DCC Biodiversity Plan sets out five themes supported by objectives and actions which are listed below:
 - 1. Maintaining Nature in the City,
 - 2. Restoring Nature in the City,
 - 3. Building for Biodiversity,

- 4. Understanding Biodiversity in the City, and
- 5. Partnering for Biodiversity.
- 4.17.2. The objectives of the DCC Biodiversity Plan include; Objective 4 Monitor and conserve legally-protected species within Dublin City, particularly those listed in the annexes of the EU Birds and Habitats Directive, Objective 11 Ensure that measures for biodiversity and nature-based solutions are incorporated into new building projects, retrofit and maintenance works, and Objective 12 which promotes net biodiversity gain.

4.18. Draft Dublin City Centre Transport Plan

- 4.18.1. In September 2023 Dublin City Council in partnership with the National Transportation Authority published the Draft Dublin City Centre Transport Plan 2023. Key initiatives outlined in the draft plan include:
 - Removing 2 out of every 3 cars in the city centre which don't have a destination there.
 - Implementing traffic management measures that prioritise pedestrians, public transport, and cyclists.

The Draft Plan acknowledges that the roll out of BusConnects and other public transportation projects over its lifetime will provide a major increase in public transport capacity as well as enabling buses to reach the city centre without undue delay. A critical element of the Draft Plan is to ensure that BusConnects can operate an efficient, reliable, and punctual service within the City Centre.

4.19. Heritage Designations and Environmental Impact Assessment

4.19.1. Natural 2000 Designations

4.19.2. The closest European sites to the proposed core bus corridor are the South Dublin Bay SAC and the South Dublin Bay and River Tolka Estuary SPA, both of which overlap slightly with the red-line boundary of the Proposed Scheme. Full details of the relevant SACs and SPAs are discussed in Section 10 (Appropriate Assessment) of this report, however, for ease, the following Natura 2000 sites have been considered to have the potential to experience effects having regard to the nature of the works, connectivity and the relevant protected species and habitats:

- North Dublin Bay SAC,
- South Dublin Bay SAC,
- Baldoyle Bay SAC,
- Howth Head SAC,
- Rockabill to Dalkey Island SAC,
- Wicklow Mountains SAC,
- Lambay Island SAC,
- Howth Head Coast SPA,
- North Bull Island SPA,
- South Dublin Bay and River Tolka Estuary SPA,
- Baldoyle Bay SPA,
- Dalkey Islands SPA,
- Malahide Estuary SPA,
- Rogerstown Estuary SPA,
- Skerries Islands SPA,
- Rockabill SPA,
- Ireland's Eye SPA,
- Lambay Island SPA,
- The North-West Irish Sea cSPA, and
- The Murrough SPA.

4.19.3. Natural Heritage Designations

4.19.4. There is one Natural Heritage Area considered to be within the potential zone of influence of the Proposed Scheme, this is the Skerries Island NHA [001218] and this is located approximately 27.7km to the north, and it overlaps with the Skerries Island

SPA the details of which are discussed in full within the Appropriate Assessment in section 10 of this report below. There are 36 no. proposed Natural Heritage Areas (pNHAs) in the vicinity of the Proposed Scheme and within the wider area (several of which overlap with the SACs/SPAs listed above). The pNHAs are listed below although it should be noted that due to the nature of the Proposed Scheme and the characteristics of individual pNHAs not all are considered to be within the potential zone of influence:

- Booterstown Marsh pNHA, the Proposed Scheme overlaps with the boundary of this pNHA by approx. 1,102m².
- Grand Canal pNHA the Proposed Scheme crosses this canal via an existing bridge, and works are proposed along its tow path.
- South Dublin Bay pNHA approximately 6m east.
- Royal Canal pNHA approximately 1.2km north.
- North Dublin Bay pNHA approximately 2.4km north.
- Dublin Docks pNHA approximately 2.5km north.
- Dalkey Coastal Zone and Killiney Hill pNHA approximately 2.7km east.
- Fitzsimon's Wood pNHA approximately 4.7km south.
- Loughlinstown Woods pNHA approximately 6km south-east.
- Dingle Glen pNHA approximately 6km south.
- Santry Demesne pNHA approximately 6.6km north.
- Liffey Valley pNHA approximately 7km northwest.
- Dodder Valley pNHA approximately 7.4km west.
- Ballybetagh Bog pNHA approximately 8km south.
- Howth Head pNHA approximately 9.2km northeast.
- Knocksink Wood pNHA approximately 9.7km south.
- Ballyman Glen pNHA approximately 9.8km south.
- Baldoyle Bay pNHA approximately 10.1km north.
- Feltrim Hill pNHA approximately 11.2km north.

- Sluice River Marsh pNHA approximately 11.3km north.
- Powerscourt Woodland pNHA approximately 11.5km south.
- Glenasmole Valley pNHA approximately 11.4km southwest.
- Dargle River Valley pNHA approximately 12km south.
- Bray Head pNHA approximately 12.2km southeast.
- Great Sugar Loaf pNHA approximately 13.1km south.
- Ireland's Eye pNHA approximately 13.3km northeast.
- Malahide Estuary pNHA approximately 13.5km north.
- Glencree Valley pNHA approximately 13.6km south.
- Lugmore Glen pNHA approximately 12.7km west.
- Kilmacanoge Marsh pNHA approximately 14.5km south.
- Rye Water Valley/Carton pNHA approximately 16.2km west.
- Portraine Shore pNHA approximately 17.8km north.
- Rogerstown Estuary pNHA approximately 18.1km north.
- Lambay Island pNHA approximately 21.8km northeast.
- The Murrough pNHA approximately 20.9km south.
- Rockabill Island pNHA approximately 32.8km northwest.

4.20. Planning History.

4.20.1. The route of the Proposed Scheme runs along the city road/street network for in excess of 8 kilometres, accordingly there are a significant number of planning applications of all varieties (residential, educational, commercial, hospital etc.) along the route and in the vicinity of the site. I consider the permissions/consents that have been built or are currently under construction to form part of the baseline/receiving environment within which the Proposed Scheme is to be provided. It is not intended to list all the consented/permitted applications and permissions here as this is neither necessary nor would it contribute to clarity, in this regard the Board should note that the applicant has provided a detailed list of the planning history along the route of the

Proposed Scheme – Sub appendix 2 "Planning History" of the Planning Report provided as Appendix 2.1 of the EIA. I have noted this submitted planning history and in the section below have focused on the more significant, relevant, and recent planning applications along the route.

- 4.20.2. Both Local Authorities within whose functional area the Proposed Scheme is located have made submissions, DLRCC did not list any specific planning history projects in their submission, however, DCC referenced the following in their submission⁸:
 - PI. Ref. 3608/17, permission granted by DCC for 140 no. bedroom hotel and apartment block at the site of former Tara Towers hotel – Maldron Hotel site, subject to amendments under subsequent applications including 2912/20, 3346/20, and 2879/21.
 - PI. Ref. 3743/19, ABP 307424/20, Permission granted for 73 apartments to rear of Elmpark Green Business Campus.
 - PA0049 Ten-year permission granted (in 2017) for a new 244 bed National Maternity Hospital and all ancillary site development works at St. Vincent's University Hospital Campus, Elm Park, Dublin 4.
 - PI. Ref. 4477/19, ABP 307591-20 and later amended by PI. Ref. 4051/21: Permission granted for initially 38 and amended to 46 no. apartments at 167-177 Merrion Road.
 - PI. Ref. 4240/19, ABP 306756-20 initial permission granted for 63 no. apartments at 143 Merrion Road (Gowan Motors site), subsequently amended under PI. Ref. 4906/22
 - PI. Ref 2221/16, ABP PL.29S.246717: permission granted to demolish 4 office blocks and erect 2 no. five storey office buildings with basement and 2 café/retail units with in excess of 40,000sqm of accommodation, at the junction of Merrion Road and Serpentine Avenue, subject to amendments under subsequent applications including PI. Ref.'s , 4299/16, 4456/16, 2500/17, 2953/17, 2065/19, Reg. Ref. 2067/20 and 2814/20.
 - PI. Ref. 4658/18 permission granted for demolition of existing building and erection of part 4- and part 6- storey (over 2 level basement) building for

⁸ Section 2.1 of the DCC submission of the 12th July 2022 refers

offices and restaurant. Subject to amendments under subsequent applications including PI. Ref.'s 4603/19, 3027/20, and 4726/22 at No. 20 Merrion Road.

- PI. Ref. 4015/09, ABP PL29s.237454, and 4015/09x1, ten-year permission granted for demolition of Jurys and Berkley Court Hotels and provision of a mixed-use development, in excess of 550 apartments and 9,000sqm commercial floorspace, (09x1 permission lifespan extended until March 2027). Subject to amendments under subsequent applications including PI. Ref's. 4344/15, 2244/16, 2578/16, 2849/16, 3386/16, 3468/16, 3532/16, 4369/16, 2561/17, 2853/17, 3008/17, 3184/17, 4601/17, 3620/18, 3502/19, 3461/21, 3700/21, 3705/21 and 4002/22.
- PI. Ref. 4155/18, ABP-303806-19, Permission granted for a replacement office building in excess of 21,000sqm at Hume House, Pembroke Road, Ballsbridge, Dublin. Subject to amendments under subsequent applications including PI. Ref. 3311/23, 2343/21, and 5499/22.
- PI. Ref. 4120/21, appealed under ABP 313812-22, demolition of existing Carrisbrooke house office building and construction of 4 to 10 storey office building at 122 Northumberland Road, at the junction of Pembroke and Northumberland Road, D4.
- PI. Ref. 4166/16, ABP PL29s.248884, permission granted for replacement office building at 74-75 Baggot Street Lower (at junction with Wilton Terrace), subject to amendments under subsequent applications including PI. Ref. 3543/19 / ABP -305602-19.
- PI. Ref. 3052/14, ABP PL29S.244492, permission granted for redevelopment of ESB offices including demolition of existing building and renovation/reuse of Georgian house, subject to amendments under subsequent applications including PI. Ref. 4428/17, 2059/18, 3385/18 and 3284/19.
- DCC also referenced various permitted structures within the public road on within the site of the Proposed Scheme, including:
 - Refurbishment works permitted to the existing kiosk on the traffic island at the Pembroke Road, Northumberland Road junction.

- Consents for various free-standing advertisement structures, metropoles, and replacement bus shelters.
- 4.20.3. Other planning applications of note along the proposed route within the functional area of Dublin City Council include:
 - PI. Ref. 4514/19 (ABP Ref: 308845-20), application for recreation and interpretive centre building and biodiversity proposals, Merrion Road/Rock Road (northwest of Booterstown Marsh between the Road and rail line). Application is supported by an EIAR and NIS. Permission initially refused by DCC but granted in July 2023 by ABP with conditions attached to ensure frontage development and boundary treatment takes account of the proposed BusConnects proposals at this location. Overall development site is split between the two neighbouring local authorities (DCC and DLR), the other application being DLR PL. Ref. D19A/0908, ABP 308900-20. The majority of the building works are proposed/permitted within the functional area of DCC.
 - PI. Ref. 4297/23: A notification of decision to grant permission issued (October 2023) to Elm Park Golf and Sports Club to refurbish, alter and realign existing tennis court no.'s 6, 7, 8, and 9 including the provision of upgraded lighting and all associated works. Board should note that the application drawings indicate the proposed realignment of existing tennis courts outside the extent of permanent land-take required as part of the CPO for the Belfield/Blackrock BusConnects project and none of the conditions imposed relate to or have any impact on the Proposed Scheme.
 - Other recent permissions granted within the grounds of the Elmpark Golf and Sports Club include - Pl. Ref. 5366/22m permission for the construction of a single storey bar and restaurant and Pl. Ref 3955/22 for the provision of a single storey building and 3 no. outdoor roofed (golf) swing space, while the site boundaries of these applications extend over the entire grounds the actual works are located centrally within the grounds and are not immediately proximate to the Proposed Scheme.
 - PI. Ref. 4395/23: Application for a temporary period to retain the continued use of the external seating enclosure adjoining Roly's Bistro, 7 Ballsbridge Terrace, Dublin 4. The application documentation includes a letter of consent

from the landowner (DCC) noting that the lands are required by the NTA as part of the BusConnects Scheme and any such retention (as with the licence agreement), should be temporary. The application documentation submitted states that "...it is requested that planning permission be granted with the attachment of a condition that the temporary permission shall cease and the structure facilitating the use be removed at a time when possession of the lands is necessary for the BBCC scheme." Notification of decision to grant permission issued on the 20th of October 2023 for to this retention application, and the Board should note that it includes a condition limiting the duration of the consent to 3 years "... or until possession of the lands is necessary for the Blackrock/Belfield BusConnects corridor should that be required earlier." The Board should also be aware that in the DCC planning report on this application the following is stated under the heading 'Enforcement' *"E0448/21 – Unauthorised structure is being constructed to the side and an opening being enlarged in the gable – closed due to licence in place."*

- 4.20.4. Planning Applications of note along the proposed route within the functional area of Dun Laoghaire Rathdown County Council include:
 - PI. Ref. D19A/0908 (ABP Ref: 308900-20), application for 1 no. vehicular access to serve new recreation and interpretive centre open landscaped space, biodiversity proposals and all associated works, Merrion Road/Rock Road (northwest of Booterstown Marsh between the Road and rail line). Permission initially refused by DLR but granted in July 2023 by ABP with conditions attached to ensure frontage development and boundary treatment takes account of the proposed BusConnects proposals at this location. Overall development site is split between the two neighbouring local authorities (DLR and DCC), the other application being DCC PI. Ref. 4514/19, ABP 308845-20 discussed previously above. The majority of the building works are proposed/permitted within the functional area of DCC.
 - PI. Ref. D21A/0950 Permission granted by DLRCC for the construction of pipeline insulation joint placement to Gas Networks Ireland on a site (overlapping with the above consent) opposite the Trimlestone Avenue/Merrion Road/Rock Road junction.

- PI. Ref. D21A/0627, ABP-312908-22, permission granted by the Board (July 2023) for development at Blackrock Clinic which provides for the relocation of the existing main hospital entrance into the Clinic. The Board should note that the current design of the Proposed Scheme does not take account of this newly consented entrance (all drawings are based on the existing entrance to the clinic that is in place and operational), however, there is a submission on the file from the NTA noting that the proposed relocated entrance would not prejudice the Proposed Scheme.
- PI. Ref. D22A/0490 permission granted October 2022, for alteration of the existing access arrangements at Blackrock Clinic (i.e. closing existing entrance and having the new access at the location of the current alternative access, includes car park changes and landscaping). While there is a submission on file from the NTA stating no objection to the proposal. The Board should note that the Proposed Scheme does not take account of this consented entrance, its drawings are based on the existing entrance that is in place and operational.
- ABP-312325-21 Strategic Housing Development (SHD) consented by the Board for the demolition of an existing extension, construction of 493 no. apartments, creche and associated site works at St. Teresa's House/Centre and St. Teresa's lodge Temple Hill, Monkstown Blackrock. Site fronts onto the route of the Proposed Scheme.
- ABP 303804-19 Strategic Housing Development permission granted in 2019 for construction of 294 residential units and creche, conversion of St. Teresa's House, dismantling and relocation of St. Teresa's Lodge, Temple Hill, Monkstown Blackrock (i.e. same site as that above).

4.21. EIA Screening

4.21.1. The NTA has submitted to the Board an Environmental Impact Assessment Report (EIAR) prepared in accordance with section 50 of the Roads Act 1993 (as amended) and Directive 2011/92/EU of the European Parliament and Council, 2011 on the assessment of the effects of certain public and private projects on the environment as amended by Directive 2014/52/EU of the European Parliament and of the Council of 16 April 2014 in respect of the proposed road development. Section 50(1)(a) of the Roads Act sets out a range of proposed road developments which must be subject to an EIA, one of which is *"any prescribed type of a road development consisting of the construction of a proposed public road or the improvement of an existing road."* Article 8 of S.I. No. 119/1994 - Road Regulations (as amended) sets out the types of prescribed roads referenced in Section 50(1)(a) of the Roads Act, this includes:

"The construction of a new road of four or more lanes, or the realignment or widening of an existing road so as to provide four or more lanes, where such new, realigned or widened road would be eight kilometres or more in length in a rural area, or 500 metres or more in length in an urban area"

The Proposed Scheme is located within an urban area and exceeds the relevant length criteria and accordingly it is appropriate that an EIAR has been submitted.

5.0 Submissions

5.1. Proposed Scheme Submissions:

5.1.1. Three submissions have been made by prescribed bodies (Dublin City Council, Dun Laoghaire Rathdown County Council, and the Development Applications Unit of the Department of Housing, Local Government and Heritage). Section 5.2 below provides a summary of the submissions from the relevant prescribed bodies and each submission is followed by the Applicant's (NTA's) responses to the issues raised by the relevant prescribed body.

5.2. Prescribed Bodies

5.2.1. Dublin City Council (DCC)

- 5.2.1.1. DCC's submission provides a description of the Proposed Scheme and notes that the parts of the proposal within their functional area include the following public roads and junctions:
 - Merrion Road (R118),
 - Pembroke Road (R118 and R816),
 - Baggot Street Upper and Baggot Street Lower (R816),
 - Fitzwilliam Street Lower, and
 - Nutley Lane (including tie-in to Stillorgan Road).
- 5.2.1.2. The Board should note that the submission from DCC was made in July 2022, and accordingly references therein the DCC Development plan refer to the 2016-2022 Dublin City Development Plan which has now been superseded by the current City Plan (which is referred to the Draft Plan as it was at the time to the DCC submission).
- 5.2.1.3. DCC list planning applications which they consider to be significant along the route of the Proposed Scheme and on the road corridor (see section 4.20 of my report above).

- 5.2.1.4. In relation to planning policy DCC note that the Regional Spatial and Economic Strategy for the Eastern and Midlands Regional Assembly 2019-2031 (RSES) supports the delivery of key sustainable transport projects including BusConnects as set out in RPO 5.2.
- 5.2.1.5. In its planning assessment of the Proposed Scheme DCC notes the following:

Environmental Impact Assessment Report and Natura 2000:

 In relation to EIA and AA, DCC acknowledges that the Board is the competent authority in relation to these matters, however, DCC do not raise any issues or highlight any omissions in relation to the submitted EIAR and NIS documents.

Zoning and Other Designations:

- DCC lists the relevant policies of their Development Plan in relation to public transport and modal shift, the public realm, features of the built heritage and street trees (policies MT2, MT3, MT4, MT5, MT7, MT12, MT20, MT23, MT04, MT010, MT045, MT047, SC2, SC20, SC21, CHC45, CHC1, CHC2, CHC4, CHC9, CHC15, GI14, GI28 and GI30 are all quoted.)
- DCC also reference the relevant policies from the (then) DRAFT Dublin City Development Plan 2022-2028, which included the following in relation to the delivery of transport infrastructure in the City, SC1, SC8, QHSN10, CEE12, SMT1, SMT3, SMT4, SMT8, SMT11, SMT13, and SMT20.
- In consideration of landuse DCC state that the majority of the route and works are within and along the existing public road where there is no specific zoning in place, however they note that Z1 (residential), Z2 (residential conservation), Z3 (neighbourhood facilities), Z4 (mixed use facilities), Z6 (enterprise/employment), Z9 (open space/recreation) and Z15 (institutional/community) zoning objectives apply to lands along the proposed scheme. DCC considers the Proposed Scheme to constitute a "Public Service Installation", which is a landuse considered to be compatible with all of the relevant listed landuse zonings.

Built Heritage Designations:

- There are several protected structures along the route of the Proposed Scheme, MacCartney Bridge (RPS 872) is referenced, as are several others many of which form part building groups such as the 18th and 19th Century terraces on Pembroke Rd, Baggot Street Upper and Lower and Fitzwilliam Street Lower, as well as an enclave of estate cottages on Estate Avenue.
- The Proposed Scheme goes through conservation areas at the Ballsbridge/River Dodder crossing and McCartney Bridge/Grand Canal crossing, Baggot Street Lower and Fitzwilliam Street Lower.
- The Proposed Scheme also includes zones of archaeological interest in the area surrounding a burial ground on Merrion Road, and at the junction of Pembroke Road and Eastmoreland Place.
- Baggot Street Lower and Fitzwilliam Street Lower are also listed as streets which have paving, kerbing and/or other traditional features which should be retained or restored (Appendix 8 of the CDP refers).

Impact on Amenity:

- Generally, DCC is satisfied that the Proposed Scheme will enhance the amenities of the area while providing more efficient urban transport without adverse impact on adjoining properties or the wider area. DCC states that it is 'satisfied that the elements of the Proposed Scheme which fall within the administrative area of the Council would not have any adverse or undue impact on the amenities of adjoining properties or the wider area'. A certain amount of disturbance during construction is acknowledged, and the proposed public realm enhancements at Ballsbridge Village and Baggot Street upper are welcomed, however, DCC do note that:
 - The proposed bus shelters on Fitzwilliam Street Lower and Baggot Street Lower, as well as the street trees on Fitzwilliam Street Lower should be omitted in the interests of preserving the historic Georgian streetscapes.
 - Loss of mature trees of value should be minimised and where unavoidable appropriate mitigation provided.

Forward Planning Comments:

 Supportive of the Proposed Scheme as it will help achieve the strategic objectives envisaged in the DCDP in relation to compact growth, sustainable mobility, permeability, and placemaking, while also contributing towards climate action. The proposal must address conservation impacts along the route.

Environment and Transportation Department Comments:

- Department is supportive of the Proposed Scheme and recognises the significant improvements it will bring in terms of bus and cycling infrastructure. The Proposed Scheme is considered to align with the policies expressed in the current and (then) draft development plans.
- Proposed Scheme will be managed by the DCC traffic control system which will be updated to accommodate the changes. During detailed design phase the exact interface with the Irish Rail system (re. Merrion Gate junction) should be agreed.
- The Proposed Scheme should not reduce existing footpath widths except where absolutely necessary. Measures should be applied to slow cyclists where there could be potential interaction with pedestrians (cycle lanes around bus stops, or between parking areas and the footpath).
- In the event of favourable consideration the NTA should be required to undertake a substantial awareness, education and behavior change programme, and agree any necessary changes to the Pay and Display parking and associated line markings in order to ensure adequate set down/loading spaces are provided for local services.
- In relation to drainage requirements the Proposed Scheme must comply with the Greater Dublin regional code of practice for drainage works version 6.0. Certain types of drainage measures from the Proposed Scheme are not acceptable to DCC (Enclosed Drainage channels, continuous kerbs incorporating drainage (figure 2, page 3 of Appendix K – Drainage Design basis, and hybrid gully shown in Section 1.13 page 4 of the road run-off collection gullies technical paper).

- The Proposed Scheme must incorporate SuDS and refer to the DCC sustainable Drainage Design and Evaluation guide published in 2021, and the applicants must confirm that the development will not increase flooding risk.
- New compensatory SuDS measures should be provided to ensure pluvial flood risk is not increased where a large number of trees are to be removed. Nutley Land where it meets Merrion Road, and the Elm Park Stream crossings are particular areas of concern. Overall, the design is based on no flooding for 1:30 years with a 20% climate change for existing networks which is acceptable.
- "Roly's Bistro" has built an extension on a green area at the Herbert Park junction which the environment and transportation department refers to as "unauthorised" and advises that its presence may impact the route. (In this regard the Board should note that this structure has in fact been licenced, the enforcement file closed and notification of decision to grant retention (albeit for a limited 3- year timeframe, or until such time as the lands are required for the Proposed Scheme) has since issued from DCC (PI. Ref. 4395/23) subsequent to this submission being lodged.
- Applicant should provide an evidence-based assessment of the impact, if any, of the Proposed Scheme on the water quality status of potentially affected water bodies (e.g. Elm Park Stream and River Dodder). Two particular areas are highlighted:
 - Upgrade works at Merrion Gates, and
 - Bridge Crossing at Pembroke Road.

At both these areas measures should be taken to minimise storm water runoff.

City Archaeologist:

- The archaeology section of DCC supports the assessment and mitigation measures set out in the submitted EIAR and further recommends that:
 - the NTA appoint a project archaeologist to oversee the delivery of the archaeological strategy,

 the primary archaeological paper archive for any excavations be prepared and deposited with the Dublin city archaeological archives.

Conservation Section:

- The conservation section raises concerns in relation to certain specific historic site boundaries and boundary treatments that are proposed to be altered as part of the Proposed Scheme; namely:
 - No.'s 151 and 153 Merrion Road are protected structures (RPS No.'s 5090/5091 semi-detached estate cottages), neighbouring these houses No.'s 155 and 157 Merrion Road (a pair of early 19th century terraced houses). Loss of front gardens, widening of entrance (no. 153) and repositioning of boundaries is stated as having a significant and negative impact. The removal of part of the front gardens of the Protected Structures at the entrance to Estate Avenue is described as seriously injuring the composition of the Avenue and is *"a regrettable loss of streetscape character on Merrion Road"*.
 - RPS 5086 (Clayton Hotel on Merrion Road Former Masonic School) impact on curtilage due to the set back of historic railings.
 - RPS 5084 (former Pembroke Town Hall now City of Dublin Education and Training Board- CDETB) impacted by loss of a pedestrian gateway, new vehicular access from adjoining street, and more hard landscaping affecting curtilage – recommends that solutions are examined to minimise impacts.
 - Provision of new vehicular access to the terrace at 1-11 Pembroke Road from Wellington Road, and impact on historic railings and stone plinth wall –recommends that solutions are examined to minimise impacts.
 - Concerns are raised regarding the provision of Cantilever signal poles in proximity to protected structures at junction of Merrion Road (close to Clayton hotel), Merrion Road/Serpentine Avenue at the RDS (RPS 5085), Ballsbridge (close to RMPDU018059) and the former Pembroke

Town Hall, and at the Belgian Embassy (2 Shrewsbury Road) which is a residential conservation area.

- Locations of bus shelters are also considered to detract from the setting of protected structures and the historic streetscape at 1 Merrion View Avenue, 45-50 Baggot Street Upper, 67-68 Baggot Street Lower, 63-67 and 86-88 Pembrooke Road, and 4-5 Fitzwilliam Street Lower. It is recommended that outdoor advertising panels be omitted from these shelters in the event of favourable consideration.
- It is recommended that prior to commencement, that the applicant agree with the planning authority proposals for the protection of in situ/or removal, transport, storage, and reassembly of items of historic paving, kerbing, street furniture, lamp standards, coal hole covers, jostle stones and other notable features.
- Loss of trees is a concern particularly those on Merrion Road, Pembroke Road, Wellington Road, and Baggot Street Upper (due to their contribution to the setting of protected structures and residential conservation areas (Z2 zones).
- Removal of trees along Nutley Lane will impact on the architectural setting of this lane.
- It is considered the introduction of a new line of trees on Fitzwilliam Street Lower will adversely affect the character of this Georgian Streetscape.
- All works in relation to historic paving/surfaces, kerbing and streetscape features should have regard to Appendices 7 and 8 of the CDP and should be suitably supervised and designed.
- McCartney Bridge (RPS 872) works to be mitigated by recording, protecting, and monitoring the works on north-western tow path.
- RPS No.'s 1978, -79 and -80, Clyde Road have the potential to be impacted by traffic control signage from the Proposed Scheme – it is recommended that this be revisited and reduce the number of signs.

- Removal of former entrance gates to Bloomfield to a location outside the old demesne has no relevance to the lands and will blur the historical record.
- The Conservation section also advises (within its recommended conditions in the appendix) that the proposal to widen the existing vehicular entrance at no.'s 153, 155 and 157 Merrion Road to 3.2m is contract to standards set out in Section 16.10.18 of the 2016 development plan, regarding parking in the curtilage of protected structures.

City Architects Division:

- Welcome the scheme in general but design needs to be supported by pedestrian traffic counts to ensure footpaths are of sufficient width and to accommodate the proposed public realm features.
- Bus shelter locations are shown but no bus shelter designs are set out. Bus stops rather than shelters are preferrable in "Red-lined Conservation Areas". Advertising in bus shelters should not be allowed in the vicinity of protected structures, ACAs, or Areas of Special Planning Control.
- Typical material typologies set out in application documents does not include or refer to existing historic fabric. Details of proposed street furniture, lighting, bins, benches, bollards, cycle stands, signs, and their locations are needed, as is clarification as to whether there will be any variation or are these standardised throughout the entire BusConnects projects.
- Details of the suitability of reusing existing boundary treatments where boundaries are being altered should be provided.
- Concurs with Conservation Section in recommending that new trees on Baggot Street Lower and Fitzwilliam Street are not appropriate and contrary to objectives in these conservation areas.
- Materials proposed should be consistent with those already in place or the private areas amended (with owner's consent) to a similar palette as that proposed. Noted that the frontage of the ESB building has high quality granite footpath recently laid and it should not be replaced.

Local village signage should be retained where possible.

Parks Biodiversity and Landscape Division:

- Consider that the scheme be redesigned to conserve a greater number of trees. New tree planting proposals are welcomed however a realistic assessment of must be considered in terms of planting proximate to boundaries and underground services.
- If compensatory planting falls below the loss of trees, then alternative mitigation must be agreed with Park Services. Arboriculturists and landscape architects should oversee the landscaping and implementation of works, throughout the project.

Arts Officer:

- The Per Cent for Art Scheme should be applied to all individual bus connects corridors.
- 5.2.1.6. The DCC submission concludes with a statement that the Proposed Scheme is supported and welcomed, as well as confirming that it will ensure the delivery of a number of key policies and objectives of the current and draft Dublin City Plans. It goes on to list as an Appendix of approximately 65 no. specific conditions from all the various internal sections in relation to the overall development which should be attached by the Board in the event of favourable consideration of the proposal. The conditions listed include inter alia:
 - Need to agree contract/formal handover mechanism for handing over/taking in charge of the project (including landscaped areas) following construction and payment for maintenance, and ensure all relevant sections of DCC are consulted.
 - All equipment and traffic signalling to be to DCC specifications.
 - Provision of as-built drawings and detailed record of existing conditions and features along the route to be provided.
 - All design details, including car parking spaces, to be agreed with DCC and all construction and reinstatement to be in accordance with their standards.

- All buffers, universal design features and accessibility to be maintained throughout.
- Private boundaries where setbacks are proposed must leave 5x3m space where on-site private parking is to be retained to ensure cars do not overhang footpaths.
- Samples of natural stone kerbs, flags etc. to be used to be provided to DCC for agreement prior to use.
- Where full reinstatement is not being provided along footpaths contractor to pay DCC long term damage charges, heritage setts and features if removed to be handled and stored appropriately and reinstated to DCCs specifications.
- NTA to undertake an awareness, education, and behavioural change programme to educate road users for all elements and interactions along the Proposed Scheme.
- Design consideration should be given in relation to the lighting design and use of streetlights on ESB infrastructure and lighting provided throughout during construction.
- Drainage works to comply with the DCC Code of Practice for Drainage Works, sustainable drainage systems to be agreed in writing with DCC, and integrated within landscaping scheme.
- The NTA should provide an evidence-based assessment of the impact on water quality status of rivers within the curtilage of the project.
- As-built drawings of all drainage works to be provided to DCC by the NTA.
- No advertising or digital displays to be installed in the proposed bus shelters without a prior grant of permission.
- Bus shelters and new street trees on Fitzwilliam Street Lower and Baggot Street Lower shall be omitted.
- Project Archaeologist to be appointed to oversee and report on relevant works.
- All works should be designed and supervised by an expert in architectural conservation, adequate protection is provided to heritage features, treatment

of historic features methodologies should also be agreed with DCC, and reporting include details of undiscovered material should it arise.

- Detailed drawings and specifications of public realm improvements at Ballsbridge village, Northumberland Road, and Pembroke Road to be submitted and agreed with DCC as well as the design and type of each bus shelter, siting of utility cabinets and other above-ground infrastructure, palette of street furniture, strategy for treatment of private landings, and village signage.
- All landscape components to require contract maintenance for a minimum period of 3 years following completion of works. Landscaped areas agreed to be taken in charge will require full completion of 3-year maintenance period and rectification of any defects or loss of planting.
- Tree protection measures to be put in place prior to works commencing and applicant to be responsible for funding any tree remedial works required where retained trees decline or fail within 5 years of the project construction works.
- Proposed Scheme to incorporate public art in accordance with the provisions of the Per Cent for Art Scheme.

5.2.2. NTA response to DCC submission

- 5.2.2.1. The NTA acknowledges the overall support of DCC and its relevant departments for the Proposed Scheme and welcomes the confirmation from DCC that it is supported by the RSES and will facilitate the future growth of the City.
- 5.2.2.2. In relation to the planning history cited by DCC the NTA acknowledges that three of the listed consents (National Maternity Hospital, 20 Merrion Road office building, and Carrisbrook house) were not listed in the application documentation. Nonetheless the NTA were aware of these consents and the proposed scheme will not conflict with them. It is also noted that for Traffic/Transportation, Air, Noise, etc. assessments, individual developments are not used in the assessment process and instead general growth and major infrastructural development are considered. In particular in relation to traffic modelling it is noted that SVUH is a modelling zone in

and of itself due to its scale and as such its appropriate growth has been assumed and considered in the traffic modelling. In relation to the consents for works in the road/corridor, the NTA notes that most of these are in place and those that aren't can be accommodated within the scheme.

- 5.2.2.3. The NTA also acknowledges that DCC will be taking over the running and traffic management systems for the corridor once the physical works have been completed. In relation to the commentary from DCC regarding the complexity of the junction interfaces at Merrion Gates, the NTA confirm that the Proposed Scheme and its traffic management caters for all traffic (incl. rail) travelling through that junction.
- 5.2.2.4. The NTA states that the roll out of a communications awareness, education, and behavioural change programme in the context of the proposed scheme (new junction arrangements, signalling etc.) lies outside the scope of a singular BusConnects scheme and would instead need to be delivered at a national or regional scale.
- 5.2.2.5. In relation to the DCC commentary on impacts on loading and car parking the NTA have stated that total car parking will be reduced by 12% along the route but due to the availability of similar car parking within 100-200m of the scheme and the other mitigations and public transport improvements being made this impact will be offset.
- 5.2.2.6. The NTA acknowledges that the Proposed Scheme drains to a number of protected waterbodies which are protected under the Water Framework Directive. In order to achieve legislative obligations, the Proposed Scheme has been designed to ensure no deterioration of any waterbody which is contiguous/downstream and will not jeopardise the attainment of good ecological and good surface water chemical status.
- 5.2.2.7. The NTA confirms that the DCC sustainable drainage design and evaluation guide will be, and are, taken into account during the detailed design phase and that drainage requirements will be developed in collaboration with DCC Drainage Planning, Policy, and Development Section.

- 5.2.2.8. In relation to works to, and in the immediate vicinity of, protected structures, the provision of cantilevered signal poles, and bus stops, the NTA respond to the DCC submission by quoting the relevant extracts of the submitted EIAR which sets out their considered impacts.
- 5.2.2.9. In response to the impact of the removal of trees the NTA again quote the relevant tracts of the submitted EIAR and defend the planting of trees adjacent to the ESB headquarters on Fitzwilliam Street Lower.
- 5.2.2.10. No additional information other than that set out in the EIAR is presented in relation to the relocation of the Bloomfield gate impacts set out in the DCC submission. Similarly, no additional information (beyond that in the EIAR – which has been requoted) is presented in relation to the provision of advertisements within bus shelters in conservation areas which was raised as being a concern by DCC.
- 5.2.2.11. The NTA confirm that the siting of utility cabinets and above-ground utility infrastructure are in appropriate locations and rationalised where possible. Furthermore, the NTA clarifies that where heritage granite kerbing exists its retention where practicable will be maximised and that other heritage features to be retained are indicated in the general arrangement drawings. It has also confirmed that signage stating welcome to relevant urban villages along the route is to be retained throughout.
- 5.2.2.12. NTA confirms that it will continue liaison with DCC throughout the procurement and construction processes in relation to the provision of street furniture, furthermore the reuse of materials will be incorporated where appropriate on boundaries which will be replaced on a like for like basis in agreement with the relevant landowners. In relation to private landings adjacent to the Proposed Scheme the NTA have confirmed that these are not to be altered as to do so would significantly increase the CPO requirements, and that it is to consider the incorporation of the new as built footpath in front of the ESB headquarters should it be sufficient to meet the requirements of the Proposed Scheme.

- 5.2.2.13. The NTA also confirms that street trees are only being proposed where impacts on cellars are not envisaged (which has been supported by carrying out a cellar survey to identify their locations) and states that in its opinion the provision of additional trees on Baggot Street Lower and Fitzwilliam Street is in accordance with the provisions of the Development Plan and Dublin City Tree Strategy which supports the planting of trees where practicable.
- 5.2.2.14. NTA confirms that in its opinion the landscaping proposals incorporated within the Scheme as presented have taken into consideration the DCC Parks, Biodiversity and Landscape Division and Arts Division comments.
- 5.2.2.15. The NTA concludes by commenting on the conditions recommended by DCC, as follows:
 - Regarding a formal agreement on the handing over of the project following construction the NTA state that this can be successfully managed through the current legislative framework which allows the NTA to design and build, but once completed the Road Authority status returns to the relevant local authority. The NTA state that a condition is not required.
 - Regarding the provision of funding for maintenance of the route the NTA confirms that they retain responsibility for the maintenance of the bus fleet and bus stops/shelters, but the maintenance of non-national roads does not fall under its remit to disperse funds, as this is a matter for the Department of Transport. The NTA state that a condition is not required.
 - In relation to ensuring continued collaboration with all DCC Departments, the NTA state that this will be carried out as a matter of course and that a condition is not required.
 - Regarding the provision of traffic management equipment, public lighting, environmental protection, as well as air and noise pollution the NTA states that these matters were the subject of extensive liaison through the design process and the Proposed Scheme has taken on board the DCC comments.
 - In relation to archaeology the NTA confirm that the EIAR commits to the appointment of a project archaeologist.

- In relation to conservation conditions the NTA state that the overall design has been informed through extensive liaison, best conservation practices will be adopted, and all features will be protected with relevant works carried out in accordance with architectural protection guidelines and local authority departments will continue to be liaised with in this regard.
- In relation to the conditions recommended by the City Architects Department and Parks, Biodiversity and Landscape Division the NTA states that the design has been informed through extensive liaison with these sections.

5.2.3. Dun Laoghaire Rathdown County Council,

5.2.3.1. Overall DRLCC recognise that the Proposed Scheme presents "a major opportunity for transformative improvements to both cycling and public transport infrastructure within DLRCC and the wider Dublin area." DLRCC are therefore supportive of the Proposed Scheme and their submission states:

"It is considered that the provision of the proposed Core Bus Corridor infrastructure, is a core policy objective of the DLRCC County Development plan 2022 – 2028 and is key to achieving the Strategic County Outcomes underpinning the County Development Plan."

5.2.3.2. The DLRCC submission goes on to discuss a number of recommendations under the headings; Traffic and Active Travel, Landscape, Public Realm and Architectural Conservation, Environment and Biodiversity, Drainage, Road Maintenance, Public Lighting and Pollution Control. DLRCC states that it is fully committed to working with the applicant to ensure that the scheme achieves its full potential and in this regard recommendations are made for the Board to consider which they believe will strengthen the overall outcomes of the project for sustainable travel. These recommendations are summarised below under the headings provided in the DLRCC submission.

Traffic and Active Travel:

 Ensure that all bus stops are adequately set back from junctions to avoid buses potentially backing up and blocking traffic and to ensure visibility of junction traffic signals for oncoming traffic.

- Ensure adequate stacking space for cyclists is provided to accommodate cyclists waiting to cross the road and to take into account the anticipated increase in cycle traffic in the future.
- DLRCC has concerns in relation to junction designs and signal phasing, in this regard they request that the Board include a condition requiring the applicant to implement and monitor a trial junction layout and signal phasing at a location (or locations) where there are significant volumes of cyclists and car traffic. It is requested that any consent for the Proposed Scheme should allow sufficient flexibility for the results of any such trials to be used to decide on and amend the detailed design of junction layouts and the signal phasing all of which should be agreed with the local authority.
- DLRCC are of the view that expediting the Bray Core Bus Corridor provides the best option to mitigate the impact of traffic re-routing on links in the overall study area (in particular along Stillorgan Park Road, Grove Avenue and between Stillorgan Village and Mount Merrion Avenue).
- Where cycle and pedestrian facilities cross side roads DLRCC requests that they are both on raised tables (i.e. not at grade with the general traffic lane). The Proposed Scheme has a mixture of at-grade and raised crossings. In this regard it is requested that the final design of any pedestrian and cycle facilities crossing side roads be agreed with the local authority.
- DLRCC requests amendments to the Temple Hill Monkstown Road junction as there is not a fully protected junction solution for cyclists at this location and the use of a toucan crossing would seem inappropriate for cyclists heading towards the City Centre from the Monkstown Road.
- Under ABP-312325-21 permission has been granted for the redesign of the junction at Temple Hill, Temple Road, and Newton Avenue. The Proposed Scheme presents a poor layout for cyclists as they cannot join city bound traffic directly when exiting Newton Ave. The newly promoted layout provides a better solution and accordingly the final design of this junction should be agreed with the local authority in the event of favourable consideration.
- DLRCC have concerns in relation to the proposed measures to restrict traffic on Georges Avenue. In this regard, they are carrying out an active travel

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assessment of the wider area and request that a condition be included for a monitoring period on Georges Avenue. Following which traffic control measures can be brought forward for the street in consultation with the local authority.

- It is considered that the retention of the left turning cycle lanes between Rock Road and Mount Vernon Avenue is preferable to the proposed design and should be incorporated into the design of this junction as there is ample space available and this will retain the existing level of service for cyclists on this arm of the junction.
- Right turn filter lane on Rock Road for access to Castledawson/Westfield is considered excessive and should be reduced with the planted median being extended. Furthermore, due to the presence of strong pedestrian desire lines a pedestrian crossing should be considered in the vicinity of these residential areas and Blackrock Park.
- The provisions of ABP-312908-22 are noted which relates to a current planning application under appeal with the Board incorporating alterations to the main vehicular entrance to Blackrock clinic⁹. The Proposed Scheme may need to be amended or altered (in consultation with the Local Authority) dependant on the outcome of that application.
- It is requested that a condition be included in the event of favourable consideration requiring appropriate post-works completion traffic monitoring with suitable mitigation measures to be put in place with the agreement of the local authority.

Landscape, Public Realm and Architectural Conservation:

- DLRCC request comprehensive soft landscaping details to be agreed in the event of favourable consideration.
- A number of specific landscaping recommendations are also recommended as follows:

⁹ This application has been granted by the Board since the DLRCC submission.

- Provision of a feature tree on either side of the estate entrance to Barclay Court under woodland perennial mix beneath existing and proposed roadside trees at this location.
- Trees should be provided in the proposed green areas/strips adjacent to the entrance of Castledawson Estate, Willow Terrace, and Blackrock Park as the carriageway is wide and exposed to the coast at these locations.
- The reduced width of the footpath adjacent to Blackrock Park opposite this location is queried along with its ability to realistically facilitate tree planting.
- DLRCC requests the landscape median on Temple Road be included in the landscape design for the Proposed Scheme, it is recommended that the existing ground cover be replaced with a herbaceous mix and all soft landscaping to be amalgamated into one large bed and extended out to the kerb lines.
- In relation to hard landscaping DLRCC are currently considering public realm improvements throughout the wider areas adjacent to the Proposed Scheme, it is therefore requested that all proposed hard landscaping features, (paving, boundary walls, street furniture etc.) be agreed and coordinated with the local authority.
- The visual impact on the setting of architectural heritage features arising from the installation of cantilever signal poles is of concern to DLRCC, the necessity of their provision, location, and design is requested to be agreed with the local authority.
- DLRCC considers the mitigation measures on the methodology set out within the EIAR in relation to the treatment of the Blackrock College access gate, railings, peers, and plinth to be appropriate, however, it is requested that a condition be imposed requiring engagement and agreement with DLRCC on the detailed design stage regarding the extent of these works which effect RPS 99 (Blackrock College entrance gates).

- Public realm interventions should be in accordance with age friendly Ireland guidelines accessibility guidelines and best practise for such works.
- Public realm interventions, hard landscaping, and street furniture should be in accordance with the DLRCC County Heritage Plan 2021 to 2025.

Environment and Biodiversity:

- The Proposed Scheme must take account of the presence of invasive species (IS) along the route.
- Provision must be made for monitoring of all proposed ecological mitigation measures set out within the EIAR and NIS.
- A number of conditions are suggested in relation to environmental management and biodiversity, these include inter alia the appointment of an ecologist for the duration of the construction process to ensure implementation of mitigation measures, provision of a biodiversity mitigation Plan/Programme, appropriate monitoring/reporting, and provision of a CEMP incorporating all ecological commitments set out.

Drainage:

- SuDs to be incorporated throughout the Proposed Scheme.
- All proposed new trees should be specified as tree pits for surface water run off as this will potentially alleviate localised pluvial flooding and provide interception.
- The Proposed Scheme represents an opportunity to trial permeable/porous surfacing treatments in less trafficked areas.
- Some existing landscape areas could be altered as part of the Proposed Scheme to provide bio-detention basins as an alternative or in addition to attenuation pipes proposed for surface water runoff.
- Drainage conditions are also provided requesting inter alia: details of all drainage provisions to be agreed, construction details of SuDs measures, provision of CEMP and detailed surface water run-off calculations.

Road Maintenance:

 The road maintenance comments from DLRCC are a list of potential conditions to be imposed in the event of favourable consideration, these include a pre-, and post- Pavement Surface Condition Index (PSCI) survey, provision of detailed design for all the various elements, detailed pavement treatment plan, and detailed Ironworks drawing.

Pollution Control:

 DLRCC pollution control section notes that no petrol interceptors appear to be included in the proposals. It is recommended a condition be imposed for the applicant to agree the relevant details of the CEMP and the surface water management plan in relation to the construction compound with the local authority.

Public Lighting:

- DLRCC has upgraded lighting along the route of the Proposed Scheme to LED over the last number of years and all fittings, brackets, and columns are in good condition, the provision of additional trees must take account of the light locations and ensure that the light levels on the road and footpath surface are not negatively impacted.
- 5.2.3.3. The DLRCC also include a number of recommended conditions in relation to environment/biodiversity, surface water and drainage, road maintenance, pollution control, and public lighting. These include:
 - Appointment of a qualified project ecologist, implementation of all mitigation measures, IS management plan.
 - Provision of a single biodiversity mitigation plan drawing together all relevant mitigation measures and provide a programme for the monitoring and implementation of mitigation measures.
 - Project ecologist to confirm their satisfaction with the lighting scheme proposed, landscaping scheme and to provide monitoring reports to confirm implementation of specified measures.
 - Provision of final CEMP to be agreed with the Planning Authority.

- All drainage measures (including drawings, SuDs, and all associated calculations), CEMP details, detailed designs, pavement treatments, ironworks, surface water management, to be submitted to, and written agreement reached with, the Local Authority prior to commencement.
- 5.2.3.4. DLRCC conclude their submission by reiterating their support for the Proposed Scheme and requesting that the amendments and clarifications sought be incorporated into the final scheme and agreed with the relevant Local Authority.

5.2.4. NTA response to DLRCC submission

- 5.2.4.1. The NTA response to the DLRCC submission acknowledges the overall support for the Proposed Scheme that the local authority has set out, but also provides additional commentary in relation to specific issues that were raised by DLRCC.
- 5.2.4.2. In relation to the location of bus stops the NTA state that where bus stop locations are being amended the new stop has generally been located on the downstream side of a junction to avoid stationary buses impacting visibility of approaching vehicles. Some bus stops have been retained at or close to their current positions and may contradict the overall scheme policy, this is only done at specific locations and for identified reasons such as avoiding impacting on public realm art, making the most sustainable use of available space, and to make best use of existing infrastructure (crossings) or extant desire lines.
- 5.2.4.3. In relation to the provision of adequate stacking space for cyclists at junctions the NTA set out the junction design arrangements for protected junctions and acknowledge that in constrained urban locations alterations are necessitated, however, advance cycle stop lines, phasing of signalling, and unimpeded cycle tracks being provided on all junction approaches will all benefit cycle stacking. The use of 120 second cycle time was also referenced as a modelling exercise and the NTA expect that in practice the corridor will operate on an adaptive basis allowing for priority at junctions to be managed to prioritise people movement via all modes of transport as necessary.

- 5.2.4.4. The NTA clarifies that only junction types 1 and 3 are included in the Proposed Scheme (from the range of 4 set out in the EIAR) and that each junction although based on these two typologies have staging and signalling times that are designed on a case-by-case basis.
- 5.2.4.5. In relation to concerns raised by DLRCC on cyclist compliance, the NTA state that the overall BusConnects infrastructure works will be transformational for cycling in Dublin with cycling predicted to increase its modal share along the proposed scheme from 4% to 16% in the AM peaks and 5% to 19% in the pm peak. While there may always be a certain degree of non-compliance this is expected to be a small percentage of cyclists and the uniformity of approach being rolled out throughout the entire scheme will facilitate cyclists adapting to the infrastructure.
- 5.2.4.6. In relation to piloting and monitoring a sample junction, the NTA have stated to a certain degree that this has already been occurring through monitoring certain DCC junctions and the data has informed proposed junction designs. The NTA state that it is unnecessary to create a trial junction as the proposed scheme allows for the corridor to operate on an adaptive basis, allowing priority to be allowed for different modes. In relation to the DLRCC preference for the Bray to City Centre scheme to be expedited to alleviate congestion the NTA state that that scheme will be undergoing its own separate consent process.
- 5.2.4.7. In their submission DLRCC reference concerns on the raised table approach at certain junctions, the NTA defend the design approach and clarify the differences proposed where parking measures are in place up to the junctions. In relation to specific concerns raised on individual junctions the NTA state:
 - At the Monkstown Road approach to the Temple Hill junction, a fully protected junction was considered at this location to facilitate a dedicated cycle crossing on this arm, however, the presence of a large CCTV pole on this junction and need to assimilate with existing measures in place were constraints that militated against this.
 - The need to amend the Newton Avenue junction to facilitate the updated junction design put forward by the St. Teresa's development on adjacent

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lands has not been ruled out. The NTA state that this permission was consented post finalisation of the design and that it will liaise with DLRCC in relation to any amendments required in this regard should the consented scheme go ahead.

- In relation to the DLRCC proposal to monitor traffic at Georges Avenue to determine whether traffic restrictions should be imposed there, the NTA responded by stating that the Local Area Model (LAM) traffic assessment identified that the proposed scheme would result in additional (unnecessary) traffic being attracted onto Georges Avenue. This would create moderate to significant air quality and noise impacts for residents. The traffic restriction was identified as the preferred solution to deter traffic from diverting to Georges Avenue, maintaining local and emergency access while noting that the road is too narrow to facilitate a turning bay for larger vehicles. Failing to introduce the proposed measures would therefore result in an adverse impact on the amenities of the area and should not be delayed.
- In response to comments on the Mount Merrion Avenue junction the NTA confirm that cycle lanes are 1.5m in width and that removing the existing cycle slip lanes allows the improvement of the public realm while also providing an improvement in level of service for pedestrians and cyclists (increased to 'A') on this stretch of the corridor.
- In relation to the turn-off into Sion Hill/Castledawson the NTA have stated that the length of the right turning lane from the Rock Road at this location is dictated by the existing median which is being retained for landscaping purposes.
- In relation to the new junction arrangements proposed (at the time the Proposed Scheme was lodged) at the Blackrock Clinic, the NTA acknowledge the consent issued and notes that it has liaised with the Clinic and has previously noted that the relocation is compatible with the Proposed Scheme.
- 5.2.4.8. Generally, in relation to concerns raised by DLRCC for congestion on approach roads to the Corridor the NTA have stated that based on the modelling data (where congestion is predicted in the 'Do Minimum' and 'Do Something' scenarios) the

benefits of the Proposed Scheme (which will deliver significant savings in journey times, a significant increase in people travelling by sustainable modes, as well as increased numbers of bus users) outweigh concerns relating to congestion accessing the corridor.

- 5.2.4.9. In relation to landscaping queries brought by DLRCC the NTA reiterate the provisions set out in the EIAR and specifically note the following:
 - At Barclay Court there is insufficient space to provide a tree on the western side of the access without removing existing trees which are in good condition.
 - Trees were considered at Castledawson, however, ornamental planting only is being proposed as there are already trees at this location. Furthermore, 2m footpaths are being provided along Blackrock Park and this is considered sufficient to accommodate street trees while maintaining sufficient footpath width.
 - In relation to hard landscaping and works already undertaken or considered by DLRCC, the NTA confirm that they will continue to liaise with the Local Authority in order to ensure appropriate interventions and compatibility.
 - In relation to cantilever signal poles the NTA state that they are aware of concerns, however, such infrastructure is only proposed where absolutely necessary.
- 5.2.4.10. In relation to the publishing of the DLRCC Biodiversity Action Plan 2021-2025 (replacing the 2009 - 2013 plan), the NTA notes no material alteration to the biodiversity assessment within the EIAR. Further, the NTA confirms that habitat surveys did not identify Japanese knotweed on the site of the Proposed Development, but noted that the invasive species management plan provides for pre-construction surveys and control measures throughout.
- 5.2.4.11. In response to DLRCC concerns for biodiversity monitoring the NTA state that there will be daily visual monitoring of surface water controls, invasive species monitoring, checks for potential bat roosts, badger and otter habitats, breeding bird, frogspawn/tadpole surveys (where seasonal restrictions cannot be adhered to)

during the construction period and annual post-construction monitoring of planting for two years.

- 5.2.4.12. In relation to the biodiversity conditions recommended by DLRCC the NTA state that these are not necessary as the design of the Proposed Development, has been, and will continue to be, informed through liaison with the Local Authority.
- 5.2.4.13. In response to the comments from the Drainage section of DLRCC the NTA confirm that all SuDS features have been assessed to ensure that there is sufficient space for them and utility checks have been carried out. Tree pits are proposed in areas of new paving while pits are not proposed in landscaped areas. Permeable paving was considered as an option but not pursued further. The purpose of the SuDS is to ensure no increase on existing runoff rates from new paved areas as such the conversion of existing landscaped areas into bioretention basins does not form part of the Proposed Scheme. In relation to the recommended drainage conditions the NTA state that they are not necessary as collaboration will continue with the Local Authority throughout the detailed design and construction processes.
- 5.2.4.14. Similar to the DCC roads comments the NTA confirms that the EIAR commits the project to pavement condition surveys pre- and post- works along the construction traffic routes. The NTA also confirms that the current legislation does not require a formal taking in charge process as the NTA will be the roads authority for the works while this role reverts automatically to the Local Authority for maintenance purposes following completion.
- 5.2.4.15. The NTA confirms that no petrol interceptors are proposed as part of the drainage works and that focus on using the existing drainage network while SuDS will be provided to ensure no increase in existing runoff while providing a level of treatment before discharging into the existing systems.
- 5.2.4.16. The NTA confirm that the proposed relocation of existing, and provision of new, lighting column locations have been co-ordinated with the planting regime to ensure no adverse effect on the light levels to roads and footpaths.

5.2.5. Department of Housing, Local Government and Heritage (Development Applications Unit)

- 5.2.5.1. The Development Applications Unit (DAU) of the DHLGH comments in relation to Nature Conservation can be summarised as follows:
 - Main concerns regarding the Proposed Scheme relate to the potential for pollutants mobilised during the construction phase having detrimental effects on the Williamstown Creek and Booterstown Marsh sections of the South Dublin Bay and River Tolka Estuary Special Protection Area (SPA), loss of treeline, hedgerow, mixed broadleaved woodlands and scattered trees and parkland habitat along the proposed corridor.
 - The proposed construction compound is located on an existing hardstand area adjacent to the outlet for Williamstown Creek which connects Dublin Bay to Booterstown Marsh, all of which form part of the South Dublin Bay and River Tolka SPA. Williamstown Creek and Booterstown Marsh are both of conservation significance as foraging habitat and roosting areas for wintering SCI (Special Conservation Interest) bird species for the SPA. Pollutants mobilised from the construction compound could potentially therefore directly detrimentally affect SCI bird species using the marsh and creek and/or their foraging habitats.
 - Various appropriate measures to prevent any pollution arising from construction are set out in the NIS, CEMP, Surface Water Management Plan (SWMP) and Environment Incidence Response Plan. If these plans are fully adhered to and implemented during construction the Department considers that detrimental effects to the South Dublin Bay and River Tolka Estuary SPA and South Dublin Bay SAC should be successfully avoided.
 - The DAU notes that the Arboricultural Impact Assessment (AIA) and Environmental Impact Assessment Report (EIAR) state that it is intended to remove 1,040m of hedgerow and 4,157m of treeline comprising 329 trees (representing approximately 25% of the total of 1299 trees identified along and adjacent the proposed route). These trees and hedgerow are mainly located along the boundaries of Blackrock Park, Blackrock College, Elm Park Golf and Sports Club, and RTE grounds where they front onto the site of the Proposed Scheme. The DAU considers this biodiversity loss to be significant,

regrettable, and will be made up for to some extent in the longer term by the planting of 349 street trees and 550m of hedgerow as part of the proposed scheme.

- The DAU recommends that in the event of favourable consideration that conditions requiring the following be imposed:
 - Mitigation measures set out within the NIS, CEMP, and Surface Water Management Plan (SWMP) submitted in support of the application should be applied to ensure detrimental effects on the SPA can be avoided successfully.
 - No removal of trees or vegetation to be permitted during the March to August (inclusive) bird breeding season.
- The DAU also recommends that the applicant be asked to review the detail of and requirement for removal of trees and investigate whether transplanting is feasible to adjacent locations in the event of large mature specimen trees being required to be removed.

5.2.6. NTA response to DAU submission

- 5.2.6.1. NTA welcomes the engagement of the Department, and notes that the CEMP includes a number of specific mitigation measures to ensure that Booterstown Marsh and Williamstown Creek are protected from any adverse effects from the scheme and construction compound. Furthermore, the NTA points to the seasonal restrictions on construction activities for vegetation removal and should it be necessary the monitoring of works by an ecologist in advance.
- 5.2.6.2. In response to the DAUs request to review the necessity of tree removal the NTA has stated that it has carried out an exhaustive exercise in determining which trees need to be removed to facilitate the proposed development, and an iterative design process has been adopted. A total of 329 trees are to be removed while 349 are proposed to be planted. In relation to transplanting trees along the route the NTA states that this was considered but determined that it would not be feasible.

5.3. Proposed Scheme Third-Party Submissions/Observations

- 5.3.1. There were a total of 96 no. third-party submissions and observations lodged in relation to the Proposed Scheme in the initial statutory period. These submissions were lodged by a mixture of third-parties, corporate entities, clubs, volunteer groups, clubs, and individuals. These submissions are all listed and summarised in **Appendix 1** of this report, and all relevant points raised have been reviewed and have been considered throughout the assessment of the Proposed Scheme where necessary. Five of the 96 initial submissions made in relation to the Proposed Scheme vere referenced an oral hearing. In the interests of clarity and conciseness I refer the Board to Appendix 1 to review the issues raised in each of the individual submissions lodged.
- 5.3.2. The main relevant themes raised throughout the various submissions have been summarised below, which also includes the applicant's response to these elements. The submissions were circulated to the applicant in August 2022, and they were invited to respond. The applicant did so in September 2022 and their comments on the submissions were circulated to all the third parties who were in turn invited to comment and a further 23 valid submissions were made at this stage. The additional submission responses were from the Blackrock Clinic, B. Heneghan, B. Harte, C. & M O'Sullivan, the Dalata Hotel Group Plc., D. Bradley & M. Cooney, Dr. R. Owens, E. Hoey, Elmpark Green Development, H. & R. Hough, J. & F. McEvoy, J. Quinn, J. McKeon, M & M Dinneen (John Taylor Menswear), K. Gilmartin and Sterrin O'Shea, M. & H. Quinn (and others), Pembroke Road Association, S. Tarmey, S. & C. Mulligan, Tesco Ireland Ltd., Upper Baggot Street Traders Association, and V. Freeman. The responses submitted by third parties to the NTAs consideration of the initial submissions broadly raise issues consistent with the original submissions, state that the applicants response does not address the specific concerns that had been raised, no amendments have been made by the NTA to address concerns and that the decision not to hold an oral hearing is neither appropriate nor in accordance with the Aarhus convention, the additional submissions again raise concerns in relation to the removal of a significant number of trees from along Nutley Lane and the impact that the Proposed Scheme will have both on Nutley Lane, the Pembroke Road and Baggot Street areas. The responses from third parties to the NTA's comments on their initial submissions are also summarised in Appendix I.

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- 5.3.3. The section below provides a high-level summary of the most frequently/commonly raised themes/issues from the third-party submissions that have been received. It is not intended in this section to list all the issues raised in the submissions that were lodged (these are summarised in Appendix I) and the responses made individually, all submissions have been reviewed and considered in preparing this report and recommendation. Where relevant specific points which merit individual discussion have been raised in the submissions, these have been brought into the overall assessment of the Proposed Scheme set out throughout this report (EIA, Planning Assessment and AA). The Board should also note that some third party have made similar submissions to both the CPO and application files, where this has occurred I have summarised the detailed responses from the NTA in relation to the CPO cases as these are specific to identified locations and can be dealt with more succinctly under the CPO section, however, for clarity where two submissions have been made in relation to both processes they have been included in my consideration of both processes.
- 5.3.4. The Board should note that many of the submissions lodged expressed support for the further and continued development of public transport systems, the main relevant themes raised throughout the third-party submissions are listed below:
 - General route selection/design alternatives and in particular:
 - Design and(/or) inclusion of Nutley Lane section of the Proposed Scheme. Concerns raised include visual impacts, loss of parking, loss of trees, creation of additional congestion, restricting access to trip generating uses – such as SVUH, St. Michaels College (and/or whether the scheme will adversely impact their traffic safety and operational measures), adverse impacts on private homes, safety of accessing dwellings over the 2-way cycle track, adverse effect on property values and on the established resident community and amenities of the area. Suggestions are made by various parties for specific design alternatives along this route including omission of certain elements of the infrastructure (such as omission of a bus or general traffic lane, use of traffic restrictions [i.e. making use of oneway traffic provisions] and/or using shorter bus filter lanes at each side of Nutley Lane). Furthermore concerns are raised that the proposed bi-

directional cycle track is inappropriate and will only increase conflict between cyclists and vehicular traffic accessing private dwellings on the southern side of Nutley Lane. Third parties suggest solutions such as cyclists sharing the carriageway with vehicles and not run along the footpaths or alternatively cycle routes should be provided on Woodbine Road and Trimleston Avenue. Concerns are also raised in relation to the extent of infrastructure proposed (in conjunction with the loss of trees along the south of Nutley Lane) in that this will adversely affect the character and visual amenities of the area. The removal of trees, and replacement of existing fence (back planted with hedgerow) with a concrete wall (along the EPGSC frontage) is considered inappropriate notwithstanding the proposed use of climbing vegetation and an alternative should be used such as some form of natural blockwork. Third parties do not consider that the extent (and impact) of the works along Nutley Lane are justified given the limited gains and demand that is in place for this connection as access to the City Centre is already facilitated through the direct connections available from UCD to the City Centre (via the Stillorgan Road and Donnybrook) and from Blackrock to the City Centre (via the existing Merrion Road corridor and DART facilities). Submissions also raise concerns that the Proposed Scheme will have an adverse and undue effect on the EPGSC which will result in a loss of general amenity for the area and a degradation of facilities in the golf course (in particular on the par rating of the golf course and impact on the tennis courts).

o The inclusion of the Pembroke Road/Baggot Street Upper and Lower portion of the route is raised as a frequent concern within a lot of the third-party submissions, with the Northumberland Road/Mount Street corridor often being presented as a more appropriate alternative. Third parties are concerned that the Proposed Scheme will restrict access to the Pembroke Road/Baggot Street area through the provision of a bus gate and the associated restriction of private car movements. It is contended that the adverse impact is further exacerbated by the removal of car parking spaces along this area. It is also suggested that

cutting off Elgin Road at the US embassy is inappropriate, and an issue is raised requesting clarity of the hours of operation of the Bus Gate at Pembroke Road.

- Related to impacts in the Baggot Street area concerns are also raised in relation to the Baggot Street/McCartney with several third parties contending that this bridge is too old and narrow and that it represents a choke point for pedestrians already, and that the Proposed Scheme will only exacerbate this as an issue. It is contended in several submissions that this bridge is not suitable to accommodate the new infrastructure proposed. Third parties also note that this bridge is a protected structure and that therefore additional works should not be carried out to it. Several third parties submit that the bridge at Lower Mount Street is a better alternative to use as it is a flat modern 20th century bridge which is capable of accommodating additional bus traffic and forms part of the existing Northumberland Road / Lower Mount Street bus route into the City Centre.
- Third parties also consider that the Proposed Scheme and the increase in bus activity that it would facilitate along the selected route would create an adverse impact on community and village amenities with particular concerns raised in relation to adverse impacts to the character of the Baggot Street/Pembroke Road, and Fitzwilliam Street Lower areas.
- Safety concerns were also raised in relation to the location of the proposed cycle track (between parked cars and the footpath) along the commercial/service centres/villages on the route, particularly at Baggot Street Upper where the works will result in adverse impacts on businesses from loss of accessibility (arising from the provision of a bus gate, restrictions on turning form Mespil Road and limiting private car access to Baggot Street), loss of parking and loading/servicing bays, as well as the impacts on protected structures and elements of heritage value.

- Submissions also raise concerns in relation to the staging of events in the Aviva Stadium which causes significant congestion/pedestrian activity in the Pembroke Road/Baggot Street area, and that the Proposed Scheme does not provide sufficient pedestrian crossing points.
- Several submissions suggest extending the proposed 3-lane carriageway design inbound from the Merrion Gates to Elm Court Apartments further north to the junction at Estate Avenue. This option is presented as an alternative approach to the design that would reduce impacts on protected structures (at Estate Avenue) and other properties in the vicinity as well as facilitating the preservation of existing mature street trees.
- Some submissions seek an increase in the width of cycle lanes throughout the scheme from 2-2.25m to facilitate passing and noncommuting cyclists.
- Some third parties raise concerns that the inclusion of bus shelters within the Georgian Core and fronting Georgian buildings is inappropriate and should be omitted.
- The issue is also raised that the lack of a feasible plan for additional bus depots is concerning and that this will lead to buses grouping and loitering at specific points along the route to the detriment of residents and businesses in the vicinity.
- While not strictly speaking a design issue, concerns have been raised in relation to the lack of enforcement of the rules of the road and the need for the applicant to engage in an awareness campaign.
 Furthermore the suggestion is made that enforcement cameras should be installed at junctions and along the route. (The issue of enforcement has also been raised by DCC and Applicant response discussed previously in section 5.2 above).
- <u>Alternatives Newton Plan</u>

- Several submissions present the 'Newton Plan' as an alternative approach to the re-organisation of the public transport network that was not given sufficient consideration by the applicant in developing the proposed transport corridors. This transport plan provides for linking Dublin neighbourhoods in an orbital system, which it is argued will keep buses moving, create more fluid traffic movement, be cost-effective, and proposes new route for Luas along Lower Baggot Street. The plan also advocates using Northumberland Road as an access point to the City Centre and is referenced in several submissions as a more appropriate alternative as it would result in a reduced impact on the established social and economic character of Baggot Street Upper area.
- Loss of car-parking and restricted access for communities.
 - Several submissions raise concerns that the Proposed Scheme will have adverse impacts on existing communities, through restricting access to properties and businesses which will impact amenities. In this regard submissions also raise concerns that the potential loss of car parking will give rise to operational issues in relation to certain specific uses, such as Blackrock Clinic, SVUH, as well as adversely impacting local service/village centres that are along the route, thereby adversely affecting customers, service users, businesses and vulnerable visitors who may not be able to use bus services and for whom cycling and pedestrian improvements won't be of benefit. In relation to Nutley Lane submissions raise concerns that the loss of car parking is significant and will force more visitor parking into residential areas in the vicinity of the lane, adversely impacting the residential amenities of the wider area. Furthermore, it is contended by third parties that the Proposed Scheme will adversely affect SVUH access and operations. In this regard the Board should note that SVUH has not made any submission to the Proposed Scheme, however, Breastcheck (a facility in the SVUH campus) have made a submission seeking to ensure that their car parking facilities are not impacted.

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- Adverse impacts on various individual properties, commercial, medical, business, and educational operations.
 - Third parties have raised concerns in relation to potential impacts that could arise on commercial, residential, educational, institutional (e.g. hospital/clinics/schools) and recreational facilities along the route from the Proposed Scheme due to works, land-take, revised traffic management arrangements, land acquisition (as well as loss of parking and loading areas). Furthermore, concerns are raised that the Proposed Scheme will cause significant adverse impacts on properties and commercial (including medical) operations through causing interruptions to utilities services such as water, gas, electricity, communications, and/or temporary altered vehicular access which may be required throughout the construction phase.
 - The permanent proposed removal/alteration of parking and loading facilities in and around the Baggot Street Upper area will draw more commercial (and visitor) parking into residential areas in the vicinity and result in adverse impacts on amenities. Furthermore, the relocation/removal of parking and loading bays from this commercial area will make access to these facilities and services harder for customers and make the management of the commercial uses harder for operators in terms of managing deliveries, and transiting the proposed infrastructure.
 - Loss of land along frontage of EPGSC will impact their operations and reduce the length of 3 holes, impact on tennis courts and affect the overall ratings of the available facilities.
- Loss of Trees.
 - The loss of trees along the route is raised as an issue in a number of submissions which have been lodged in relation to individual local areas, including Nutley Lane, Pembroke Road/ Baggot Street Upper and Lower, and the Merrion Road.
 - It is suggested that alternative landscaping and planting be provided along the concrete wall proposed along Nutley Lane along the frontage

of the EPGSC frontage to address the public side through the provision of indentations in the wall to accommodate the replanting of trees.

- Concerns are also raised that the removal of trees (at Herbert Park and Nutley Lane in particular) will give rise to adverse impacts on Bats, commuting and foraging activities.
- Third parties consider that priority should be given to greening the city rather than engineering more transport infrastructure into the existing corridor.
- Environment and Biodiversity:
 - Several submissions raise concerns that the Proposed Scheme will have an adverse impact on biodiversity, including bats, wildlife, and flora, including spread of invasive species.
 - Concerns are also raised that the Proposed Scheme will have an adverse impact on European designated sites and species, (i.e. SACs, SPAs and birds known to loiter and feed in the vicinity).
- <u>Reduction in land take requirements for the Proposed Scheme.</u>
 - Several submissions request a reduction in the land take required to facilitate the Proposed Scheme and suggest that reductions in the extent of infrastructure be incorporated or that the design of the project be altered to minimise the land take provided for.
- Adverse impact on locations/structures of heritage and cultural value.
 - The Proposed Scheme runs immediately adjacent to a number of protected structures and within areas that have been designated as Residential Conservation Areas or Georgian Conservation Areas. Submissions raise concerns not only in relation to the nature of the works themselves which in some instances propose the removal and set back of features which form part of the Protected Structures (i.e. works directly affecting the curtilage/setting of protected structures) or which are of heritage value in and of themselves such as railings, boundary treatments, gates etc., but also in relation to the nature and operational impacts that could arise on conservation areas and

areas/structures of heritage value through impacting street character. In this regard concerns have been raised that adverse impacts will occur to streets of heritage/conservation value through the changes to the streetscape that will arise from the operational phase, both from the new corridor infrastructure as well as the increased number and frequency of buses travelling

- A number of specific concerns are raised in relation to the works proposed to the boundaries of 1-11 Pembroke Road (a terrace of buildings that are all on the RPS), and which will have their access arrangements altered by the Proposed Scheme to facilitate the provision and operation of the Bus Gate at this location. One of the existing entrances is to be closed to vehicular traffic with an alternative vehicular access being provided onto Waterloo Road. Third parties suggest that this is inappropriate and will adversely impact on the setting, amenity, and attraction of this unique terrace of period properties. Another concern raised in relation to these RPS structures is that the Proposed Scheme will adversely affect their character and impact their mature parkland setting.
- Third parties also raise concerns that the application documentation does not include sufficient information in relation to the works, methodologies, or practices to be adopted in replacing, repurposing or moving heritage features/railings etc. Third parties are concerned that the use of terms such as replacing 'Like-for-like', and 'to match the existing' are not sufficiently detailed and do not provide the required assurance that works will protect and minimise impacts on heritage features and protected structures.
- Third parties contend that the Proposed Scheme will spoil the historic atmosphere and setting of Pembroke Road, the Georgian setting of the heritage areas of Dublin, and various Victorian streetscape elements, furthermore it is contended that these impacts could adversely affect the general attraction of this area for locals and tourists. Concerns are also raised that relocation of the kiosk on Pembroke Road is inappropriate.

- One third party submission raises concerns that the set back of the existing plinth and railing boundary along the frontage of the Clayton Hotel (RPS former Masonic School), is inappropriate and will have an adverse impact on its setting and landscaped grounds. The submission contends that this set back is being provided to allow the retention of three trees but that maintaining the setting of the Protected Structure is of greater concern and should be prioritised ahead of tree retention.
- Objections are raised in relation to interference with railings, gate, and granite plinths along Herbert Park Road, third parties note that these amendments are acknowledged as being "Direct, Negative, Moderate and Permanent" in the application documentation.
- Justification for the Proposed Scheme following the Pandemic:
 - Several submissions note that the need for the Proposed Scheme is no longer justified or as significant as set out in the application documentation, having regard to the changes the COVID 19 pandemic has had on commuting patterns. With more and more people working in blended working conditions and increased working from home becoming normalised a development of the proposed scale and nature such as that proposed cannot be justified.
- Junction Design:
 - Concerns have been raised in relation to the safety of the junction designs adopted and in particular whether they could be improved to further ensure pedestrian and cyclist safety.
 - Loss of left-hand turning lanes at various locations throughout the scheme will lead to traffic safety issues, and a range of submissions have been made seeking alterations to where proposed or existing traffic restrictions are provided for within the Proposed Scheme (for example at locations such as at Ailesbury Road / Shrewsbury Road junction, Pembroke/Baggot Street Upper, Eastmoreland Place or Mespil Road). The proposed traffic restriction from Georges Avenue onto Frascati Road (where access is proposed to be restricted to

authorised vehicles and bicycles only) is also referenced as being of concern in some submissions.

- Third parties also raise concerns in relation to the specific design of certain junctions and whether improvements can be made to functionality and safety. In this regard the design of the crossing of the Dodder is raised (with suggestions on how interactions with the Dodder Greenway should be improved). Concerns are also raised in relation to the pedestrian crossing facilities and general arrangements at a variety of junctions (where additional crossing requirements should be considered or where pedestrian crossing is mixed with cyclist crossing facilities) at a number of junctions the following junctions Temple Hill/Monkstown Road, Temple Road/Newton Avenue, Frascati Road/Temple Road, Frascati Road/George's Avenue, Rock Road/Booterstown Avenue, Merrion/Strand Road (missing a pedestrian crossing on one arm), Fitzwilliam Street Lower/Mount Street Upper, and Nutley Lane / Stillorgan Road. A pedestrian crossing is also requested on Fitzwilliam Street at Fitzwilliam Lane. A suggestion is also made that yellow boxes be expanded so that they cover the entirety of the road area up to the signal point and in particular on the Strand Road at Merrion Gates and Rock Road at Phoenix Terrace are cited as examples of this requirement. It is also argued that connection should be provided to the coastal mobility route at Newtown Avenue, and cyclists should be protected from left turning traffic at St. Vincent's Park Entrance.
- One third party also raises concern that the Proposed Scheme will result in the creation of a traffic hazard and restrict sightlines for traffic turning into and out of Fitzwilliam Lane due to the proposed location of the bus stop.
- Suggestion is made that the Proposed Scheme should adopt a 'Dutch' or 'Cyclops' junction design approach in lieu of the current proposal as the general design approach provided in the application drawings has an increased risk of conflicts between cyclists and left turning drivers.

Third party concerns are also raised that the proposed route could be made safer for pedestrians and cyclists by making bus stop islands larger, and removing spaces that have been designed to be shared between cyclists and pedestrians such as at Elgin Road, Booterstown station, and Nutley Lane. It is contended that designs should be altered/revisited to reduce/omit the amount of shared spaces between pedestrians and cyclists (particularly toucan crossings). It is suggested that toucan crossings present a low/poor level of service for right-hand turning cyclists.

- Construction Concerns:
 - Some third parties raise concerns that it is unclear whether the construction activities will have impacts on their residential amenities and request greater clarity in relation to work practices and timing.
 - Concerns are also raised that sufficient detail is not available from drawings for third parties to assess the extent and level of impact on their properties.
- Concerns raised in relation to the Public Consultation:
 - Concerns were raised in relation to the engagement and outcome of the public consultation process. In this regard it should be noted that the majority of submissions acknowledged that public consultation was carried out, however, concerns were predominantly raised in relation to the timing of changes and the format of the final Proposed Scheme, while the second round of submissions lodged raised concerns that an Oral Hearing was not being carried out as part of the decision process with a number of submissions stating that this was prejudicial and contrary to the principles set out in the Aarhus convention. (This matter is considered further in Section 8.3 of this report below). Of particular concern in relation to the timing of changes within the Proposed Scheme is the provision of the bi-directional cycle track along the southern side of Nutley Lane, this was stated as being a late alteration as these facilities were initially proposed along the northern side of the Lane (along the RTE frontage).

- Third parties also raised concerns in their second round of submissions that the NTA did not take any account of any of the initial submissions lodged and as evidenced by them not proposing any alterations to the Proposed Scheme within their response document.
- 5.3.5. While the above issues represent the most common issues raised throughout the third-party submissions, I wish to reiterate that all of the issues raised in the submissions have been considered, and where additional discussion is required, these are discussed further in the Planning, Environmental Impact, and Appropriate assessments carried out in the later sections of this report below. A comprehensive summary and review of all the individual submissions lodged in relation to the Proposed Scheme is set out and detailed in Appendix 1, and all the points and issues raised therein have been considered in the assessments carried out throughout this report.

5.3.6. Proposed Scheme NTA Response to Common Themes/Issues Raised:

This section of the report sets out the response from the NTA to the common themes raised by third parties above where they have not been dealt with previously in response to the prescribed bodies responses.

5.3.7. Route Selection/Alternatives: Nutley Lane

5.3.7.1. The NTA state in their response that the corridors being proposed across the core bus network are generally along established radial corridors to and from the City, however, in developing the core bus network a significant demand was identified for bus travel between UCD and Ballsbridge. The proposed route via Nutley Lane serves a significant public transport demand between these locations, which currently suffers from poor journey time reliability particularly at peak times. Demand for travel by bus is anticipated to continue to grow in this corridor into the future in line with population growth. The bus priority measures proposed will accommodate this growth in travel demand while protecting passengers from increasing congestion. The bus lanes and improved infrastructure along this route will serve B-spine services increasing reliability. In 2028 it is estimated that c. 150-200 additional

passengers will be carried along Nutley Lane in the AM Peak hour (rising to 300-350 in the same scenario by 2043).

- 5.3.7.2. A cycle route along Nutley Lane is a requirement to provide connectivity between UCD and Dart Stations as well as providing a secondary cycle link (S04) set out in the Greater Dublin Area Cycle Network Plan.
- 5.3.7.3. Furthermore, in relation to the Nutley Lane section the NTA note the following:
 - The project design considered a number of alternatives along the Nutley Lane, and the current proposal represents the optimal approach as it will increase bus service reliability and connectivity for all sustainable modes of transport while minimising impacts on property. The alternatives considered along Nutley Lane, included three cycle track options, and seven vehicular options (NL1 – NL7) with various carriageway arrangements proposed that included three-carriageway proposals along Nutley Lane, however, each of these did not perform as well as the preferred arrangement in terms of road safety, transport quality and reliability. Of particular note in relation to the 3carraigeway options assessed, (i.e. those that did not provide full physical bus priority - dedicated bus lanes in both directions) were the adverse impacts on adjoining streets from increased levels of through-traffic detouring from Nutley Lane, the reduction in bus journey time reliability and worse performances in terms of traffic safety.
 - Air quality impacts are found to be overall neutral and long-term pre-mitigation and while noise impacts will arise during construction, these will be temporary and subject to mitigation in terms of plant maintenance and timing of construction works. Operational noise impacts are considered to be positive to neutral arising from the reduction in traffic volumes associated with the Proposed Scheme in the design and opening years.
 - During the operational period there will be a positive to neutral direct impact due to the reduction in traffic volumes.
 - The NTA considers that the Proposed Scheme will not have an adverse impact on the character of Nutley Lane, but will contribute to the community

through the improved public realm and cycling facilities as well as the improved connectivity and improvement to the bus services.

- The impact on the golf course lands along Nutley Lane have been minimised (following engagement) through the omission of pedestrian facilities on this side of Nutley Lane. Boundary treatments (concrete wall and climbing vegetation with hedgerow on the club side) have been designed to retain the club's privacy, and the NTA do not consider that the Proposed Scheme will adversely affect the par rating of any of the holes at the EPGSC.
- There will be a loss of trees along Nutley Lane, primarily along the frontage of the EPGSC. The NTA state this cannot be avoided in order to deliver the objectives for bus, normal traffic, and cycle track infrastructure in both directions. The preference was to avoid removal of trees along the northern side of Nutley Lane (in the vicinity of private residences).
- In terms of construction activities impacting on amenities, appropriate measures will be put in to protect features and retained vegetation and the proposed concrete wall and hedgerow has been designed to minimise visual impacts.
- NTA states that the scheme has been designed to minimise the impact on trees while also achieving the overall objectives, cycle lanes along this section have been kept to minimal widths to minimise the number of trees requiring removal.
- In relation to the loss of parking along Nutley Lane the NTA acknowledges that 39 no. residential pay and display and permit parking spaces along the eastern side of Nutley Lane are proposed to be removed. The NTA states that all residential properties along this stretch have off-street parking and the onstreet spaces are underutilised. There are approximately 60 no. equivalent spaces in the vicinity where displaced parking could be accommodated. In relation to the loss of 4 no. disabled parking bays at the Merrion Shopping Centre the NTA note that the centre provides parking for customers in an offstreet car park which includes disabled spaces. The NTA also notes that the other large trip attractors on Nutley Lane (SVUH, RTE studios, EPGSC, and

St. Michaels College) all currently provide off-street parking at each of their sites.

- In relation to congestion the NTA state that there will be no increases in general traffic flows along the study area as the Proposed Scheme will actually reduce general traffic flows, with there being a predicted reduction of 220 Passenger Car Units (PCUs) along Nutley Lane during the AM peak hours in 2028, arising from the modal shift that will be facilitated by the works. The PM peak hour shows no reduction or increase in general traffic flows in excess of 100 PCUs (changes of greater than this being the level at which significance is noted) along Nutley Lane.
- In relation to access to St. Michaels college the NTA state that the Proposed Scheme will improve access from both the Stillorgan and Merrion Roads as well as providing alternative transport options for students leading to less dependency the private cars.
- In terms of traffic modelling and whether SVUH has been adequately considered, the NTA clarifies that SVUH is itself a traffic modelling zone due to its size, and it considers the continued growth of the Hospital with an employment growth increase of approximately 400 and 700 assumed by 2028 and 2043 respectively. The modelling shows the number of car trips accessing the SVUH site over 24 hrs reducing from 3,300 in 2020 to approximately 2,000 in 2028 and 2043 with public transport trips increasing over the same period from 1,900 to 3,000 and 3,400 respectively. The Proposed Scheme incorporates the right turning lane from Nutley Lane provided for in the permitted National Maternity Hospital consent. The NTA states that the Proposed Scheme will have a Positive, Very Significant and Long-term effect on the sustainable movement of people along the corridor and a Negative, Slight and Long-Term impact on the surrounding road network due to the re-distribution of general traffic.
- The NTA states that overall the improvements to pedestrian infrastructure will result in Positive, Significant and Long-term effects on the section of the corridor that includes Nutley Lane. Furthermore, the improvements to cycling

infrastructure along Nutley Lane will have a Positive, Very Significant, and Long-term effect.

- In terms of congestion the NTA state that both the Nutley Lane/SVUH and Merrion Road/Nutley Lane junctions have been modelled to show that they operate within capacity during AM and PM peaks. While the Stillorgan Road / Nutley Lane junction will operate over-capacity with a practical reserve capacity of -5%.
- The two-way cycle track along the southern side of Nutley Lane runs from the Stillorgan Road. Junction to the SVUH junction, and passes the frontage of 8 no. dwellings (an additional five to the route that was shown in the third round of public consultation as at that stage the cycleway ran along the northern side between the Stillorgan Road junction and Nutley Park). Safety audits carried out as part of the project design did not highlight any safety issues in relation to the bi-directional cycle way passing in front of residential driveways and the NTA notes that SI 182/1997 provides that a vehicle is allowed to be driven across a footpath and is also allowed to be driven across a cycle track to facilitate access.
- In terms of impact on property values the NTA points to Appendix A10.2 of the EIAR which considers the economic impact of the bus corridors which concludes that in overall terms the public realm improvements and provision of improved sustainable transport options may in fact lead to an increase in value of both residential and retail property prices.
- In relation to impacts on the community and character of Nutley Lane, the NTA points to the public consultation process that it has undertaken as well as the improvements in the level of service for pedestrians, the enhanced public realm, cycling infrastructure, improved public transport and general permeability being incorporated throughout the Proposed Scheme. Accordingly, the NTA is of the opinion that the Proposed Scheme will contribute positively to the community.
- In response to concerns raised in relation to cyclist safety the NTA notes that cyclist level of service provisions are proposed to increase from their current 'D' rating along Nutley Lane to a an 'A' rating throughout and the safety audit

carried out did not envisage any safety issues in relation to cycling or pedestrian infrastructure along Nutley Lane.

A number of submissions have referred to the replacement of the fence/hedging at EPGSC with a concrete wall, as being an adverse impact on visual amenities and the character of the area. In response to this issue the NTA acknowledge that the Proposed Scheme has to balance often-competing factors in the design of the proposal, however, the proposed wall replacement for the fencing and hedgerow was developed in conjunction with the EPGSC (landowner) and offers increased security, to aid visual assimilation climbing vegetation (Ivy or similar) is proposed on the roadside face of the reinforced wall.

5.3.8. Route Selection/Alternatives: Baggot Street Upper/Pembroke Road.

- 5.3.8.1. In relation to the Northumberland Road, Mount Street alternative to the Baggot Street Upper/Pembroke Road route to the city centre frequently referenced throughout the submissions the NTA refer to the Combined Activity Density Map (figure 2.5 of the EIAR) which combines residential, employment and student enrolment densities to approximate the potential demand for public transport. The density map shows that there is a greater combined activity density along the proposed route (i.e., along Pembroke Road and Baggot Street Upper/Lower) than the suggested alternative (Northumberland Road and Mount Street). The Northumberland Road option was considered as an alternative (Option N2) in the design of the Scheme with the current proposal via Baggot Street Upper and Lower being referred to as N1. N1 was considered to have significant benefits in relation to land use character and capital cost. The various options looked at on both routes were expected to affect a large number of trees and on-street parking provision, however, these were greater on the Northumberland Road options and accordingly the Pembroke Road/Baggot Street corridor was considered optimal.
- 5.3.8.2. In relation to capacity concerns on the Baggot Street/MacCartney Bridge the NTA state the Proposed Scheme prioritises walking, cycling and buses crossing the Bridge. Modelling shows that under the Proposed Scheme there will be significantly fewer vehicles crossing the Bridge (with Baggot Street Upper and Lower

experiencing a reduction of 952 and 317 PCUs respectively in the AM peak hour). In relation to structural loading, the cross-sectional vehicular trafficked area on the bridge will be reduced (it will be approximately halved from 12m to 6m) and so the number of vehicles crossing the bridge at any given time will be significantly reduced should the Proposed Scheme go ahead.

- 5.3.8.3. In relation to the potential for the bus gate on Pembroke Road to give rise to adverse impacts due to access restrictions for private cars to local businesses, the NTA state that four alternative options were considered for this location including 4-lane, 3-lane (allowing for one-way system) and 2-lane cross sections, and cycle tracks, all with and without parking. The 2-lane option facilitated by the proposed bus gate does not require permanent land-take from protected (or other) structures of heritage value, or the removal of trees and will retain and/or widen footpaths at this location while still achieving the Proposed Scheme objectives. The bus-gate option performed best of the options considered in terms of flora and fauna (through the retention of trees) and in terms of air quality, as well as noise and vibration (through reduction in carriageway widths). This option also performed best under architectural heritage, landscape and visual, land use character and also preserved the most car parking.
- 5.3.8.4. In relation to pedestrian crossings the NTA state the proposed scheme will significantly improve facilitates for pedestrians in Baggot Street Upper including improved crossing facilities with shorter crossing distances than currently in place in some cases. On Pembroke Road existing informal crossing points will be retained, the carriageway is to be narrowed and buildouts are provided to reduce crossing distances.
- 5.3.8.5. In relation to access to businesses on Baggot Street the NTA state that the sustainable options for access will be greatly improved through the Proposed Scheme, with bus journey time reductions as well more frequent and reliable services. Additional bicycle parking and improvements to the public realm are also proposed on Baggot Street which will contribute to a more cohesive village environment. The NTA notes that general traffic access to Baggot Street Upper will be maintained at all times although during hours of operation of the bus gate (which will be from 06.00 to 20.00 as indicated on drawings and section 4.13 of the

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Preliminary Design Report) general traffic will not be able to access Baggot Street Upper from Pembroke Road. As such the NTA anticipates that the Proposed Scheme will have a positive impact on local business in the area. The NTA acknowledge that there will be disruption during construction, but this will be managed effectively through the construction phase with access provisions being discussed with businesses and residences and a Construction Stage Mobility Management Plan being developed in advance.

- 5.3.8.6. In relation to car parking the NTA have stated that it has balanced the need to provide parking and loading within this constrained urban location with some spaces being removed (approximately 29 of the 67 general residential pay and display spaces along the Pembroke Road). The NTA go on to state that there are approximately 650 spaces within 200m of the proposed scheme between Ballsbridge and Merrion Square. It is also noted that all parking being removed at this location is public parking, no private parking spaces are being removed.
- 5.3.8.7. The NTA state that in developing the design of the Proposed Scheme it has balanced the need to provide parking and loading within Baggot Street Upper as it is an important urban village, it acknowledges that some parking and loading has been relocated to other proximate locations.
- 5.3.8.8. On impacts on the character of the area the NTA state that the operational stages will involve changes along Pembroke Road and Baggot Street Upper, but these will not alter the overall townscape, although there will be improved junction layouts and new planting resulting in moderate long term positive impacts.
- 5.3.8.9. Having regard to impact on protected structures or structures of heritage merit, the NTA state that significant effort has been made to minimise impact and that the proposed bus gate option on Pembroke Road means that permanent land-take is not required at this location, footpath widths are maximised, tree removal minimised, and the maximum amount of car parking retained. A specific response was submitted in relation to no. 1-11 Pembroke Road this is discussed further in the Planning Assessment below.

- 5.3.8.10. In relation to the staging of events, the NTA state that pedestrian footpaths on Pembroke Road are maintained and widened where feasible and while traffic and crowd control for the Aviva stadium are matters for the Gardai and event organisers, it is not envisaged that additional issues will be experienced.
- 5.3.8.11. Safety concerns have also been raised in relation to the proposed location of the cycle track between the footpath and parked cars, the NTA states that this is the preferred location and is in line with international best practice for high quality cycling infrastructure, and the safety audit completed did not raise any concern in this regard.
- 5.3.8.12. In relation to the proposed restriction for general traffic turning right from Mespil Road onto Baggot Street Upper, the NTA note that this is the only right turn currently permitted at this junction and its restriction will significantly improve the operation of this junction, while prioritising sustainable modes (walking, cycling and buses). It is also considered that the proposed bus gate will reduce demand for this right turn.

5.3.9. Alternatives: Extension of 3-lane carriageway from Elm Court to Estate Ave.

5.3.9.1. Some third-party submissions suggest that the proposed signal-controlled priority from the Merion Gates junction (inbound) should be extended past the Elm Court Apartments, as well as No.'s 157, 155, 153, and 151 Merrion Road thus eliminating any impact on properties in the area. The NTA note that amendments were made to the emerging preferred scheme in the design phase at this location (omitting dedicated bus lanes on both sides of the Merrion Road for a short distance - 100m), to avoid the need for land acquisition from 7 residential properties with very limited front gardens, as well as the demolition of another property and additional land-take from a commercial property. The reason for commencing the dedicated inbound bus lane immediately after no. 165 Merrion Road is to maximise the amount of physical priority afforded to buses and limit the potential for queuing traffic approaching the SVUH junction (inbound along the Merrion Road) extending beyond the physical bus lane provision and creating additional congestion for both bus and general traffic at this location. The NTA consider that the alternative proposed by third parties would significantly reduce the available queuing space for vehicles on approach to the

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SVUH junction, would introduce an unacceptable risk to the progress of buses through this area and they therefore did not consider that it met the scheme objectives.

5.3.10. Alternatives: Newton Plan

5.3.10.1. The NTA state that the Newton Plan was submitted previously on behalf of the Baggot Street Traders and the Pembroke Road Association as part of the consultation process on the Greater Dublin Area Transport Strategy (2022 – 2042). The NTA states that the Newton Plan relates predominantly to planning for transport services rather than infrastructure that will be used by the services. The NTA state that the Newton Plan has been considered as part of the development of the (then) Draft Transport Strategy for the Greater Dublin Area 2022-2042.

5.3.11. Loss of car-parking and restricted access/impact for communities.

- 5.3.11.1. In relation to concerns raised regarding restricted access/impact on communities along the route, the NTA respond by pointing to improved access being at the core of the Proposed Scheme, and that while bus lanes, general traffic lanes and cycle tracks may widen carriageways and have different types and frequencies of traffic, that the sustainable modes of travel that the works facilitate (including pedestrian facilities) will, in fact, improve access throughout.
- 5.3.11.2. Where car-parking issues were raised in relation to general areas the NTA has responded in a similar manner to the responses provided previously in relation to Nutley Lane, Pembroke Road, and Baggot Street Upper as set out above. Referencing the presence of an appropriate number and scale of similar parking spaces in the vicinity and the overall need to prioritise more sustainable modes of transport. In relation to specific locations where queries were raised that private offstreet parking spaces or access could be impacted, the NTA have clarified that the Proposed Scheme will not result in residential properties that have on-site car parking losing this facility.

- 5.3.12. Adverse impacts on various individual properties (both commercial and residential) arising from the Proposed Scheme due to works, land-take, revised traffic management arrangements and land acquisition.
- 5.3.12.1. Generally the NTA respond to issues raised in relation to individual properties by clarifying that access to each will be maintained throughout construction and that where boundaries are to be set back these will be replaced on a like for like basis. Where heritage boundaries or features are to be set back the applicants reference the methodology set out within the EIAR and note that heritage gateways, railings and plinths will be recorded, stored, and reinstated along the new front boundaries, and reference the assessments carried out within the EIAR in terms of identifying and quantifying the significance of impacts.

5.3.13. Loss of Trees.

5.3.13.1. The NTA acknowledges that the Proposed Scheme will require the removal of mature trees and makes reference to the relevant sections of the submitted EIAR (including the Arboricultural Impact Assessment Report) in this regard. The NTA states that 329 trees are proposed to be removed under the Proposed Scheme, while 349 street trees will be planted throughout, giving rise to a net increase of 20 no. trees. The NTA also state that insofar as possible the Proposed Scheme was designed to retain trees and references the reduced width cycle lane at Merrion Road as an example of this.

5.3.14. Land take requirements of the Proposed Scheme

5.3.14.1. The Applicant defends the extent of land take requirements to facilitate the Proposed Scheme and states that the requirements have been minimised insofar as practicable in order to deliver the overall Scheme objectives.

5.3.15. Impact on locations/structures of heritage and cultural value.

5.3.15.1. In response to the concerns raised in relation to the potential impacts on conservation areas, items on the Record of Protected Structures and other heritage

items the NTA refer to and reiterate several sections of the submitted EIAR, to avoid repetition I discuss these impacts in the relevant sections of the EIA of this report below (Section 9.11 refers).

5.3.15.2. Scheme Justification post-pandemic

5.3.15.3. A number of submissions relating to Nutley Lane (and the wider scheme) reference the fact that Covid 19 has changed commuting patterns and that the Proposed Scheme not needed. In response to this issue the NTA state that the pandemic brought about a short-term change in travel patterns in the Greater Dublin Area and that travel demand and patterns of travel have now started to return to pre-pandemic levels and are anticipated to grow in line with population growth. They go on to note that the impacts on travel demand and patterns of travel are still dependent on the quality of the transport system in particular the reliability of a bus service that is not constrained by general traffic congestion.

5.3.16. Junction Design

5.3.16.1. In relation to junction design the NTA points to the fact that two broad junction designs (Type 1 or Type 3) are used in the Proposed Scheme (from the four options within the design booklet). The junction designs proposed improve the quality of pedestrian, cyclist and bus priority infrastructure at each location and the levels of safety and service for each of these sustainable travel modes is improved. The NTA states that the junction designs adopted removes any uncontrolled pedestrian-cyclist conflict, provides raised and protected cycle tracks in advance, reduces the risk of side-swipe due to the removal of cyclist-vehicle conflict at weaving and merging lanes on all approaches, improves right turning safety (for cyclists) and provides improved sightlines for left-turning traffic. EIAR appendix A6.3 (Junction Design Report) sets out the evolution of the junction design at the key locations along the route of the Proposed Scheme. The NTA note that the junction designs adopted considered the objectives of the scheme and the need for safety and service improvements while acknowledging the urban setting and associated space constraints. In these situations, advance cycle stop lines on approaches are included

and phasing and co-ordinated signalling is provided to ensure optimal junction performance.

5.3.17. Consultations

5.3.17.1. Third parties have raised concerns in relation to the public consultation process prior to and during the application process and raised concern in relation to the provisions of the Aarhus Convention and Kazakhstan advice. In relation to this issue the NTA response points to the three phases of non-statutory consultation carried out prior to lodgement of the current application (February to May 2019, March to April and November to December 2020) which engaged with all members of the public and relevant stakeholders. The NTA in their submission acknowledged that certain rounds of the public engagement had to be undertaken during the COVID pandemic restrictions. The NTA went on to state that the application process itself offers the public opportunity to engage with the process. In relation to the Kazakhstan advice the NTA have stated that this refers to the holding of public hearings and does not apply to the non-statutory public consultation effort engaged in by the NTA prior to lodgement of the current application with the Board.

5.4. Third Party Submissions/Objections on the CPO.

5.4.1. There were 23 no. third party submissions lodged in the initial public consultation phase in relation to the CPO process. The submissions and issues raised have all been summarised individually below as each submission relates to specific landholdings and CPO areas. The submissions were circulated to the applicant (the NTA) who submitted a response to the issues raised (the responses to each individual submission are set out below under the relevant heading). The response of the NTA was also forwarded to the various parties by the Board and further commentary was invited, twelve further submissions were made, which are also summarised below.

5.4.2. 1 Merrion Land Ltd.

 Submission prepared by Urban Agency on behalf of 1 Merrion Land Ltd. in relation to plot list 1038(1).1d (permanent land take) and 1038(2).2d (temporary land take) regarding lands at 143 Merrion Road. Permission has been granted at this location under PI. Ref. 4240/19 which has been designed cognisant of the proposed BusConnects proposals and which at time of site inspection was under construction.

- Observer has requested CAD files of the CPO lines from the NTA but they have not been forthcoming.
- Amenity space on ground level has been designed in accordance with the CPO zones but it will not be possible to increase from those designed for.
- There is a fire exit onto the Merrion Road any temporary hoarding or works must ensure this fire exit is neither impeded nor blocked.
- There are two private inspection chambers within 1038(2).2d which cannot be moved and will need to be protected throughout the proposed works.
- Manhole over Irish water foul connection from the development is located within CPO area as well as two drainage lines all must be protected for the duration of works.
- Lighting scheme must be given careful scrutiny to ensure light spill is minimised and does not result in severe light trespass onto the 143 Merrion Road apartment development which includes ground floor units facing onto Merrion Road.
- NTA must engage to ensure that the public landscaping is consistent with the issued grant of permission.
- Submission includes conditions that it is requesting ABP to attach to any confirmed CPO including confirming the right to pass over the CPO areas, the right to use CPO areas for fire exit, provision and maintenance of services and conduits, confirming the right to construct their permitted development as granted including provision and renewal of overhangs as well as confirming the right to over sail cranes and provide scaffolding/hoarding on CPO areas to facilitate construction.

5.4.2.1. NTA Response

• There is no requirement to extend the CPO area beyond what is detailed.

- Details regarding temporary access provisions will be discussed with homes and businesses prior to construction starting in the area (Section 5.5.3.2 of EIAR refers). The duration of the works will vary from property to property, but access and egress will be maintained at all times including fire access as practicable.
- Section 19.5.1.1 of the EIAR sets out that all possible precautions will be taken by the appointed contractor to avoid unplanned interruptions to any services during construction.
- Public lighting will be changed at this location as the current light stands conflict with the proposed cycle track, replacements are proposed at similar set back locations (street lighting drawing 11 of 23 refers). All new lighting will aim to minimise the effects of obtrusive light at night, reduce visual impact during daylight, and will comply with the "Guidance notes for the Reduction of Light Pollution" issued by the institution of lighting professionals.
- Should the CPO be approved a Notice to Treat will be served on the relevant landowner, reinstatement of landscaping, frontage, gates, walls, fences, or other detailing etc. for CPO areas (subject to approval) will be on a like-for-like basis and local arrangements will be made in advance of works.
- The areas identified for permanent acquisition will be retained in public ownership (subject to approval), and any rights through or over this portion of land will form part of formal agreements put in place following the service of the Notice to Treat. The temporary area will be returned to the landowner with rights restored.
- 5.4.2.2. Merrion Land Ltd. Response to NTA submission
 - On the 6th of July 2023 Merrion Land Ltd. made a further observation in response to the NTAs commentary noting that the details of their original submission were based on mapping supplied to them by the NTA dated 27/05/2021. This is a pdf drawing file and not a CAD file.
 - The need to maintain access, provision of private open space (at ground floor) and access to a service, provide and maintain all services in both the areas of permanent and temporary acquisition must be maintained.

5.4.3. Blackrock Clinic (/Blackrock Health)

- Submission prepared by McGill Planning and relates to CPO plot references 1019(1).1i, 1019(2).2i, 1019(3).2i, 1020(a).1i and 1020(2).2i.
- Supports the principle of the proposed development but objects to the extent of the proposed land take (on a temporary and permanent) basis to facilitate the works as it will impact on the operation of the Clinic and Hospital.
- Bus Connects has not taken account of the proposed relocation of the vehicular and pedestrian access from the Rock Road to Blackrock Clinic nor the clinics future expansion.
- Adverse visual impact arising from loss of mature trees within the Clinic site.
- The extent of the temporary land-take in the vicinity of the Glenalla building will result in the loss of c. 7 car parking spaces and render the building inaccessible, it is not clear what this land-take is for.
- CPO Plot references 1019(1).1i (permanent), 1019(2).2i and 1019(3).2i (temporary), are not necessary. These relate to the main frontage as it is their understanding the land take is to facilitate induction loops on the clinic junction arm and is nothing to do with Bus Connects, however, the existing entrance has induction loops, and the clinic facilitates any necessary maintenance by the roads authority and they see no reason to alter this arrangement which is understood to be acceptable to the NTA. The Clinic is of the opinion that the junction can be facilitated with less land-take that will not necessitate the removal of parking spaces which are crucial to operations.
- Impact on utilities (incl. water, gas, electricity, communications, and vehicular access), it is critical that phasing, notification and agreement with the Blackrock Clinic in advance of any work to utilities.
- Proposals require the removal of c. 10 car parking spaces permanently and 40 temporarily, these are crucial to clinic operations and it is inappropriate to remove them.
- Blackrock Clinic has an appeal before An Board Pleanála under (PL06D.312908) for alternative access arrangements to the site and a further application to Dun Laoghaire/Rathdown County Council (D22A/0490) which

was granted 31/08/2022 showing a single lane access/egress, detailed junction (with Phoenix terrace as the north eastern arm) complete with cycling crossing, toucan crossings and yellow box. (This is a significant departure from the submitted drawings and would replace a currently proposed grassed central verge area.)

- The reference within the application documentation to the Dun Laoghaire Rathdown Development plan 2016-2022 does not reflect the current zoning in and around the Blackrock Clinic as set out in the 2022-2028 Plan which was adopted in March 2022 (Seafort building, on Castledawson Avenue, is now zoned for medical use and is in the ownership of Blackrock Health)
- Realignment places too much burden on properties to the southside of the Rock Road, and it is not necessary to provide footpaths and cycle paths in excess of DMURS guidelines as currently proposed the realignment should be spread more evenly.
- Reduction in land-take from Blackrock Clinic will allow retention of mature trees and minimise visual impact. An alternative design is also offered to show how land-take can be minimised.

5.4.3.1. NTA Response:

- Extent of CPO is the minimum required to deliver the project, which includes the provision of the desirable minimum widths of 2m each for footpaths and cycle tracks. The cycle track in the vicinity of the clinic has been reduced to 1.5m to minimise the extent of the CPO already. The submission suggestions for further reductions in the CPO area is achieved by reducing footpaths and cycle tracks locally to 1.8 and 1.75 respectively and curtailing cycle tracks to share with the bus lane which fails to meet the objectives of the project in this area.
- In relation to seeking to share the extent of the CPO areas between the northern and southern sides of the road the NTA have clarified that there are level differences which restrict the ability to move the CPO (and route widening) to the northern side of Rock Road.

- In relation to the impact on the Glenalla plot, the NTA have stated that access will be maintained throughout works and that there will be impacts arising from having to build out the retaining wall structure and grading. Upon completion the plot should retain the ability to accommodate c. 6-7 car parking spaces. Local arrangements will be made to ensure access is retained during works but there will be temporary impacts where the extant car parking at this location will not be available during construction.
- There will be temporary and permanent impacts on extant parking arising from the proposed development, however, car park reconfiguration and local accommodations will be agreed should the CPO be confirmed by An Bord Pleanála.
- The NTA defend the extent of the permanent CPO which is to ensure that access for maintenance and emergencies to signal infrastructure (including induction loops) is always available to the Roads Authority.
- Details regarding temporary access provisions will be discussed with property owners prior to construction starting in the area (Section 5.5.3.2 of EIAR refers). The duration of the works will vary from property to property, but access and egress will be maintained at all times during construction, this includes alternative pedestrian access which is raised as a concern in the submission. Also refer to section 17.5.1 of the EIAR relating to protection of features, (trees and vegetation), access and security during works.
- It is acknowledged that there will be temporary inconveniences during construction activities, however, these will be managed insofar as practicable to limit impacts.
- It is acknowledged that the proposed relocation of the entrance to the Blackrock clinic consented by Dun Laoghaire-Rathdown County Council (DLRCC) in August (DL22A/0490) is compatible with the proposed BusConnects project.
- Ten trees are proposed to be removed from the clinic lands; however, 20 trees are proposed resulting in a net increase of 10, montages are provided in figure 17.2 of the EIAR. A minor negative change to the character of the view is predicted but no appreciable loss of visual amenity.

- Section 19.5.1.1 of the EIAR sets out that all possible precautions will be taken by the appointed contractor to avoid unplanned interruptions to any services during construction. Any required works will be scheduled to minimise impacts and duration of interruptions. Given the important function of the Clinic any planned interruption will be discussed in advance.
- The adoption of the DLRCC Development plan 2022-2028 is acknowledged and it is contended that the proposed development remains consistent with the provisions of this plan, and that the project is specifically supported by its policies.

5.4.3.2. Blackrock Clinic (/Blackrock Health) Response to NTA submission

On the 6th of July 2023 Blackrock Clinic (/Blackrock Health) made a further observation in response to the NTAs commentary noting that the NTA submission was generic. The objector continues to assert that the level of land-take is excessive, will have significant impacts on clinic and hospital operations as well as its utilities and services. Furthermore, the proposed scheme has not taken account of the revised and now permitted access arrangements at the clinic under ABP-312908-22, nor the alternative access arrangements previously approved under D22A/0490. The Clinic requests that should the CPO/scheme be approved that it be done in accordance with the DBFL drawings (included with their submission) showing amendments with a significant reduction in land-take as per their original submission.

5.4.4. Blue Infinity PropCo Limited.

- Submission lodged in relation to CPO Plot 1011(1).2c (Temporary), Bankcentre Property, Merrion Road.
- Submission states that there is a lack of clarity and omission of schedule from the circulated documentation and that they do not therefore have a clear understanding of either the proposed impact on their rights or their property interests. Submission notes that additional clarity has been sought directly from the NTA as well.

5.4.4.1. NTA Response

- Schedules were not included as no private rights were identified at this plot.
- The proposed development requires the provision of a raised table across the entrance of the site to improve pedestrian and cyclist safety, access and egress will be maintained at all times.
- Since the submission was lodged the NTA have engaged with the representatives of Blue Infinity.

5.4.5. Blackrock College

- Submission lodged in relation to three CPO plots 1022(1).1a (permanent, private rights to be acquired) in front of Willow Park School entrance gates (DLR RPS28, National Inventory of Architectural Heritage (NIAH) 2473), 1021(1).1i (permanent private rights to be acquired over frontage and access location) and 1021(2).2i (temporary private rights to be temporarily restricted or interfered with).
- CPO at Willow Park gate had not been previously flagged, the CPO and plans for this entrance will have a negative impact on the internal campus traffic management system which has been designed to cater for peak movements.
- The CPO and NTA plans do not take account of the existing protected structure gates which will be in the middle of the carriageways.
- College requests maintaining the existing arrangements to allow two exit lanes from the campus at Willow Park gate and a wider bell-mouth area to allow contra-flow movements at the gates, landscaping proposals should be altered to respect the location and widths of the vehicle entrance gates, and retention of the existing yellow box currently provided on inbound lane of rock road. Pending required redesign the Board should consider this as a holding objection to CPO of plot 1022(1).1a.
- In relation to the other two CPO plots at the Blackrock College gate entrance 1021(1).1i and 1021(2).2i, the following is a summary of the issues raised.

- The impact of relocating the gateway which is the primary access into the college campus must be co-ordinated with the college and pedestrian and vehicular access must be maintained throughout.
- The Gate lodge (adjacent to the entrances gates) is an occupied dwelling the NTA intends to acquire access to this dwelling, vehicular and pedestrian access to the dwelling must be retained throughout.
- All temporary CPO areas must be reinstated in consultation and with the agreement of the college.
- Only a brief statement is provided in relation to the methodology for relocating the Blackrock College archway, a full and detailed method statement is requested to be submitted to the college for review and agreement prior to the commencement of these works.

5.4.5.1. NTA Response

- Access arrangements at Willow Park entrance gates will not impact on the existing gate which will remain unaffected by the works. The two-exit lane arrangement will be restricted to one in order to improve pedestrian and cyclist safety over the raised table arrangement and reduced corner radii set out. The NTA does not accept that there will be a material impact on traffic movement out of this gate, they also note the request for the retention of the yellow box at this location and state that it will be considered at detailed design stage.
- Access and egress will be maintained at all times during the construction period; however, inconveniences are inevitable. Arrangements will be discussed locally on an individual basis.
- In terms of the methodology adopted for the works to Blackrock college gate, section 16.51.5 of the EIAR is referenced along with appendix A16.3 of the EIAR. All works will be overseen by an architectural heritage specialist.
- Reinstatement of property frontage will be on a like-for-like basis, and appropriate compensation agreed in the event of the CPO being confirmed.
- 5.4.5.2. Blackrock College Response to NTA submission

- On the 6th of July 2023 Blackrock College made a further observation in response to the NTAs commentary. The issues raised are set out below.
- There is no justification for the requirement to acquire the plot or land directly in front of the Willow Park School Entrance gates. The traffic management system within the Willow Park / Blackrock college campus heavily relies on the existing arrangements at this gate which provides both left and right turning lanes.
- On the basis of the above asks that only a temporary CPO be approved for the plot in front of the Willow Park school gate so that works can be completed but ownership is retained by the school.

5.4.6. BreastCheck

- Submission objects to CPO plot 1003(1).1i (permanent, private rights to be acquired) land take along Nutley Lane.
- Concerns that the CPO will impact negatively on the available car parking spaces available immediately adjacent to the breast check unit which will adversely affect the operation of the unit and have wider knock-on effects for SVUH.
- Submission notes the overall improvement to public transport involved however, considers that public transport, cycling and walking may not be appropriate modes of transport for some of those accessing their services and request that car parking is retained.

5.4.6.1. NTA Response

- Notes that a new building has been constructed within the SVUH site immediately adjacent to the proposed scheme and the Breastcheck building – under emergency COVID legislation, and have provided updated images of that building.
- NTA have confirmed that the proposed development and its associated landtake will not result in any temporary or permanent loss of car parking in the vicinity of the BreastCheck Merrion Unit or within the SVUH campus.

5.4.7. Dalata Group PLC.

- Submission is made in relation to CPO Plot 1007(1).1c (Permanent), and 1007(2).2c (temporary) land acquisitions at the Clayton Hotel, Ballsbridge on the Merrion Road.
- Are supportive of the proposed development in principle, however, they are concerned that there will be detrimental impacts on the operations of the Clayton Hotel Ballsbridge arising from the loss of landscaped lands along its frontage with the Merrion Road. The hotel is on the Record of Protected Structures (RPS No. 5086) and the proposed development (through acquiring the lands along the frontage) will have a negative impact on the protected structure, and run contrary to the Guidelines for Planning Authorities on Architectural Heritage Protection as well as the policies of the Development Plan. The scheme will not be adversely affected should this frontage land-take be omitted from the CPO.

5.4.7.1. NTA Response

- The impact of the proposed development on the Clayton Hotel is detailed in Section 16.4.3.1 of the EIAR.
- The land-take is required to facilitate the provision of cycle track, pedestrian path and carriageway requirements while also facilitating the retention of three mature trees with estimated 20+ (1 no.) and 40+ (2 no.) years remaining.

5.4.7.2. Dalata Group PLC. Response to NTA submission

- On the 6th of July 2023 the Dalata Group made a further observation in response to the NTAs commentary.
- The Dalata Groups position remains unchanged as the NTA have not altered the extent or nature of the CPO at this location.
- The buildings and site of the Clayton Hotel are protected, and the works will seriously injure the overall built heritage value of the site. The EIAR acknowledges the negative impact on the protected structure, and accordingly the works run contrary to conservation guidelines and the provisions of the City Development Plan.

- The preservation of three trees should not outweigh the importance of preserving the site curtilage and railings of the protected structure, and the removal of the trees would be less impactful than the boundary alterations proposed.
- The CPO of the relevant lands is therefore requested to be omitted from the scheme.

5.4.8. Rhonda Draper

- Submission is made in relation to CPO Plot 1002(1).2d (temporary acquisition with private rights to be restricted or otherwise interfered with), which concerns the blocking of a private vehicular entrance to a dwelling house off Stillorgan Road (No. 118 Stillorgan Road).
- Wants to retain the entrance only to her dwelling (which has operated without issue for 43 years) as is for vehicular access (not exit), as she is very concerned that having to execute an immediate right turn (having pulled off the Stillorgan Road) in such close proximity to a junction will inevitably lead to traffic accident and congestion (particularly as traffic will be accelerating from a turn off the north bound lane of the Stillorgan road when turning onto Nutley lane). Queuing for/to her access off Nutley Lane will also cause concern.

5.4.8.1. NTA Response

- Vehicular entrance onto Stillorgan Road junction directly from the property will cause safety conflict with bicycles queuing to use junction. The provision of additional traffic control infrastructure and junction alterations will render access to 118 Stillorgan Road directly off the junction unsafe. This access is uncontrolled and is currently available for access and egress.
- The use of the Nutley Lane access from the Stillorgan Road is set back 30m from the junction and is not considered as a potential hazard in the Road Safety Audit or by the design team. This situation is the same for the neighbouring property and is not uncommon at urban junctions.
- 5.4.8.2. Rhonda Draper Response to NTA submission:

- Junction designs remain unclear, however, vehicular access to the dwelling will not interfere with the cycle lane or pedestrian arrangements.
- Vehicular access to her dwelling from the incoming side of Nutley Lane is not possible due to queuing of traffic and at present the neighbouring property at no. 8 is accessed only from the outbound carriageway (i.e. on the same side of the road) as queuing traffic renders it impossible and unsafe to gain access.
- Vehicular access through the grounds of the dwelling from the Nutley Lane access to the Stillorgan Road junction are not used.
- Considers there to have been a lack of genuine engagement from the NTA and a lack of detailed designs provided.

5.4.9. Elm Court Management DAC

- Submission is made in relation to CPO Plots 1033(1)d (Permanent with private rights to be acquired), and 1033(2).2d (temporary with private rights to be temporarily restricted or otherwise interfered with).
- EIA has not been made available and they request that it be provided as soon as it is completed.
- Concerns that the proposed development will adversely affect the safety of pedestrians and have a negative impact on air quality and traffic generally.
- Object to the need to take land from along the frontage of Elm Court.
- The proposal will reduce the amount of car parking available which will impact local residents and businesses.
- Concerns that the proposed development will restrict access to the village by car.
- No details of work time schedule or compensation to be paid for use of the land (lands at front of Elm Court required on a temporary basis for construction purposes).
- Unclear whether the proposal will impact the front hedge, gates, and access to Elm Court, as well as trees in general.

5.4.9.1. NTA Response

- EIAR is available for review and comment as per notices issued.
- Traffic assessment is set out in Section 6.4.6.2.8 and 6.4.6.3 which concludes that overall there will be a reduction in general traffic flows along the proposed development which will result in a positive, moderate and long term effect while the impact of the re-distributed general traffic within the surrounding road network will have a negative, slight and long term effect.
- The subject CPO lands in this instance are located between the existing hedge/gate of the apartments and the pavement edge. Neither the existing hedge nor gate will be impacted.
- There will be no impact on on-site parking, however, there will be a net increase of two car-parking spaces in the section of the scheme between Trimleston Avenue and Nutley Lane where the Elm Park apartments are located.
- The CPO lands are needed to provide the preferred design scheme incorporating segregated cycle track, footpaths, bus lane and normal traffic lanes in each direction.
- Economic impacts arising from the proposed development are set out in chapter 10 of the EIAR. Strong benefits on the basis of sustainable travelling patterns and positive accessibility impacts are predicted.
- Impact on trees is set out in Arboricultural Impact Assessment Report (Appendix A17.1 of the EIAR).
- Unclear which village access is being queried and reference to one-way system, however, no one-way systems are proposed as part of the proposed development in the vicinity.
- Standard compensation response is provided stating that this will be established in the event of the CPO being approved and reinstatement provided on a like for like basis.
- Construction timing and methodologies are dealt with in Chapter 5 of the EIAR.

5.4.10. Elm Park Golf and Sports Club

- Submission prepared by Simon Clear and made in relation to the Nutley Lane elements of the proposal that impact on the Elm Park Golf and Sports Club (EPGSC) landholding. The CPO Plots that run along the frontage of the holding are 1000(1).1f (Permanent), as well as 1000(3).2f and 1000(2).2f (temporary).
- Elm Park Golf and Sports Club (EPGSC) are affected by both the proposed development and the associated compulsory purchase order (CPO). While supportive of the overall scheme EPGSC have reservations in relation to the need for, and the impacts of, the Nutley Lane link.
- The effects of emerging working from home patterns will reduce the need to accommodate buses at the scale and frequency accommodated in the current proposal, and adequate consideration has not been given to alternatives and/or the preliminary work carried out by the NTA regarding the post-Covid *'Alternative Future Scenario for Travel Demand'*. Accordingly, the submission is seeking either omission of the Nutley Lane link or its significant alteration to be for a single bus lane with a bus shuttle option, thus reducing the land-take requirements affecting the EPGSC. Should an alternative emerge as a preference there may be associated alterations required to the access arrangements for the EPGSC off the Nutley Lane.
- It is considered that the Proposed Scheme could potentially create a traffic hazard at the entrances to the EPGSC.
- It is feared that the loss of land from the EPGSC to allow construction of the proposed development will result in a reduction in the overall rating (for competition) and attractiveness of the club. The land take associated with the proposed development will reduce the length of 3 holes, require an amendment to a green and the loss of ground on tennis court no. 9. Any impacts on the tennis courts will have a long-term effect on the rating of the tennis facilities.
- The proposed development through the removal of mature vegetation will have an adverse impact on bats as the replanting at this location will fall short of the trees that are to be removed and this ecological corridor will be lost.

The findings in the EIAR of "No significant residual effect" is not adequately explained in relation to bats.

• Requests an Oral Hearing in relation to the proposed development.

5.4.10.1. NTA Response

- The need for the proposed development has been set out in Chapter 2 of the EIAR. A cycle route along Nutley Lane is a requirement to provide connectivity between UCD and Dart Stations as well as providing a secondary and primary link set out in the Greater Dublin Area Cycle Network Plan. The Bus lanes along this route will serve B-spine services increasing reliability and service. In 2028 it is estimated that c. 150-200 additional passengers will be carried along Nutley Lane in the AM Peak hour (rising to 300-350 in the same scenario by 2043).
- The Impact on golf course lands has been minimised through the omission of pedestrian facilities on this side of Nutley Lane (through engagement).
- Boundary treatments (concrete wall and climbing vegetation with hedgerow on the club side) has been designed to retain the club's privacy.
- Entrance and secondary entrance issues raised can be adequately resolved and the proposed development will not impact on the par rating of any hole.
- In terms of impacts on the club it is acknowledged that there will be a short term moderate negative impact during construction, but that accessibility will improve through reduced traffic.
- Road safety audit (Stage 1) has been carried out which does not envisage any issues of safety at either the primary or secondary access points to the Club.
- There will be a loss of trees on the Club side of the road which cannot be avoided in order to deliver the objectives of a bus, general traffic, and cycle tracks in both directions. The preference was to avoid removal of trees along the northern side of Nutley Lane and replant hedgerow behind a concrete wall (with climbing vegetation) along the Club frontage.

- In terms of construction activities appropriate measures will be put in to protect features and retained vegetation and the proposed concrete wall and hedgerow has been designed to minimise impact on the club.
- Alternatives were assessed to incorporate three-carriageway proposals along Nutley Lane, however, each of these did not perform as well as the preferred arrangement in terms of road safety, transport quality and reliability.

5.4.11. Elmpark Green Development (/Davy Platform ICAV/Elm Real Estate Investments)

- Submission prepared by O'Connor Sutton Cronin and is made in relation to CPO Plot 1042(1).1e (Permanent with private rights to the acquired) at the entrance junction for the Elmpark Green Development off Merrion Road.
- Supportive of the proposed development in principle, however, wishes to
 ensure that the integrity and quality of the Elmpark Green Development is not
 compromised as part of the works, and its continued operation as a major
 residential and employment centre is protected.
- Elmpark Green has a range of uses (residential, office blocks, cafés, crèche, leisure centre and conference centre) and it is served by a single access point onto the Merrion Road.
- It is queried whether the land-take for the new junction arrangement has to be permanent, a temporary acquisition would seem just as appropriate.
- If the land-take must go ahead the provision of a high-quality landscaping scheme (similar to that already in place) and a consistent ongoing maintenance regime needs to be agreed with Elmpark Green development, or alternatively the permanent land-take could be restricted to the roads/pathways to allow consistent management of landscaped areas to be retained by Elmpark Green.
- Appendix 6.4 of the EIAR provides junction modelling which shows that projected traffic flows for the predicted year of opening (2028) will have the access junction operating above the theoretical capacity limit in the PM peak and over maximum capacity limit in the AM peak. It is unclear whether the recent grant of permission for 73 apartments (under construction – Original

consent 3743/19, ABP-307424-20) has been included in these calculations and changes to the Merrion Gates junction show that it will also be overcapacity and bring a stacking issue (potentially hundreds of vehicles) back to Elmpark Green junction, which will also lead to stacking on the ramp from the basement car park. It is recommended that the Board seek additional clarity in relation to the traffic projections via a further information request.

 It is essential that access to Elmpark Green campus is maintained throughout construction, and it is requested that in the event of favourable consideration that the Board require that the provisions of the CEMP be applied in this regard and furthermore it is requested that commitments made to individual homes and businesses affected by works be extended to overall developments such as Elmpark Green to ensure construction impacts are minimised.

5.4.11.1. NTA Response

- The extent of the CPO lands has been kept to a minimum but includes traffic signal infrastructure, proposed SUDs measures, and lighting columns to ensure access for maintenance is always available.
- Landscaping has been designed to be sympathetic to the existing landscaping and if the CPO is confirmed reinstatement will be on a like for like basis and agreed with landowners, maintenance of the landscaped areas can be discussed during this stage.
- It is acknowledged that in the AM peak period the southern Merrion Road approach to the junction is modelled to be operating at above capacity, however, all other approaches will operate within capacity (including the access to Elmpark Green) in both the AM and PM peaks. The NTA, however, consider the operation of this junction to be acceptable considering the significant benefits to people movement and sustainable modes of transport that will arise from the Proposed Scheme along this corridor and the Level of Service improvements being provided for pedestrian and cyclist traffic.

- In terms of access and egress, the NTA have confirmed that this will be maintained at all times although it must acknowledge that as with any construction process there may be varying degrees of inconvenience arising.
- 5.4.11.2. Elmpark Green Development (/Davy Platform ICAV/Elm Real Estate Investments) Response to NTA submission:
 - On the 6th July OCSC on behalf of the objector made a further observation in response to the NTAs commentary. The following summarises the main points raised.
 - Remains unclear why a permanent CPO is required given the extent and nature of the works required at this junction access/location. NTA has not justified the CPO in the context of this junction operating in a satisfactory manner for a number of years.
 - Asks that the permanent CPO be restricted to areas where permanent infrastructure is indicated and realistically expected to be located, therefore the landscaped area to the south of the junction be omitted from the permanent land-take and used only as a temporary acquisition to allow ownership to be returned to the development.
 - It is requested that the signal plans put in operation at the revised junctions be required through condition to give sufficient consideration to the operation of the Elmpark Green Development to avoid any disproportionate impact and on operations or creation of a traffic hazard.
 - Welcomes the commitment to retain access throughout the construction phase.

5.4.12. Caroline Farrell

- Submission is made in relation to 1-11 Pembroke Road, CPO Plots in the vicinity are 1013(1).2d, 1012(2).2d and 1012(1).2d all of which are temporary and while the first involves restriction/interference with private rights temporarily the last two include the restriction/interference of private rights.
- Submission states that it supports the observations and proposals made by the Pembroke Road Association together with the Upper Baggot Street

Traders Association to the NTA in January 2022 and supports the Newton Plan presented by Tom Philips Planners.

 Is against anything that will interfere with the current access/egress of their property and the enjoyment of the property by their tenants.

5.4.12.1. NTA Response

- The rearrangement of the accesses into 1-11 Pembroke Road are necessary due to the provision of the bus gate, which is of itself necessary to provide the objectives of the proposed development while minimising impact on the Pembrooke Road and its existing amenities.
- The eastern most access along Pembroke Road will remain as both vehicular and pedestrian but will have a control (as will the new proposed access onto Waterloo Road) in order to restrict the driveway being used as a means of bypassing the proposed bus gate.

5.4.13. Veronica Freeman

- Submission is made in relation to 153 Merrion Road, the CPO Plots directly affecting this dwelling are 1036(1).1d (Permanent), and 1036(2).2d (temporary).
- The proposed development/landtake impacts and reduces the front garden of the property and will result in the loss of two car parking spaces which are needed to facilitate medical appointments and ensure mobility. There is limited alternative parking in the vicinity and none so proximate.
- Removal of garden hedges (and mature trees from the public realm outside the boundary) will reduce privacy, increase noise, and facilitate additional pollution.
- Proposed works to boundary fences and gates will impact on the historic railing and curtilage of a dwelling which is on the RPS.
- Works will result in devaluation of the property.
- Requests that the three-lane design (i.e. omission of inbound bus lane) from the Merrion Gate junction inbound be extended until after properties no. 151

to 157 Merrion Road to eliminate the impacts on the dwellings and RPS properties curtilage, as this would facilitate the retention of existing boundaries, negate the need for direct intervention on the site of protected structures and maintain the heritage value.

5.4.13.1. NTA Response

- The works will result in the edge of the bus lane being 0.3 to 0.4m closer to the residence than the current carriageway kerb.
- The front boundary is approx. 10.6m long and is proposed to be at least 8.2m from the front of the house, accordingly the proposed development will not hinder or materially reduce the number of cars that can be accommodated/parked on site.
- Air quality (/pollution) arising is considered to be negligible to moderate beneficial at this location as shown in figures 7.3-7.8 of the EIAR.
- Noise impacts at worst are predicted to be negative, not significant, short to medium term impact, arising from an overall reduction in traffic volumes through incorporation of bus priority signals.
- In terms of vibration from buses, at distances of 2.5 to 10m from the road edge levels are negligible in terms of human perception and building response.
- Boundaries will be reinstated on a like for like basis, therefore maintaining privacy levels.
- In terms of property values the NTA states that the investment in the public realm and improvement of connectivity and accessibility will render the location more desirable and accordingly property values will not be reduced.
- Impact on the protected structure is acknowledged, however, mitigation will be provided through recording the existing arrangement, and careful repositioning of the existing railing and plinth to ensure that cultural heritage is protected while accommodating the overall objectives of the proposed development.

- There are no trees immediately in front of no 153, however two trees (outside 151 and 155 Merrion Rd.) are proposed to be removed to facilitate the Proposed Scheme. NTA also notes that the cycle tracks in the vicinity have been reduced in width in order to minimise impact and land-take demands insofar as practicable.
- Full EIA is available on website and through the public consultation process.
- In review of options for delivery of the proposed development at this location reducing the physical bus land in this area by omitting the bus lane at the location of 151-157 Merrion road was considered to be an unacceptable risk to the progress of buses through this area as it would (a) reduce the physical bus lane to only 85m in advance of the SVUH junction and (b) increase the signal-controlled priority length (where there would be shared traffic in the same lane) to 200m and thereby significantly reducing the available queuing space available.

5.4.13.2. Veronica Freeman Response to NTA Submission

 Does not consider that the response submitted addresses her concerns and states that the issues as raised in her initial submission remain valid.

5.4.14. Gas Networks Ireland (GNI)

- Submission is made in relation to CPO Plots 1039(1).1c (Permanent), and 1039(2).2(c) (temporary) land-takes concerning the St. Vincent's Above Ground Installation (AGI).
- Gas Networks Ireland have stated that this gas installation is vital for the supply to St. Vincent's Hospital and other customers in the surrounding areas. There is an isolation valve on the inlet of the 19 Bar Transmission connection at this location which has a Zone 1 hazardous area associated, thus making it unsuitable for access by non-GNI personnel, there are also other cables and communication equipment vital to ensure safe operations in place at this location.
- GNI require access to the AGI at all times.

 Have requested further clarity and engagement from NTA and GNI engineers and safety team and are awaiting additional information and contact.

5.4.14.1. NTA Response:

- Extensive meetings and discussions have taken place and will continue on this matter. The proposed development (which includes the dismantling and relocation of the existing archway and provision of sliding gate) will improve access to this location for GNI staff.
- It is not anticipated that the proposed development will necessitate a need to decommission the AGI for any period of time. Cycle track widths have been reduced in the vicinity to limit the land-take requirements at this location and in the vicinity.
- It is anticipated that during the detailed design stage further details, arrangements and construction methodologies can be agreed between the NTA/Contractor and GNI.

5.4.14.2. GNI response to NTA Submission:

- On the 6th July GNI made a further observation in response to the NTAs commentary.
- From a safety perspective GNI will need to ensure that all works comply with their code of practice.
- Access to the site for GNI personnel will need to be managed carefully and assured and agreed upfront.
- The security measures and new gate to be agreed and detailed with and to GNI.
- The use of the inner (temporary CPO) lands will need to be agreed as well as the nature of works proposed.
- Parking for maintenance vehicles (2 no. vans) will need to be assured.
- The inlet (and other) valves at this location must be kept clear at all times and 24hr access maintained for GSI personnel.

5.4.15. Anthony Harrison

- Submission is made in relation to CPO Plots1012(1).2d and 1012(2).2d (both temporary with private rights to be temporarily restricted/interfered with) land-take affecting 5 Pembroke Road. (These are the referenced CPO plots; however, I note 1013(1).2d (temporary with rights temporarily restricted/interfered with) at the eastern gate onto Baggot Street Upper may also be relevant).
- Inappropriate to alter the railings and gardens of the terrace of no.'s 1-11
 Pembroke Road as they are protected structures and have significant heritage value.
- The provision of a vehicular access onto Waterloo Road is at odds with the original layout and has the potential to create a traffic/safety hazard due to the traffic speeds.
- Does not consider that the alterations to the terrace are required in order to provide the bus connects project.

5.4.15.1. NTA Response

- The alterations to 1-11 Pembroke Road are required in order to facilitate the provision of the bus gate, which in turn removes the requirement for four traffic lanes along Pembroke Road.
- A new access will be provided along Waterloo Road and one entrance (the western entrance onto Pembroke Road) will be made pedestrian/cycle only. Traffic controls will be provided on the existing eastern entrance to Pembroke Road as well as the new entrance to avoid the driveway from being used as a means of by-passing the bus gate. Extant boundaries will not be impacted apart from the gates and safety audits do not highlight any safety concerns at these locations.
- Mitigation will be provided by recording and labelling the affected sections.
 Extant gates will be adapted to provide the pedestrian/cycle access, railings and works not required for adaption will be protected and all due care will be taken in relation to works to these protected structures. While an impact is acknowledged it is stated within the EIAR as being of a Low to Medium

magnitude, while overall the impact is considered Direct, Negative, Slight and Long-term.

5.4.15.2. Anthony Harrison - Response to NTA submission

 On the 4th July 2023 Mr. Harrison made a further observation in response to the NTA submission noting the historical importance of the plinth and railings at no.'s 1-11 Pembroke Road, and the fact that the existing entrance/exit arrangements are in everyday use, with vehicular movements slow and safe at these locations. The new vehicular access arrangements via Waterloo Road are potentially dangerous and seeks that consent be refused.

5.4.16. Lamtos Unlimited Co.

- Submission is made in relation to the potential impact on Merrion House, Merrion Road, Dublin 4, CPO Plots 1041(1).1c (Permanent) and 1041(2).2c (temporary) are relevant in this regard as they run partially across the frontage of the building at this location.
- Are progressing planning application proposals in relation to the Merrion House site and adjoining lands (pre-application Strategic Housing Development reference no. 307176-20).
- The general arrangement drawings do not show the three existing vehicular entrances into their lands nor is there any account or interaction shown in relation to the existing entrances.
- It is their intention to provide one consolidated priority junction access point into the site as part of their forthcoming LRD application, the location of which has not yet been set.
- Questions the need for, and justification of the two-way cycle track along the eastern side of Merrion Road and its provision constitutes an unnecessary duplication of infrastructure (as there is a northbound cycle-track on the western side of the Merrion Rd.) which will lead to traffic conflicts with access into their site. Furthermore, concern is raised in relation to the location of a Proposed Bus stop along the site frontage.

 The site is highly accessible, with environmental sensitivities and physical constraints and they are requesting that the Board limits the permanent and temporary land-take in relation to the BusConnects project.

5.4.16.1. NTA Response

- The 3 no. access points are shown on sheet 9 of the fencing and boundary treatment drawings, due to the nature of how it is intended to treat these points (i.e. allowing vehicles to cross over pedestrian and cycle tacks) they are not easily identified on the general arrangement drawings.
- The East Coast trail interacts with the proposed development between the Merrion Road/Strand Road junction and the Dart entrance at Booterstown. The two-way cycle track on the eastern side of the road at this location is to facilitate those using this greenway and to avoid those users from having to cross the road and also provides a connection opportunity to existing cycle facilities within and through Blackrock Park. This part of the proposed development operates as both part of the Primary cycle route 13 and Greenway Route N5.
- NTA confirms that the proposed bus stop relocation at the frontage of the site is optimal to serve the proposed scheme and surrounding area as this location better serves Elmpark Green, however, as the proposed redevelopment of Merrion House has not been submitted for planning the NTA has confirmed that any future proposed entrance(s) has/have not been considered within the overall design.
- Design interventions (Tactile paving, ramping, and narrowing of cycle way) are used at the location of the proposed bus stop to ensure pedestrian and cyclist safety.

5.4.17. Helen Long

 Submission is made in relation to CPO Plot 1018(1).2e (temporary) which relates to lands at the entrance to the Westfield/Castledawson apartment complex at Sion Hill.

- Concern is raised that this is a land grab by the NTA and any works by the NTA will make an existing dangerous entrance worse. There is already a bus lane in place and the need to CPO these lands is questioned.
- Not all relevant required lands in ownership of Sion Hill are included in CPO.

5.4.17.1. NTA Response

- The Proposed CPO will be temporary in nature and the proposed development will not impact on access to the Sion Hill complex as access is to be retained at the same location with improvements (new raised entry treatment) to facilitate a safer pedestrian environment.
- Access will be retained throughout although it is noted that there may be local inconveniences similar to any construction project.
- Verges between Sion Hill front boundary and public footpath are understood to be within the boundaries of the public road.
- The proposed works will provide additional safety measures at the entrance it will be ramped, with reduced corner radii to slow traffic and prioritising pedestrian and cyclist traffic. Safety audits do not highlight any issues with the proposal.

5.4.18. Management Company 31-33 Merrion Road CLG

- Submission is made by Walsh Design Group in relation to CPO Plot 1008(1).2d (temporary) at the entrance of 31-33 Merrion Road.
- The submission requests that the NTA engage with the management company to agree the materials to be used and confirm methodology for maintaining access for residents throughout works period.

5.4.18.1. NTA Response

 CPO at this location is to provide a raised table at the access to 31-33 Merrion Road.

- NTA will engage with the landowners and agree finishes in the event of the CPO being confirmed with ABP, and suitable arrangements and compensation agreed.
- Access and egress will be maintained throughout construction, however, there may be a certain amount of inconvenience experienced.

5.4.19. Shauna McGivern

- Submission is made by Sudway and Company Ltd. Chartered Surveyors in relation to CPO Plots 1035(1).1d (Permanent), and 1035(2).2d (temporary) which relate to the site of a dwelling house at no. 155 Merrion Road.
- The proposed land-take will have a disproportionate effect on the property given the size of the existing driveway and garden.
- The proposal constitutes an increased risk to the family both during the works and operational period which is unacceptable.
- The removal of period walls and railings along the site frontage is unacceptable.
- It is unclear whether there will be sufficient space left to accommodate a vehicle and even if there is access it will be more hazardous due to the need to traverse both cycle and bus lanes.
- Scheme is no longer relevant as the Sandymount Strand cycleway provides cyclists with a means of accessing the city centre and this was not in place when the BusConnects scheme was considered. It should therefore be dropped as there is a better option in place.
- The proposed development would infringe on the occupiers right to the quiet enjoyment of their property.
- Reserves the right to attend any oral hearing and/or be represented and question acquiring authority's witnesses and requests that reasonable costs of engaging with the process should be awarded.

5.4.19.1. NTA Response

- The permanent acquisition will result in the loss of between 0.7m to 0.8m of land with an additional 5m temporarily required to facilitate construction. The edge of the proposed bus lane will be 0.4 to 0.5m closer to the residence than the kerb of the existing general traffic lane and the 9m long front boundary wall will be at least 6.2m from the steps at the front of the dwelling. The access gates will also be widened in the interests of safety. The NTA does not believe that this will introduce any additional risk to the occupants and will not hinder the ability to park in the driveway.
- Access and egress will be maintained throughout although it is acknowledged that there may be some temporary inconveniences, however, all relevant safety, health and welfare at work legislation will be adhered to.
- Appendix 16.2 of the EIAR details protected structures and potential impacts arising (including on houses 155-157 Merrion Road – which I note the applicant mistakenly consider to be protected structures, they are not). The impact of the works along the site frontage have been noted as being of medium magnitude, while the construction phase impact is direct, negative, moderate, and permanent. Mitigation is provided that includes recording, careful reinstatement, relocation, and reuse of the existing boundary treatment along the new boundary. Following mitigation, the predicted residual impact is direct, negative, slight, and temporary.
- NTA considers that the works will not hinder the ability to park in the driveway, and that the road safety audit conducted does not highlight any safety concerns in relation to access and parking.
- In relation to the existence of an alternative cycleway (Sandymount) the NTA state that the proposed development is supported by the Greater Dublin Area Cycle Network Plan (GCDCNP) and the proposed development is needed to address the significant deficiency in the very limited segregated cycling infrastructure available along this corridor.
- In terms of impact on the enjoyment and amenity of the property, boundary treatments will be replaced like-for-like, and there will be a small loss (0.7-0.8m) of landscaped amenity space. There will be no other changes to the

characteristics of the property. Should the CPO be confirmed compensation will be determined.

5.4.19.2. Shauna McGivern Response to NTA submission

- Deeply dissatisfied with there being no oral hearing, the lack of a hearing is a curtailment of their rights to question the NTA design team on the lack of detailed design in relation to her dwelling and the proposed works.
- States that they haven't had the opportunity to engage properly with the NTA as the Board have had their response since July 2022 but was not circulated until later.
- The access should be widened to an opening of 3300mm, should be centralised in the boundary as in the case for no. 157, and gates should be biparting sliding gates. This will be necessary as parking is already limited and the loss of 0.8m will render traditional gates incapable of closing.
- Confirms that the gates at the front of the property are not original and were installed in 2017 and the original gates were pedestrian only.
- NTA do not reference the reinstatement of the landscaped garden at the front of the property.
- Arrangements will cause conflict with cyclists from vehicular access and egress from dwelling, at a minimum a yellow box should be provided.
- Considers that the Board have erred in law in not holding oral hearings and asks that this be re-considered.

5.4.20. Laura Quinn

- Submission is made by Sudway & Company Ltd. Chartered Surveyors in relation to CPO Plots 1034(1).1d (Permanent), and 1034(2).2d (temporary) which relate to the front garden of a residential dwelling at no. 157 Merrion Road.
- The proposed land-take will have a disproportionate effect on the property given the size of the existing driveway and garden.

- The proposal constitutes an increased safety risk both during the works and operational period which is unacceptable.
- The removal of period walls and railings along the site frontage is unacceptable.
- It is unclear whether there will be sufficient space left to accommodate a vehicle and even if there is access will be more hazardous due to the need to traverse both cycle and bus lanes.
- Scheme is no longer relevant as the Sandymount Strand cycleway provides cyclists with a means of accessing the city centre and this was not in place when the BusConnects scheme was considered. It should therefore be dropped as there is a better option in place.
- The proposed development would infringe on the occupiers right to the quiet enjoyment of their property.
- Reserves the right to attend any oral hearing and/or be represented and question acquiring authority's witnesses and requests that reasonable costs of engaging with the process should be awarded.

5.4.20.1. NTA Response

- The permanent acquisition will result in the loss of between 0.7 to 0.8m of land with an additional 5m temporarily required to facilitate construction. The edge of the proposed bus lane will be 0.4 to 0.5m closer to the residence than the kerb of the existing general traffic lane and the 9m long front boundary wall will be at least 6.2m from the steps at the front of the dwelling. The access gates will also be widened in the interests of safety. The NTA does not believe that this will introduce any additional risk to the occupants and will not hinder the ability to park in the driveway.
- The remainder of the responses are the same as those set out in the response to S. McGivern submission (the neighbouring dwelling) and are not restated here to avoid repetition.

5.4.20.2. Laura Quinn Response to NTA submission

- Deeply dissatisfied with there being no Oral Hearing, the lack of a hearing is a curtailment of their rights to question the NTA design team on the lack of detailed design in relation to her dwelling and the proposed works.
- States that they haven't had the opportunity to engage properly with the NTA as the Board have had their response since July 2022 but was not circulated until later.
- NTA do not reference the reinstatement of the landscaped garden at the front of the property.
- Arrangements will cause conflict with cyclists from vehicular access and egress from dwelling, at a minimum a yellow box should be provided.
- Considers that the Board have erred in law in not holding oral hearings and asks that this be re-considered.

5.4.21. Richard Sallinger

- Submission made by Pearse Mehigan & Co. solicitors in relation to CPO Plot 1042(1).1e (Permanent with private rights to be acquired). This plot is located at the entrance to the Elmpark Green Development.
- Objects to the proposed CPO as his principal residence is in this development and requests that the Board notes their objection and confirm no further untoward steps will be taken without further notice and that a suitable opportunity be afforded to him to put his case more forcefully at any future Oral hearing.

5.4.21.1. NTA Response

- Submission is from an interested party who resides in the Elmpark Green Development; however, the interested party's property does not form part of the CPO lands. Access will be maintained to the property throughout construction and the CPO is to improve access arrangements and facilitate future maintenance of the signalised junction.
- NTA has communicated the above to the interested party's representative by letter dated 20th July 2022.

5.4.22. Tesco Ireland Ltd.

- Submission made by Avison Young, in relation to CPO Plots 1004(1).1cP, 1004(2).1cP, 1004(3).1c, (all permanent), 1004(4).2c, 1004(5).2c, 1004(6).2c and 1004(7).2c (all temporary). These Plots all relate to lands at the Merrion Shopping Centre. (The Tesco submission also relates to the proposed application and is summarised in Appendix 1)
- Welcome the proposed investment in public transport active travel in the urban environment of Dublin.
- Tesco currently has two stores along the proposed route at the Merrion Shopping Centre and Baggot Street Upper.
- Clarification is sought on the timing and duration of the temporary acquisition of lands associated with the Proposed Scheme.
- Clarification is also sought in relation to 1004(4).2c as to whether the access ramp and footpath are subject to the temporary CPO.
- Clarification is sought as to whether there will be any disruption to the current access arrangements from Merrion Road during any proposed development works, and queries whether the full range of accessibility needs from vulnerable groups such as the elderly and disabled have been considered in both the construction and operational phases of the proposed development.
- Tesco Baggot Street is proposed to lose its loading bay, as part of the proposed development an additional loading bay is to be provided at Eastmoreland Place, however this is too far away to be viably used by Tesco and the other commercial premises in the vicinity operating along Baggot Street. Loading and access to loading space is required twice a day and providing bays at distance will lead to health and safety as well as congestion issues.
- The provision of a cycle track on the inside of parking spaces and loading bays is considered to be a hazard for customers, staff, cyclists, and pedestrians, Loading and unloading needs to be done from a vehicle to the kerbside which will create a dangerous conflict between cyclists and vehicle users.

 It is unclear from the documentation provided if there will be any segregation of the cycle route in terms of a curb, and if so, will this be dropped to facilitate deliveries.

5.4.22.1. NTA Response

- Acknowledges that works to the access ramp (CPO Plot 1004(4).2c) will necessitate temporary closure of the ramp, however, signage and local arrangements will direct customers to the Nutley Lane – level access entrance.
- Access will be maintained to the property, however, there is likely to be temporary inconveniences during construction. Local arrangements will be made on a property-by-property basis to ensure accessibility.
- In relation to Baggot Street, the NTA have stated that a loading bay (consisting of a dedicated loading bay and partially by a dual use loading bay/taxi rank will provide 42m of dedicated locating facilitates - more than currently in place) albeit it is located c. 40m from Tesco, a distance considered acceptable by the NTA. (Eastmoreland Street loading bays are being provided to offset loss of loading at front of 46-52 Baggot Street Upper).
- A buffer zone and lower kerbing is being provided to ensure cyclist and loaders safety and the safety audit has not highlighted any issues with the proposed arrangements.

5.4.22.2. Tesco Ireland Response to NTA submission

- The clarifications regarding the CPO of lands at the Merrion Shopping Centre are welcomed by Tesco, and they will work with the NTA in order to ensure access arrangements are appropriate and works activities do not impact adversely.
- In relation to the Baggot Street Upper delivery area they raise concerns regarding the distance between their unit and the loading bays (being approximately 40m distant), this could give rise to safety hazards for pedestrians and occupational hazards for delivery staff. It is requested that a relocation closer to the Tesco unit be considered.

 It is requested that the 750mm buffer zone between delivery area and cycle track be widened to be able to accommodate delivery cages which are 846mm wide.

5.4.23. Eileen Vaughan

- Submission is made in relation to 9 Pembroke Road, there are three CPO Plots in the vicinity of no. 9 which is one of a six terrace residential development that is on the RPS. The CPO plots are 1012(1).2d, 1012(2).2d (both temporary with private rights to be temporarily restricted/interfered with) and however, 1013(1).2d (temporary – with rights temporarily restricted/interfered with).
- The proposed development represents the provision of a busy bus route which would be totally inappropriate in the Pembroke Road/Baggot Street area which is vibrant residential village centre. The proposed development would cut into the available pedestrian paths/pavements killing the friendly and welcoming atmosphere for the elderly residents and children as well as those visiting the area for events who enjoy the local amenities.
- The Northumberland Road and Mount Street axis represents a much better option for providing bus access to the city centre.
- The CPO will alter the setting and existing access arrangements at this location, and the terrace buildings are all on the RPS.

5.4.23.1. NTA Response

- There will be an increase in bus volumes along the corridor, however, there
 will be an associated reduction in car trips (particularly in the vicinity of
 Pembroke Road and Baggot Street where volumes will decrease by up to
 almost 1,000 Passenger car units (PCUs) in the morning peak). The safety
 audit carried out has not highlighted any issues or concerns in relation to
 Baggot Street and crossing points in the vicinity.
- The Proposed Scheme will be transformative for public transport, pedestrians and cyclists and will increase connectivity and accessibility throughout the route.

 In selecting the preferred route option various alternatives were considered including routing the proposed development along Northumberland Road. That option did not perform as well in terms of the decision criteria as the preferred option due to capital costs, transport reliability and quality, residential population, employment catchments, traffic network integration and land use character.

5.4.24. Wappinger Food Corporation Ltd.

- Submission made by Denis McSweeney Solicitors (and Simon Clear & Associates) in relation to CPO of lands in the immediate vicinity of Roly's Bistro on Merrion Road. The relevant CPO plot is 1010(1).1h (permanent acquisition with a smaller area where private rights are to be acquired).
- Submission made on behalf of the owners of Roly's Bistro on Merrion Road who also occupy the premises and adjoining land (subject to the CPO) at the junction of Merrion Road and Herbert Park Road. The land adjoining the gable of Roly's Bistro is in the ownership of Dublin City Council and Roly's Bistro have a "pergola" located on it which operates as part of the restaurant business.
- The proposed development does not take account of the "pergola" structure that has been added to the Gable end of Roly's Bistro on lands in the ownership of Dublin City Council.
- The submission requests that the curve of the proposed junction approach on the Herbert Parkside be moved so that there is no impact on the existing "pergola" as well as reduced impact on other boundary features of Herbert park including railings and plinth.
- CPO should be reduced to that essential for the operation of the scheme Roly's and Dublin City Council have the capacity and capability for long term maintenance of the Parkland in the immediate vicinity and it is submitted that the NTA do not.
- It is stated that there is no bat survey undertaken in the vicinity of Roly's Bistro and trees in the vicinity, this omission in combination with the proposed

removal of trees in the vicinity has therefore not been assessed in the submitted EIAR.

- It is requested that the proposed development take account of the structure that exists and make appropriate adjustments to retain it with less modification on the Herbert Park side of the junction.
- The submission requests an oral hearing.

5.4.24.1. NTA Response

- NTA notes that the DCC submission describes the extant pergola as an unauthorised extension, accordingly the structure was not assessed in the EIAR. DCC have granted a temporary street furniture licence for the pergola, after which it is anticipated that it will be removed. Accordingly, the NTA have now carried out an assessment along the lines of that set out in section 10.4.4.2.2.1 and Table 10.12 of the EIAR. The removal of the pergola is required by the proposed development and accordingly a medium magnitude of impact has been determined as it will lead to a change in operating conditions but not compromising the overall viability of the business. The business is assigned a medium sensitivity and therefore the overall significance of effect is negative, moderate, long term but not significant land take impact on the business.
- The NTA states that the junction at Herbert Park has been through several design iterations (Appendix A6.3 refers) however, the overall principle to provide a 4-arm crossroads at this location has been retained throughout. The current alignment minimises the impact on trees, adjoining lands and ensures that there is not a stagger to the junction (which would remove the benefit of the current proposal for cyclists and pedestrians).
- The cultural significance of the plinth and railing at Herbert Park is acknowledged and is assessed in chapter 16 of the EIAR (section 16.4.3.5 refers) stating that the wrought iron gate, granite plinths and railings at the corner of Roly's Bistro will be repositioned as a result of the land-take.

- NTA acknowledge that the habitat mapping is incorrect at this location as the Pergola has not been identified as "Buildings and Artificial surfaces", this however, does not alter the findings of the EIAR in respect of Biodiversity.
- In relation to bats the submitted EIAR does assess the potential impacts arising, the removal of six trees and hedgerow in the vicinity of Roly's Bistro is acknowledged as negative, however, none of the trees offer roost habitat, they are located in areas that already has significant disturbance and lighting (which is not preferred by bats) furthermore there is an abundance of better foraging available within and surrounding Herbert Park and along the Dodder.

5.4.24.2. Wappinger Food Corporation Ltd. Response to NTA submission

Note that they do not intend to make further submissions at this stage, however, they do wish to clarify that the subject structure is not unauthorised and that no enforcement proceedings have taken place in this regard.

6.0 Oral Hearing

6.1. The Board considered the documentation on hand and decided to determine both the Compulsory Purchase Order and Proposed Scheme case through written procedures. Accordingly, no oral hearing has been held for either case. All parties in relation to both the case and CPO were informed of this, and third parties were circulated the applicant's (NTA's) response to their observations/objections and invited to provide any further submissions.

7.0 Assessment

7.1. Having regard to the requirements of the Planning and Development Act, 2000 (as amended), this assessment is divided into three main parts, planning assessment, environmental impact assessment and appropriate assessment. In each assessment, where necessary, I refer to the issues raised by all parties, made either in the application documentation by the applicant, made to the Board in response to the application, and submissions received following circulation of the applicant's response to submissions. There is an inevitable overlap between the various assessments being undertaken. In the interest of brevity, matters are generally not repeated but rather cross-referencing is applied.

8.0 Planning Assessment

8.1.Introduction

- 8.1.1. A substantial amount of information has been submitted to the Board in relation to this project throughout the application process. The planning assessment below has had regard to all the information provided, including the original application documentation, all submissions and observations lodged by third parties (including prescribed bodies), the response to the submissions lodged by the applicant and subsequent further third-party submissions following circulation of that response.
- 8.1.2. I have read all the documentation on file including the EIAR, NIS, planning report and supporting documentation submitted with the application. I have visited the subject site and its surroundings. I have read in full the observations submitted in respect of the application including the third-party observations, the observations from the relevant Planning Authorities as well as the observations from the DAU. Having regard to all the information that has been received, I consider that the key issues for consideration by the Board in this case are as follows:
 - Policy Context/Principal of the Proposed Scheme,
 - Justification and Need for the Proposed Scheme,
 - Route Selection/Alternatives,
 - Project/Junction Design,
 - Impact on commercial/local premises,
 - Protected Structures/Cultural Heritage/Architectural Heritage,
 - Visual Impact/Townscape
 - Biodiversity,
 - Residential Amenity,
 - Consultation,
 - Recommended Conditions

8.2. Policy Context / Principal of Proposed Scheme

- 8.2.1. The Proposed Scheme essentially constitutes the provision of additional infrastructure to facilitate improved public transport (bus lanes and bus priority measures), cycling (provision of segregated cycle tracks throughout and improved cycling safety measures at junctions) and pedestrian (public realm, footpaths, as well as an increased number of pedestrian road crossings) movement. Overall, the Proposed Scheme aims to improve the reliability, efficiency, access, and availability of public transport while also improving other sustainable transport infrastructure (cycling and walking) along this established transport corridor. The Proposed Scheme forms part of a number of BusConnects infrastructure projects which are being proposed throughout several of the main radial transport arteries of Dublin. The infrastructure improvements associated with the Proposed Scheme will contribute towards the development of sustainable communities, as well as providing an economic stimulus from improved accessibility.
- 8.2.2. Section 4 of this report sets out in detail the overall policy context for the Proposed Scheme at national, regional and location level. In the interests of clarity I note that some submissions have raised concerns that some of the application documentation refers to plans that have been updated since the application documentation has been lodged. In this regard the Board should note that the policy documentation section (and the context for my consideration below) refers to and considers the Proposed Scheme under the current and relevant planning policy documentation.
- 8.2.3. At national level the Climate Action Plan 2023 (CAP23) introduces carbon budgets for the transport sector as well as outlining the avoid-shift-improve framework to achieve a net zero decarbonisation pathway. Put simply this framework prioritises actions to avoid the need to travel; shift to more environmentally friendly modes and improve the energy efficiency of vehicle technology.
- 8.2.4. The proposed BusConnects programme provides for road space/carriageway reallocation to prioritise more sustainable forms of travel. The reallocation of road space is a measure outlined in CAP23 under both 'avoid' and 'shift' to promote active travel and modal shift to public transport. The Proposed Scheme, prioritises public transportation and sustainable modes of travel throughout its design by improving footpaths, providing segregated cycle tracks, and reducing the amount of car parking

spaces available along the route. The additional infrastructure being provided will increase the attractiveness of public transport, cycling and walking, and while space is still provided for general traffic along the majority of the route public transport is prioritised. BusConnects is also seen as a key action under the major public transport infrastructure programme to deliver abatement in transport emissions, as outlined in CAP23 for the period 2023-2025.

- 8.2.5. The National Development Plan (NDP) recognises BusConnects as one of the major regional investments for the Eastern and Midland Region and overall the project is identified as a strategic investment priority noting that it will overhaul the current bus system in all of the relevant cities making journeys faster, predictable, and more reliable. Transformed active travel and bus infrastructure and services in all five of Ireland's major cities is fundamental to achieving the overarching target of 500,000 additional active travel and public transport journeys by 2030. The NDP states that BusConnects will implement a network of 'next generation' bus corridors including segregated cycling facilities on the busiest routes to make journeys faster, predictable, and reliable.
- 8.2.6. The National Planning Framework recognises that Dublin is too heavily dependent on roads and private car-based transport, and National Strategic Outcome (NSO) 4 'Sustainable Mobility' seeks the expansion of '...attractive public transport alternatives to car transportation to reduce congestion and emissions and to enable the transport sector to cater for the demands associated with longer-term population and employment growth in a sustainable manner...'. In relation to population, the NPF targets a growth of 20-25% - an increase of 235,000 to 293,000 - to 2040 for Dublin City and suburbs. One of the measures identified in NSO4 to cater for the development of attractive public transport alternatives is to deliver BusConnects as key public transport objective of the GDA transport strategy.
- 8.2.7. Other relevant NSO's from the National Planning Framework to which BusConnects will contribute include NSO 1 (Compact Growth) and NSO 8 (Transition to a Low Carbon and Climate Resilient Society) through facilitating the provision of higher densities along sufficiently serviced transport corridors, increasing accessibility, and contributing to the transition to more sustainable modes of travel through providing additional infrastructure to improve the attractiveness of public transport, cycling and walking. Furthermore, the provision of infrastructure which will increase accessibility,

prioritise people movement, improve public transport, and pedestrian connectivity as well as the public realm as set out in the Proposed Scheme will also, in my view, contribute in a positive manner towards NSO 2 (regional accessibility), NSO 5 (strong economy), NSO 6 (international connectivity), NSO 10 (access to quality childcare, education and health services), and National Policy Objective 27, which aims to *"Ensure the integration of safe and convenient alternatives to the car into the design of our communities, by prioritising walking and cycling accessibility to both existing and proposed developments, and integrating physical activity facilities for all ages".*

- 8.2.8. At regional level, the Eastern & Midlands Regional Spatial and Economic Strategy (RSES) includes the Dublin MASP which seeks to focus growth along high-quality transport corridors, and specifically references the delivery of sustainable transport projects including BusConnects (Regional Policy Objective 5.2 refers – quoted previously in full in section 7.8.2 of this report above).
- 8.2.9. There are four objectives which have been developed to support the delivery of the overall aim of the Transport Strategy for the Greater Dublin Area, 2022-2042 these are to provide: an enhanced natural and built environment, connected communities and better quality of life, a strong sustainable economy, and an inclusive transport system. The provision of the Blackrock/Belfield to City Centre core bus corridor portion of the BusConnects programme will, in my opinion contribute to all four of these objectives through improving bus priority, reliability and efficiency throughout the entire transport corridor, facilitating the movement of a higher number of people in a sustainable manner, improving cycling infrastructure both in terms of extent and safety, as well as improving the public realm and pedestrian facilities.
- 8.2.10. The cycle facilities proposed under the Proposed Scheme will contribute towards the intention of the NTA and local authorities to deliver a safe, comprehensive, attractive, and legible cycle network in accordance with the updated Greater Dublin Area Cycle Network Plan. There are two primary cycle routes identified along the Proposed Scheme (Cycle Routes 13 and 13A from the 2013 network plan) as well as a number of secondary, other primary and greenway cycle routes which connect with/traverse it, these routes include 13E/N5, SO3/Dodder Greenway, N10 Grand Canal Greenway/SO1/N10, and C7. The updated 2022 GDA Cycle Network Plan shows the entirety of the Proposed Scheme as a 'Primary Radial' route with the exception

of Nutley Lane and Fitzwilliam Street Lower which are both identified as 'Secondary Routes'. In my opinion the Proposed Scheme will facilitate the delivery of an improved and necessary cycling network through the provision of a segregated cycle track, with safer junctions for cyclists along the entirety of the route.

- 8.2.11. The Proposed Scheme extends through the functional areas of both Dun Laoghaire Rathdown County Council and Dublin City Council, sections 4.13 to 4.17 of my report above lists and summarises the range of policies and objectives from the relevant current plans of these local authorities.
- 8.2.12. The DLRCDP adopts the avoid-shift-improve approach to transport and supports the provision of BusConnects as enabling transport infrastructure, furthermore policy objectives T1; T3; T4, T5, and T11 (refer to section 4.13 of my report above) support the integration of land use and transport policies, delivery of transport infrastructure, development of sustainable travel and transport, expansion of public transport improvements, and support the provision of quality bus networks, as well as walking and cycling infrastructure. I also note that the submission from DLRCDP in relation to the Proposed Scheme supports the principal of the works and does not raise any issues in relation to its overall nature and need.
- 8.2.13. The Dublin City Development Plan 2022-2028 (DCDP) includes objective SMTO01 which aims to achieve the transition to more sustainable travel modes including walking, cycling and public transport. The DCDP supports the provision of the BusConnects Core Bus Corridor projects (SMT22 of the DCDP refers see section 4.16 above), which identifies the projects as key sustainable transport projects which are supported by the City Council. Furthermore, the DCDP supports the improvement of the public realm, pedestrian improvements, the development of the 15-minute city, and increased management of city centre road space to address the needs of pedestrians and cyclists (SMT 12, 13 and 14 refer). I also note that the DCC submission to this application did not raise any issues in relation to the principle of the Proposed Scheme.
- 8.2.14. I consider that the Proposed Scheme has significant policy support at national, regional, and local levels in the context of the relevant published and adopted plans and strategies. The policy documents at all levels have identified congestion and pollution as significant constraints in the context of being able to deliver sustainable

development throughout Dublin and its wider hinterland, furthermore all policy documentation recognises, predicts, and indeed encourages the continued population and economic growth of the City. In my opinion in order to facilitate the sustainable development of Dublin, improve the facilities, amenities, accessibility, health and wellbeing of its residents, commuters and visitors, improvements to its transport network in general and public transport network in particular, as well as improving cycling and pedestrian infrastructure is not only necessary but vital.

- 8.2.15. The Proposed Scheme provides significant bus priority infrastructure, improved public realm and pedestrian measures, while also creating a safe and segregated cycling track network along this existing transport corridor. In doing so it will facilitate improved public transport reliability, access, and availability, while also improving cyclist and pedestrian safety, and making these sustainable modes of transport and people movement more attractive. The Proposed Scheme achieves this in conjunction with maintaining private vehicle access over the majority of the route, albeit I note that certain measures and traffic controls are being incorporated which will restrict private vehicle access to certain areas (through one way signage, restricted access/turning at certain locations and the provision of a bus gate at Pembroke Road).
- 8.2.16. A double-deck bus is 20 times more efficient at transporting people than a private car, with a bus typically carrying 60-70 passengers using the same amount of road space as 3 cars, making this option more attractive and reliable for passengers will improve accessibility and people movement while also reducing congestion and emissions. Similarly, car dependent traffic also takes up more room than cycling or pedestrian traffic and as such providing infrastructure and safety measure improvements for these modes of travel will also reduce congestion, increase people-moving efficiency and attractiveness of these modes which will ultimately increase the numbers of people using more sustainable means of travel.
- 8.2.17. The Proposed Scheme will result in an increase of 41% (68 no. to 96 no.) in pedestrian signal crossings, an increase from 4% to 100% of segregated cycling facilities along the route. It will also result in 100% (an increase from the existing 37%) of the route having bus priority measures in place either through the provision of dedicated bus lanes, priority signalling and bus gate.

- 8.2.18. The modelling carried out as part of the application process shows that in the 2028AM peak hour the Proposed Scheme will result in an increase of 100% in the number of people travelling by bus, an increase of 67% in the number of people walking and cycling and a reduction of 50% in the number of people travelling by car along the route. I consider the modelling carried out is robust, based on accurate data and reaches reasonable conclusions. These are significant improvements that will reduce the amount of congestion along this existing transport corridor, and provide a mechanism whereby the predicted population and economic growth for Dublin can be sustainably managed in terms of traffic and transport demands.
- 8.2.19. In consideration of the above, I am of the opinion that the Proposed Scheme is comprehensively supported by the relevant planning policy context, and furthermore it will address congestion throughout the route by improving public transport, cycling and pedestrian infrastructure and accordingly contribute towards reducing emissions. In providing infrastructural upgrades for pedestrians, cyclists, and bus traffic the attractiveness of these more sustainable modes of travel will be increased from their current levels which will encourage their use. The improved safety measures for cyclists (segregated cycle tracks) and pedestrians (improved quality of footpaths and increased number of controlled crossings over carriageways) will also lead to increased participation in these modes. I also note that while a certain capacity for private cars is retained throughout the route that some restrictions will also be applicable for that mode of transport. In my opinion this is appropriate as it facilitates the prioritisation and improvement of the most sustainable modes of transport available along this corridor and provides for the optimum use of the available street space. Accordingly, I consider that the principle of the Proposed Scheme is acceptable and consistent with the provisions of the relevant planning policy documentation.

8.3. Justification and Need for the Proposed Scheme

8.3.1. Some third parties have raised concerns in relation to the overall justification of the Proposed Scheme in terms of alternative proposals which should be prioritised in lieu of the works (e.g. DART upgrades), and whether the works are justified in light of the new working environment in a post-COVID era.

- 8.3.2. In relation to the justification of the proposed scheme, I point to the significant traffic congestion which arises throughout Dublin as is acknowledged in all relevant policy documentation (referred to previously above) and the detailed traffic modelling that has been undertaken within the application documentation. This congestion results in adverse impacts on, air quality, public health, population wellbeing, the amenities of the area concerned and the economy. The NPF notes that the population of the Greater Dublin area is to increase by 25% by 2040, which will give rise to significant additional traffic and travel demands over and above that currently being experienced.
- 8.3.3. The submitted EIAR provides modelling of future traffic in both the 'Do Minimum' (which allows for the provision of other GDA transport strategy improvements – such as roll out of the DART+ programme, Luas Green Line capacity enhancement, and cycle network plan - but not the Proposed Scheme, or any other BusConnects Core Bus Corridor infrastructure works [but including other BusConnects elements such as new services, new fleet, next generation ticketing etc.]), and 'Do Something' scenarios which incorporates the Proposed Scheme, the other core bus corridor infrastructure works as well as the other GDA transport strategy improvements. The modelling carried out shows a consistent increase in the travel demands associated with both a growing population and economy, and highlights the significant improvements throughout in the 'do something' scenario when compared to the 'do minimum'. Positive impacts are predicted in relation to pedestrian, cycling and bus infrastructure. Very significant positive and long-term impacts are predicted from the modelling in terms of bus network performance (journey times and bus reliability) with total bus journey time being reduced by up to 18% in 2028 and 16-18% in 2043.
- 8.3.4. Currently the existing transport corridor suffers from a deficient cycling network with only 4% of the route having segregated cycling facilities in place. This is inadequate, inappropriate, and unsustainable along such a significant transport corridor within Dublin. All relevant policy documentation points to the need to encourage and improve cycling facilities throughout urban areas and the benefits (in terms of both health and people movement) that arise. The Proposed Scheme provides segregated cycling tracks throughout the corridor and, in my opinion, it is neither sustainable nor appropriate to argue, as set out in some submissions, that the provision of cycle tracks elsewhere in Dublin offset or somehow negate the need to

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provide cycling facilities along the route of the Proposed Scheme. Furthermore, I acknowledge and accept that the preferred and safest approach for cycling facilities is as a segregated track (and not a shared facility with a bus lane) and that the provision of such infrastructure represents the safest form for all road users and will encourage more people to use this sustainable and healthy mode of transport.

- 8.3.5. Third parties have raised issues referencing the changes in travel patterns that have occurred since the COVID restrictions and the fact that traffic counts and assessments contained in the EIAR are largely based on surveying and conditions that were in place prior to the pandemic, and therefore should not be relied upon. In this regard the application documentation states that while the pandemic brought about a short-term change in travel patterns, that travel demand has started to return to pre-pandemic levels. In consideration of this matter, I have reviewed the October 2023 Central Statistics Office transport bulletin which shows that the number of bus journeys in Dublin have returned to (and more frequently exceed) the levels in 2019 (the last full year of pre-pandemic travel). Furthermore, I consider that with the population and economic growth anticipated, projected, and targeted over the short, medium, and long term, it is correct for the survey details to consider pre-pandemic levels of demand will increase in line with growth.
- 8.3.6. In relation to the suggested alternatives of upgrading the existing DART facilities in lieu of the Proposed Scheme to encourage a change to more sustainable travel modes along this transport corridor, this matter has been considered in the assessment of strategic alternatives in the EIA (section 9.4 below). In this regard I note that the GDA transport strategy considers that the most appropriate transport solution for this corridor includes (minimal construction) DART upgrades, Luas Green Line capacity expansion and the provision of higher quality bus services and infrastructure. Each of these public transport elements will work in a complimentary manner with each serving differing catchments and purposes within the entirety of the overall networks. As acknowledged in the GDA transport strategy, due to the urban nature and travel demands of the area along and beyond this corridor all of these sustainable public transport solutions will be required to be improved as no single piece of infrastructure on its own can improve the level of services and infrastructure required to provide a viable and attractive alternative to the private car, thereby relieving congestion and reducing emissions.

8.4. Having regard to the above, I consider that the Proposed Scheme is entirely justified in terms of providing for improved public transportation, cycling and pedestrian network while also enhancing the public realm where practicable. In the interests of clarity I wish to state that I consider the timing and modelling of the relevant traffic surveys to be appropriate and robust. The Proposed Scheme offers the best opportunity to address congestion and ensure the transport requirements over the medium and long term can be catered for. Furthermore, the Green House Gas (GHG) emission savings potentially facilitated by the Proposed Scheme equates to the removal of approximately 3,000 and 3,300 car trips per weekday from the road network in 2028 and 2043 respectively, further justifying the works in terms of climate change.

8.5. Route Selection/Alternatives

- 8.5.1. In relation to alternatives in general these have been dealt with in a comprehensive manner in section 9.4 of this report in the context of the EIA of the Proposed Scheme. Notwithstanding this, and my assessment above that the principle of the Proposed Scheme in the context of the planning policy context and its justification in terms of the current and future transportation requirements of the corridor area as being acceptable, further consideration is merited in relation to the specific route selection and design approach adopted for certain locations. Of particular note in this regard (and the locations which have been the focus of several different third-party submissions) are listed below:
 - Nutley Lane.
 - Pembroke Road/Baggot Street Upper/Lower.
 - Newton Plan.

8.5.2. Nutley Lane

8.5.2.1. Concerns have been raised by third parties in relation to (a) whether the inclusion of the Nutley Lane link can be justified within the Proposed Scheme, (b) the adverse impact that the proposal will have on properties along this part of the route, and (c) in relation to the overall design of the works and the adverse impacts that will arise on both the community and amenity of the lane. The third-party concerns in relation to the Nutley Lane and the applicant's response to same have been summarised in Sections 5.3 of this report above, my consideration of these matters is set out below.

- 8.5.2.2. In terms of the justification of the proposed works along the Nutley Lane I note that the application documentation states that there is an identified demand for connectivity between UCD and Ballsbridge, and that there are already two bus links running along Nutley Lane (the 47 and 27x services), furthermore there are significant trip attractors along and served by this link namely UCD, the RTE campus, and SVUH. I note that third parties have stated that access to the City Centre can be facilitated from UCD via the Stillorgan Road and Donnybrook, and while this link does exist (and also forms part of a separate BusConnects CBC) it does not negate the need to improve bus and cycling infrastructure along Nutley Lane. At present there are no bus lanes or bus priority measures along this link. Traffic modelling predicts that 200 additional passengers will be carried along Nutley Lane in the AM peak hour in 2028, rising to an additional 300-350 passengers for the same period in 2043 in the event of the Proposed Scheme being implemented. While these numbers may be smaller than the increases predicted along other parts of the corridor they are still significant. The infrastructure improvements proposed will also facilitate better synergy, reliability and connectivity with other public transport services including the DART line as well as other bus services, such as those on the Blackrock to City Centre and Stillorgan Road to City Centre routes. The proposed infrastructure improvements will provide dedicated bus lanes in each direction along Nutley Lane providing clear priority for buses which will improve journey times and enhance the reliability of services. Accordingly I consider the bus infrastructure works along this route to be of merit, fully justified and in the best interests of sustainable development.
- 8.5.2.3. In relation to cycling infrastructure, there are currently no cycle lanes or tracks in place along Nutley Lane, which has been identified as a secondary cycle link in the Greater Dublin Area Cycle Network Plan 2023. Accordingly, I consider that the principle of providing improved cycling infrastructure entirely justified in terms of policy and demand, this link will also facilitate connectivity to the DART line and to

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the cycle tracks proposed on the Merrion, Rock and Frascati Roads and beyond within the Proposed Scheme.

- 8.5.2.4. On the basis of the above I consider that the proposed bus and cycling infrastructure improvements along Nutley Lane are not only justifiable, but are necessary in order to improve the sustainability of transport options both at this location and to serve the wider area, while also reducing congestion.
- 8.5.2.5. The final design of the link along Nutley Lane has emerged following a range of options being considered and has been informed through public consultation. The range of permutations in the design of the scheme at this location in relation to the cycling route included the provision of two single cycle tracks along Nutley Lane, provision of a partial 2-way cycle lane on part of the route before reverting to single tracks on each side to Merrion Road, and the provision of a parallel cycle route via Woodbine Road and Trimleston Avenue. In relation to the reallocation of carriageway space to provide bus priority seven options were considered (described in section 3.4.1.1.5 of the EIAR) which included the provision of two, three, and four carriageway options and mixing of general traffic and bus lanes. Of particular note in relation to the 3-carraigeway options assessed, (i.e. those that did not provide full physical bus priority dedicated bus lanes in each direction) were the adverse impacts on adjoining streets from increased levels of through-traffic detouring from Nutley Lane, the reduction in bus journey time reliability and worse performances in terms of traffic safety.
- 8.5.2.6. The option brought forward provides a dedicated bus lane and general traffic lane in both directions as well as a 2-way cycle lane for part of the route (along the southern side of Nutley Lane from the Stillorgan junction as far as the entrance to St. Vincent's University Hospital SVUH) before it changes into a single track running along the northern and southern sides until it reaches the Merrion Road. In order to minimise land-take there is no footpath provided along the frontage of the Elm Park Golf and Sports Club (EPGSC), with this portion of the road occupied solely by the two-way cycle track.

- 8.5.2.7. In order to facilitate the Proposed Scheme along Nutley Lane permanent (and temporary) land take is required from EIR, RTE, the EPGSC, and SVUH, however, no permanent land take is required from any private residential dwellings. I acknowledge that the land take will give rise to impacts on the affected holdings through the permanent loss of land, and changes will be required along the various site frontages. I do not, however, consider that the Proposed Scheme will give rise to significant adverse impacts that would preclude the continued operations and activities on the affected properties as all are set within their own large grounds, and established operations and activities will be able to continue. In particular in this regard I note that the Proposed Scheme will result in land take from along the frontage of the EPGSC. The land take will directly impact on the area of one of the tennis courts, which if it is to be retained, will necessitate some relocation works on the part of the landowner. A planning application (Pl. Ref. 4297/23) has been lodged to, and granted by, Dublin City Council in this regard. The EPGSC have raised concerns that the works will give rise to other impacts on the golf course itself. In this regard I note that the boundary setbacks (temporary and permanent land takes) will infringe on and approach two tee-boxes and a green, however, I do not consider that the boundary set back will give rise to significant impacts on golfing activities and operations at this location, given their extent in the context of the overall holding, and the proposals to replace boundary treatments to retain privacy and security along this frontage. Furthermore, any impact on the EPGSC must be balanced against the wider and imperative needs of creating sustainable transport infrastructure at this location.
- 8.5.2.8. Other properties which are most impacted by the Proposed Scheme along Nutley Lane include:
 - An EIR exchange building and RTE Campus which will have their front boundaries set back to accommodate widening, which will also include the loss of trees. The altered boundary treatments will not result in any significant effects on operations, however, as their access and car parking arrangements will be retained.
 - Similarly the Proposed Scheme requires land take from the SVUH campus with boundaries required to be set back, however, access and operations will

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be unaffected as no on-site parking or access arrangements will be altered. Construction activities will necessitate temporary management of traffic and access arrangements, however, there are commitments throughout the application documentation to ensure such arrangements will be put in place.

 The Merrion Shopping Centre will also have parking removed from along its Nutley Lane frontage, however, I note that on-site car parking is available at this location for customers and that commitments have been set out within the application documentation to ensure access remains available throughout the construction process.

In relation to all of the above properties I note that the resultant infrastructure works will give rise to enhanced and improved accessibility via bus and by bicycle which will give rise to benefits to both the operations and users of these facilities.

8.5.2.9. I note that permanent land take is not required from any private residential dwelling along this section of the route although it is proposed to close an existing vehicular entrance to a dwelling at 118 Stillorgan Road (at the junction). I note that this vehicular entrance has been in place for a significant period (submission made from the owner states that it has been in use for in excess of 43 years without adverse effect). The alterations at this location to facilitate the Proposed Scheme require the closing the existing vehicular entrance off the Stillorgan Road junction and leaving it for pedestrian/cycle access to the dwelling only. The dwelling house has another vehicular access directly onto Nutley Lane which will not be affected by the Proposed Scheme. The need to close the vehicular access arises from traffic safety and traffic management concerns at the Stillorgan Road junction. The closure of this vehicular access point is, in my opinion necessary, and while it will affect the current residential amenity by restricting access options enjoyed by and available to the residents of the property, the impact is not of such significance to require alterations to the scheme when balanced against the wider benefits for traffic (vehicular, pedestrian and cyclist) and traffic safety for all users of the junction. I note that an alternative vehicular access is available and that these arrangements are already in place and functional. Overall, on balance, I consider that the benefit in terms of increased traffic safety for cyclists, pedestrians and all vehicles using the Stillorgan Road junction outweighs the potential inconvenience that will arise for the occupants.

- 8.5.2.10. Achieving the design of the Proposed Scheme along Nutley Lane will necessitate the removal of a significant number of street trees primarily along the frontage of SVUH, EPGSC, RTE and the EIR building. The loss of trees along this route is regrettable and will impact on the character of the area, however, on balance, having regard to the improvements that will arise on the public transportation network and improved cycling infrastructure that will be provided, in combination with the fact that direct impacts on private residential properties are minimised, I consider that the impact of the loss of trees at this location to not be of such significance that would merit the alteration or omission of this portion of the Proposed Scheme. Trees are retained insofar as practicable and the benefits of the Proposed Scheme to the travelling public and enhanced connectivity and modal shift facilitated are of such merit that the removal of the trees is justified in this case, having particular regard to the extent of alternatives considered for this part of the corridor and the constraints along the route.
- 8.5.2.11. The land take required to facilitate the Proposed Scheme is required to widen Nutley Lane to accommodate the infrastructure improvements, and in turn necessitates the set back of established boundaries. In most cases along this route the intention is to replace boundaries at their new set-back locations on a like for like basis. This is not proposed along the frontage of the EPGSC. Currently this boundary predominantly consists of high chain link wire fencing which is back-planted by relatively dense hedgerow with some mature trees. This boundary treatment is not visually permeable but does protect the privacy of the EPGSC while also presenting a visually 'soft edge' when viewed from Nutley Lane and the residential properties on the opposite side. The Proposed Scheme intends to replace this boundary with a reinforced concrete wall, behind which a hedgerow will be reinstated. This approach will improve security and privacy of the Golf Club and the views from inside the course looking out will not be significantly affected once the hedgerow/replacement planting matures. The new concrete wall is intended to be of the same height as the existing fence and would on its own represent a departure from the existing aesthetic along this boundary which despite the presence of the large chain-link fence is dominated by greenery along this side. As mitigation of this the Proposed Scheme incorporates climbing vegetation (such as ivy) along the roadside edge of the concrete wall. I consider that the provision and maintenance of the climbing

vegetation along this new wall to be critical, and it will require detailed management and nurturing to ensure that it successfully takes and serves to mask the visual impact of the wall. I am therefore recommending that the provision and maintenance of this vegetative screen be subject to a specific condition requiring its provision and maintenance until such time as the planting can be considered to be of sufficient extent and strength to be self-maintaining. In this regard I recommend that the applicant be conditioned to provide, maintain and protect the road-side planting for a minimum of 5 years or until such time as the local authority is satisfied that the wall has become suitably screened, in the event of issues arising with the planting (failure, removal or vandalism) it should be incumbent on the applicant to replace or mitigate the issues arising for a period not less than 5 years.

- 8.5.2.12. There will be a significant loss of car parking spaces along Nutley Lane (approximately 46 no.), these are pay and display car parking spaces that occur along the roadside, and for clarity I note that no on-site car parking is to be removed from any property (residential or commercial) which currently enjoys the benefit of on-site parking. I also note that the major car trip attractors in the vicinity all provide significant on-site parking for their operations (such as RTE, the Merrion Shopping Centre, SVUH and EPGSC). The loss of the roadside car parking is required to facilitate the provision of the cycle tracks, bus lanes and general traffic lanes, within this urban area and accordingly I consider their removal to be appropriate in the context of the identified wider benefits of the scheme including improved public transport, better cycling and pedestrian facilities, reduction in congestion and reduced emissions.
- 8.5.2.13. Several submissions have raised concerns that the Proposed Scheme will irrevocably alter the character of Nutley Lane and result in the provision of a six-lane transport corridor (2 no. bus lanes, 2 no. general traffic lanes and 2 no. cycle tracks) through this residential area, resulting in the dissection of the community and separation from services. I fully acknowledge that the Proposed Scheme will alter the character of Nutley Lane, however, the changes that will arise will improve accessibility and connectivity, and while modernising and widening the carriageway it also provides for formalised toucan/pedestrian signalised crossings along its length improving traffic safety and providing for connectivity. Furthermore, landscaping and

tree retention has been prioritised along the northeastern side of the lane proximate to the majority of existing residential properties which I consider to be an appropriate response.

- 8.5.2.14. Arguments have been brought forward seeking a reduction in the amount of general traffic lanes and/or bus lanes through providing a one-way system or only having a bus lane in one direction (inbound) at this location, and while this may seem like an attractive option, I would remind the Board that the traffic modelling carried out results in increased traffic impacts on adjoining streets in any of these scenarios and that the Proposed Scheme as set out in the application documents represents the optimum traffic and transport solution for this section.
- 8.5.2.15. Concerns were also raised in third party submissions in relation to traffic safety and conflicts arising from residents having to traverse at least one bus lane, and cycle track(s) to gain vehicular access to properties. I note that in this regard concerns have been raised in relation to the bi-directional nature of the cycle track, and that access to dwellings may be impacted. On consideration of this matter the two-way cycle track will run along the frontage of a total of 8 dwellings at this location and will be separated from the front wall of the properties by a footpath, furthermore the provision of cycle tracks within urban environments is common practice and should be encouraged, and road safety audits carried out by the applicant did not return any issue with the proposed arrangements. I also note that the local authority has not raised any concerns in relation to the safety of this arrangement. Accordingly I consider the cycle track provision at this location to be appropriate.
- 8.5.2.16. Again while I note the concerns raised, I consider that the provision of bus lanes and cycle tracks to be acceptable and safe practice which is in keeping with the proper planning and sustainable development of the area. The standard rules of the road will apply and will ensure that access to properties will be retained and maintained. I am therefore satisfied that the Proposed Scheme will not give rise to traffic hazards in this regard. While I note that the Proposed Scheme will result in changes to Nutley Lane, I do not consider these to be out of character with this urban area or to be of such adverse significance to merit changes to, or omissions from, the Proposed Scheme.

8.5.3. Pembroke Road/Baggot Street Upper/Lower

- 8.5.3.1. A significant number of submissions have raised concerns that the Proposed Scheme will have an adverse and inappropriate impact on Pembroke Road, Baggot Street Upper, Baggot Street Lower and Fitzwilliam Street Lower. In this regard the provision of an alternative route using the Northumberland Road and Mount Street is frequently offered as a more appropriate option. In this regard I note that the alternative option may be considered attractive if the Proposed Scheme is considered as simply a transport mechanism to and from the City Centre, however, in my opinion the Proposed Scheme offers much more through offering connectivity to and through village centres and commercial hubs along its route. The Proposed Scheme, in my opinion, offers the opportunity for enhanced connectivity for Baggot Street Upper and Lower. The infrastructure improvements proposed will strengthen this area as a destination in its own right as well as facilitating those transiting to the City Centre. I note that Baggot Street offers a wide range of services and functions and in my opinion the attraction of the area will be improved and enhanced through the increased connectivity options offered through the proposed infrastructure improvements, not only through bus connections and activity but through enhanced cycling (including cycle parking) facilities. The combined activity density mapping included within the EIAR demonstrates that the Proposed Scheme being routed through Pembroke Road and Baggot Street Upper and Lower offers a better opportunity to improve services to a wider range of the population (residents, workers, and students) in a more convenient manner (i.e. providing infrastructure to facilitate services and connectivity closest to where it is needed).
- 8.5.3.2. The alternatives section of the EIAR (as discussed below in Section 9.4) clarifies that the Northumberland Road option was considered within the initial design approach for the Proposed Scheme, and both routes (and various design options on each) were compared and contrasted using a range of sub-criteria such as capital cost, transport reliability and quality, residential population, and employment catchments. In general, the Proposed Scheme route was considered better than the alternative in both land use character and capital cost considerations. In considering environmental media impacts the differences between both alternatives were neutral in terms of potential effects on archaeological, cultural/architectural heritage, soils

and geology, hydrology, landscape and visual, air quality, as well as noise and vibration. It was considered, however, that the Northumberland Road option performed poorer in terms of the potential for loss of trees and loss of car parking when compared with the current proposal. I accept these findings and consider that it is appropriate and preferred to provide additional higher quality transport infrastructure and public realm improvements at locations most proximate to where the demand arises and where people want to go. In principle therefore I consider that the routing of the Proposed Scheme along Baggot Street Upper and Lower to not only be appropriate but desirable in terms of improving connectivity, increasing service, and providing the widest range of options to the highest number of people.

8.5.3.3. The suitability of Baggot Street/McCartney Bridge to cater for the Proposed Scheme has also been raised as an issue in several submissions, and it is stated that it is as a pinch point which is presented as an argument in favour of the Northumberland Road alternative route (which has a more modern and flat bridge over the Canal). I note that McCartney Bridge itself is a protected structure, and in this regard, I wish to clarify that I do not consider that the Proposed Scheme will give rise to any adverse impacts on the established nature and character of the bridge. The proposed reallocation of carriageway on the bridge will result in widening of the footpaths on each side of the bridge (with the historic granite paving being reinstated on the southern side – in this regard the Board is referred to "Landscaping General Arrangement Drawings" sheet 20 of 23 which clearly indicates same), provision of two cycle tracks and a reduction in the number of vehicular carriageways to 2 no. (i.e. one general traffic carriageway in each direction, there are currently 4 lanes - 2 no. general traffic lanes in each direction). Bus priority is proposed to be provided over the bridge by use of bus priority signalling on both the inbound (at Baggot Street Upper) and outbound (at Baggot Street Lower) sides. Therefore, should the proposed scheme be implemented there will be a reduction in vehicular traffic over the Bridge (highlighted in table 6.65 of the EIAR which shows that Baggot Street Upper will experience a reduction of 952 PCUs in the AM 2028 peak hour while Baggot Street lower will have a reduction of 3178 PCUs in the same hour). Accordingly, the proposed scheme will result in a reduction in traffic using this protected structure but will also provide enhancement of its general amenity through the provision of wider paths. Furthermore, I note that the grand canal towpath in the

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vicinity of McCartney bridge is to be improved with existing trees to be retained which will improve both the accessibility and the setting of the bridge.

- 8.5.3.4. Concerns have also been raised in submissions that the Proposed Scheme will have an adverse impact generally on the general amenity and streetscape of the Baggot Street and Pembroke Road Areas as well as impacting the commercial operators through the loss of car parking. While I note these concerns, I am of the opinion that the works proposed will not result in adverse impacts but will improve the amenity, accessibility, and attractiveness of this area. While I fully acknowledge that car parking is proposed to be reduced on Baggot Street Upper, footpaths are generally widened (particularly along the northern side with some widening on to the south), this area will retain two bus stops (one outbound and one inbound) and general traffic will be restricted through the provision of a bus gate and a traffic turning restriction at Mespil Road. The new infrastructure proposed will provide a segregated and safe cycle track and improve cycling parking with the provision of c. 30 sheffield bike stands. The majority of existing street trees are retained on Baggot Street Upper, however, 5 no. (1 no. maple which is in decline and 4 early mature trees) on the southern side of the street are to be removed. Additional planting in the form of 3 no. street trees on the northern and 5 no. on the southern side of the street is proposed.
- 8.5.3.5. Loading bays and parking are to be consolidated along Baggot Street Upper which will result in spaces being removed. Between Waterloo and Haddington Roads the Proposed Scheme will result in the omission of 10 no. existing pay and display parking spaces, one disabled space and one loading bay (large bay approximately 3 car spaces). Three pay and display spaces, and three disabled spaces are to be provided in the Proposed Scheme within the same area as well as 2 no. loading bays (07.00-19.00) an additional loading bay is also being proposed at Eastmoreland Place. I note there will be a loss of car parking spaces at this location, however, I consider this as necessary to achieve the overall aims of prioritising public and sustainable modes of transport. I also note that some parking and loading bays will be retained in this area. One of the commercial operators had made a submission that the separation buffer between the loading bays be widened to .85m to accommodate a specific pallet system which is used for deliveries as this will reduce

conflict with the cycle track and increase safety. As there is adequate space within the public realm and footpaths in the vicinity of the proposed loading bays on Baggot Street Upper I consider this approach to be acceptable and I recommend the inclusion of a condition in the interests of cyclist and traffic safety at this location. I note the relocation of one of the existing loading bays to a position (Eastmoreland place) further distant from commercial operations, however, I do not consider this impact to be significant as any issues can be mitigated through management of deliveries.

- 8.5.3.6. The provision of the bus gate on the Pembroke Road arm of the Waterloo Road/Baggot Street Upper junction is raised as being a concern for commercial operators in the vicinity as it will restrict access for private vehicles. As set out previously above I consider that the Proposed Scheme improves the accessibility of this location (especially for those who may not have access to a car), while still retaining a small number of accessible and general car parking spaces. Therefore, the scheme continues to accommodate access to private vehicles albeit, I acknowledge that an alternative route may be required to access the location via either Haddington or Waterloo Roads. Submissions did draw attention to the lack of detail as to the operating period of the bus gate, and while I acknowledge the application documentation could be clearer on this the drawings and section 4.11.3 of the Preliminary Design Report (Supplementary Information) state that the bus gate will be operational from 06.00 – 20.00. Further concerns are raised in relation to the proposed restriction in right turns from the Mespil Road onto Baggot Street, however, the applicant states that this restriction is necessary to improve the operation of the Mespil/Haddington/Baggot Street junction. In this regard I note that alternative means of accessing Baggot Street Upper will be retained via Waterloo Road and Haddington Road throughout the day.
- 8.5.3.7. I also note that throughout the Pembroke Road and Baggot Street areas pedestrian crossing and connectivity is retained, with Baggot Street having formal and signalised crossings at all junction arms while the existing informal crossings are facilitated on Pembroke Road through the narrowing of the carriageway at this location, and the provision of buildouts breaking up the designated parking locations

to facilitate increased visibility and reduced crossing distances which will facilitate shorter and safer crossing for pedestrians.

8.5.3.8. In relation to Baggot Street Lower the central median and its mature trees is to be retained, with a bus lane and general traffic lane provided both inbound and outbound, in conjunction with cycle tracks. Parking spaces are to be removed as part of the Proposed Scheme from along Baggot Street Lower. There are 49 spaces currently in place (both pay and display and permit parking) while the Proposed Scheme provides for 13 spaces. Additional planting is also proposed along Baggot Street Lower which I consider to be appropriate although I note concerns that have been raised by DCC. In this regard I refer to section 9.11.13 of my report below (EIA) in which I set out the discussion in this regard. Existing granite kerbing which is considered to be of heritage merit is proposed to be reinstated along the street. I note also that the provision of proposed bus shelters on Baggot Street Lower/Upper, Pembroke Road and Fitzwilliam Street Lower has drawn concern from some third parties and DCC as being inappropriate interventions along these streetscapes, in this regard (and consistent with my conclusion on section 9.11 of the EIAR) I consider it appropriate that advertisement panels be omitted from the shelters proposed along Baggot Street Lower and Upper, and that the one bus stop proposed along Fitzwilliam Street Lower be omitted to minimise the visual impact on these streetscapes, in this regard the Board should note that the DCC Planning Section recommends that bus shelters along Baggot Street Lower and Fitzwilliam Street Lower be omitted in their entirety while their conservation section requests that advertisement panels only be omitted at these locations. I consider that bus shelters fulfil an important function for service users and that they should not be omitted lightly. As there are already bus shelters in place along Baggot Street Upper and a more varied streetscape in place along Baggot Street Lower, I do not consider their introduction to be novel or at odds with the established character of the area. Furthermore the footpaths in the vicinity can accommodate bus shelters and accordingly I only consider it necessary to omit the advertising panels to minimise visual impact. In relation to Fitzwilliam Street Lower, I concur with the opinion of the DCC planning section in that this streetscape is more sensitive to such interventions, with no bus shelters in place, a strong relatively uncluttered Georgian streetscape in

place and relatively narrow footpaths, and hence I recommend that the bus stop at this location be omitted.

- 8.5.3.9. In relation to the other elements of the Proposed Scheme on Fitzwilliam Street Lower, I am satisfied that the route selection, footpath improvements, cycle tracks and bus lanes will not present an adverse impact along this heritage streetscape (subject to omission of the bus shelter) due to their nature and location. I acknowledge that there will be a loss of 20 no. car parking spaces, however, I consider this loss to be acceptable given the City Centre location, nature and character of the street and the need to preserve and respect the built form at this location, furthermore the omission of car parking will facilitate the prioritisation of bus traffic (through the provision of dedicated lanes - both inbound and outbound) while also facilitating the provision of two cycle tracks. The Proposed Scheme provides for planting along the eastern side, however, as discussed in section 9.11.13 below, I do not consider the provision of this new tree line appropriate given the established Georgian nature and proportions of this street, its location in a conservation zoned area of the City Development Plan. In this regard I am recommending that the provision of trees along this street be omitted by condition, the Board should note that this position is consistent with that of DCC as outlined in their submission. One submission raised concerns in relation to the potential for traffic impact to arise at Fitzwilliam Lane due to the location of the proposed bus stop, I do not consider this to be an issue as the normal rules of the road will apply and the arrangement proposed is within an urban area where minimum speed limits apply.
- 8.5.3.10. Concerns have been raised by third parties concerning major events being held in the vicinity of Baggot Street with particular references to events at the Aviva Stadium. In this regard I note that these events are subject to their own traffic and event management practices, and I do not consider that such matters will be adversely affected by the Proposed Scheme.
- 8.5.3.11. Overall in light of the above, I consider the route selection through Pembroke Road, Baggot Street Upper and Lower, and Fitzwilliam Street Lower area to be appropriate and optimal, I also consider that the connectivity of the Baggot Street area will be greatly improved through the additional bus, cycling and pedestrian infrastructure

proposed. I note that additional management may be required in order to facilitate deliveries to commercial premises, but this will not, in my opinion, present a significant adverse impact for the area. The amenities along Baggot Street Upper will be improved through the provision of wider footpaths, additional planting and the McCartney bridge will have reduced vehicular traffic arising. I do consider that the bus shelters should be conditioned to minimise visual impacts along Baggot Street through the omission of advertising panels, and that the bus shelter and proposed planting at Fitzwilliam Street should be omitted in the interests of preserving the streetscape proportions and amenities.

8.5.4. Newton Plan

8.5.4.1. I have reviewed the 'Newton Plan', which was conceived primarily by Mr. Tom Newton, an experienced former bus driver which has been submitted and referenced in third party submissions. I consider that the Newton Plan relates predominantly to the provision and management of bus services and routes within the City and does not relate to the provision of infrastructure. I note that it was lodged and considered as part of the development of the Transport Strategy for the Greater Dublin Area 2022-2042 to inform the city-wide transport policy context. I consider that the current Proposed Scheme is consistent with, and has been informed by, the provisions of the adopted and agreed transport strategy and that it represents the optimal approach towards the improvement of sustainable transport alternatives and infrastructure along this transport corridor. I refer to the consideration of reasonable alternatives carried out in Section 9.4 of this report below (EIA) and having regard to the provisions of the Newton Plan I do not consider it appropriate or necessary to alter the Proposed Scheme.

8.6. Project/Junction Design

8.6.1. Section 3 above of my report has set out a detailed description of the overall project design including an overview of junction, bus stop, signage, infrastructure, and overall route design by section. Several submissions have been lodged in relation to specific infrastructure design elements within the scheme which I intend to discuss here.

8.6.2. Bus Stops

- 8.6.3. The provision of bus stops throughout the scheme is critical to its overall successful function. Concerns have been raised in relation to the locations and designs of the bus stop infrastructure proposed.
- 8.6.4. In relation to the location of bus stops, the overall approach has been to ensure that they are located close to local facilities, have an approximate spacing of 400m (suburban) and 250m (urban centres), be close to the nearest junction/pedestrian crossing, be located downstream of a junction rather than upstream, have sufficient space for associated infrastructure (shelter, waiting area, Real Time Passenger Information [RTPI] displays, boarding and waiting areas, cycle tracks and footpaths etc.), and consider the potential for interchanges with other transport routes. The primary considerations in locating bus stops includes minimising the walking distance between interchange stops (for accessing orbital bus routes as well as other public transport services such as the DART), and to ensure stops are located proximate to pedestrian crossings to ensure safety of access. In general, in relation to the location of bus, stops I am satisfied that the above approach (as outlined in section 4.6.4.5 of the submitted EIAR) has been adopted insofar as is practicable, however, having regard to the nature of the development of any urban project such as that proposed there is a need to consider the locations of existing bus stops, characteristics of the various locations and constraints that are in place along the route that may necessitate a deviation from the preferred approach. The rationalisation of bus stops has led to some stops being retained, others removed, and some being omitted. Inbound ten of the 26 stops are proposed to be relocated, 5 no. removed, and one to be added, so that the total number of stops will be rationalised from 26 to 22. Outbound 12 no. of the 28 stops are proposed to be relocated, 4 no. removed with no new additions resulting in the number of stops being rationalised from 28 no. to 24.
- 8.6.5. I note that the submission from DLR seeks clarity in relation to the location of bus stops and raises concerns that some stops are located on the upstream side of junctions (and therefore contrary to the general preferred approach) this has been done in some instances where other constraints are in place. In this regard I note that the outbound bus stop on the approach to Temple Road / Frascati Road / Barclay Court junction is retained in place (upstream of the junction) to avoid

impacting on the public realm and an art installation, while the bus stop inbound at Booterstown Avenue is only slightly relocated while remaining on the upstream side of the junction to facilitate proximity to a private coach layby and take advantage of the existing pedestrian crossing (and strong desire line) to connect to the Booterstown DART station. I note that a further submission has also raised concerns in relation to the proposed location of bus stops in the vicinity of Merrion House, however, I am satisfied that the location of this bus stop is appropriate to provide for the needs of the local population and wider travelling public. Overall I am satisfied that the locations of bus stops along both the inbound and outbound sections of the route are at appropriate locations and I do not consider that any require relocation, in this regard the Board should note that the locations of bus stops along the route have not been raised as being a significant concern in other third party submissions.

- 8.6.6. Section 3.1.3 above has set out the overall design approach for bus stops and whether an island-, shared landing zone-, lay-by, or inline-, bus stop is being proposed. All of these typologies are used in the Proposed Scheme and sections 3.2.17, 3.3.15, 3.4.12, 3.5.15, and 3.6.7 of this report above sets out how many of each type are proposed in each of the 5 sections of the Proposed Scheme. Of the total of 46 service bus stops within the Proposed Scheme, 12 no. are island bus stops (the preferred approach) while 33 no. will be of the shared-landing variety which is next on the hierarchy, and one will be in-line (at Nutley Lane near RTE, as there is no cycle track at this location passengers can alight and board straight from the foot path). The Board should also note that four lay-by bus stops are provided as part of the proposed scheme to cater for existing and potential future private coach services these are located at the Frascati Centre (also shared landing on the main services bus stop no. 3084), Mount Merrion Avenue, Booterstown and SVUH.
- 8.6.7. While some concerns have been raised by third parties in relation to the safety of the bus stop designs due to the potential for conflicts between cyclists and bus users, I am satisfied that the measures proposed, which include deflection of cyclists behind the bus stop, narrowing of the cycle track, LED warning studs, the inclusion of speed controls including ramping the cycle track up, cycle track road markings as well as pedestrian push button controls for cycle signalling (island bus stops) all combine to maximise pedestrian and cyclist safety. I also note that the design of bus stops has been informed by carrying out traffic safety and accessibility audits to ensure safety

for all users and that vulnerable users of services (including wheelchair users) are adequately protected. I am also satisfied that provisions have been made for the visually impaired through the use of tactile paving and the provision of signal call buttons for crossing cycle tracks to provide a safe and accessible environment. On review of the detailed design of the proposed bus stops, I am satisfied that the applicant has had regard to the requirements of the mobility and visually impaired and that the bus stops have taken adequate and appropriate measures to ensure accessibility and safety for all users, including cyclists, bus passengers and pedestrians.

8.6.8. Bus Gate

- 8.6.9. One bus gate is proposed as part of the Proposed Scheme on Pembroke Road between the junctions of Eastmoreland Place and Waterloo Road. Concerns that have been raised in relation to this element of the Proposed Scheme are primarily based on the restrictions it will apply to general traffic accessing Baggot Street Upper, and the impact arising from accessibility and commercial enterprise. The bus gate will be operational from 06.00 to 20.00 as stated on the application drawings and in section 4.13 of the preliminary design report.
- 8.6.10. In relation to this element of the Proposed Scheme I note that bus gates are common features in urban transport systems and that that the provision of this bus gate allows bus priority to be retained without having to provide dedicated bus lanes along Pembroke Road between Eastmoreland Place and Northumberland Road. This minimises the land take requirements for the scheme, mitigates visual impacts, allows the retention of parking and provision of generous footpaths and planting while also providing for cycle lanes as well as maintaining bus priority. Furthermore, I note that alternative means of access will be retained to the Baggot Street area for those who wish to use private cars albeit I acknowledge that these will be more circuitous when approaching from Pembroke Road than that currently available. Overall, I consider the provision of the bus gate and its operational hours to be appropriate and in the best interests of promoting the use of sustainable modes of transport, ensuring public transport priority, and minimising the overall impacts of the Proposed Scheme.

8.6.11. Junction Design

- 8.6.12. A summary of the overall junction design approach adopted has been set out in section 3.1.2 previously above, in general the approach is to limit left turning filter lanes and provide segregated, delineated, and controlled crossings for cyclists and pedestrians. Some submissions have raised concerns that the Proposed Scheme does not go far enough to protect cyclists and that alternatives such as "Dutch-style" and "Cyclops" junction designs at junctions should be provided. In simple terms due to the established urban environment through which the Proposed Scheme runs, the space is not available within the existing corridor to cater for such interventions without significant impacts at each of the junctions and that to provide such solutions would give rise to significant adverse impacts on population, landholdings, as well as the built and natural environment, however, I note that the junctions proposed within the Scheme provide protection for pedestrians and cyclists and have been informed by international best practice.
- 8.6.13. The Proposed Scheme provides for a bespoke junction design at each of the junction locations within the existing constraints arising from this urban environment while also adhering to a set of general principles to improve safety and movements for all users buses, cyclists, pedestrians, and general traffic. The junction typologies within the Proposed Scheme are either type 1 or type 3 junctions as described in the BusConnects Preliminary Design Booklet, with each specific junction described in the Junction Design Report (Appendix A6.3 of the EIAR). The junction designs have also been fully informed through consideration of the needs of disability groups and catering for pedestrians who are the most vulnerable users.
- 8.6.14. The junction designs throughout the Proposed Scheme have been informed by the Design Manual for Urban Roads (DMURS), in particular with regard to the hierarchy of users (with pedestrians being afforded the highest priority, then cyclists then public transport with private vehicles at the bottom of the user hierarchy) and the requirements of providing safe crossing points for pedestrians and cyclists while facilitating traffic movements. All junctions provide for protected cyclist loitering areas and generally provide for delineated segregated crossing points dedicated to cyclists with separate pedestrian crossing points generally in place. In some instances toucan crossings are provided (where carriageway crossing facilities are shared between pedestrians and cyclists). Some third-party submissions question the merit

and safety of this approach and request that dedicated and separate cyclist facilities be provided at all crossing points. Toucan crossings are provided at locations such as Stradbrook/Monkstown Road junction, Frascati Road, Blackrock Clinic, Blackrock College, Ballsbridge, Baggot Street Lower, and Nutley Lane. Toucan crossings are proposed to facilitate mid-stream crossings (between junctions) and to accommodate crossings where a junction cannot accommodate separate dedicated cyclist and pedestrian crossing infrastructure. Some submissions state that toucan crossings do not provide the highest level of service for cyclists and there is a potential conflict between cyclist and pedestrian users. I note these concerns, however, I am satisfied that the use of toucan crossings at the select locations indicated is appropriate, relevant and all suitable measures have been included to ensure safety of users.

8.6.15. Concerns have also been raised that toucan crossings do not adequately support right turning cyclists particularly on smaller roads such as Nutley Lane. I note that along the Nutley Lane route it may be necessary for right turning cyclists to travel beyond their desired junction to make a right turn before having to turn back. While this may not be considered ideal, I note that these arrangements are necessary in order to facilitate the other constraints along the Lane and to minimise the impacts of the Proposed Scheme on private dwellings along this portion of the route, while ensuring the provision of a continuous safe cycling network and maintaining bus priority. Furthermore, while I note such crossing provisions may not be direct, it does not necessitate an unreasonably long or arduous diversion. A similar issue is raised in relation to the Stradbrook Road/Monkstown junction in that while safe right-turning is facilitated it is not by as direct a route as available at other locations. I note in relation to this that the Proposed Scheme is using an existing toucan crossing at this location and while the available route is not direct, it does not require a significant or overly inconvenient detour. Overall, toucan crossings within the scheme are only specified at certain specific locations where alternative crossing arrangements are either not suitable or appropriate. I consider that the level of service being provided to pedestrians and cyclists using these crossings constitutes an improvement from the existing situations in place along the route and that all measures and crossings represent a safe and sustainable means of crossing roads for all.

8.6.16. The proposed junction designs incorporated throughout the Proposed Scheme generally provide for deflection of the cycle track at junctions to provide a protection

kerb/buffer between cyclists and vehicular traffic. The radius and design of the kerbing requires vehicles to carry out a tighter turning manoeuvre to complete a left turn which effectively will force them to slow down prior to and during the turn. This junction arrangement is provided both at the larger signalised controlled junctions as well as on smaller (non-signalised) side junctions where an additional raised table treatment is incorporated to further reduce traffic speeds and highlight the potential presence of pedestrians and cyclists to left turning vehicles. At signalised junctions the design layout also keeps straight-ahead and right-turning cyclists on the raised-adjacent cycle track as far as the junction, avoiding any cyclist-vehicle conflict which may arise from cyclists weaving and merging lanes on the approach to junctions. The design of the protection kerbing incorporated at junctions also restricts cyclists from crossing over to the centre of a junction to turn right and thus they will be directed to cross via the designated crossing points thus improving their safety at such locations.

- 8.6.17. Signalling is also used to improve safety where possible, so that staggered signalling will be used to highlight and assert the presence of cyclists where left turning vehicles may proceed at the same time (this is particularly important in situations where left turning traffic will be coming from a more central lane and crossing a bus lane). The Board should also note that the Proposed Scheme incorporates new signalling which will highlight the necessity for left turning vehicles to proceed with caution be aware of, and yield to, cyclists and pedestrians proceeding straight.
- 8.6.18. In relation to pedestrian crossings I am satisfied that the proposals have been designed to ensure pedestrian safety at all junctions. The Proposed Scheme provides additional pedestrian crossings along the route (increasing from 68 to 91) and all are designed in an appropriate and safe manner with two-stage crossings generally provided where crossing distances will be in excess of 19m.
- 8.6.19. I note concerns have been raised in relation to the design of a number of specific junctions, down to specific design features and extent of yellow boxes, and requests to separate out toucan crossing arrangements. On review of the junction design approaches and the evolution of the junction designs set out in the application documentation, I am satisfied that the design and arrangements provided at junctions are appropriate to ensure pedestrian, cyclist and vehicular safety while also

working within the urban constraints present along the route to minimise impacts arising.

8.6.20. Cycle track and Pedestrian footpath widths

8.6.21. Segregated cycle track widths and pedestrian paths throughout the Proposed Scheme are generally 2m wide, although at certain locations these widths are proposed to be reduced to account for local constraints. These deviations from the preferred widths have been set out previously in sections 3.2.18, 3.3.16, 3.4.13., 3.5.16, and 3.6.8 of my report above. In all instances reductions from the preferred widths are over short distances and are being provided to either tie in with existing adjoining facilities, to reduce land take requirements on private property, minimise impacts on items of heritage interest, or retain existing mature trees/planting. I note that the reductions can result in the cycle track widths falling to a minimum of 1.2m for certain specific pinch points over short sections and that a minimum of 1.2m (accessibility standard) is maintained for pinch points on footpaths at all locations. Having regard to the context and nature of the Proposed Scheme, I consider these deviations to be acceptable and note that footpaths will continue to meet accessibility standards throughout.

8.6.22. Cycle tracks adjacent to parking areas

8.6.23. Concerns have been raised in relation to the provision of cycling tracks on the inside of car parking areas (for example on the Pembroke Road), and that this could give rise to safety issues from conflict between cyclists and motorists existing and access their vehicles. As with any new infrastructure there will be an element of acclimatisation for all users, however, I note that the preferred location for raised adjacent cycle tracks is between the footpath and any proposed parking spaces as this provides additional protection for cyclists and that this is also in line with international best practice. Furthermore, I note that where parking is proposed adjacent to a cycle lane a protection/separation buffer of .75m is incorporated (between the car parking area and the cycle track) throughout to avoid conflicts arising. I consider this approach to be acceptable and am satisfied that it provides a safe environment for cyclists as well as those existing/entering parked cars.

8.6.24. Car Parking

- 8.6.25. The reduction in car parking along the route of the Proposed Scheme is raised in a number of submissions, with the focus of concern being that the loss in car parking will restrict access to certain locations and that this will have an adverse impact on the commercial viability of premises and services. I note that a reduction in car parking along the route is proposed. Overall a total of approximately 165 designated car parking spaces (including pay and display, permit, and accessible spaces) are proposed to be removed along the route under the Proposed Scheme. Sections 4 (Ballsbridge to Merrion Square) and 4 (Nutley Lane) will experience the largest reductions in on street parking with the loss of approximately 101 and 44 spaces respectively. I note that the Proposed Scheme will not result in any private residence losing on-site car parking where such a facility already exists. (The board should note that these numbers do not include the car parking that will be affected in the onsite car park at Blackrock clinic this is discussed separately in Section 8.7.5 below)
- 8.6.26. I note that throughout the Proposed Scheme car parking is proposed in designated pockets on both sides of the Merrion Gates junction, along both sides of Pembroke Road (between Northumberland Road and Eastmoreland Place), Wellington Road, Eastmoreland Place, Baggot Street Upper, and Baggot Street Lower. Furthermore, the applicant argues that due to the urban nature of the locations that equivalent car parking facilities remain available along adjacent streets within 200m of the route. In this regard the EIAR states that there are 650 equivalent spaces within 200m of Section 4 of the route and 105 spaces within 200m of section 5.
- 8.6.27. I note that throughout, the design scheme predominantly caters for the needs of the private car while prioritising the sustainable modes of transport, and some submissions argue that the Proposed Scheme does not go far enough, and that additional one-way systems or limitations should be put in place for general traffic. I also note that all relevant policy documentation advocates for the prioritisation of public transport over the private car as this represents the most sustainable and efficient means of moving people around any urban environment. I consider that the Proposed Scheme, as designed, successfully balances the need to prioritise public transport, cycling and pedestrian infrastructure while also accommodating the private car within the network. I acknowledge that certain inconveniences will arise from the Scheme for the private car in terms of there being less carriageway space

devoted/assigned to it, the removal of left turning filter lanes, the reduction in car parking spaces, and restricted turning/access at certain locations. The Proposed Scheme, however, should not be misconstrued as being 'anti-car', as it continues to cater for and accommodate the private car. While car parking will be reduced along the scheme, it is still retained where practicable at suitable locations. Accordingly, while acknowledging that there is a loss of car parking, I do not consider this loss to be of such significance or adverse impact to merit any changes, omission or refusal of the Proposed Scheme given the overall wider benefits arising in terms of improved bus, walking, and cycling infrastructure in terms of people movement and emissions reductions.

8.6.28. Georges Avenue

- 8.6.29. Third Party submissions and the submission from DLR have raised concerns in relation to the proposed traffic controls at Georges Avenue. Under the Proposed Scheme it is intended to close the exit from Georges Avenue onto Frascati Road through traffic control measures to only allow authorised vehicles, pedestrians, and cyclists to exit this route, and only allow pedestrians and cyclists access to the Avenue from the Frascati Road. Submissions from residents of the avenue and their representatives raise concerns that this affects their access, residential amenity, and question whether deliveries will be able to be made as no turning facility is provided.
- 8.6.30. The applicant has stated that the proposed restrictions are necessary in order to reduce adverse air and noise impacts arising on the Avenue from traffic that would be diverted onto this road as a rat run in the event of the Proposed Scheme being implemented. The modelling identified that negative moderate to significant noise and air quality impacts would arise from rat-running traffic that would be attracted onto Georges Avenue should the Proposed Scheme be implemented. Accordingly, alternative design solutions including fully signalising this junction were considered, with the restricted access solution emerging as the preferred solution. I note that Georges Avenue will continue to be fully accessible from the surrounding road network (via Carrysfort Avenue/Anglesea Drive, and Mount Merrion Avenue/Frascati Park) and that while the Avenue is narrow that authorised vehicles will still be permitted to exit onto Frascati Road. Accordingly, while I note that there will be additional inconvenience to residents who wish to access Georges Avenue from

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Frascati Road as a slightly longer route will need to be taken, I do not consider that this impact to be of such significance to require alterations to the Scheme. Furthermore, I consider that the adverse impacts that would arise in the absence of the access restrictions in terms of noise and air quality would be much greater in significance for residents over the medium and long term. Accordingly, I consider the traffic restrictions proposed at Georges Avenue to be appropriate and in accordance with proper planning and sustainable development.

8.6.31. Elgin Road

- 8.6.32. The alterations in the access arrangements at the Elgin Road (in proximity to the American Embassy) is raised as an issue in one submission, with a focus of that submission being concern that local residents are not aware of the proposed changes and whether the full implications of the traffic restriction at this location have been considered. At the junction of Elgin and Pembroke Roads it is proposed to close Pembroke Road to vehicular access from Elgin Road (while maintaining vehicular access in the reverse direction on the inbound leg) provide significant additional landscaping, reduce carriageway widths on Elgin Road, and provide a turning area for vehicles that need to turn and travel back up Elgin Road as access will not be permitted to Pembroke. The proposed alterations at this junction have not attracted submissions from residents or commercial concerns in the area.
- 8.6.33. These are locally significant alterations, that will in my opinion greatly enhance the amenity of the area and reduce traffic flows at this location, providing more privacy and a much-improved public realm. In relation to public consultation I note that the Proposed Scheme has undertaken significant non-statutory public consultation (refer to my consideration of this at 8.12 below) and has also undertaken all statutory public notification processes as well as progressing a robust public awareness campaign of the project during the design process. I am therefore satisfied that all the statutory requirements have been met and that the applicant has made all reasonable efforts to engage the public.
- 8.6.34. I note that the Elgin Road area will remain fully accessible from the Clyde and Raglan Roads and that detailed traffic modelling has been undertaken of the Proposed Scheme (refer to Section 9.13 of my report below) to ensure that all impacts on traffic in the wider network is also considered. In this regard I note that

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the Proposed Scheme also provides for traffic controls at the Clyde Road / Clyde Lane junction and at the Herbert Park/Pembroke Park junctions.

8.6.35. Accordingly I consider that the proposed works at the Elgin/Pembroke Road junction are appropriate and adhere to the principles of the proper planning and sustainable development of the area.

8.6.36. Herbert Park Junction

- 8.6.37. Submissions have been lodged in relation to the design and impact of the Proposed Scheme at the Herbert Park/ Shelbourne Road /Pembroke Road/Merrion Road Junction at Ballsbridge. I have considered this matter under the provisions of the EIA and in this regard I refer the Board to Section 9.11 of this report below – (Archaeology, Cultural, and Architectural Heritage), and my conclusion on that section set out at 9.11.8.3.
- 8.6.38. The Proposed Scheme entails the setting back of heritage (railings and plinth) at this location along the eastern side of Herbert Park (adjacent to no. 7 Ballsbridge Terrace), which will involve the loss of 6 no. category A trees. This area is zoned as Z9 (Amenity / Open Space / Green Network) under the Dublin City Development Plan 2022-2028. Having reviewed the evolution of the junction design at this location, completed a site visit and given the fact that there is sufficient space at this location to provide for the junction improvements required to facilitate the bus, cycling and pedestrian networks, (i.e. the scheme objectives), while also retaining the trees, I consider it appropriate to include a condition requiring the amendment of the junction design at this location in order to retain the character of this location as set out in my reasoning in section 9.11.8.3.
- 8.6.39. I note at this location the submitted EIAR did not take account of an existing pergola structure that had been erected under licence by Roly's Bistro on lands owned by the Council. In the interests of clarity I wish to confirm that this structure is authorised structure, while there had been debate on this matter through submissions, the Board should note that consent (PI. Ref. 4392/23) has been granted by DCC for a temporary period (3 years or until such time as these lands are required for the BusConnects Project) has now been granted. Regardless of this I note that the submitted EIAR did not include a review of the pergola structure, nor has it been

included in the drawings and details provided at this location. The applicant in their response to submissions did provide commentary on their consideration of the potential land take impact on the Bistro, which was considered to be negative, moderate, long term but not significant. I also note that the removal of trees was not considered to be significant in terms of Biodiversity as the trees do not provide potential for bat roosts. The applicant also noted that the primary driver for the junction design was to provide a standard 4-arm crossroads to ensure improvements for all users and that to introduce a stagger would remove some of the benefits for cyclists and pedestrians.

8.6.40. I note all of the above, however, in this regard, I do not consider that sufficient weighting has been given to the need to retain the trees and heritage railings/features on Herbert Park at this location. I consider that there is adequate space at this location to accommodate an improved junction while retaining all trees (noting that one – no. 6248 from the arboricultural assessment) may require transplanting, which from review of the application documentation should be possible due to the space available and distance to underground services. I note that in so doing this would be the only transplanted tree along the route, however, as the DAU sought additional consideration of this issue and in this regard I am of the opinion that an appropriate condition should be imposed as discussed further in section 9.11.8.3 below in relation to the transplantation of this tree should it be necessary. Should the Board not consider this amendment appropriate, I wish to clarify that my primary reasoning on this matter is to preserve the amenity of this location and preserve existing mature trees insofar as is practical.

8.6.41. Extension of 3-lane carriageway from Elm Court to Estate Avenue

8.6.42. Submissions have been made to suggest that the proposed signal-controlled priority from the Merion Gates junction (inbound) should be extended past the Elm Court Apartments, as well as No.'s 157, 155, 153, and 151 Merrion Road, thereby extending the 3-carraigeway design (two general traffic lanes and one outbound bus lane) at this location. Doing so would eliminate the need for land take from the Elm Court Apartments, as well as 4 no. private dwellings (two of which - no.'s 151 and 153 Merrion Road are on the RPS) while also potentially facilitating the retention of 3 no. mature street trees

- 8.6.43. I consider the impacts on these properties at section 9.5.7.3, 9.5.7.4, 9.11.4.2,
 9.11.10, 9.12.10, of this report below and do not wish to repeat the overall review here, however, in relation to the impacts of the Proposed Scheme at this location, I note the following:
 - I do not consider that the Proposed Scheme will have an adverse impact on the Elm Court Apartments, the land take and works along the frontage of these apartments are all outside the existing front boundary hedge, and while I note that the bus stop immediately outside these apartments is to be removed, I do not consider that significant adverse effects will arise at this location. While buses may not be stopping immediately outside the apartments under the scheme, the area will continue to be well served by stops.
 - Dwellings 157 and 155 Merrion Road are period residences that will be directly impacted by a permanent and temporary land take (to facilitate construction) as well as setting back of their front boundary walls by approximately 0.7 to 0.8m. These structures are not on the RPS (notwithstanding the application documentation stating that they are), and the remaining driveways will remain capable of accommodating on-site parking. The dwellings are period residences, and their boundary walls are of heritage merit. It is proposed to set back the existing front boundaries by repositioning the existing railings and plinths all under appropriate architectural supervision.
 - Dwellings 153 and 151 Merrion Road are on the RPS, and of the two, the land take requirements for no. 153 is the larger (permanent land take of 7.9m²), with the permanent land take/set back requirement along its frontage being 0.6-0.8m with the edge of the proposed bus lane carriageway being approximately 0.3 0.4m closer to the residences than current. The boundary setbacks will be carried out by relocating the existing boundaries under architectural supervision to minimise impacts. No. 153 has a driveway which can accommodate on site car parking and while the front boundary is to be set back it will not alter the ability to park two cars on site at this location. No. 151 does not have on-site parking and the boundary set back requirements ranging from approximately 0.1 to 0.6m (permanent land take requirement of 3m²) along this corner sites frontage.

- 8.6.44. The works will also necessitate the removal of three mature street trees at this location (located on the street in front of Elm Court Apartments, No. 155, and No. 151 Merrion Road respectively).
- 8.6.45. I note that the DCC submission on the application considered that the impacts on No. 153 and 151 Merrion Road and their built fabric was regrettable given their protected status and location at the entrance to Estate Avenue.
- 8.6.46. In relation to the necessity for the works at this location the applicant states that should the inbound bus lane be shortened as suggested in submissions that this would reduce the overall length of the bus lane inbound in advance of the SVUH junction to only 85m and increase the signal-controlled priority length (from the Merrion Gates junction) to 200m. It is argued that this would significantly reduce the available queuing space for vehicles on approach to the SVUH junction and introduce an unacceptable risk to the progress of buses.
- 8.6.47. On consideration of this matter I conclude that maximising the amount of bus lane at this location is appropriate and desirable in order to ensure the prioritisation of bus traffic and also allowing for general traffic requirements. I note that this is a busy transport route and the proximity to the SVUH junction (which has been designed to allow left turning traffic filter into the bus lane on the inbound section) could give rise to significant knock-on effects throughout the route and erode the reliability, average speed, and efficiency improvements that are sought for bus services along this route. I also note that the cycle lanes (on each side of the road at this location) have already been reduced to 1.5m each for approximately 300m in length at this location in order to inter-alia minimise impact on heritage features, street trees and property. This location is also on the inbound section of the route following the Merrion Gates junction which has to provide for DART movements at the level crossing on strand road. On balance, therefore I consider that the provision of the bus lane as set out in the Proposed Scheme is appropriate at this location, however, I recommend that an appropriate condition be included to ensure that the works to the frontage of the RPS structures and period dwellings at this location are carried out in an appropriate manner which respects the context and materials.

8.6.48. Junction updates

8.6.49. Some submissions have raised concerns that the Proposed Scheme does not take account of consents for updated junction arrangements from certain consented projects such as at Blackrock Clinic and a consented scheme at the junction of Temple Hill, Temple Road, and Newton Avenue or projects which may currently be under preparation. The Proposed Scheme has been designed in the context of the junction arrangements and route that is/was in place at the time of the application and the applicants do not have control over the timing of the implementation of any proposed or consented projects along this route. I am satisfied that the Proposed Scheme can incorporate any updated junction arrangements should and as they arise in the context of any future or recently consented permissions. Furthermore, I note that the applicants do not (and cannot) have control over if and when consented projects are implemented and so it would be inappropriate, unnecessary, and unworkable to require the current application documentation to be updated in the event of a new development proposal being consented or lodged given the extent, location, nature, and scale of the subject works. I do not consider that the Proposed Scheme will prejudice any future development proposals along its route as it will in fact improve accessibility and upgrade bus infrastructure throughout.

8.7. Impact on Commercial/Service/Community Premises

- 8.7.1. Submissions have been made raising concerns that the Proposed Scheme will result in adverse impacts on commercial, service and community premises along the route. In this regard I consider that the Proposed Scheme will improve accessibility to commercial and service premises. Car parking (albeit at a reduced level) remains available at suitable locations along the route and significant infrastructure improvements are being brought about to cater for additional access by safe, convenient, and reliable sustainable modes of transport. The Proposed Scheme will render all businesses and services along the route more accessible to those who do not have access to a private car and additional bike stands are also provided throughout.
- 8.7.2. Some submissions have raised concerns that the Proposed Scheme will have an adverse impact on more vulnerable people in terms of impacting their ability to access medical services (such as pharmacies, doctors, and hospital visits), as such users may not be in a position to take advantage of public transport or cycling and

pedestrian infrastructure improvements. Concerns have also been raised in relation to accessible car parking spaces being lost.

- 8.7.3. As set out previously above car parking will continue to be available throughout the scheme albeit at a reduced scale. Accessible spaces will be provided/retained under the Proposed Scheme at suitable locations such as Baggot Street Upper, Ballsbridge, and Booterstown, while the major medical facilities along the route, such as St. Vincent's University Hospital and Blackrock Clinic provide their own parking facilities within their own grounds. I do note that for certain locations by car (due to traffic restrictions incorporated into the Proposed Scheme), while this may be an inconvenience, I do not consider it to be a significant impact given the overall significant improvements being proposed for public transport services, and sustainable modes of transport. Accordingly, I consider that the Proposed Scheme will not significantly inconvenience users who are more reliant on the private car to access facilities and services.
- 8.7.4. Maintaining access to commercial premises and private properties throughout the construction phase has also been raised as a concern in a number of submissions. A project of the scale and in the location proposed will obviously cause disruption to businesses and properties along its route through the construction phase, however, there are commitments throughout the application documentation setting out that access to businesses, residences and community facilities will be accommodated and maintained throughout the construction phase. Furthermore, I note that construction activities will be rolled out on a phased basis throughout the overall route which will minimise impacts felt, the CEMP includes a Construction Traffic Management Plan, and that the applicant has committed to liaising with property owners and operators to ensure impacts are minimised.
- 8.7.5. The Blackrock Clinic has made a submission supporting the overall project, however, highlighting concerns in relation to the impacts on their site and operations. The issues raised include concerns that the Proposed Scheme has not given consideration to the future expansion of the clinic, the loss of on-site car-parking (which will affect their operations), the proposed relocation of the access arrangements for the clinic, the loss of trees from the site causing adverse visual impact, the land take from the clinic property being excessive with the realignment

placing too much of a burden on lands on the south side of rock road, the application documentation references to outdated plans (the 2016 DLR County Plan), impacts on utilities and services, and concerns in relation to access to services during construction. In this regard the Board a should note that the consideration of this application in this report has been carried out under all the current relevant development plans. Having reviewed the application documentation I am satisfied that the design of the Proposed Scheme at this location minimises the land take requirements from the Clinic and furthermore that it is appropriate for the land take to accommodate route expansion on this (southern) side of the road due to the proximity of individual residential dwellings and the difference in levels on the opposite side of the road. To widen the route corridor to the north would, in my opinion, give rise to significant adverse impacts on a large number of residential dwellings when considered under the range of environmental criteria. Furthermore, in relation to the extent of the land take I note that the widths of the cycle tacks along this frontage have been reduced to 1.5m, (from the preferred 2m) to minimise land take and impacts. In terms of a loss in car parking the clinic states that there will be a loss of approximately 40 no. spaces, while the applicant maintains the loss is closer to approximately 14 no. spaces following construction while acknowledging that approximately 20 no. spaces will be affected by the temporary land take during construction. In this regard, I note that there is a significant car park in place on the clinic grounds and I do not consider the loss of car parking to be significant given the overall wider benefits arising from the Proposed Scheme in terms of improved bus, walking, and cycling infrastructure and the ability for the Clinic to organise and manage its car parking requirements. I note that there will be inconvenience during construction, but the application documentation provides assurances that access will be maintained throughout, and that services and utilities connections and diversions will be managed appropriately. I note that the land take associated with the works will necessitate the removal of trees, however, new street tree planting is also proposed at this location which will serve to mitigate visual impacts as they mature. A new retaining wall structure is required along the frontage of the Glenalla building within the clinic grounds. In their submission the clinic has noted that these works will impact on parking and operations at this location. I note that there is a larger temporary land take from the front of the Glenalla building and that this is necessary

in order to facilitate the construction requirements of the retaining wall and on completion parking will continue to be facilitated at this location. There are two consented applications for the provision of alternative entrances to Blackrock clinic, (PI. Ref.'s D21A/0627/ABP-312908-22 and D22A/0490, granted permission in July 2023 and October 2022 respectively refer). The clinic has raised concerns that the Proposed Scheme has not been designed in accordance with these new consents (which both refer to closing the existing Blackrock entrance and relocating it to a point further east along its frontage opposite the entrance to Phoenix Terrace). In relation to this issue, I note that (a) neither entrance had been permitted prior to lodgement of the current application, (b) neither have yet been constructed, (c) the current applicant has no control over whether or when a revised junction arrangement will be implemented by the clinic, and (d) that both planning applications have submissions on the file stating that the NTA have no objection to the proposals and that the revised junction arrangements are compatible with the Proposed Scheme. Accordingly, having regard to the above, on balance, I consider that the Proposed Scheme is appropriate at this location and that while impacts will arise on the Blackrock Clinic, I am satisfied that the design and construction measures provided for will mitigate against significant construction and operational impacts.

8.7.6. Blackrock College has also made submissions raising concerns in relation to the potential impacts arising from the Proposed Scheme on its access and operations. The Board should note I discuss with the consideration of impact on the residential amenity of the Gate Lodge at 8.12.6 below, works along its site frontage and at its gate at 8.9.11 below. The submission lodged raises concerns in relation to maintenance of access during construction, the proposed arrangement at Willow Park school gates entrance (which they argue should be retained as it currently is), a yellow box should be instigated/retained at the entrance junction and they request additional detail in relation to the (RPS) gate works. In relation to the above I note that the applicant has responded by stating that the Proposed Scheme will not alter any internal on-site traffic arrangements on the school grounds, however, the two exit lanes at the Willow Park gate are proposed to be reduced to one to improve cyclist and pedestrian safety at this location which will be provided with raised table treatment. The applicant states that the provision of a yellow box in advance of and

through the gate will be considered at detailed design stage, and that the methodologies for works to heritage features (RPS Blackrock gate) are set out in section 16.5.1.5 of the EIAR. I note the methodology for the works at the RPS gates and along the railings and plinth at the site frontage of Blackrock College and I am satisfied that these are sufficient provided additional liaison and agreement is reached with the Planning Authority in advance of works. This will be subject to a suitable condition. I am also satisfied that continued liaison with the College will be held and that access will be maintained throughout the construction process. I consider that the provision of a yellow box at the Willow Park school would be appropriate and of merit and will attach an appropriate condition in this regard. Otherwise I am satisfied that the Proposed Scheme will improve accessibility to the school by sustainable modes of transport and that the entrance arrangements proposed are in the best interests of traffic, cyclist, and pedestrian safety. Accordingly, I consider that the Proposed Scheme will not give rise to significant adverse impacts at this location.

- 8.7.7. In relation to services to properties (i.e. gas, electricity, water etc.) I note that the application documentation includes commitments to engage and liaise with all parties and coordinate with all stakeholders to manage construction to minimise disruption and all possible precautions will be taken to avoid unplanned interruptions of any services. The Proposed Scheme has been designed to minimise interventions with utilities, however, where diversions are necessary, I am satisfied that appropriate precautions are provided for and that significant adverse impacts will not arise in this regard.
- 8.7.8. During the operational phase I note that there will be changes in traffic patterns and while car parking will continue to be provided along the route the number of available spaces will be reduced. The public transport, pedestrian and cycle track improvements will, in my opinion, increase the attractiveness of more sustainable modes of travel and will therefore reduce demand for car parking over time. Accordingly, I consider that the Proposed Development will not give rise to significant adverse impacts on access to properties along the route.

8.8. Impacts on Built Heritage.

- 8.8.1. Several submissions have raised concerns in relation to the potential adverse impact that the Proposed Scheme could have on various elements of the built heritage. I have reviewed these impacts and considerations in detail in Section 9.11 (Archaeology, Cultural and Architectural Heritage) of this report below, setting out in detail the background to the areas through which the Proposed Scheme is located, identifying the elements of architectural and heritage merit along the route, discussing the potential impacts on items of architectural heritage including the Record of Protected Structures (RPS), Architectural Conservation Areas (ACAs), development plan conservation areas, NIAH structures, designed landscapes and other structures of architectural interest including street furniture. I have set out detailed conclusions in relation to the potential impacts on built heritage in section 9.11.12, and the discussion and detail set out in Section 9.12.19 (Landscape/Townscape and Visual) is also of relevance in relation to this matter as it also considers impact on streetscape.
- 8.8.2. I do not intend to repeat the description or consideration carried out in sections 9.11 or 9.12 here, however, I do note that the Proposed Scheme predominantly refers to works along and within an existing transport corridor and as such the majority of works will occur at street level to the carriageways and footpaths, with the notable exceptions of boundary treatment setbacks, signage provision, and bus shelters.
- 8.8.3. In general, I do not consider that the Proposed Scheme will give rise to significant adverse impacts on items of architectural heritage, the works being carried out to carriageways and at street level will not in my opinion impact the character of any of the areas through which the route extends as the nature of the route will remain consistent with that currently in place, i.e. it will remain a significant transport corridor which will facilitate vehicular, pedestrian and cyclist movements. I do note that the Proposed Scheme runs through areas that have significant heritage value in and of themselves, and passes by or near structures and buildings that are of architectural or heritage merit.
- 8.8.4. At Fitzwilliam Street Lower, I consider that the Proposed Scheme does merit changing in the interests of preserving the character of this Georgian Streetscape. The Proposed Scheme (while not zoned itself) is located in a red-hatched

conservation area in the DCC Development Plan, with a high concentration of RPS buildings on each side which are zoned as a "Georgian Conservation Area - Z8" along both sides. For these reasons (and considering the width of the footpaths in place) and as set out previously above (and discussed in sections 9.11.11 and 9.12.19 below) I consider that the proposed bus shelter and new street trees along Fitzwilliam Street Lower should be omitted from the Proposed Scheme in the interests of preserving the established character of this area and minimising visual impact.

- 8.8.5. The Proposed Scheme continues to run through a red-hatched conservation area along Baggot Street Lower and Upper and again there is a high concentration of protected structures in place. At this location, however, there is more of a mix in development forms, the footpaths are wider and there are mature street trees present. Accordingly, I consider that the Proposed Development, its associated planting, and bus shelters can be accommodated without adverse visual or heritage impacts, however, in order to do so and minimise impacts in so far as is practicable I consider it appropriate to omit advertising panels from bus shelters. In this regard, the Board should note and as discussed previously above I do not agree with the DCC recommendation to omit bus shelters from the Baggot Street area.
- 8.8.6. Several submissions have been made in relation to the proposed amendments to 1-11 Pembroke Road (a terrace of 6 houses that share a common driveway and front lawn area with mature trees and all of which are Protected Structures (DCC RPS 6552, 6554, 6556, 6558, 6560, and 6562). At this location the Proposed Scheme is proposing to close off one of the two existing vehicular gates to the terrace to all but pedestrian/cyclist traffic and provide a new vehicular access onto Waterloo Road. These works are necessitated by the need to ensure functionality of the proposed bus gate. Permanent land take is not required and the amendments will be to the functionality of the existing gates while providing an additional vehicular gate where at present there is only a pedestrian gate. The works proposed will re-purpose existing railings and plinth, with appropriate recording, monitoring and oversight of the works being provided throughout. Appendix A16.3 of the submitted EIAR contains the "Methodology for Works Affecting Sensitive and Historic Fabric", which details the general approach to such works and activities.

- 8.8.7. It is acknowledged that the proposed works will have an impact on these structures and the location, however, I do not consider that the impact will be significant, the character of the protected structures will be retained as will their grounds and the existing entrances (albeit one will be restricted from vehicular use) and the Proposed Scheme incorporates appropriate mitigatory provisions in terms of oversight, monitoring, and recording of works and features.
- 8.8.8. I note that some confusion has arisen from third parties due to the presentation of the landscape arrangement drawings for the attendant grounds of 1-11 Pembroke Road, as these only shows trees which have the potential to be impacted. In this regard some third parties have raised concerns that tree felling will be carried out within the site of 1-11 Pembroke Road, this is not the case. It is not intended for any of the mature trees on site to be felled and the applicant has clarified and confirmed this matter in their response to submissions. Accordingly the setting of these protected structures and the terrace as a whole will be maintained.
- 8.8.9. Similar to the above, alterations are also required to the boundaries and vehicular access to the former Pembroke Town Hall (now CDETB building). Under the Proposed Scheme it is proposed to alter the means of vehicular access and curtilage of this building by restricting the existing access from vehicular use and relocating it to the Anglesea Road. These works are necessitated to ensure the efficient use and safety at the junction between Merrion Road and Anglesea roads. The works are proposed to be overseen by an appropriately qualified architectural conservation specialist and will involve the existing railings being removed and adapted to form gates to match the existent boundary treatment, similarly existing kerbing will be reused within the landscaping proposals as appropriate and historic fabric not subject to direct works will be protected.
- 8.8.10. The Proposed Scheme also requires the existing railings to be set back at the Clayton Hotel on Merrion Road (Former Masonic School) which is on the RPS. The set back of these railings is proposed to be approximately 2.5m over a distance of approximately 58m. This set back is required in order to accommodate the required infrastructure while also being able to retain three significant mature trees. I note a submission from the affected landowners of the site has been lodged stating that the priority at this location should be the preservation of the existing boundaries of the site of this protected structure and not the preservation of trees, however, I consider

that the works can be carried out subject to suitable use, repurposing and storage of extant materials while still retaining the character and setting of the protected structure. All works will be subject to suitable oversight and monitoring, and the preservation of the mature trees at this location is of merit in terms of maintaining the streetscape character and preserving visual amenities, accordingly I am satisfied that the works can be carried out without significant adverse impact on the protected structure and are appropriate at this location.

- 8.8.11. Similar to the above the Proposed Scheme involves alterations to heritage gates (Blackrock College [DLR RPS 99], gate at St. Marys Nursing home and the Bloomfield demesne gate). I describe these features and the proposed works and associated mitigation measures in section 9.11 below and my consideration of impacts in section 9.11.12.2 below. I note that all works involved will include the recording of the existing features in position, recording of all elements, their careful removal and storage prior to reinstatement. I also note that the Proposed Scheme requires the set back of approximately 180m of the front railings of Blackrock College to accommodate road widening required to facilitate the works. This boundary is of heritage merit and will be treated in the same way by recording and relocating the existing railings and plinth along the new boundary. This setback is necessitated as widening cannot be carried out on the opposite side of the route due to the proximity of a large number of residential and other properties which front directly onto the footpath, hence any route widening or expansion of infrastructure in that direction would have wide ranging and very significant adverse impacts on those properties. I, therefore, consider the works along the Blackrock College frontage to be appropriate, justified, and necessary in order to ensure the delivery of improved public transport, cycling and pedestrian infrastructure at this location. For completeness, I also consider the works proposed to the St. Marys Nursing Home and Bloomfield Demense gates (which is to be relocated) as necessary and appropriate and am satisfied (as set out in Section 9.11.12.2) for these to be carried out as proposed with the implementation of the mitigation measures set out within the EIAR.
- 8.8.12. I have previously set out my consideration of the impacts from the Proposed Scheme on no.'s 151 and 153 Merrion Road above, other protected structures directly impacted by the Proposed Scheme include MacCartney Bridge, and Lois an Uisce,

(Blackrock). I do not consider that these structures will be adversely affected due to the nature of the works proposed and their settings. I note that elsewhere the Proposed Scheme runs along and adjacent to a number of Protected Structures and heritage features, however, I do not consider that these will be impacted by the works proposed to the street/route and further discussion is provided in relation to these in Section 9.11.9 below. I note that DCC raise concerns in relation to the size of the vehicular gates being proposed at no.'s 153 as being inappropriate. In this regard I note that there is existing car parking space at this location and a vehicular entrance and that the access arrangements are in the interests of road safety and ensuring access. I also note that the City plan has been updated since DCC made their submission, and accordingly I am satisfied that the access gates at this location are appropriate subject to final design agreement with the planning authority.

8.8.13. The relocation the kiosk at Pembroke Road junction has also been raised as a concern in submissions. It is proposed to relocate this structure currently located on a large traffic island in the middle of the junction to a location 10m to the southeast so that it will be positioned centrally within a landscaped amenity area formed between the two arms of Pembroke Road at its junction with Lansdowne and Northumberland Roads. The kiosk will remain fully serviced and connected to utilities. The relocation is necessitated by the redesign of the junction which involves the removal of dedicated left turning filter lanes and the provision of 5 vehicular lanes on the eastern arm of Pembroke Road (2 bus lanes, 2 general traffic lanes in- and out-bound as well as a right turning inbound filter lane into Lansdowne Road). The kiosk is not a protected structure but both it and the railings within the current traffic island are considered heritage features and accordingly all works in relation to same will be carried out in accordance with Appendix 16.3 of the submitted EIAR, and materials and structures will be reused at their new locations. The relocation of this structure will therefore retain its character and it will be set within a significant area of improved public realm forming a pocket amenity park at this location. Accordingly I note that while the Proposed Scheme will impact on the kiosk through its relocation, it will still occupy this corner of the Pembroke Road junction and will be set within a landscaped area. On balance, having regard to the overall need to improve sustainable transport infrastructure at this location I consider that the proposed

works are justified, appropriate and will maintain the unique character of this structure.

- 8.8.14. For clarity, in relation to potential impacts on the built environment, I consider that the design of the Proposed Scheme has given adequate consideration to all elements of heritage value throughout the design process. I consider that the need for cantilevered signage is appropriate as proposed and that it will not detract from the heritage value of structures or features in the vicinity or the wider streetscape. I am satisfied that the approach set out in the application documentation in relation to the treatment, preservation and reuse of heritage features (including heritage lampposts, post boxes, jostle stones, cobbles, granite kerbing etc.) throughout the Proposed Scheme (as set out in the EIAR and shown on the landscaping general arrangement drawings) is appropriate, however, as set out in section 9.11.12 below I consider that the 3 no. concrete benches along the boundary of the former swiftcall centre at Merrion Road should also be preserved and incorporated into the new boundaries.
- 8.8.15. I note in relation to the carrying out of works to and in the vicinity of heritage features that both DLRCC and DCC generally consider that the mitigation and methodologies set out set out within the EIAR to be appropriate, however, it is requested that a condition be imposed requiring engagement and agreement with the local authority on the final works methodologies at the detailed design stage, the Applicant has stated that the inclusion of a specific condition is not required in this regard as liaison will occur as a matter of course. Having regard to the nature and scale of the project, and the fact that the Local Authorities have specialist conservation and architectural sections with widespread and detailed local expertise and considering their development management and planning functions, I consider it appropriate that a condition be applied in relation to heritage features and works which will directly affect them in order to ensure the efficacy of the recording, preservation, protection, and reuse methodologies.

8.9. Visual Impact/Townscape

8.9.1. In general I am satisfied that the overall design of the Proposed Scheme is appropriate and that the works which are predominantly focused along the transport

corridor will not give rise to adverse impacts. The infrastructure proposed will alter the streetscape, however, I do not consider that the impacts will negatively impact the amenities of the areas through which the project runs through. Landscaping and planting is provided at suitable locations throughout and heritage materials are to be reused and retained where practicable.

- 8.9.2. In relation to the operational period, I note that the initial impact of the loss of mature trees will be mitigated somewhat as the new landscaping provisions along the scheme matures and the project will become assimilated into this built environment. Some third-party submissions have raised concerns that the operational phase of the project will give rise to additional impacts in relation to the numbers and potential stacking/accumulation of buses at locations along the route and the effect that additional bus activities will have on amenities. I have discussed this in the EIA in my conclusions under Section 9.12 of this report below. I consider that the Proposed Scheme at its core has been designed to minimise and reduce congestion and improve the reliability, efficiency, and journey times of buses. Accordingly the project will result in better management of buses along the route (due to the priority measures being provided along 100% of the route) and less congestion, I consider that this will ensure that the accumulation of buses at any specific locations along the route or at its terminus does not occur. For completeness I consider that the increased cycling and pedestrian activity along the route facilitated by the Proposed Scheme, will have a beneficial impact on the townscape/visual impacts during the operational period as it will lead to increased human scale activities along and throughout the route.
- 8.9.3. Accordingly, I am satisfied that while the Proposed Scheme will create a change to the town/streetscape and visual amenities along its route, that the overall impacts arising will generally be neutral in the short term turning to beneficial overall as the landscaping and planting matures and congestion levels reduce.

8.10. Biodiversity

8.10.1. Some third-party submissions have raised concerns in relation to Biodiversity, and the majority of these refer to the loss of trees along the route as being of significant concern. Biodiversity and all related matters have been comprehensively considered in Section 9.8 of this report (Biodiversity Section of the EIA) with further relevant assessments and discussion in Sections 9.9 (Water), and 9.6 (Air and Climate). Furthermore, the potential for impacts to arise on European designated sites and species is comprehensively considered in Section 10 which sets out the Appropriate Assessment of the project.

- 8.10.2. Potential impacts on biodiversity could arise from vegetation and tree removal; construction and earthworks; drainage and additional silt mobilisation and/or pollutant release into drainage networks; lighting during construction and operation; noise and vibration; and through facilitating the spread of invasive species.
- 8.10.3. I note that there are two minor overlaps between the Proposed Scheme and European designated sites. These is an overlap of 4.3m² at Booterstown Marsh with the South Dublin Bay and Tolka Estuary SPA, and an overlap of 2.7m² with the South Dublin Bay SAC at Merrion Gates. In relation to these I note that they arise along the boundary of the designations at locations which are already occupied by hardcore material, i.e. where they occur the habitats in place do not correspond to sensitive QI habitats nor are they areas on which any protected species rely. Under the Proposed Scheme the existing hardstanding areas will be replaced with new road surfacing (i.e. replacing like with like) and as such integrity and impact on the designations is avoided.
- 8.10.4. The DAU comments in relation to nature conservation notes that the application documentation (NIS, CEMP, Surface Water Management Plan, and Environment Incidence Response Plan) contains a range of appropriate measures to prevent pollution and effects arising and that the implementation of the stated measures should successfully avoid detrimental effects on the South Dublin Bay and River Tolka Estuary SPA and South Dublin Bay SAC. The implementation of mitigation measures set out includes a comprehensive suite of measures to avoid mobilisation of pollutants and sediment during construction and the implementation of these measures will be confirmed by way of condition. Issues regarding the potential impacts on Natura 2000 Sites are dealt with in the AA Section of my report.
- 8.10.5. The loss of trees along the route represents a significant intervention in relation to biodiversity. I note that the trees to be lost are not subject to protection or ecological designations, however, they do contribute to biodiversity as well as the amenities of

the areas in which they occur. The application documentation includes an Arboricultural Impact Assessment which classifies all trees and groups of trees that have the potential to be impacted and highlights the locations from which trees are proposed to be removed. Street trees are proposed to be removed at various locations throughout the route to accommodate works, however, the areas which could be considered to be most affected by tree loss include:

- Blackrock Park opposite Ben Inagh Park junction. Tree removal here arises from the need to accommodate a retaining wall structure along the boundary of the Park to facilitate route widening.
- From the entrance to Blackrock Clinic along the frontage of Blackrock College to its entrance gates on the southern side of the Rock Road. Tree removal at this location is required to accommodate route widening.
- Along the northern (coastal) side of the Merrion Road From Trimleston Avenue to the Maldron Hotel. Tree removal necessitated by route widening and boundary set back.
- Nutley Lane, tree removal is necessitated from the frontage of RTE, EPGSC, and SVUH to accommodate route widening and boundary setbacks.
- Intermittent street trees are to be omitted from the Merrion Road between the Strand Road and Ballsbridge. The Board should note that along this stretch that not all trees are to be removed and that a significant portion will be retained, however, where trees are to be removed this is to accommodate the infrastructure requirements. Furthermore, I note that between Ailesbury Road and Shrewsbury Road junctions the Proposed Scheme provides for a threecarriageway design solution to minimise impacts.
- At the Herbert Park junction it is proposed to remove 6 no. trees, however, as set out previously above I consider it appropriate to retain these trees and redesign/realign this junction slightly.
- 8.10.6. Overall the Proposed Scheme will result in the permanent loss of 4,157m of treeline incorporating 329 no. trees, and 1,040m of hedgerows as well as the temporary loss of c. 242m of treeline and 60m of hedgerow. In mitigation of this loss it is proposed to plant 349 new street trees and 558m of hedgerows. (The Board should note that the

Proposed Scheme also incorporates the provision of 1,241m² of species rich grassland, 4,990m² of ornamental planting, 176m² of native planting and 2,928m² of amenity grassland planting.) In view of my proposed alterations to the Proposed Scheme (i.e. the omission of the new treeline proposed on Fitzwilliam Street Lower [11 no. trees] and the revision to the Herbert Park junction to retain 6 no. trees), the balance between tree removal and new planting would be 323 trees lost, against 338 being planted. While the loss of street trees is regrettable, I am satisfied that the new planting proposed (with my recommended amendments) will mitigate the loss, in combination with the other landscaping proposals.

- 8.10.7. Furthermore, I note that none of the trees proposed to be removed provide potential to accommodate bat roosts, and that the range of mitigation measures being incorporated within the CEMP (which includes restricting of felling during the bird nesting season [March to August inclusive], unless a specific need arises in which case ecological review of the affected trees will be carried out in advance of works) will provide sufficient mitigation to protect species that occur in the area. The application also includes an Invasive Species Management Plan which will ensure adverse impacts from their spread will not arise.
- 8.10.8. In conclusion on biodiversity (and as set out in Sections 9.8, and 10 below) there will be come unavoidable impacts arising from the Proposed Scheme (such as the loss of mature trees). I note that all works are located within the urban environment and accordingly all local species will be habituated to human activities, construction, and general disturbance. The additional planting proposed will mitigate against the loss of trees along the route and the comprehensive suite of mitigation measures set out in the application documentation will ensure that the potential for impacts to arise will be minimised. The Proposed Scheme also incorporates SuDs measures within its drainage schemes and generally the drainage measures proposed will not give rise to adverse impact on receiving waters. In this regard I note that both Local Authorities have requested that drainage measures should satisfy their requirements, and I consider it appropriate to ensure this through the provision of an appropriate condition.

8.11. Residential Amenity

- 8.11.1. A project of the nature proposed will give rise to a wide range of impacts that could be considered to impact on residential amenity. The majority of such impacts on residential amenities will arise during the construction phase and could arise from noise, dust, construction traffic, temporary traffic diversions, impact on services/utilities, and air quality, all of these matters have been considered in detail in the relevant EIA sections of this report below. I am satisfied on the basis of the comprehensive suite of mitigation measures proposed throughout the submitted EIAR (including CEMP), and NIS that construction impacts will be minimised and managed insofar as is practicable and furthermore that they will be temporary in nature where they do arise.
- 8.11.2. I consider that the operational phase impacts that will arise for residential amenities will generally be positive through the provision of improved public transport infrastructure along the route, reductions in congestion, and the provision of increased connectivity throughout. The provision of additional safer cycling infrastructure and new pedestrian facilities including increased pedestrian crossings and public realm improvements will also give rise to improved residential amenities.
- 8.11.3. Where submissions have been made in relation to residential amenity they frequently refer to the residential amenities of general areas through which the Proposed Scheme will run. In this regard I note the previous discussions set out above in relation to Nutley Lane and Baggot Street/Pembroke Road areas. In relation to these areas in the interests of completeness I note that while the Proposed Scheme will result in changes that I do not consider that these changes give rise to adverse impacts on residential amenity. The improved public transport, cycling and pedestrian infrastructure being proposed will be of benefit to all and the noise and air quality assessments set out in sections 9.6 and 9.7 below demonstrate that impacts will be negligible.
- 8.11.4. In relation to residential properties that will have their general means of access altered I have previously discussed the traffic restriction at Georges Avenue. I consider that this restriction will present an inconvenience to residents in the area, but I do not consider this impact to be significant. This restriction is necessary to reduce the adverse impact on residential amenity that would arise in its absence due

to noise and air quality impacts from rat-running vehicles. Similarly, I note that a oneway system is proposed at Seafort Parade, there is already a one-way system in place at this location, however, under the Proposed Scheme its direction would be reversed. The affected residential units will continue to enjoy access onto the Rock Road and accordingly I consider that this is not a significant impact. Other traffic controls proposed, such as turning restrictions at Pembroke/Herbert Park and Clyde lane will not adversely affect residential amenities.

- 8.11.5. I consider that the potential for the most significant impacts to arise on residential amenities along the route will be at properties from which permanent or temporary acquisition of land is required, or those which will have their means of access or boundary/access arrangements altered. I note from the outset that land take (temporary or permanent) from residential properties has been kept to a minimum throughout the Proposed Scheme and this approach is to be welcomed in terms of considering impacts on residential amenities. The residential properties from which land take is required to facilitate the Proposed Scheme are discussed below.
 - At Lios an Uisce (DLR RPS 107), Rock Road, (adjacent to Blackrock Park), permanent (15.6m²) and temporary (96.8m²) land take is proposed to facilitate route widening and tying in with new retaining wall structure alongside Blackrock Park. The affected area seems to serve as a secondary/side access to the dwelling and garden, with the primary access being through the main gate. The dwelling is set within its own large grounds and the works will not affect access nor the ability to park vehicles on site. I do note that there is potential for inconvenience for the residents arising from standard construction practices, however, the CEMP contains appropriate mitigation, and existing gate, rail and plinth boundaries will be set back in accordance with EIAR Appendix A16.3 'Methodology for Works Affecting Sensitive and Historic Fabric'. The works therefore will not affect the setting of the dwelling and while there will be some sort-term inconvenience during the construction period I do not consider that the residential amenity of this property will be significantly affected.
 - Entrance to Castledawson/Sion Hill residential development. The Proposed Scheme includes a temporary land take as part of the CPO process over the entrance to this residential scheme. A submission has been lodged raising

concerns that the land take is unnecessary, and the works will create a traffic hazard as the entranced is stated to be hazardous already. Concern has also been raised that the works proposed will require more lands than set out in the CPO mapping, however, I consider that any clarification in this regard would be a civil matter and the applicant has stated that they are satisfied that the relevant lands have been included in full within the CPO. I consider that the works at this location will be temporary in nature and predominantly focused on tying in the existing entrance to the Proposed scheme, provision of a raised table and landscaping. I note that there will be temporary inconvenience to residents during the construction phase, however, access and egress will be maintained throughout, and I do not consider that residential amenities will be affected.

- The temporary and permanent land take required at the Blackrock College gates are proximate to the gate lodge which is a permanent place of residence and Blackrock College has included a concern in their submission in relation to the maintenance of access to this residential unit. In relation to this issue I note that the most proximate land take to this unit is temporary to facilitate construction activities at the Blackrock College Gate and front railings. In relation to construction at this location access and egress will be maintained throughout as committed to in the application documentation. Once complete I do not consider that the works carried out to the Blackrock College gate and frontage railings will affect the residential amenity of this dwelling.
- Permanent land take is required at the entrance to Willow Terrace to facilitate works to tie in the access to the new infrastructure (the existing gates at the entrance will not be affected). I do not consider that the works or land take will give rise to impacts on residential amenity beyond those associated with the standard construction which will incorporate mitigation measures and commitment to maintaining access.
- At the entrance to Elmpark Green Development (a mixed-use commercial/office and residential development), permanent land take is proposed at the entrance to ensure that access road, signage, and traffic controls can be tied into the new infrastructure. One submission has been

received from a resident raising general concern in relation to the application/CPO process. I do not consider that the works or land take will give rise to impacts on residential amenity beyond the standard construction mitigation measures and commitment to maintaining access.

- Temporary and permanent land take is also required from the frontage of Elm Court apartments however, both only extend over the grassed area between the front boundary wall of the apartments to the public footpath. Accordingly the existing front boundary of the apartments will not be impacted, and the existing entrance shall be tied into the proposed infrastructure. I do not consider that the works or land take will give rise to impacts on residential amenity beyond the standard construction mitigation measures and commitment to maintaining access.
- No's 157 to 151 Merrion Road, permanent and temporary land take is required from the front gardens of these properties. I have described the proposed works and land take requirements for these properties previously in Section 8.6.43 above. Submissions have been received from the owners/occupiers of no.'s 153, 155 and 157 in relation to the impacts on their properties, with the issues raised including, that the land take required is disproportionate, safety risks from construction, impact on period walls/front boundaries/hedging, and property devaluation, as well as concern in relation to loss of on-site car parking. All these properties will lose a portion of their front gardens permanently and have their front boundaries set back from between 0.1 - 0.8m. Where any of these dwellings have on-site parking available this will be retained, and while the Proposed Scheme will result in an impact to these properties, I do not consider that the impact will be of a significant scale in terms of impacting residential amenities. Access will be maintained during construction albeit I acknowledge that a larger portion of the lands will be required temporarily to accommodate the construction works and that this will cause temporary inconvenience for the residents. However, the works are justified in the context of being necessary to accommodate the desired public transport priority, walking and cycling infrastructure at this location as well as avoiding and reducing congestion.

- Permanent and temporary land acquisition is required along the frontage of 143 Merrion Road where permission has been granted for an apartment development. A submission has been received from the developer seeking additional clarity and liaison with the NTA on the extent of the proposed land take, clarifying that service areas and fire escape areas must be kept clear / accessible, retention of planned amenity space, seeking assurance that lighting will not impact the permitted development and provision of consistent landscaping. The applicant responded by clarifying that further liaison will be carried out in advance of works, services and access will be maintained, new lighting will be designed sensitively, and landscaping carried out/replaced on a like for like basis. As the works at this location are largely at street level and will tie the frontage of the permitted development into the new infrastructure, I am satisfied that no adverse impacts will arise on the future residential amenities of the residents at this location.
- At No. 85 Merrion Road and 12 Merrion View Avenue, temporary and permanent land take is required from site frontage (garden and driveway no. 85), and side garden/rear access (No. 12 and rest of Merrion View Avenue). The boundaries at this location are proposed to be set back to accommodate route widening. Heritage pillars adjacent to no. 12 will not be altered. Temporary land take at no. 85 will be 52 m² and permanent land take 32.9m². The dwelling will still retain the ability to provide on-site vehicle parking. The temporary land take to the side of no. 12, is 135.6m², and the permanent is 12.9m². The temporary land takes will give rise to impact and access inconvenience during the construction period which will be subject to the standard management and access arrangements previously set out above, however, on completion I consider that the permanent boundary setbacks will not give rise to significant impacts on residential amenity given the boundaries will be replaced and the size of the residential sites involved.
- No. 118 Stillorgan Road (at the junction between Nutley Lane and Stillorgan Road), will be subject to a temporary land take to facilitate works to close the vehicular access to the dwelling directly off the Stillorgan Road junction and the CPO also acquires the private rights at this location. The resident of this property has lodged a submission in relation to the project, stating that she

wishes to retain this access which has operated safely for decades and is concerned that using the alternative access for entry and exist will cause a traffic hazard. This dwelling will retain a vehicular entrance directly off the Nutley Lane and while the works will inconvenience and impact on the property, I do not consider that residential amenities will be significantly affected, and on balance having regard to the overall need and justification of the overall project to improve bus, cycling and pedestrian infrastructure I do not consider it is warranted to alter the proposed design at this location.

- No. 31-33 Merrion Road, residential development has a temporary land take at the access point which will facilitate works to provide a raised table and tie in the existing access with the new infrastructure. The management company has made a submission seeking further engagement and to agree the use of materials at this location. I consider that the Proposed Scheme will not impact on the residential amenities of these residential properties during the operational phase and construction will be managed to minimise impact and maintain access.
- In relation to the works at 1-11 Pembroke road, these have been discussed previously above, temporary land acquisition and private rights (access) will be restricted/interfered with. For clarity, these works will alter access arrangements, however, the character of this terrace will not be affected and two vehicular access points will remain. Apart from the temporary construction phase inconveniences I do not consider that the Proposed Scheme will significantly affect the residential amenities of these properties.
- Phoenix Terrace (a terrace of six 19th century houses facing onto Blackrock Park leading into a more modern residential development – Marine View), does not experience land take from any of the individual properties, however, a submission has been received from the residents of no. 1 Phoenix Terrace which raises concerns in relation to the maintenance of the extent of the communal parking treatment along the terrace, the maintenance of rightturning movements off Rock Road, and the extent of the set back of the wall along Rock Road at Blackrock Park. The applicant has responded to this by confirming that existing car parking will not be impacted, confirming the wall opposite no. 1 will not be moved and that right turning movements from the

Rock Road will be maintained. While noting that temporary inconvenience will arise during construction, access will be maintained throughout and on completion of the works I am satisfied that the Proposed Scheme will not give rise to adverse impacts on residential amenity at this location.

- 8.11.6. I have also considered the potential for impacts to arise on general residential areas most proximate to the route of the Proposed Scheme. In this regard I note that residential development occurs immediately adjacent (i.e., fronting onto) the route at various locations throughout the length of the Proposed Scheme, most notably perhaps along the Merrion Road, Nutley Lane, Pembroke Road, Baggot Street Upper and Fitzwilliam Street. Each of these areas have their own character and established residential amenities which are related to, and informed by, their relationship with (and proximity to) the street and its activities. I am satisfied that the Proposed Scheme has taken all reasonable precautions to protect residential amenities of these areas and dwellings insofar as is practicable while still achieving the overall objective of providing much-needed improved infrastructure for public and sustainable modes of transport throughout the route. I do not consider that the Proposed Scheme which essentially refurbishes, upgrades, improves and renews the existing transport infrastructure in place alters the overall streetscape character of the roads and streets that it runs along and accordingly while I acknowledge that changes will occur, I do not consider that residential amenities will be adversely affected. In consideration of this matter I note that access to properties and services/utilities are to be managed throughout the construction phase to minimise adverse effects and that construction practices will be strictly controlled and mitigated through the provisions of the CEMP.
- 8.11.7. Overall I consider that the Proposed Scheme will greatly improve connectivity, public transport, cycling and pedestrian infrastructure throughout and as such it will improve the overall amenity and attractiveness of properties along its length. In this regard I note that several submissions have raised concerns that the Proposed Scheme will adversely affect property values. As the Scheme has been designed to reduce congestion, improve the transportation network, and sensitively improve the public realm it will, in my opinion, contribute to and enhance the amenities of the areas in which it is situated. While I note that land take will have impacts on some individual residential properties, I note that these have been kept to a minimum and lands are

only proposed to be acquired where necessary. Accordingly, I am satisfied that the mitigation measures and design proposed will ensure significant adverse impacts on residential amenity and property values will not arise.

8.12. Consultation

- 8.12.1. Several third parties have raised concerns in relation to the public consultation process prior to and during the application process. In this regard I note that the majority of submissions acknowledge engagement with the process, however, dissatisfaction is expressed in relation to the outcome and/or the timing of changes to the Proposed Scheme, submissions also refer to concerns in relation to the provisions of Aarhaus and the Kazakhstan advice (which relates to the holding of public hearings) and the lack of an oral hearing being made in relation to this proposal.
- 8.12.2. In relation to the consultation undertaken by the applicant prior to the Proposed Scheme being lodged with An Bord Pleanála, I note the following:
 - First phase public consultations in relation to the all the overall BusConnects Core Bus Corridors were held in November 2018 to March 2019, January to April 2019, and February to May 2019. These consultations related to all the BusConnects routes with the Proposed Scheme consultations being in the Feb-May 2019 batch, (at this stage the Proposed Scheme was in two parts – UCD Ballsbridge to City Centre and Blackrock to Merrion). These consultations constituted public information and community forum events at the Clayton Burlington Hotel, and a public information event at the Gresham Hotel. The UCD Ballsbridge route and Blackrock to Merrion Route attracted 773 and 84 submissions respectively.
 - Following these initial consultations, a draft Preferred Route Option (PRO) was prepared and a second round of public consultation commenced which ran from the 4th March 2020 to 17th April 2020. This phase of consultation was impacted by the COVID-19 restrictions, however, all information remained available via website, and meetings and community forums were held prior to restrictions. Phone/online discussions were held with landowners. The UCD

Ballsbridge to City Centre Route and the Blackrock to Merrion Route attracted 34 no. and 31 no. submissions respectively in this phase

- The third round of public consultations ran from November to December 2020 and was also affected by COVID restrictions, so virtual consultation rooms for each of the BusConnects corridors were set up with and further submissions invited, with affected landowner meetings held virtually or by phone. The UCD Ballsbridge to City Centre Route and Blackrock to Merrion Route attracted a total of 292 and 201 submissions respectively as part of this round of consultations.
- 8.12.3. In relation to the above I refer the Board to the submitted EIAR, and the 'Preferred Route Option Report', in which the applicant reviews the range of submissions made in relation to each of the rounds of consultation and reviews how the various options were considered to inform the emerging preferred route, preferred route and the overall design of the Proposed Scheme.
- 8.12.4. I note that several third-party submissions have raised dissatisfaction with the public consultation process in terms of the final outcome and timing of changes to what has ultimately become the Proposed Scheme while noting that a public engagement process has been undertaken. In this regard I can understand individuals and organisations being disappointed in the outcome of the design process in relation to the final route selection and proposed local design measures, however, I also consider that a significant level of public engagement and dissemination of information has been undertaken in advance of the current application process and I am satisfied that the public have been afforded every opportunity to engage with the overall process of the design of the scheme from the earliest opportunity.
- 8.12.5. The statutory process has made all the application documentation available for public review as required in the relevant statutory processes with public notices published in two newspapers, and affected landowners listed within the CPO process with relevant public notices applied with CPO site notices erected. Following the Proposed Scheme being lodged with the Board 96 no. third party submissions were made as well as three submissions from Prescribed Bodies (Dublin City Council, Dun Laoghaire Rathdown County Council and the Development Applications Unit of the Department of Housing, Local Government and Heritage). A

further 24 valid submissions were lodged in response to the applicant's response to the first party submissions.

- 8.12.6. In relation to holding an Oral Hearing, this matter is at the sole discretion of the Board under the provisions of the Planning and Development Act, 2000 (as amended), who, having considered the application documentation and the submissions lodged were satisfied that sufficient information was available to undertake the decision process without a hearing. Following this decision all third parties were afforded the opportunity to make further submissions on the responses that the applicant had previously submitted.
- 8.12.7. As set out above, I am satisfied that a significant level of public consultation and engagement has been undertaken by the applicant from the earliest stages of the procedural process. From the submissions lodged it is acknowledged that the applicant has engaged with the public, all relevant third parties and other organisations and prescribed bodies. Alterations have been carried out to the Proposed Scheme throughout the engagement process and while I note some revisions do not receive universal support the design process has been influenced through the consultations. I am also satisfied with the level of detail and clarity provided within the application documentation and that the statutory process complies with the requirements of the Aarhus Convention. I also note that the Kazakhstan Advice refers to the holding of public hearings within a statutory process (and not non-statutory public consultation), and under the provisions of the Planning and Development Act, 2000 the holding of an oral hearing is at the discretion of the Board, and a determination on this matter has already been made.
- 8.12.8. In conclusion. I am satisfied that an appropriate level of public engagement has been carried out and that the relevant statutory processes have been adhered to in this regard.

8.13. Recommended Conditions

8.13.1. I note in their submissions that both DLR and DCC planning authorities have included lists of recommended conditions. Where relevant to any of the above assessment these have been discussed previously. The Board should note that the

conditions did not raise any significant issues in relation to the route or principle of the Proposed Scheme and were focused on smaller detailed design issues.

- 8.13.2. A number of the conditions requested are seeking contractual agreements to be conditioned in terms of handover, management, and maintenance of the Scheme following construction. In relation to these items I am satisfied that the relevant legislative provisions are in place for the construction and handover of the roads infrastructure to render the attachment of such conditions unnecessary.
- 8.13.3. Other conditions are requested to ensure ongoing liaison, agreement, and engagement in relation to a number of detailed measures such as drainage, methodologies of conservation and recording and carrying out works around heritage items, traffic management, agreement on detailed design features, reinstatement works, standards to be adopted. I consider that such conditions requiring further liaison and agreement with the relevant location authority to be generally acceptable and in accordance with best practice, although I note that the applicant has stated that such liaison will occur as a matter of course and that additional specific conditions are not required, I consider that the imposition of such conditions on any consent that may issue would be appropriate and in the interests of proper planning and sustainable development.

8.14. Conclusion on Proper Planning and Sustainable Development

8.14.1. Overall I am satisfied that the Proposed Scheme will deliver significant improvements to bus, cycling and pedestrian infrastructure, which will facilitate a reduction in traffic congestion, promotion in the use of sustainable modes of transport all while minimising impacts on the amenities of the area, residential population, heritage features, and biodiversity. I am of the opinion that the subject works if implemented will encourage a significant modal shift from the private car towards sustainable travel modes into and out of the City. In this regard I have reviewed all submissions lodged and noted the concerns raised by third parties and whole I acknowledge the issues raised and note that there will be a certain level of impact and inconvenience during the construction phase throughout, and some changes and alterations during the operational phase, however, I do not consider that these impacts are significant or significantly adverse having regard to the overall benefits that will arise from the Proposed Scheme. I am satisfied that the application documentation is clear and demonstrates that the scheme has been designed to minimise impacts and that robust justification has been provided in relation to the various elements of the infrastructure proposed. Furthermore I consider that the application documentation contains a comprehensive suite of mitigation measures which will minimise impacts where and as they arise. I consider that the Proposed Scheme has demonstrated that it will contribute to the reduction in emissions and improve the efficiency of people movement throughout the City. Accordingly, I am satisfied that the Proposed Scheme is in accordance with the proper planning and sustainable development of the area, subject to compliance with the mitigation measures set out and conditions attached in my recommendation below.

9.0 Environmental Impact Assessment

9.1.Introduction

9.1.1. The Environmental Impact Assessment Directive requires that projects that are likely to have significant effects on the environment must be suitably assessed prior to any consent decision being made. Section 50 of the Roads Act 1993 (as amended) lists the forms of road development which must be subject to an Environmental Impact Assessment (EIA). The list includes a road development for "any prescribed type of road development consisting of the construction of a proposed public road or the improvement of an existing public road.¹⁰" Article 8 of the Roads Regulations 1994 (S.I. no. 119/1994) clarifies the type of prescribed road development for the purposes of Section 50(1)(a)(iv) as including: "(a) the construction of a new road, of four lanes or more lanes, or the realignment or widening of an existing road so as to provide four or more lanes, where such realigned and / or widened road is more than 500 meters in length and is in an urban area". The applicant considers that the Proposed BusConnects Belfield/Blackrock to city centre core bus corridor scheme meets and exceeds the threshold established in Article 8 of the Roads Regulations as it includes realignment/widening of existing roads so as to provide four or more

¹⁰ Section 50(1)(a)(iv) of the Roads Act 1993 (as amended) refers.

lanes over lengths which exceed 500m in an urban area and accordingly EIA is required.

- 9.1.2. The application falls within the scope of the amending 2014 EIA Directive (Directive 2014/52/EU) on the basis that the application was lodged after the last date for transposition. The application also falls within the scope of the European Union (Planning and Development) (Environmental Impact Assessment) Regulations 2018, as the application was lodged after these regulations came into effect.
- 9.1.3. This section of my report comprises an Environmental Impact Assessment (EIA) of the Proposed Scheme. Some matters considered have been discussed previously above in the Planning Assessment section (above) and are also considered in the Appropriate Assessment section (further below) and accordingly this section should be read in conjunction with these other relevant sections as necessary.

9.2. EIAR Contents and Structure

- 9.2.1. The application documentation includes an Environmental Impact Assessment Report (EIAR) which has been prepared on behalf of the NTA (the applicant) by a team led by Jacobs Engineering (who directly contributed to the following sections -Introduction, Need for Proposed Scheme, Traffic & Transport, Population, Human Health, Water, Material Assets), in collaboration with ARUP (Introduction, Need for Proposed Scheme, Proposed Scheme Description, Construction, Land, Soils Geology and Hydrogeology, Waste and Resources, Risks of Major Accidents and/or Disasters, Cumulative Impacts and Environmental Interactions, Summary of Mitigation and Monitoring Measures, and Summary of Significant Residual Impacts) and other specialists including Systra (Traffic and Transport), AWN Consulting (Air Quality, Climate, Noise and Vibration) EHA Occupational Health Hygiene Consultants (Human Health), Scott Cawley Ltd. (Biodiversity), Courtney Deery Heritage Consultancy Ltd. (Archaeological and Cultural Heritage), Cathal Crimmins Architect (Architectural Heritage), and Brady Shipman Martin (Landscape, Townscape & Visual).
- 9.2.2. The EIAR is presented in the grouped format across four separate volumes:
 - Volume 1: Non-Technical Summary (NTS) is set out as a separate document and provides a summary of the EIAR in non-technical language.

- Volume 2: Presents the main EIAR and discusses the Proposed Scheme over 23 separate chapters – (1. Introduction, 2. Need for the Proposed Scheme, 3. Consideration of Reasonable Alternatives, 4. Proposed Scheme Description, 5. Construction, 6. Traffic and Transport, 7. Air Quality, 8. Climate, 9. Noise and Vibration, 10. Population, 11. Human Health, 12. Biodiversity, 13. Water (including flooding), 14. Land, Soils, Geology and Hydrogeology, 15 Archaeology and Cultural Heritage, 16. Architectural Heritage, 17. Landscape (Townscape) & Visual, 18. Waste and Resources, 19. Material Assets, 20. Risk of Major Accidents and/or Disasters, 21. Cumulative Impacts and Environmental Interactions, 22. Summary of Mitigation and Monitoring Measures, 23. Summary of Significant Residual Impacts).
- Volume 3 contains drawings and large format images (Figures) that illustrate the information provided in Volume 2.
- Volume 4 contains the Appendices to the EIAR and is provided across four parts.

9.3. Compliance with Legislation

9.3.1. As is required under Article 3(1) of Directive 2014/52/EU amending Directive 2011/92/EU on the assessment of the effects of certain public and private projects on the environment, the EIAR describes and assesses the direct and indirect significant effects of the project on the following factors: (a) population and human health; (b) biodiversity with particular attention to the species and habitats protected under Directive 92/43/EEC and Directive 2009/147/EC; (c) land, soil, water, air and climate; (d) material assets, cultural heritage and the landscape. It also considers the interaction between the factors referred to in points (a) to (d). Article 3(2) includes a requirement that the expected effects derived from the vulnerability of the project to major accidents and/or disasters that are relevant to the project concerned are considered. The application documentation includes an Environmental Impact Assessment Report (EIAR) which, in my opinion, has been prepared by competent and appropriate individuals in accordance with the relevant national and EU legislation.

9.3.2. Overall, I am satisfied that the information provided is reasonable and sufficient to allow the Board to reach a reasoned conclusion on the significant effects of the Proposed Scheme on the environment, taking into account current knowledge and methods of assessment.

9.4. Consideration of Reasonable Alternatives

- 9.4.1. The EIAR must include a description of the reasonable alternatives studied by the developer, which are relevant to the project and its specific characteristics, as well as an indication of the main reasons for the options chosen, taking into account the effects of the project on the environment.
- 9.4.2. The consideration of alternatives in relation to the Proposed Scheme is set out in Section 3 of the submitted EIAR. Alternatives were considered at three levels, strategic alternatives, route alternatives and design alternatives.

9.4.3. Strategic Alternatives

- 9.4.4. In relation to strategic alternatives the provisions (and findings) of the Greater Dublin Transport Strategy and its associated Strategic Environmental Assessment (SEA) are considered.
- 9.4.5. The strategic alternatives considered include the 'do nothing' scenario, bus rapid transport (BRT), light rail, metro, heavy rail, demand management, and technological alternatives, these are summarised below:
 - Do Nothing, currently the bus network is characterised by discontinuity resulting in buses and cyclists competing with general traffic for use of the carriageway for the majority of journeys. Pursuing a do-nothing strategy would exacerbate this problem and result in increasing delays and unreliable journey times as traffic congestion and associated greenhouse gas emissions continues and potentially grows while bus capacity would remain restricted. Similarly cycling would continue to be unattractive to the majority as segregated infrastructure would be absent from the majority of the route. Furthermore, pedestrian facilities and the walking environment would not improve, thereby sustainable modes of transport (and their environmental improvements) would not be encouraged or prioritised. For these

environmental considerations/reasons and in the face of rising congestion and emissions the do-nothing scenario was not considered as a viable alternative.

- BRT Alternative: Definitions of BRT range from a quality bus corridor to a fully segregated bus system. It is, however, intended that all of the core bus corridor infrastructure works, including the Proposed Scheme, will be developed to provide a BRT level of service albeit fully segregated bus lanes (i.e. continuous unbroken physical bus lane infrastructure which would have a larger land-take requirement with all associated biodiversity, heritage, air quality, noise and likely demolition impacts along the corridor) will not be provided. These environmental reasons were the primary considerations in not pursuing a BRT solution along the corridor, with the core bus corridor as proposed being capable of providing the required bus priority through use of measures such as signal-control priority to address pinch points or to lessen impacts.
- Light Rail: Bus-based transport is appropriate for passenger demand levels up to 4,000 passengers per hour per direction, with light rail for 3,500 to 7,000 passengers, and heavy rail or metro for 7,000 passengers per hour. The GDA strategy considered the passenger flow modelling along the corridor of the Proposed Scheme and noted that it was within the capacity of bus transport without reaching the passenger demand which would support the provision of rail solutions, put simply the demand wouldn't justify the provision of light rail. Furthermore, similar to the BRT alternative the provision of light rail would be more impactful in terms of construction, land take requirements, biodiversity, heritage, air, and noise, and would require the need to accommodate an additional dedicated infrastructure corridor which would in all likelihood require demolition along the route.
- Metro/Heavy Rail : Similar to light rail the travel demand levels are not in place to justify a metro or heavy rail alternative along the proposed corridor. Although it should be noted that the GDA transport strategy includes for the implementation of Metro South Luas Green Line capacity upgrade. The provision of a metro would not, however, negate the need to cater for the residual bus needs of the area nor the need to develop improved cycling and pedestrian infrastructure. Similar to the other previous alternatives the need

for a dedicated and inflexible corridor would result in greater construction impacts, a larger land-take and potentially demolition along the corridor, and for these environmental reasons was not considered as a suitable alternative.

- Upgrade of existing DART line: The GDA transport strategy considers the upgrade of the existing DART southeast line (which is contained within the broader area of the Proposed Scheme and which would require minimal construction works) in combination with expansion of Luas Green line capacity and the incorporation of higher quality bus services and infrastructure as the most appropriate public transport solution for this corridor. The Proposed Scheme would therefore complement other infrastructure upgrades while minimising construction and environmental impacts.
- Demand Management: The overall goal of improving transportation and accessibility in urban environments can be achieved through demand management which can be achieved through restricting car movement/access using signage and charges etc. which have minimal construction/ environmental impact. This cannot, however, be achieved in the absence of viable transport alternatives being in place. Accordingly, the public transport system capacity and reliability must be built up either in tandem or in advance of demand management measures. At present the existing public transport system does not have sufficient capacity to facilitate a large number of additional users that would arise from demand management strategies of the scale necessary to effect change. Furthermore demand management movement measures would not reduce congestion or remove the need for additional bus, cycling and pedestrian infrastructure (which will be required with or without car movement restrictions).
- Technological Alternatives: Advances in technology have also been considered within the EIAR, and while the move to driverless and electric vehicles is acknowledged it is also noted that three typical cars (electric or otherwise) take the same road space for a maximum of 12 occupants that a double decker bus requires to carry approximately 90. (In this regard I note that car occupancies can be 5-7, however, the point remains that buses are the more effective/efficient use of road space when compared to private vehicles). The switch to electric vehicles (both car and bus) is acknowledged

as helping to reduce GHG emissions from congestion. The EIAR acknowledges the benefits of technological advancements but also notes that there is no evidence that such advancements will displace the need for mass transit in an urban environment, and therefore the need for improvement to the public transportation network and non-car modes of travel such as pedestrian and cycle facilities remains.

9.4.6. Route Alternatives

- 9.4.7. Section 3.3 of the EIAR provides an examination of the various route alternatives considered as part of the iterative design process which was informed through a range of public consultations. Feasibility and option reports were prepared initially, with public consultation undertaken between February and May 2019, the draft preferred option was developed (April 2019 to March 2020). The second round of public consultation took place from March to April 2020, and additional preferred route option development took place before more public consultation (November to December 2020) and finalising the Proposed Scheme.
- 9.4.8. The initial design approach considered two corridors Dun Laoghaire to City Centre, and Ballsbridge to UCD corridors. At the initial stage a range of options were considered (91 individual links for the Dun Laoghaire to City Centre route, and in excess of 11 individual links on the Ballsbridge to UCD route). These options were further sifted considering engineering and high-level environmental constraints, including space requirements, availability of adjacent links to form a coherent end-to-end route as well as population catchments. This sifting analysis identified 3 route alternatives for the UCD to Ballsbridge corridor, and one main corridor through Blackrock to Merrion Road, with two options from Merrion Road to the City Centre (either via Pembroke Road and Baggot Street Lower, or via Northumberland Road and Mount Street) for the Blackrock to City Centre Route.
- 9.4.9. The options were then subjected to a finer grain analysis and compared using a multi-criteria analysis (in accordance with the Department of Transport Document 'Common Appraisal Framework for Transport Projects and Programmes') including environmental considerations such as cultural heritage, flora and fauna, soils and geology, hydrology, air quality, landscape and visual, noise and vibration, impact on

amenities - including loss of trees, land use character, capital costs, traffic network integration as well as resident and employment catchments.

9.4.10. **Design Alternatives**

- 9.4.11. Options considered and the development of the preferred route option also included changes to the design in terms of junctions, carriageway cross-sections and allocation, as well as consideration of cycling route options, all of which were further considered under the range of environmental criteria. In this regard I refer the Board to Section 3.4 of the EIAR which breaks down the various specific design options and alternatives considered for Fitzwilliam Street Lower (4 design options), Pembroke Road (4 design options including realignment of property access steps, 4, 3 and 2-lane cross sections, bus gate, and parking bay alternatives), Merrion Road (4 design options including 2, 3, and 4 lane cross sections, signal controlled bus priority) Nutley Lane (3 cycle route design options, and 7 carriageway/vehicular options including a range of 2-4 lane cross sections over various portions, and pedestrian cycle-lane options), and for Blackrock to Merrion (the route for this section remained consistent throughout as it continued to perform well across all criteria).
- 9.4.12. Over and above the route design alternatives specific additional options were considered in relation to the route cross section adjacent to Booterstown Marsh, access arrangements at 1-11 Pembroke Road, Bloomfield gateway relocation, delaying the beginning of the bus lane on Merrion Road inbound from the Strand Road junction and the restrictions on Georges Avenue.
- 9.4.13. I note in regard to the above that several third-party submissions have been made expressing dissatisfaction in relation to various issues arising from design options, alternative routes, public engagement/consultation, and route selection. Where necessary I have provided additional discussion in my planning assessment (Section 8) of this recommendation, however, overall I consider that the considerations of alternatives and reasons for route selection and overall scheme design have been adequately articulated and appropriately informed through public consultation.
- 9.4.14. Having reviewed the range of alternatives considered throughout the design process ranging from strategic transportation options through to route selection and to

particular design alternatives considered in relation to specific locations, I am satisfied that the applicant has considered the full range of design options and alternatives in relation to the Proposed Scheme. I consider that all reasonable alternatives have therefore been considered and that the design of the Proposed Scheme has emerged following an appropriate review of all environmental constraints and criteria. Furthermore, I note that a significant level of public consultation has been carried out throughout the design process. The main reasons for the selection of the emerging preferred route and evolution of the design scheme are included throughout Chapter 3 of the EIAR. I am therefore be satisfied that this section of the EIAR is sufficient to comply with the provisions of Article 94 and Paragraph 1(d) of Schedule 6 of the Planning and Development Regulations, 2001 (as amended) referring to the consideration of reasonable alternatives.

9.5. Population and Human Health

- 9.5.1. Chapters 10 and 11 of the submitted EIAR consider the impacts of the Proposed Scheme on population and human health respectively. The Board should also note that the population chapter of the EIAR draws on the traffic and transportation, air quality, noise, and vibration, as well as the landscape, townscape and visual sections (of the EIAR) and is also supported by Appendices A10.1 (Schedule of commercial businesses), and A10.2 (The Economic Impact of the Core Bus Corridors Report¹¹). The Study Area for Population has been established as being the census parish boundaries that are intersected by, or adjacent to, the Proposed Scheme (i.e. Monkstown, Newtownpark, Blackrock, Booterstown, Donnybrook, Merrion Road, Sandymount, Haddington Road, University (Newman Church) and Westland Row). The population section of the EIAR is further informed by desktop research and a walkover survey conducted in October 2021.
- 9.5.2. The Board should also note that specific impacts on local residents and communities along and in the vicinity of the route from traffic, noise and vibration, air quality, as well as from visual/landscape/townscape issues have been discussed in full within the EIAR and relevant parts of this report (below), I do not therefore intend to repeat consideration of these matters here, and accordingly the content of this section

¹¹ EY 2021.

should be read in conjunction with those others referenced. This Section of the report draws from these other assessed potential and residual impacts in order to determine the potential for, as well as the magnitude and significance of, impacts on population in terms of community and economic amenities.

9.5.3. Third party submissions received concerning the Proposed Scheme in relation to population have raised issues such as accessibility to commercial and residential properties, impact on the viability of individual business/commercial enterprises as well as adverse impacts on village centres along the route through loss of services (including loading bays), parking (including accessible spaces) and connectivity with customers. Concerns in relation to residential properties include accessibility, potential loss of functionality (e.g., whether car parking/loading spaces will be lost), adverse impact on protected features/properties, safety of access, air quality/pollution and disconnection from (/or dissection of) the local community. Issues in relation to Human Health have not been referenced often in the submissions although there have been some issues raised in relation to safety, and concerns regarding Air Quality.

9.5.4. **Overview**

9.5.4.1. From the outset I note that the Proposed Scheme constitutes works along an existing transport corridor, which already accommodates a significant amount of general traffic, including buses, cyclists, and pedestrians and which is bounded by a mix of residential, recreational, and commercial developments as well as educational, and other institutional uses (such as clinics, hospital, religious and care facilities) and community facilities. The Proposed Scheme has been fully described previously.

Population

9.5.4.2. In terms of population the potential for impacts is considered under two broad headings – Community and Economy. The method of assessing impacts on the population refers to how the local community perceive their area and how they use community and recreational resources, while the method of economic assessment considers the extent, range and impacts on commercial entities along the corridor.

- 9.5.4.3. The term 'Community Amenity' is used within the EIAR to describe the perceived character or attractiveness of an area. Potential community amenity impacts could arise from the Proposed Scheme during both construction and operational phases from land take, accessibility, traffic, air quality, noise, and vibration, as well as landscape and visual impact. Potential impacts could also arise from the same factors in relation to commercial amenities which could give rise to economic effects.
- 9.5.4.4. In terms of the established community baseline the Proposed Scheme is located in the vicinity of 38 places of worship, 39 recreational areas, 23 health centres/hospitals, and 54 no. schools. Examples of these include SVUH, Blackrock Park, St. Mary's Nursing Home, EPGSC, and Blackrock College. The Proposed Scheme also runs adjacent and proximate to the RDS and Aviva Stadium. The EIAR states that there are approximately 21,000 residential properties and 30,700 commuters in the study area. The breakdown in modes of transport for commuters (with the Dublin average presented in brackets) is as follows: 9% (12%) travel by bus/minibus, 35% (54%) car/van, 9% (8%) train, 32% (17%) foot/bike, and 15% (9% other).
- 9.5.4.5. The EIAR states that there are 7,087 commercial receptors within the study area with approximately 260 of these located along the Proposed Scheme (a schedule of commercial receptors is included in Appendix A10.1 of the EIAR) with the notable centres of employment including the Frascati Centre, SVUH, Blackrock Village Centre, Elmpark Green Development, and the Merrion Shopping Centre. The largest employment sectors in the study area are commerce and trade, as well as professional services.
- 9.5.4.6. Permanent land-take is required to facilitate the Proposed Scheme from 7 no. residential properties, 13 no. community facilities, and 11 no. commercial businesses. In this regard the Board should note that within the original EIAR assessment the applicant did not include the impact of the need for the removal of the pergola on the side of Roly's Bistro at Ballsbridge terrace to facilitate the Proposed Scheme. The applicant later clarified in response to submissions that this was due to their consideration that this structure was unauthorised (as referenced in the submission from DCC), however, that as a temporary licence had been issued for the structure up until May 2023 the NTA provided additional discussion on this element to augment its assessment. The Board should note that DCC is the

landowner of the site on which the pergola is situated and at time of site inspection (August) it remained both in place and use. A recent planning application (Pl. Ref. 4395/23) has been made by the applicant and granted permission by DCC for the temporary retention of this structure for a period of 3 years or until the lands are needed for the Proposed Scheme.

9.5.4.7. The EIAR estimates that there will be approximately 200 staff employed to provide the Proposed Scheme which will rise to c.250 staff at peak construction.

Human Health

- 9.5.5. The study area for human health has been established by identifying all the Small Areas¹² that touch or coincide with a 500m boundary on each side of the centreline of the Proposed Scheme as this captures people who live and work within easy access of the Proposed Scheme and includes the air quality and noise study areas. The risk to human health from environmental hazards (including noise, air pollution, water) is considered, and baseline data from these other sections of the EIAR have been used and referenced. The assessment considers population health profiles, determinants of health, identification of impacts and considers health status of the population, social inequalities, level of exposure to a health risk, likely population affected and potential impacts on mental health are also considered.
- 9.5.6. Overall Dublin has a better health profile than average for Ireland with lower mortality rates, albeit cancer rates are higher. Levels of air pollution are almost entirely within the EU limits for NO₂ and PM (Particulate Matter). There is, however, a relatively high prevalence of exposure to excessive traffic noise, which can cause annoyance and is linked to other adverse health outcomes. Rates of walking and cycling are relatively high for communities in the study area within 2km of the City Centre but car dependency increases at distances beyond 3km from the centre. Several national and international studies provide evidence that people in deprived areas suffer worse health outcomes than those in affluent areas. In relation to the study area for the Proposed Scheme there are no small areas classed as deprived.

9.5.7. Potential Impacts

¹² Developed by the National Institute of Regional and Spatial Analysis on behalf of the OSI in consultation with the CSO.

Population

- 9.5.7.1. The characteristics of the Proposed Scheme that are considerations in assessing the potential impacts on population during the construction phase are based on the findings in relation to landscape/townscape (visual impact arising from works), traffic and transport (including temporary traffic diversions, stop/go systems, diversions to footpaths and cycle lanes), Air and Climate (dust arising and air quality impacts), Noise and Vibration (from construction and operations), disruptions/breaks in services (e.g., disruption to water or electrical services) as well as the temporary and permanent land acquisitions.
- 9.5.7.2. During construction there will be a moderate impact on community facilities along the route of the Proposed Scheme during the construction period which rises to a moderate to significant impact for SVUH. These impacts arise from the combination of restrictions, noise and visual impacts that will be in place for the construction phase, and accordingly will be temporary in nature. I consider community facilities within the overall study area but not immediately adjacent to the Proposed Scheme will experience a neutral but not-significant short-term impact on amenities, from traffic diversions and construction traffic due to the temporary and phased nature of the works along the corridor.
- 9.5.7.3. Further impacts will arise in relation to the land-take requirements from the Proposed Scheme which includes lands from residential properties and community facilities. The residential properties from which land-take is required are set out in Table 9.5.1 below:

Table 9.5.1 – List of Residential properties from which land-take is required for the Proposed Scheme

Address	Land-take	Other Considerations
No. 85 Merrion Road	Temporary and permanent land take required from frontage of dwelling.	Permanent and temporary land- take will reduce front garden and driveway of property but will retain function and use as parking and access area.
Lands at Merrion View Avenue	Temporary and permanent acquisition of lands at side garden and rear access road to Merrion View Residential properties.	Narrow wedge of permanent land take required for the Proposed Scheme. Larger temporary land-take for construction and replacement boundary wall will temporarily

Address	Land-take	Other Considerations
		restrict rear access roadway for residents
No. 151 Merrion Road	Small permanent land-take from front garden/site frontage and larger portion of temporary land- take to facilitate re-construction and set-back of boundary railings.	Dwelling is on the RPS at entrance of Estate Avenue onto Merrion Road. No vehicular access along frontage being set- back. Dwelling is semi-detached with no. 153 below.
No. 153 Merrion Road	Permanent and temporary land- take from front garden, site frontage to facilitate proposed scheme. Temporary land-take required for reconstruction of new boundary railings at set back location.	Dwelling is on the RPS and semi-detached with No. 151 above. Existing vehicular driveway and parking in place with front garden. Permanent land-take required not so large that it will restrict parking on driveway at site frontage however, temporary land-take will restrict ability to park for construction period.
No. 155 Merrion Road	Permanent and temporary land- take from front garden, site frontage to facilitate proposed scheme. Temporary land-take required for reconstruction of new boundary railings at set back location.	Early 19 th century period residence. Existing vehicular driveway and parking in place with front garden. Permanent land-take required is not so large that it will restrict parking on driveway at site frontage, however, temporary land-take will restrict ability to park for construction period.
No. 157 Merrion Road	Permanent and temporary land- take from front garden, site frontage to facilitate proposed scheme. Temporary land-take required for reconstruction of new boundary railings at set back location.	Early 19 th century period residence. Existing vehicular driveway and parking in place with front garden. Permanent land-take required not so large that it will restrict parking on driveway at site frontage however, temporary land-take will restrict ability to park for construction period.
No.'s 1, 3, 5, 7, 9, & 11 Pembroke Road	Temporary land-take is required along the frontage of this terrace of properties which share a communal frontage, front garden area and driveway access. One of their existing two vehicular access points onto Pembroke Road (the westernmost) is proposed to be closed for vehicular traffic, while an alternative new vehicular access is proposed off Waterloo Road.	All properties on this terrace are included in the RPS. Works are required to ensure the proposed bus gate on Pembroke Road at this location can function effectively. The new access onto Waterloo Road and easternmost access onto Pembroke road will have a new control system at each access point to ensure access is maintained and mitigate opportunistic through-traffic.

Address	Land-take	Other Considerations
No. 118 Stillorgan Road	Temporary land-take at site frontage to close direct vehicular driveway access from Stillorgan Road junction.	Dwelling has a second vehicular access driveway from Nutley Road which will remain, and the proposed works are required to ensure traffic safety at the Stillorgan Road Junction.
Lios An Uisce, Rock Road	Temporary and Permanent land- take of side garden/access lands at Lios An Uisce to facilitate scheme and boundary set-back at Blackrock Park	Large 18 th Century House set within its own large site adjacent to Blackrock Park, dwelling is on the RPS.
Elm Court Apartments, Merrion Road	Temporary and Permanent land- take from the frontage of this apartment block site.	Land-take is from the outside of the front boundary wall/hedge of the apartments i.e. between it and the existing road edge.

9.5.7.4. Impacts will arise on these residential properties of varying degrees dependent on the nature and size of the land-take relative to the amenity, function, and character of the properties. All properties will retain their functions and the NTA have clarified in submissions that the land takes involved will not result in any property which already enjoys the benefit of an off-street car parking space losing the ability to accommodate a parked car. During the construction phase these properties will experience additional impacts as temporary land-takes are required to facilitate the relevant construction works. Where boundaries are to be replaced this is being done on a like-for-like basis, and where protected structures are involved, the boundaries are to be set back with materials and features removed will be stored. reused/repurposed where practicable. All the properties listed in table 9.5.1 will experience impacts, and I consider the most significant impacts on residential properties will arise in relation to no.'s 151, 153, 155 and 157 Merrion Road. These properties are all residential in nature and two of them, no.'s 151 and 153, are on the record of protected structures and form part of the entrance into Estate Avenue. No.'s 155 and 157 are early 19th century terraced houses and while they have heritage value they are not included in the RPS. All four dwellings are provided on smaller urban sites/plots facing onto the existing roadway. The other residential landtakes are either temporary, amending access arrangements only, or relate to dwellings which are set within larger sites. I also note that the DCC submission referred to the loss of part of the front gardens at the entrance to Estate Avenue as seriously injuring the composition of the avenue and is as a regrettable loss of

streetscape character on Merrion Road. During construction access to property will be maintained, however, I note that due to the temporary works land-take it will not be possible to park cars at the resident's properties. This is a short-term adverse impact.

- 9.5.7.5. Impacts on Community facilities (which are classified as community due to their use's) include land-take from SVUH, Blackrock Clinic, Blackrock College, St. Mary's Nursing Home, Blackrock Park, EPGSC and the City of Dublin Education and Training Board (CDETB) (no. 1 – 3 Merrion Road – former Pembroke Town Hall). Of these I consider that the most significant Impact arises at the CDETB site as this relates to a protected structure on a limited site, and although the land-take at this location is temporary in nature it will result in permanently altering the vehicular access arrangements and therefore the setting of the building. Other land-take areas may be larger and permanent for example at EPGSC, Blackrock Clinic' and SVUH, however, in my opinion impacts at these locations are not as significant in population/community terms as the land take requirements are smaller in proportion to the size of the overall properties and their sites/setting and functions will broadly remain minimally affected. I also note that the Proposed Scheme proposes the permanent acquisition of public amenity greenspace under the ownership of DCC adjoining 7 Ballsbridge terrace. These lands are surrounded by heritage fencing, and currently accommodate a stand of mature trees, five of which are proposed to be removed to accommodate the junction design at Herbert Park/Merrion Road, this is also the location of a temporary restaurant pergola. The impacts arising from these land-take areas can be minimised when considered over the large scale of the Proposed Scheme and have been discussed previously in the Planning Assessment. While access to some amenity areas may be altered temporarily to accommodate construction works, I consider such impacts to be negative, slight, and short term.
- 9.5.7.6. Access for pedestrians, cyclists and vehicular traffic will be subject to restrictions and diversion during the construction phase, I consider these impacts will be negative, slight to moderate and short term. At the overall population/community amenity scale, however, I am satisfied that the impacts arising on community amenities are not significant and short term during the construction phase.
- 9.5.7.7. In relation to economic impacts commercial amenities of property along the route will be affected throughout the construction phase from the activities that will be

necessitated, similar to community amenity diversions and access restrictions will also arise. I note that access will be maintained to all commercial properties, however, I still consider that commercial operations along the route will experience negative slight to moderate impacts of a temporary nature during construction.

- 9.5.7.8. I note that commercial properties will also be affected by land-take and of these Merrion House (offices opposite Elmpark Green Development), Glenalla (Casteldawson Avenue at the Blackrock Clinic), the Clayton Hotel (Ballsbridge), Merrion Shopping Centre, and the RTE site (at Donnybrook) will be most affected by permanent and temporary land-take. I note that access will be maintained throughout construction and all these properties are provided within their own large sites. Accordingly, I consider impacts to be negative, not significant, and short-term during construction. I note that Roly's Bistros temporary pergola was not considered, nor mapped within the initial EIAR, and the Board should be aware that there is no land take proposed from that property as the lands on which the Pergola is located in owned by DCC. Nonetheless, I consider that this bistro will experience a negative, moderate, and long-term impact due to the Proposed Scheme, through the proposed loss of the pergola and traffic/carriageway amendments at this location.
- 9.5.7.9. Several submissions have raised concerns in relation to the loss of carparking along the route of the Proposed Scheme and the potential for adverse impacts to arise on commercial properties. In this regard I consider that the Proposed Scheme overall improves accessibility of commercial property along the route by sustainable modes of transport and will therefore improve accessibility to a larger number of people, and I also note that there are significant parking facilities in the vicinity of the scheme which will continue to cater for the private car.
- 9.5.7.10. Potential operational phase impacts from the Proposed Scheme on population could arise from effects on community amenities, changes to commuting patterns, modal shift, reduced on-street parking, altered commercial delivery methodologies (changes to loading bays), permanent land acquisition, improvements to cycling and pedestrian facilities, changes to the public realm, altered traffic patterns, permanent alterations to streetscape, works in the vicinity of protected structures and other elements of heritage value, as well as reduced available on-street car-parking.
- 9.5.7.11. In the do-nothing/do minimum scenario the Proposed Scheme would not be implemented (albeit other GDA transport strategy projects would), bus, cycling and

pedestrian infrastructure would not be altered and the domination of the private car within the existent transport corridor would continue as is. The impacts arising from the Proposed Scheme on community and economy at a population level should it be implemented are summarised below:

Community:

- In terms of community amenity the traffic and transport assessment demonstrates that the facilities along the route will have a positive, moderate long term impact arising from enhanced accessibility through sustainable means, while facilities in the surrounding road network will experience a slight negative impact from changes to traffic patterns.
- Air quality impacts are neutral, and no significant impacts have been identified in relation to noise in relation to Community Amenity.
- In terms of landscape, townscape and visual a negative moderate/significant and long-term impact arises in relation to the following community amenities Blackrock and Booterstown Parks, Booterstown Nature Reserve, the River Dodder, Grand Canal and the EPGSC.
- On balance, the impacts of the combination of all these factors i.e. the combination of traffic and public realm improvements, with localised visual adverse impacts on certain amenities and neutral noise and air quality, I consider that at the overall community level the Proposed Scheme will have a neutral to positive, not significant long-term impact on amenity with the visual amenity impacts improving over the long-term as landscaping incorporated within the Scheme matures.
- In considering land-take for residential properties, dwellings which are permanently losing portions of their front gardens will experience negative impacts throughout the operational phase, with impacts being of moderate (no. 185 Merrion Road) and slight (no.'s 151, 153, 155, and 157 Merrion Road, Elm Court Apartments, and Lios an Uisce) significance and long-term.
- For community facilities I consider that Blackrock Clinic and SVUH will experience moderate, negative, and long-term impacts, however, I do not consider that the land-take from these facilities will impact adversely on

community/population accessibility. I consider other community uses along the route (including EPGSC, Blackrock Park, CDETB) will experience negative, moderate, and short-term impacts which when considered at a community/population level will be negative but not significant over the long term.

- In terms of accessibility the improvements to bus, cycling and pedestrian infrastructure provided by the Proposed Scheme will give rise to an overall positive, moderate to significant (rising to very significant for some) and longterm impact for pedestrians, cyclists, and bus users at community/population level access to community facilities.
- While the Proposed Scheme will lead to a reduction in general traffic along its route improving accessibility for sustainable modes, I acknowledge that redistributed traffic in the vicinity will give rise to potential negative, slight, and long-term impacts on accessibility for private vehicles to community amenities in the surrounding road network. I consider these impacts to be negative, slight, and long-term.

Economy:

- When viewed in combination I consider that the predicted impacts on commercial amenity from Traffic, Air Quality, Nosie and Vibration, and Landscape/Townscape will result in long-term positive impacts ranging from moderate to not significant in magnitude at the community/population level. In this regard I note that accessibility gains must be balanced against individual short term negative impacts on individual commercial properties. For example I note that the Intercontinental, Herbert Park, and Clayton Hotels are predicted to experience negative, moderate/significant, and short-term visual impacts during the operational phase which will reduce as the public realm works and landscaping matures during operations, however, overall accessibility of these properties by all modes of transport will improve.
- In terms of land-take there is a total of eight commercial properties which will experience permanent land acquisition from their sites to accommodate the Proposed Scheme. All of these are considered to experience imperceptible/ not significant or slight to long-term impacts with the exception of Merrion

House which is expected to experience a moderate long term impact as it is predicted to loose approximately 15 car parking spaces. At a community/population level I consider these impacts to be negative, not significant, and long term for the operational phase.

- Overall, I consider community accessibility to commercial properties to be improved by the Proposed Scheme due to the bus, pedestrian and cycling infrastructure improvements. I consider these impacts to be positive and to vary from not significant to very significant throughout the community areas of the study area.
- In relation to the private car I consider that parking has been retained where
 possible and while the traffic assessment shows a positive, moderate and
 long term impact for commercial businesses along the route, for private
 vehicles in the surrounding road network (due to traffic displacement) a slight
 negative long term impact is predicted.

9.5.8. Human Health

- 9.5.8.1. The key characteristics of the Proposed Scheme which could influence human health during the construction phase are traffic management, noise and vibration, dust/air pollution, disruption to footpaths and cycle lanes/tracks/ways, land acquisition from community and residential receptors and interruption to services (e.g., water and power).
- 9.5.8.2. In the do-nothing scenario the Proposed Scheme is not carried out and the existing car-dominated infrastructure remains, the resultant high and increasing levels of traffic congestion (which is projected to grow in line with population) and disjointed infrastructure would discourage pedestrian and cycling movements and the pattern of car use would exacerbate sedentary lifestyles throughout with all associated health effects potentially worsening. Construction phase impacts are considered further below:
 - Works along Merrion Road and Nutley Lane may affect access to SVUH, while access will be maintained delays could arise, particularly as the hospital has an emergency department. This impact is considered as negative, significant, and temporary.

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- Potential exists for impacts on health from pedestrian, cyclist and traffic collisions and conflict in the event of temporary diversions, stress levels could also arise for regular commuters or those on the school run. As proper signage and advance notice will be in place, I consider these impacts to be negative, slight, and temporary. Similarly, increased congestion could give rise to moderate impacts on more sensitive groups using the route.
- Construction related air pollution could also give rise to impacts, the air assessment has stated that risk of dust impacts is low, although I note that construction could give rise to general stress in the population. Furthermore, construction within 250m of hospitals will be subject to the national guidelines for the prevention of Nosocomial Aspergillosis to ensure protection of those with suppressed immune systems. Accordingly, I consider these risks to be negative, slight/not significant, and short-term.
- The Noise assessment assesses residual noise impacts to be negative, moderate to significant and temporary. I note that construction hours will be generally restricted, however, night working will be required under agreement to avoid/reduce the significance of impact on peak traffic. For this reason some sleep disturbance may arise although I note that works will be temporary and modular with works being carried out in phases along various sections of the route. Accordingly, I consider such impacts to be negative, moderate, and temporary.
- 9.5.8.3. The relevant impacts during the operational period relate to provision of bus priority (improving timing and reliability for users), redistribution of traffic (resulting in busier streets and potentially creating through-traffic on previously quieter streets, decreasing air quality and/or affecting accessibility), enhancing pedestrian and cyclist facilities, improved public realm (affecting wellbeing), reduction in on-street parking, and permanent land acquisition. Operational impacts are summarised below:
 - I am satisfied on the basis of the submitted information that the Proposed Scheme will encourage and increase cycling and pedestrian activity while also reducing car dominance and dependence, therefore resulting in a positive,

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slight to significant and long-term benefit to the population at large within the study area.

- The improvements in bus journey times of up to 39% in 2028 and 21% in 2043 will also give rise to reduced stress and reduction in commuters exposure to air pollutants, although this is hard to quantify, I concur with the EIARs findings of this impact being positive, moderate, and medium-term.
- A mix of beneficial and adverse impacts have been modelled in comparing the 'do Minimum' and 'do Something' scenarios. While the majority of modelled receptors show a negligible impact in terms of annual mean NO₂ concentration, a slightly beneficial impact is estimated at 32 receptors, moderate beneficial at 5 no., and substantial beneficial at 6 no. receptors along the length of the Proposed Scheme. A slight adverse impact is expected at 17 receptors with a moderate adverse impact at 9 no. on the R138 Leeson Street and Donnybrook Road. These are considered significant as they exceed the EU limit value. The degree of population exposure is uncertain and from the submitted information the levels will reduce to negligible by 2043 due to technology improvements. Accordingly, I consider the population level health impacts to be positive to negative of moderate significance and long-term in duration.
- I consider noise impacts during the operational phase to be negligible with road and traffic noise remaining dominant along this existing transport corridor. I do note that the likelihood of lower noise levels in the medium to longer term may arise through the increased electrification of the national transport fleet.
- In relation to noise from redistributed traffic the analysis is based on daytime levels (as this is a daytime occurrence). None of the 930 modelled locations have predicted changes in noise levels from the Proposed Scheme which would be at a level associated with a measurable change of risk for serious population health outcomes. The highest increase in noise recorded being 3.5dBL_{den} which has been modelled at one location. As significant levels of redistributed traffic will not arise at night-time, I am satisfied that traffic noise health impacts can be considered as neutral, imperceptible, and long-term.

- During the operational phase emergency access to hospitals and properties generally along the route will be improved through the ability for emergency vehicles being able to operate within the bus lanes, public access to hospitals will be maintained throughout, and the infrastructure for access from sustainable travel modes will be improved. These impacts will be positive, significant to very significant, and long-term and in this regard, I note that access will be more equitable with the Proposed Scheme improving accessibility to healthcare for those who do not have access to a car.
- In relation to impacts on communicable diseases such as Covid, I note that pedestrian and cycling infrastructure will be provided and that the Proposed Scheme will improve the availability, manageability, accessibility, and reliability of public transport services. I do not consider that these infrastructure improvements will of themselves alter exposure risk to such diseases with this being an operator management issue. I therefore consider risks in this regard to be neutral and long term.

9.5.9. Mitigation Measures

9.5.9.1. No additional mitigation measures beyond those set out in the traffic, noise and vibration, landscape(townscape), heritage, and air quality sections and within the CEMP (for construction purposes) are provided in relation to Population and Human Health. The CEMP provides details of traffic management and diversions will be properly signposted and advance warnings provided for the construction period and works periods and locations will also be made public in advance through the provision of a communications plan.

9.5.10. Conclusion on Population and Human Health

9.5.11. I consider that the Proposed Scheme will improve accessibility throughout the route for community and business uses by improving bus, pedestrian and cycling infrastructure. I note that specific properties may experience impacts individually of a significant scale, however, overall these impacts are not of such significance to consider the scheme to be inappropriate in its entirety, and where issues have been identified I am satisfied that these can be addressed by appropriate condition or mitigated through the measures incorporated into the Proposed Scheme.

9.5.12. I have considered all of the written submissions made in relation to population and human health, in addition to those specifically identified in this section of the report. I am satisfied that impacts which arise that are not positive can be avoided, managed, and mitigated by the measures which form part of the Proposed Scheme, the proposed mitigation measures and through the imposition of suitable conditions where appropriate. I am, therefore, satisfied that the Proposed Scheme would not have any unacceptable direct or indirect impacts in terms of Population or Human Health. I am also satisfied that while some cumulative effects may arise from the Proposed Scheme together with existing and permitted developments, these would be avoided, managed, and mitigated by the measures which form part of the Proposed Scheme and through suitable conditions.

9.6. Air and Climate

9.6.1. **Overview**

9.6.1.1. Chapters 7 and 8 of the submitted EIAR deals with Air Quality and Climate respectively.

9.6.1.2. Air Quality

In relation to air quality the applicants have focused on receptors within 350m of the Proposed Scheme as well as receptors along construction traffic routes and redistributed traffic as the study area for the construction phase and a distance of 200m from the route corridor for the Operational Phase.

The key potential pollutants in terms of Air Quality have been identified as:

- Nitrogen dioxide (NO₂)
- Dust
- Particulate Matter PM₁₀ (i.e. with an aerodynamic diameter < 10 microns) and PM_{2.5} (with an aerodynamic diameter of < 2.5microns)

Section 7.2 (incl. tables 7.2 and 7.3) of the EIAR sets out the upper limits established in the various guidelines, policies, and regulations in relation to nitrogen dioxide and particulate matter (PM).

Baseline air quality was arrived at following a desk study of relevant available EPA ambient air quality data as well as through NO₂ monitoring surveys at 20 no locations proximate to, and in the vicinity of, the Proposed Scheme¹³, figure 7.1 of the EIAR (Volume 3 part 2) shows the locations which are listed in table 7.17 of the EIAR. Modelling was also carried out (Air quality, Traffic data, traffic dispersion, emissions) as well as verification of modelling¹⁴ to ensure predictions are accurate to allow assessment. Meteorological conditions were also considered in the modelling.

The sensitivity of the receptors has been categorised in terms of effects on people and property, human health impacts and ecological impacts. Overall the study area has high, medium, and low sensitivity receptors within 350m of the Proposed Scheme.

9.6.1.3. Climate:

The key potential factors in terms of climate are:

- Land Use Change (loss of trees/carbon sink).
- Greenhouse Gas (GHG) emissions (CO₂ being of primary concern).

Section 8 of the EIAR sets out the potential climate impacts arising from the Proposed Scheme and includes considerations on both the direct study area (i.e. the transport corridor within the red-line of the current application) and the indirect study area (i.e. a wider area where the Proposed Scheme will have an influence on changing traffic volumes above a defined threshold¹⁵ with reference to TII traffic and Transport Assessment Guidelines).

The climate assessment is desk based and draws from the projected traffic levels to calculate carbon emissions from construction materials, traffic, and traffic pattern changes as well as operational maintenance.

¹³ These 20 locations proximate to the Proposed Scheme were part of a wider monitoring campaign over 112 locations for the wider bus connects Dublin programme.

¹⁴ Comparison of monitored and modelling NO₂ concentrations.

¹⁵ Refer to Section 6.2.1 of the EIAR for further details and map.

9.6.2. Air Quality

9.6.2.1. Construction Phase Potential Impacts- Air Quality

- 9.6.2.2. During construction the main dust generating impacts will arise from earthworks (excavations, haulage, tipping, stockpiling, levelling, and landscaping), general construction activities and track out (i.e. dust/dirt transported from the site onto the public road networks and deposited/re-suspended by other vehicles). As there are no major demolition works as part of the proposed scheme these are not seen as a significant source of dust. The construction phase also has the potential to give rise to impacts on regional air emissions. The Board should note that the projections and assessment within the EIAR consider 2024 as the construction year, 2028 as the opening year and 2043 as the design year (opening year plus 15 years).
 - In relation to earthworks I note that the applicants refer to the IAQM¹⁶ guidelines when assessing the magnitude of dust emission from earthworks. Accordingly, as the Proposed Schemes construction compound and construction site areas will have a total site area between 2,500m² and 10,000m² and that it is unlikely that there will be more than five heavy earthmoving vehicles in use at any one time during peak construction activities¹⁷, the magnitude of dust emissions from earthworks can be described as medium. The sensitivity of the area is high for dust soiling and medium for human health impacts, on this basis there is an overall medium risk of temporary dust soiling impacts and human health impacts from earthworks. I consider the proximate European ecologically designated sites (Dublin Bay SAC and South Dublin Bay and River Tolka Estuary SPA) to be highly sensitive receptors while ecological areas at greater distance are of medium sensitivity. As the magnitude of dust emissions is medium there is medium risk for ecological impacts in an unmitigated scenario.
 - There are no buildings being provided as part of the Proposed Scheme, with the main relevant construction activities other than earthworks being installation of paving materials, provision of retaining walls, a ramp at Grand

¹⁶ Institute of Air Quality Management Guidelines

¹⁷ Construction activities will be phased as set out in Section 5.2 of the EIAR and referenced in Section 3.8 above.

Canal Walk, boundary setbacks and gateway alterations. Using the IAQM guidance dust emissions from the construction activities can be classified as being of small magnitude, giving an overall low risk of temporary dust spoiling and human health impacts and a low risk in terms of ecological impacts in the unmitigated scenario.

- Track out activities, with between 10 45 Heavy Duty Vehicle (HDV) outward movements in any one day is classified as having a dust emission magnitude of medium under the IAQM. Overall giving a medium risk of temporary dust spoiling, human health and ecological impacts arising in an unmitigated scenario.
- Construction traffic has been considered in the context of the Do Minimum (traffic projections without the Proposed Scheme – but with other future developments) and Do Something (traffic projections with the Proposed Scheme), in the context of NO₂ and particulate matter (PM) concentrations. The EIAR provides a comparison between the two scenarios and notes that slight beneficial and slight adverse impacts will arise at differing locations throughout the route, however, overall impacts will be negligible, which considering the EPA guidelines gives an overall impact of emissions from construction phase of neutral and short-term. In terms of impacts on ecology from construction traffic the annual mean NO_x is either not changed or reduced across all sensitive receptors except for the Grand Canal pNHA (at Grand Canal Street Upper, Leeson Bridge, and Mespil Road). In relation to Nitrogen deposition most sites are below the critical lower load for the designated habitat sites in the Do Minimum and Do Something scenarios except for the Grand Canal pNHA at Leeson Street, which will be above in both scenarios with the do something scenario resulting in a 1% increase relative to the lower critical load. Therefore giving an impact for the construction phase of overall negative, slight, and short term under the EPA guidelines.
- In terms of the Regional Air Quality the construction phase impacts will result in increases in emissions of all the modelled pollutants. The majority of increases in emissions result from redistribution of vehicles onto diversionary routes during construction and increases are minimal between the do nothing

and do something scenarios. The regional impacts on air quality for the construction phase pre-mitigation are therefore, neutral and short term.

9.6.2.3. Operational Phase Potential Impacts- Air Quality:

- 9.6.2.4. Operational Phase impacts on air quality will arise solely from the changes in pollutants arising, these have been modelled in the Do Minimum (DM) and Do Something (DS) Scenarios across the 2028 (opening year) and 2043 (design year) in relation to the various receptors.
- 9.6.2.5. In the DM 2028 scenario while the majority of modelled receptors are estimated to have a negligible impact in annual mean NO₂ concentrations¹⁸, they are above the national air quality limit value in some areas, with 27 exceedances being modelled. Annual mean PM_{2.5} and PM₁₀ concentrations are below the relevant national air quality limit value objectives for the modelled receptors.
- 9.6.2.6. In the DS scenario for 2028 the majority of modelled receptors are estimated to experience a negligible impact in annual mean NO₂ concentrations¹⁹, however there are 30 areas where exceedances of the relevant national air quality limit are predicted (an increase from 27 exceedances precited in the DM scenario). Annual mean PM_{2.5} and PM₁₀ both remain below relevant national air quality limits.
- 9.6.2.7. In comparing both 2028 DM and DS scenarios at the most impacted receptor locations (table 7.32 of the EIAR refers), in relation to NO₂ a slightly beneficial impact is estimated at 32 receptors, moderate beneficial impact at 5 receptors and a substantial beneficial impact at 6 receptors. These changes are primarily due to the diversion of traffic that will arise from the Proposed Scheme. This must be balanced against a slight adverse impact being projected at 17 receptors and the moderate adverse impact at 9 receptors on Leeson Street and Donnybrook Road. While the localised moderate impacts are negative and significant, I consider them to be medium-term²⁰ (in a worst case scenario) as by the design year (2043) there will be

¹⁸ Table 7, Appendix A7.1 of EIAR refers.

¹⁹ Table 7, Appendix A7.1 of EIAR refers.

²⁰ EPA guidelines 2022 defines short terms effects as lasting 1-7 years, medium term effects 7-15yrs and long term effects 15-60 years.

reductions in NO₂ concentrations arising from reductions in emissions from advances in engine technology and increased penetration of electric vehicles. In this regard I note that the EIAR considers the impact in NO₂ emissions to be short-term, however, as no definitive evidence is provided in terms of the longevity of the exceedances, I consider it appropriate to consider the impact to be medium term. Overall, PM levels in relation to the Proposed Scheme are negligible.

- 9.6.2.8. I therefore consider that in the unmitigated impacts from the operational phase of the Proposed Scheme in relation to NO₂ and Particulate Matter to be Neutral and long-term. In this regard I note that older fleet (in terms of technology) projections have been used and that the effects of the current (/or previous 2021) Climate Action Plan measures have not been incorporated into the EIAR²¹ (for example the fleet of electric vehicles is planned to be greater by the opening year than modelled in the EIAR) and accordingly I consider that total concentrations of NO₂ and PM will in all likelihood be lower than reported in the EIAR and that therefore the EIAR has adopted a caution and conservative approach in this regard.
- 9.6.2.9. In relation to impacts on sensitive ecological receptors (i.e. SPAs, SACs, NHAs and pNHAs) during the operational phase, (similar to the construction phase) all sites are shown to exceed critical levels for NO_x in both DM and DS scenarios. The Board should note, however, in the DS scenario Nitrogen deposition is projected to be reduced at Booterstown Marsh, South Dublin Bay SAC, and South Dublin Bay and River Tolka Estuary SPA from that in the DM scenario. For the Grand Canal pNHA, of the fifteen locations modelled, nine were shown to have a higher annual mean NO_x concentration in the DS scenario than in the DM scenario. When Nitrogen deposition levels are compared to the lower and higher critical loads for the designated habitat sites (table 7.34 of EIAR refers) the lower critical load is only exceeded for one of the monitored locations the Grand Canal pNHA at Leeson Bridge. This occurs in both the DM and DS scenarios. I consider therefore that the ecological impacts arising from the operational phase to be overall negative, slight, and long-term.

²¹ As they were not known at the time of lodgement of the current application.

9.6.2.10. In terms of impact on regional air quality the EIAR notes that the Proposed Scheme pre-mitigation will lead to an overall increase in pollutants in the opening and design year of the proposed development, due primarily to predicted slower and/or longer travel times for cars and HGVs. The percentage change in 2028 does not exceed 0.20% across any of the categories, while in 2043 it is not predicted to exceed 0.4%. Pre-mitigation impacts for the operational phase in terms of traffic emissions are therefore considered overall to be neutral and long-term.

9.6.3. Mitigation Measures – Air Quality

- 9.6.3.1. Mitigation measures are set out in section 7.5 of the EIAR and include provisions during construction to reduce dust nuisance arising during construction, these include inspection and cleaning of affected public roads, material handling and stockpiling of materials to minimise exposure to wind, water misting/spraying as necessary, trucks moving materials to be covered with tarpaulins, site hoarding along sensitive boundaries, monitoring of dust mitigation measures and updating methods were appropriate.
- 9.6.3.2. In relation to construction traffic as there will be a neutral/slight temporary impact on air quality no specific construction phase monitoring or mitigation is proposed.
- 9.6.3.3. No specific operational phase mitigation measures are proposed, the areas that have been identified as potentially experiencing moderate adverse effects (R138 Leeson Street) is an area of known congestion which is experiencing high levels of baseline NO₂ concentrations. Furthermore, as stated previously it is anticipated that changes to the national vehicle fleet will improve traffic emissions over the short, medium and long terms, for example the Climate Action Plan 2023 targets include reducing the total distances driven across all car journeys by 20%, walking, cycling and public transport to account for 50% of journeys and that 30% of private cars and 20% of Light Goods Vehicles will be electric and accordingly I consider that these impacts will reduce to negligible by the design year (2043).

9.6.4. Climate

9.6.4.1. Construction Phase Potential Impacts- Climate:

- 9.6.4.2. Potential construction phase impacts on climate arise from the use of carbon in materials, construction traffic emissions and land use change. The EIAR estimates that the Proposed Scheme will result in total CO₂ equivalent (CO₂e) emissions of 4.3ktonnes in terms of embodied carbon (i.e. raw materials, manufacturing/ refinement of materials, installation etc.), construction activities, waste and site clearance over the 24 month construction period, giving a negative significant and short-term impact. Construction phase traffic is predicted as having an increase of 0.25ktonnes of CO₂e over the "do Minimum" estimates, the majority of this increase arises from diversion of traffic onto longer routes during construction. These rates are conservative, as the modelling used applies the peak construction day in 2024 across the entire year. This impact is negative, significant, and short-term.
- 9.6.4.3. The proposed land use will essentially remain the same during construction albeit that there will be a minor variation where the construction compound will be provided on a disused and overgrown car park. While significant land use changes will not arise as the site will overall remain as a major transport corridor there will be alterations through localised carriageway widening, loss of (329 no.) trees and hedgerow. In this regard I note that as part of the construction phase it is proposed to provide 349 no. trees, 558m of hedgerows, grassland, and ornamental/native planting. These measures are not provided as a climate change mitigation measure but as a part of the overall design scheme that serves amenity and landscape purposes, nonetheless these will contribute to additional carbon sequestration that I consider offsets the loss of trees to result in a short term neutral overall impact in this regard.

9.6.4.4. Operational Phase Potential Impacts- Climate

9.6.4.5. The operational phase of the proposed development will give rise to a total maintenance phase GHG emissions of 1.1kt CO_{2eq} which constitutes a negative, significant, and permanent impact prior to mitigation.

- 9.6.4.6. Direct and indirect operational phase impacts will arise from the traffic emissions arising from the Proposed Scheme as discussed in Section 8.5.2.4 of the submitted EIAR. In comparing the DS and DM scenarios for combined direct and indirect operational phase emissions in the opening year 2028 there is a reduction of 0.2ktonne CO_{2eq} in emissions, while the same figure for the 2043 design year is an increase of 0.9ktonnes. The primary driver in this increase is the rise in number of goods vehicles which are ultimately not affected by the Proposed Scheme and which have been projected without consideration of future potential fleet technology improvements. If car and bus projections are focused on the Proposed Scheme results in a reduction of 1.2ktonnes (2028) and 0.4ktonnes (2043) in CO_{2eq} in the DS scenario when compared to the DM. Accordingly, the Proposed Scheme will have a positive significant and permanent effect in relation to climate change prior to mitigation.
- 9.6.4.7. In arriving at these figures the Board should note that they are broadly based on projections using existing traffic volumes and without considering improvements on traffic signalling in the indirect area, which once optimised (not subject to the current application) will facilitate improved travel times over the wider network and thus improve indirect emissions arising. Furthermore, the figures do not consider any future frequency in bus services beyond that set out in the current application albeit the Proposed Scheme will facilitate increased levels of resilience, frequency, and attractiveness of bus services (as well as pedestrian and cycling facilities) along the route, thus, encouraging modal and societal shifts in travel behaviour. In this context I consider that the significance of impacts set out above to be robust while conservative.

9.6.5. Mitigation Measures - Climate

9.6.5.1. Measures to minimise/reduce embodied carbon in the construction phase are set out in section 8.7.1.1 of the submitted EIAR. These include the use of ground granulated blast furnace slag concrete in lieu of Portland cement where practicable, reuse of materials and local sourcing of materials. A construction traffic management plan will also be developed/used (as detailed in the CEMP).

9.6.5.2. During the operational phase road maintenance will require the use of bituminous materials for which mitigation cannot be provided, however, in this regard I note that the use of the route as a major transport corridor will remain the same and while the additional works and surfaces will likely require more maintenance interventions than the existing infrastructure would necessitate, in the DM scenario there would already be an established baseline level of maintenance into the future, which may require further additional interventions in the absence of the infrastructure improvements proposed due to the aging nature of the existing.

9.6.6. Residual Impacts

Air Quality

- 9.6.6.1. Following the implementation of the construction phase mitigation measures there will be a neutral short-term impact on air quality from the Proposed Scheme in relation to construction dust, road traffic impact on local human receptors and regional air quality, with a negative, slight, short-term impact on local ecological receptors.
- 9.6.6.2. The operational phase does not have bespoke specific mitigation measures in relation to air quality as the impacts are neutral and long term in relation to local human receptors, and regional air quality, while impacts on local ecological receptors are negative, slight, and long-term. Again while not a project specific mitigation measure, I note that the purpose of the scheme will facilitate modal shift and that improvements to the national fleet will reduce emissions over the medium and long term. The operational phase of the proposed development will therefore give rise to a neutral long-term effect.

Climate

9.6.6.3. In relation to climate following implementation of mitigation measures I consider that the construction phase will give rise to significant short-term negative impacts, similar to any large-scale transport construction project. Mitigation measures and construction practices will serve to minimise these but not alter the significance of impact in relation to climate.

- 9.6.6.4. For the operational phase I note that the proposed development will result in decreasing the accommodation for general car traffic (and emissions reductions) while improving bus, pedestrian, and cycling facilities. The GHGs reductions facilitated through the reductions in emissions from cars and buses enabled by the Proposed Scheme, equate to the removal of approximately 3,000 and 3,300 car trips per weekday from the road network in 2028 and 2043 respectively. Accordingly, the operational phase of the proposed development will have a positive, significant, and permanent impact on climate.
- 9.6.6.5. I have considered all of the submissions made in relation to air quality and climate, in addition to those specifically identified in this section of the report. I am satisfied that while adverse impacts will arise at certain times and phases within the scheme that these would be either sufficiently managed and mitigated by the measures which form part of the proposed scheme and/or through suitable conditions. I am, therefore, satisfied that the Proposed Scheme would not have any unacceptable significant direct or indirect impacts in terms of air quality and climate and that ultimately the Proposed Scheme will give rise to significant positive impacts in relation to Climate. I am also satisfied that while some cumulative effects may arise from the Proposed Scheme together with existing and permitted developments, these would be avoided, managed, and mitigated by the measures which form part of the Proposed Scheme and through suitable conditions.

9.7. Noise and Vibration

9.7.1. Noise and Vibration is dealt with in Section 9 of the submitted EIAR, it considers Noise Sensitive Locations²² (NSLs) as well as vibration sensitive locations²³ (VSLs) within a buffer of 300m (for construction) and 1km (for operation) of the proposed scheme (as well as along re-distributed traffic routes). The Bord should note that third-party submissions have raised concerns in relation to noise and vibration

²² Areas where people spend significant periods of time and where concentration, sleep and amenity are important considerations (e.g. dwellings, schools, hospitals, hotels, recreation areas etc).

²³ Including buildings with vibration sensitive equipment (e.g. laboratories or sensitive medical equipment)

effects arising from the Proposed Scheme both during construction and operation as being inappropriate and having adverse impacts on amenities.

- 9.7.2. The key noise and vibration sensitive receptors along the Proposed Scheme include residential properties within up to 100m, schools, pre-schools and colleges, clinics, nursing homes, and hospitals. The baseline noise conditions have been established from a desk study using EPA publicly available data which includes all existing sources of major rail, road, and aircraft noise within Dublin, and was augmented through conducting a noise survey²⁴ at 18 no. locations along the route (and at locations of interest in the vicinity) of the Proposed Scheme.
- 9.7.3. The submitted EIAR considers the Proposed Scheme in the context of the TII Noise Guidelines 2004 (NRA 2004) and 2014 (NRA 2014) – albeit these documents predominantly relate to roads developments through rural (and therefore lower noise) areas – as well as BS 5228 – 1:2009+A1:2014, and from these has derived construction noise thresholds (CNTs) for the Proposed Scheme, given its urban location in combination with the projects linear character and transient nature of the works as they progress. The thresholds categorise areas as A, B, or C, dependent on the established background noise at night-time and establish different threshold levels for each, for works at night, while establishing different levels for works during the day and evening, for urban and suburban properties and offices close to roads and industrial areas, and away from main roads. This baseline level is used to categorise and classify the level of impacts arising from noise on receptors in the study area. From the outset I note that any construction activities are going to give rise to adverse noise impacts that will affect proximate properties negatively, particularly within an urban/suburban environment such as that in which the subject works are proposed. The construction noise thresholds established within the submitted EIAR (table 9.10 refers) range from 45 to 75 dB_{LAeq} (period). The magnitude of effects is considered to be significant where it is determined that a major or moderate magnitude of impact occurs for a duration exceeding 10 of more days in any 15 consecutive days or nights or in excess of 40 days over any 6 consecutive months. Significance ratings of noise impacts have been determined by using the baseline noise level of 67dB_{LAeq, 12hr} (which has been established from the noise

²⁴ Appendix A9.1 of the EIAR contains the results Noise and Vibration Survey

surveys carried out on the route) and comparing noise effects from the Proposed Scheme in the context of this and any exceedance of the construction noise thresholds.

- 9.7.4. In relation to vibration, the assessment in the EIAR has established differing recommended limits for transient (surface construction) vibration in relation to buildings depending on the soundness of their construction, their use (i.e., residential, commercial, industrial), their heritage value or protected status. The recommended limits range from a Peak Particle Velocity (PPV) of 3mm/s for vulnerable structures to 50mm/s for reinforced or framed structures, continuous vibration levels are set at 50% those of the relevant transient levels. Values have also been assigned to human response criteria to vibration levels noting that higher levels of vibration are usually tolerated for single events of short-term nature during construction. Where significance of levels under 0.14mm/s PPV are imperceptible, ≥0.14 to 0.3 mm/s PPV are considered imperceptible to not significant, ≥0.3 to 1mm/s PPV not significant to slight, ≥ 1 and <10mm/s PPV moderate to significant, and 10mm/s PPV and greater significant to very significant.</p>
- 9.7.5. In relation to assessing noise and vibration I note that the proposed works are to an existing transport corridor which will continue to cater for significant traffic volumes whether the Proposed Scheme goes ahead or not, and accordingly changes in traffic volumes in the design year and differences between the do minimum and do something scenarios are also of consideration. In relation to this issue the EIAR considers that where changes in traffic noise levels at NSLs along the Proposed Scheme in the short to medium term (i.e. year of opening plus 15 years) is less than 3dB the impact is not significant and above this level impacts are deemed to be potentially significant, similarly 3dB is the threshold for significance for the long term (i.e. design year 2043).
- 9.7.6. The EIAR has also considered absolute noise levels and the provisions of the Dublin Agglomeration Noise Action Plan 2018-2023²⁵ (NAP), and the ProPG²⁶, both of which define a daytime noise level below 55db(A) as being low/desirable low, and

²⁵ By Dublin City Council, Dun Laoghaire Rathdown County Council, Fingal County Council and South Dublin County Council.

²⁶ Planning & Noise – New Residential Development by the Institute of Acoustics, provides practitioners with guidance on noise management for new residential development.

noise levels above 70dB(A) as high/undesirably high. The 2018 NAP has noted that overall population and dwelling noise exposures have improved since the previous 2013 iteration, and this has been partially attributed to improved public transport and cycling facilities, limiting HGVs to particular routes in the city as well as revised speed limits and limiting delivery hours in built up areas.

- 9.7.7. The WHO guidelines are also referenced within the EIAR, however, I note that these are primarily considered to inform national policy decisions and public health orientated recommendations at a large population level/scale and are not intended to be applied at a receptor level or individual project basis.
- 9.7.8. In the interests of clarity I wish to confirm that I am satisfied that the methodologies set out in the submitted EIAR are appropriate to assess the noise and vibration impacts arising in relation to the proposed development having regard to the nature and location of the proposed works.

9.7.9. Overview - Baseline

- 9.7.10. The available published noise mapping (by the TII which fed into the Dublin Agglomeration NAP) is presented in Volume 3 (Figures 9.1.1 and 9.1.2 of the EIAR refer) and tabulated in Figure 9.20 of the EIAR, and demonstrates that road noise is the dominant noise source throughout all five sections of the Proposed Scheme route. NSLs within 20m of the road edge are within the 60-69 dBL_{den} for all sections of the Route with the exception of the Nutley Lane whose NSLs (residential properties and SVUH are at various sets backs from 15 to 45m from the road edge) are in the 60-64 or 55-59dbL_{den} contours dependent on the extent of the set back.
- 9.7.11. While confirming road noise as the dominant noise source throughout the route The noise surveys also provided the following average daytime noise levels:
 - Stradbrook Road to Booterstown Avenue: between 60-74dB LAeq,T,
 - Booterstown Avenue to Nutley Lane: between 62-66dB LAeq,T,
 - Merrion Road (Nutley Lane to Ballsbridge): between 63-67dB LAeq,T,
 - Ballsbridge to Merrion Square: between 60dB-65dB L_{Aeq,T}, and
 - Nutley Lane: between 56dB and 60dB LAeq,T

- 9.7.12. I note that the attended noise surveys were carried out in July and September 2020 when the COVID-19 restrictions were in place but minimised (i.e. schools and non-essential retail had been re-opened and employees permitted to return to work if working from home was not an option). As monitoring was carried out during COVID travel restrictions the submitted EIAR compares the results of the dedicated noise survey data with DCC long term noise monitoring and compares traffic counters between 2019 and 2020, and determined that the noise levels during the 2020 survey periods are likely to be 0.4 to 1.5 dB lower than the same months in 2019. I consider that this small degree of variance appropriate and acceptable as baseline noise levels are not used in predicting future traffic noise, or construction noise but used as a comparator to determine significance of impact. Using the baseline survey results will therefore represent a conservative approach and serve to highlight rather than hide the levels of significance of impacts in relation to noise.
- 9.7.13. In relation to vibration, attended vibration monitoring was carried out at sample locations both adjacent to existing bus lanes within Dublin City (so that typical vibration levels of buses along a mixed-use traffic lane could be measured) and at a controlled sampling location (so that the specific vibration level of buses could be determined). The results of these survey's confirmed that vibration levels associated with a heavily trafficked urban suburban road inclusive of a dedicated bus lane results in negligible vibration levels at the edge of the road in terms of both human perception and building response, these results are consistent with my subjective observations during site inspection.

9.7.14. Potential Noise and Vibration Impacts:

Construction Phase.

9.7.14.1. Any construction project is going to give rise to noise impacts. The EIAR lists the range of construction activities that are required by the Proposed Scheme, which includes general road works, road widening/upgrade, utility diversions, bus gate construction, urban realm landscaping, construction compound activities, boundary treatments, retaining walls and ancillary works (decommissioning substations, relocation/reorientation of heritage gates/arches, upgrade of Grand Canal tow-path ramp) and emergency works. The EIAR lists the relevant equipment required to carry

out these works and calculates noise that will be generated at NSLs in the vicinity of areas where such works are required and equipment used. As would be typical in urban and suburban construction projects noise levels are shown to exceed CNTs at noise sensitive locations throughout, with negative impacts ranging from slight to very significant in the absence of mitigation along the works areas dependent on the nature and proximity of the receptor. All such impacts will be temporary during the construction period.

- 9.7.14.2. In relation to vibration from construction activities the submitted documentation confirms that all works required for the Proposed Scheme are an order of magnitude below limits which could generate any cosmetic or structural damage to structurally sound or protected/heritage buildings. I therefore consider potential for impacts to arise from construction vibration to be neutral and not significant.
- 9.7.14.3. In relation to impact from construction traffic all roads within 1km have been considered and the noise levels from the 'do minimum' and 'do something' scenarios have been calculated and compared. For the majority of roads within that study area traffic noise impacts have been determined to be imperceptible/positive or negative not significant to slight. Slight to moderate impacts from construction traffic have been identified at locations on Carysfort Avenue, Elgin Road, and Haddington Road, while a moderate impact has been identified at Pembroke Lane (Figure 9.3 of EIAR refers). All these impacts are temporary for the duration of the construction phase.

Operational Phase.

- 9.7.14.4. To determine noise impacts from the operational phase two key assessment zones have been considered – the route of the Proposed Scheme itself and the road network within 1km. From modelling the traffic volumes in 2043 are shown to be lower than those in 2028, largely due to modal shift into public transport facilitated through the transport Strategy for the Greater Dublin Area, 2016-2035.
- 9.7.14.5. Traffic modelling in the EIAR has shown that the route of the Proposed Scheme will experience an imperceptible-positive to a not-significant negative impact from noise in 2028, as a result of overall reduced overall traffic volumes. Certain roads within the 1km study boundary will experience a slight-moderate adverse impact from redistributed traffic, these roads which include Carysfort Avenue, Anglesea Avenue,

Herbert Road, Lansdowne Road, Percy Place, and part of Haddington and Mespil Roads will experience this impact over the short-medium term.

- 9.7.14.6. The 2043 design year modelling shows that there will be a positive, imperceptible to slight, long-term impact along the majority of the Proposed Scheme Route with small pockets of not-significant negative impacts over the long term. The majority of roads within the 1km study area predicted to experience either imperceptible positive or negative not significant to slight long-term impacts. There are two roads, however, (Lansdowne Park and Herbert Road) that are predicted to experience long term moderate and slight-moderate negative impacts for noise.
- 9.7.14.7. In terms of vibration levels during the operational phase I note that the monitoring scenarios carried out indicate that a bus generates 0.1mm/s PPV or less, which is below the normal range of perceptible human response to vibration. Furthermore, the route of the Proposed Scheme is already in use as a busy transport corridor. Accordingly, I do not consider that there will be any significant impacts arising from vibration during the operational phase.
- 9.7.14.8. The relocation and provision of new bus stops at new locations has the potential to increase noise impacts, particularly where new locations are proximate to NSLs and/or are at locations which do not benefit from extant screening. There are six such locations identified (along the Rock Road, Merrion Road, Pembroke Road and Baggot Street Lower). At these locations traffic noise is dominant and will remain so during the operational phase. The City Bus fleet is forecast as becoming 100% electric for the design year of 2043, which will reduce engine noise over the operational phase and overall traffic levels will be reduced. Accordingly, while I consider that the noise impacts arising at the relocated or new bus stop locations will be negative and long-term I do not consider that impacts will be significant.
- 9.7.14.9. In relation to maintenance works these will be ongoing throughout the operational period and would be required along this transport corridor whether the proposed scheme goes ahead or not. I therefore consider that these impacts will not be significant.

9.7.15. Mitigation Measures

- 9.7.15.1. The submitted CEMP (Appendix A5.1 of the EIAR) and section 9.5.1.1 of the EIAR provides a suite of mitigation measures in relation to Noise and Vibration which include the following:
 - Contractor being required to take specific noise abatement measures to comply with construction noise limits detailed in EIAR.
 - Employing the best means practicable to minimise noise from site operations.
 - Contractor must put in place most appropriate noise control measures depending on the level of noise reduction required at individual working areas.
 - The least noisy item of plant or equipment available must be selected where practicable.
 - Mobile plant will use acoustic exhausts and canopy's and operated with panels closed.
 - For percussive tools (like breakers) noise control measures such as mufflers or sound reducing equipment are to be fitted.
 - Noisy plant or equipment will be sited away from noise sensitive boundaries of the construction compound, and 2.4m high hoarding provided along relevant boundaries.
 - Where compressors, generators and pumps are located in proximity to NSLs and have potential to exceed the construction noise thresholds, these will be surrounded by acoustic lagging or enclosed within acoustic enclosures.
 - Construction activities will be scheduled in a manner that reflects the location of the site and the nature of neighbouring properties and activities scheduled to avoid significant cumulative noise levels.
 - The NTA will establish clear forms of communication that will involve the appointed contractor and NSLs in proximity to the works so that residents or building occupants are aware of the duration of activities likely to generate noise or vibration that are of potentially significance.
 - The contractor will carry out noise monitoring at representative NSLs to evaluate and inform the requirement and/ or implementation of noise management measures.

- The appointed contractor will carry out vibration monitoring at buildings and structures where proposed works have the potential to be at or exceed the vibration limit values established in the EIAR. Vibration from construction activities will be limited to the values set out in Table 9.13 in Chapter 9 of the EIAR to avoid any form of potential cosmetic damage to buildings and structures.
- A clear communication programme will be established by NTA to inform adjacent building occupants in advance of any potential intrusive works which may give rise to vibration levels likely to result in significant effects as per Table 9.14 in of the EIAR;
- Activities capable of generating significant vibration effects with respect to human response (as per Table 9.11 in the EIAR) will be restricted to daytime hours only, as far as practicable.
- Appropriate vibration isolation (such as resilient mounts to pumps and generators) will be applied to plant and equipment, where required and where feasible.
- Generally, construction working hours will be between 07:00hrs and 23:00hrs on weekdays, and between 08:00hrs and 16:30hrs on Saturdays. The planning of night-time and Sunday working (which will be required during certain periods in order to facilitate street works that cannot be undertaken under daytime/ evening time conditions) will take consideration of sensitive receptors, in particular any nearby residential areas.

9.7.16. Noise and Vibration Conclusion

9.7.17. As with any construction project of the scale proposed noise impacts will arise in relation to the Proposed Scheme. I am satisfied that due to the nature of the proposal that the scale of the proposed construction impacts will be temporary and transient in nature and will not give rise to significant adverse impacts and that the requirements and needs of the local population can be adequately managed to minimise the impacts felt from noise and vibration. I also note that the during the operational phase that the use of the transport corridor will be consistent with that already in place albeit that there will be carriageway reassignment and priority

assigned to public transport and additional cycling and pedestrian facilities provided. I am satisfied that the development will not give rise to significant adverse effects from noise or vibration with the application of the measures set out in the application documentation.

9.7.18. I have considered all of the submissions made in relation to noise. I am satisfied that these would be avoided, managed, and mitigated by the measures which form part of the proposed scheme, the proposed mitigation measures and through suitable conditions. I am, therefore, satisfied that the Proposed Scheme would not have any unacceptable direct or indirect impacts in terms of noise. I am also satisfied that while some cumulative effects may arise from the Proposed Scheme together with existing and permitted developments, these would be avoided, managed, and mitigated by the measures which form part of the Proposed Scheme and through suitable conditions.

9.8. Biodiversity

- 9.8.1. Biodiversity is dealt with in Section 12 of the EIAR which reviews the relevant legislation, provides details of the baseline ecological environment, and provides a variable Zone of Influence (ZOI) in relation to specific ecological features/receptors. The EIAR biodiversity section has been informed by both desk study and field assessments and surveys in relation to designated areas for nature conservation, habitats, rare/protected plant species, non-native plant species, mammals, birds, reptiles, amphibians, fish, and invertebrates.
- 9.8.2. From the outset I note that the site of the Proposed Scheme constitutes works along an existing busy transport corridor within an urban environment, however, there are sensitive ecological corridors, features, species, and designated sites along, proximate, and within the development footprint of the works areas. Furthermore, I note that the importance of the ecological/natural features and amenities within the urban environment including planting, parks, treelines, gardens, urban trees, coastal areas, riparian zones, should not be underestimated in terms of their importance to support local biodiversity regardless of the urban context.
- 9.8.3. I have reviewed the various Zones of Influence (ZoI distances over which a likely significant effect may occur) that have been established in the EIAR in relation to

various environmental receptors/media and consider them to be acceptable and appropriate having regard to the specific nature of the scheme and the characteristics of the receptors. The following ZOIs are of note in relation to biodiversity:

- ZOI for terrestrial habitats is generally the footprint and immediate environment of the Proposed Scheme.
- ZOI for Air Quality construction phase impacts of 50m from the Proposed Scheme and 500m from the temporary construction compound. Operational Air Quality phase ZOI of 200m from routes which have a change in Annual Average Daily Traffic (ADDT) greater than 1,000.
- The potential ZOI for aquatic plants, habitats and animals includes all estuarine, river or bay habitats downstream of the Proposed Scheme, with that for Atlantic Salmon and Lamprey being limited to waterbodies crossed by, or drained to, the Proposed Scheme. The critical consideration here being the hydrological linkages in place and the potential magnitude of discharged waters and/or potential volumes and type of pollutants.
- The ZOI for mammals is species dependent, with otter and badger having a ZOI of 150m²⁷, bat roosts approximately 200m but can be variable (increased) and is considered in a case-by-case basis dependent on importance/type of roost.
- The ZOI in relation to birds is considerably more variable. Breeding birds ZOI is generally restricted to the habitat loss within the footprint of the Proposed Scheme (such as tree loss and hedgerows), however, indirect impacts on wintering birds could extend to 300m for general construction, while ex-situ disturbance impacts from the Scheme could have wider ranging impacts as many estuarine bird species use inland feeding sites proximate to works/operational areas with many species being SCIs of European designated sites.

²⁷ In line with NRA guidelines (Guidelines for the Crossing of Watercourses during the Construction of National Road Schemes (NRA 2005) and the Guidelines for the Treatment of Badgers Prior to the Construction of National Road Schemes (NRA 2005b)

- ZOI of amphibian species is generally limited to direct habitat loss or severance within the scheme boundary or indirect impacts on water quality for connected wetlands.
- 9.8.4. In the following sections I set out the relevant species and habitats of concern, potential impacts arising, mitigation measures proposed, and consideration of the significance of any residual impacts. These are discussed under the following headings:
 - Habitats,
 - Protected Plant Species
 - Mammals
 - Birds
 - Reptiles, Amphibians and Fish
 - Invertebrates
- 9.8.5. In order to establish the ecological baseline the applicant carried out a range of surveys throughout 2018 to 2021, including:
 - Habitat surveys: June-Aug. 2018, Aug. 2020, Oct. 2020.
 - Bat Surveys: Surveys consisting of walked transect surveys at three selected locations (on lands adjacent to Nutley Lane, Rock Road adjacent to Blackrock College, and Rock Road adjacent to Blackrock Park) from June to Aug. 2018, Sept. & Oct. 2019, May & July 2020, July & Aug. 2021. Trees located within the footprint of the Proposed Scheme were also assessed for their potential to support roosting bats from June to Aug. 2018, and Aug. 2020.
 - Other Mammal Surveys: Badger and Otter surveys were carried out as part of the multidisciplinary walkover surveys undertaken between June and Aug. 2018, August 2020, and February 2021.
 - Wintering Birds: Desk Study identified two sites adjacent to Rock Road (Booterstown Nature Reserve and Blackrock Park) with potential for wintering birds and which would be subject to works. These sites were

surveyed using a "look-see" methodology - Feb. to March 2020, Nov. to March 2021, and Oct. to March 2022.

 Amphibian and Reptile suitability assessments: June to Aug. 2018 and Aug. 2020.

9.8.6. Habitats – Overview

- 9.8.7. The Proposed Scheme runs proximate to a number of European Designated sites and the potential for, and consideration of, impacts on these sites is set out in full in Section 10 of this report (Appropriate Assessment) further below. There is an overlap between the Proposed Scheme and the South Dublin Bay and Tolka Estuary SPA (4.3m²) at Booterstown Marsh, and the South Dublin Bay SAC (2.7m²) at Merrion Gates. In relation to this I note that where these overlaps occur the habitats in place do not correspond to QI habitats as they relate to areas of pre-existing hardstanding which are proposed to be replaced with new road surfacing (i.e. replacing like with like). I also note that there are underlying pNHAs at these locations too (Booterstown Marsh pNHA, and South Dublin Bay pNHA refer), while the Grand Canal is also designated as a pNHA in the vicinity of the proposed works.
- 9.8.8. There are also a number of nationally designated sites (pNHAs and NHAs) in the vicinity of the Proposed Scheme (listed in Section 12.4.3.1.1.7 of the submitted EIAR), the majority of which are incorporated within/overlapping SACs/SPAs.
- 9.8.9. The habitats along and within the footprint of the Proposed Scheme corridor are relatively typical of its urban environment, and include hedgerows, treelines, buildings and artificial surfaces, scrub, flower beds and borders, as well as amenity grasslands. There are some aquatic habitats in place along the corridor such as depositing lowland rivers, canals, as well as other artificial lakes and ponds. None of the habitats within the footprint of the Proposed Scheme correspond to Annex I habitats. Although the Board should note that the Proposed Scheme does run immediately adjacent to, and overlaps partially with, Booterstown Marsh which supports a number of coastal Annex I habitats within its wetland community complex. Lower Saltmarsh and Upper Saltmarsh (both Annex I habitats) have been identified to the east of the Proposed Scheme in Booterstown Marsh. These saltmarsh habitats are separated from the Proposed Scheme by a varying buffer of 10 15m of

scrub and linear habitats). The Proposed Scheme will require works to be carried out within the pNHA and SPA associated with the Booterstown Nature Reserve (/Booterstown Marsh) – in this regard I note that there is more overlap with the pNHA than the SPA due to the boundary of the pNHA extending further southwest in places i.e., into the established footpath/paving of the transport corridor. Where works are proposed they do not infringe or overlap with Annex I habitats, which the applicants have confirmed both through review of historical NPWS data (adapted from McCorry & Ryle 2009) and through communications with the reporting author of a more recent (unpublished) survey of the Marsh commissioned by An Taisce. I also note in this regard that the submission from the Development Applications Unit in relation to Nature Conservation acknowledges the works proposed along the marsh at Rock Road and notes that the range of mitigation measures set out within the submitted NIS and CEMP will ensure that adequate protection measures are provided to avoid pollution events. Furthermore on this point, some third-party submissions have referred to the reliance on outdated information in relation to ecological assessments, in relation to the Booterstown Marsh habitats, I am satisfied that the details provided are accurate, up to date, and form an appropriate basis upon which the Board can complete its relevant assessments to inform a decision.

9.8.10. Habitats – Potential Impacts and Mitigation

- 9.8.11. In relation to habitats there are a number of potential impacts that can arise from the Proposed Scheme during construction and operational phases, which I have listed below.
 - o Habitat Loss and Fragmentation,
 - o Habitat degradation arising from hydrological/hydrogeological impacts,
 - o Habitat degradation as a result of hydrogeological impacts,
 - Habitat degradation due to spread of invasive species,
 - Habitat degradation due to adverse impacts on air quality,
 - Disturbance and Displacement Impacts on Habitats.

9.8.11.1. Habitat Loss and Fragmentation:

Habitat loss will arise from the proposed development primarily from works within the footprint of the Proposed Scheme. These works will necessitate the removal of individual trees, hedgerows, treelines, scrub, flower beds and borders which all contribute to biodiversity. I note that no Annex I habitats will be subject to loss or fragmentation arising from the Proposed Scheme, furthermore, the Board should note that no loss of River (Dodder) or Canal (Grand Canal) habitats will arise as the proposed scheme crosses these locations at existing bridges and ramp improvement works will be carried out along the existing towpath of the Canal.

The Proposed Scheme will result in the permanent loss of 4,157m of treeline (329 no.) trees, and 1,040m of hedgerows as well as the temporary loss of c. 242m of treeline and 60m of hedgerow. In mitigation of this loss the Proposed Scheme includes the provision of 349 street trees and 558m of hedgerows. The Scheme also incorporates the provision of 1,241m² of species rich grassland, 4,990m² of ornamental planting, 176m² of native planting and 2,928m² of amenity grassland planting.

The Proposed Scheme will require works to be carried out within the South Dublin Bay SAC (at Merrion Gates) and South Dublin Bay and River Tolka Estuary SPA (/Booterstown Marsh pNHA) at Booterstown Marsh. I note where works are proposed which overlap with these designations that the areas impacted are those which are already paved/subject to hardcore and therefore Annex I, or habitats relied on by QI/SCI species will not be directly impacted.

Habitat may be lost due to loss of screening vegetation alongside known ex-situ winter bird feeding sites (e.g. at Blackrock Park, Blackrock College) such works could affect the extent of feeding lands available/considered suitable for bird species.

The Proposed Scheme will not result in the permanent direct loss or fragmentation of Otter habitat, as works will be crossing areas offering suitable habitat (such as the Dodder and Grand Canal) via bridges which are already operating as significant transport corridors.

Habitat loss/fragmentation could also arise as a consequence of degradation from a reduction in water quality or changes to the hydrological regime caused by the Proposed Scheme. The Proposed Scheme is hydrologically connected to Dublin Bay, the Dodder, Brewery Stream, Grand Canal, Booterstown Marsh and Nutley

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stream as well as a network of existing surface and combined sewer/surface water pipes. Notwithstanding the above, impacts arising from hydrological connectivity are more likely to result in habitat degradation and not loss, and this issue is more fully discussed below in relation to degradation.

While direct habitat loss will occur arising from the Proposed Scheme, no habitats of international or national importance will be affected. I note that the more sensitive habitats that will be lost are of local importance (higher value - i.e. trees, hedges etc.) and will have minimal geographic impact beyond the local level. However, I recognise that the loss of trees and hedgerows could be considered a significant impact throughout the entirety of the scheme. Trees and hedgerows are subject to replacement through the provision of additional landscaping as part of the overall design and as such while localised impacts (through the loss of a mature tree) may arise, impacts will be mitigated through the replacement planting and landscaping that is being provided.

I do not consider habitat fragmentation to be of significant concern as the works are along an existing significant transport corridor which is in place and operational.

9.8.11.2. Habitat degradation arising from hydrological/hydrogeological impacts:

As referenced above the Proposed Scheme is hydrologically connected to Dublin Bay, the Dodder, Grand Canal Booterstown Marsh, Nutley Stream and the various drains and sewers along its length. The potential release of contaminated surface water runoff, accidental spillage, or pollution event discharging to any surface water features in the Construction Stage has the potential to affect water quality in the receiving aquatic environment. Such impacts in an unmitigated scenario have the potential to create significant adverse impacts at the local and national level.

Such events would degrade the relevant aquatic environment and the range of species which are reliant on it. The potential adverse impacts that could arise include those directly on species that inhabit the aquatic environment as well as those that rely on it (e.g. through availability/abundance of prey species). Such species would include those which are QIs/SCIs of European Designated sites (including Otter and wintering bird species) and I therefore consider such impacts to be potentially significant and negative at the national scale in the absence of mitigation measures.

Due to the nature, location, and extent of proposed works (/excavations) in combination with the extant ground conditions I do not consider it likely that there will be impacts arising on groundwater dependent habitats from impacts on hydrogeology. I note that localised pumping may be required at works areas throughout the Proposed Scheme, however, the potential impacts arising would be negligible and temporary. Where impacts arise I consider that these can be managed and controlled as part of the construction programme and suite of mitigation measures included which protect water quality.

The Proposed Scheme provides a SuDs drainage design which will ensure that runoff rates will not increase and also includes detailed measures and controls set out in the CEMP, which includes the provision of a Surface Water Management Plan (SWMP), and Environmental Incident Response Plan (EIRP) for construction. These are discussed fully in section 9.9 (water) of this report below and in section 12.5.1 of the submitted EIAR. In relation to the operational phase the implementation of the SuDs measures will result in a beneficial (although imperceptible) impact on local water quality.

9.8.11.3. Habitat degradation due to spread of invasive species.

An area of three-cornered garlic was recorded within the proposed scheme while common cord-grass is known to be locally present within Booterstown Marsh, with records of other non-native invasives also in the vicinity. Impacts arising from the spread of invasive species have the potential to give rise to significant negative impacts on sensitive habitats within the ZOI of the Proposed Scheme at scales ranging from local to international in the absence of mitigation. The Proposed Scheme includes an Invasive Species Management Plan (ISMP - Section 5.3 of the CEMP refers), the implementation of which will ensure that this and other invasives are not spread as a result of the proposed works. The ISMP provides for a pre-construction survey and provides details of how any of the recorded invasives in the wider area can be dealt with in the event of any becoming established at works areas prior to commencement of development.

While the Cord-grass cannot be directly impacted by the proposed works (it is not located within the proposed footprint or any works areas) seeds could be spread further in the event of increased additional surface water runoff from the Proposed Scheme. This issue will be controlled through the management of surface water during the construction and operation (maintenance) period. Section 5.4 of the CEMP includes a Surface Water Management Plan which contains a comprehensive suite of control measures (Section 5.4.4.), and routine maintenance throughout the operational phase will be carried out by the relevant local authority.

9.8.11.4. Habitat degradation due to adverse impacts on air quality

Reductions in air quality from the Proposed Works have the potential to adversely impact on sensitive habitats in the vicinity. There are designated sites within proximity of the proposed works and construction compound and adverse impacts on air quality could give rise to significant effects on sensitive habitats both during the construction and operational phases due to potential emissions and dust. As set out above in section 10.6.8 (Air Quality) of this report I consider such impacts to be negative slight and short term on local ecological receptors following the implementation of mitigation measures for dust nuisance (section 7.5 of the EIAR) and considering that NO₂ deposition levels will remain below the critical loads for inland and surface water habitats, for SAC and SPA designated sites as set out in the submitted NIS. I do note that the lower critical load of NO₂ dry deposition rate is exceeded at Grand Canal Leeson Bridge, however, at this location this level is modelled to be exceeded in the DM scenario using conservative projections in terms of the transportation fleet and not considering the targets set out in the Climate Action plan 2023 (as the application was lodged in advance of their publication).

9.8.11.5. Disturbance and Displacement Impacts on Habitats.

The potential for impacts to arise on habitats from disturbance and displacement arises from the impact of the proposed works on the various species that will be affected, including birds (both wintering and breeding) as well as mammals. These are discussed further in detail below.

9.8.12. Protected Plant Species Potential Impacts and Mitigation

No protected plant species from the flora protection order 2015 were recorded within or in close proximity to the Proposed Scheme. Borrer's saltmarsh grass is known to occur in Booterstown Marsh, records show that opposite-leaved pondweed is located in the Grand Canal, Great burnet is located in UCD and wild asparagus within Blackrock, however, none of these species were recorded in surveys. I do not consider that direct impacts will arise due to the nature and location of the proposed works, however, impacts could arise from habitat degradation due to surface water quality impacts that could arise. Such impacts in the absence of mitigation have the potential to be of national scale significance. Accordingly, the mitigation measures set out regarding the protection of watercourses and drainage interventions will also ensure protection of plant species.

9.8.13. Mammals

9.8.13.1. Bats

In relation to bats where transect surveys took place bats were identified with the majority of occurrences being in the vicinity of Blackrock Park. I note only three transect areas were identified and surveyed for bats (adjacent to Nutley Lane, Rock Road adjacent to Blackrock College, and Rock Road adjacent to Blackrock Park) as these areas presented the best foraging habitat along the route. The surveys which were carried out over autumn, spring, and summer from 2018-2020, with additional sections surveyed in 2021, showed that there is bat activity at suitable locations along the scheme corridor.

No bat roosts were identified along the corridor although four trees along the route were identified as having the potential to support roosting bats, the Proposed Scheme does not have any direct impact on any of these trees, and Section 12.5.1.4.1 of the EIAR includes specific provisions to ensure protection of these trees during construction, accordingly there is no potential for impacts to arise on bat roosts.

In relation to bat habitat loss I note that the Proposed Scheme will result in loss of feeding habitat at the locations surveyed. These feeding areas are along planting/hedging adjacent to the existing transport route and its associated infrastructure (lights footpaths etc.) there is, in my opinion, limited potential for the works to result in fragmentation or the creation of a barrier effect due to the nature, location and context of the works, and surrounding habitats. I consider that the impact on foraging/commuting bats to be significant but only at the local level. In

relation to the provision of the temporary construction compound I note that there are limited foraging opportunities at this location and mitigation measures include the provision of appropriate lighting. Generally, works are being carried out at well-lit suburban and urban locations with sufficient artificial lighting provided, it is unlikely that additional lighting will be required and if it is the CEMP and mitigation measures set out in Section 12.5.1.4.1 of the EIAR state that potential of impact from any additional lighting (at works or compound area) on bats will be considered and designed to minimise adverse effects, additional tree planting that is provided as part of the Proposed Scheme will provide new habitat for foraging bats and lighting

During the operational phase there is the potential for temporary localised significant impacts to arise pending the species becoming habituated to the new roads layout and activity levels. Due to the short-term effect of this impact I do not consider further mitigation necessary.

9.8.13.2. Badger

In relation to Badger, no evidence of this species was recorded along the corridor, however, they are known to be widely distributed throughout the Greater Dublin Area. I note that the EIAR assumes that badger may occur in vegetated areas adjacent to the proposed scheme. The Proposed Scheme does require the removal of habitat that could be suitable for badger, such works will be localised and proximate to the existing road/pathways (e.g. where local widening is required at Blackrock park amenity grassland/embankment overlooking the pond). Such areas may be suitable for foraging or commuting badgers but would not be significant for the species. Badgers are nocturnal and as such lighting could give rise to impacts, however, the Proposed Scheme is along an existing well-lit and busy transport corridor and accordingly any locally occurring species would be habituated to a certain level of lighting and infrastructure. The additional compound lighting could give rise to significant local effect on Badgers. No setts or areas of high badger activity were identified within any of the modelled light spill zones of the Proposed Scheme. The mitigation measures set out in section 12.5.1.4.2.1 of the EIAR ensures that lighting will be designed in a manner that will limit light-spill, furthermore pre-construction badger surveys will be carried out, and excavations will be covered to ensure entrapment does not occur. While the mitigation measures are, in my

opinion, appropriate there will remain a potential residual significant effect at the local geographic level in relation to habitat loss, mortality risk, and displacement/disturbance.

9.8.13.3. Otter

In relation to Otter, mustelid footprints were noted from surveys in February 2021 proximate to Ballsbridge, the River Dodder is known to support a local otter population and otter signs have been recorded at Merrion Strand, with further activity recorded at Grand Canal dock and where the Dodder discharges to the Liffey Estuary (downstream of the Proposed Scheme). Otter is also a QI of the Wicklow Mountains SAC, and male territories can extend downstream to distances that would reach the site of the Proposed Scheme. Given surveys did not identify any otter breeding or resting places and the nature of the proposed works along rivers canals (i.e. no instream works and occurring predominantly where existing infrastructure is in place – roads, bridges and tow-paths) along a busy transport link/corridor I consider that the Proposed Scheme will not give rise to any likely significant negative effect at any geographic scale in relation to otter breeding/resting sites, loss/fragmentation of foraging or commuting habitat. There is the potential for a barrier effect and/or displacement to arise from additional disturbance during works along the bridges, however, this would be temporary in nature and local individual species would be habituated to a certain degree of anthropogenic interference. The EIAR states additional lighting is unlikely to be required and if it should prove necessary it will be controlled to ensure no overspill to otter habitats. The proposed works do, in my opinion have the potential to give rise to significant localised impacts on habitat and food source abundance through any potential adverse impacts on water quality prior to mitigation. There are a range of measures in place to protect water quality (Section 12.5 of EIAR and 11.6.3.1 and 11.6.3.2 all refer), and section 12.5.1.4.3 of the EIAR sets out specific mitigation measures in relation to Otter which include pre-construction surveys, consultation with NPWS where required, engagement of ecologists and workforce training.

9.8.13.4. Marine Mammals:

The Proposed Scheme is hydrologically connected to Dublin Bay and there are a range of marine mammals present in the Bay which are protected under the Wildlife Acts and also listed on Annex II of the Habitats Directive, while all cetacean species are listed in Annex IV. Some species, such as Harbour Porpoise, Harbour Seal, Grey Seal are QIs of SACs in the wider area. The construction phase of the Proposed Scheme has the potential to result in significant adverse effects on marine mammals in the event of adverse effects on water quality (both directly on the species themselves and by reducing the availability of food supply). The mitigation measures in relation to protecting water quality during construction as set out in Section 12.5 of the EIAR, 11.6.3.1 and 11.6.3.2 are therefore relevant, and their implementation will ensure impacts on Marine mammals will not be significant.

9.8.13.5. Other Mammals

No other mammal species were recorded along the proposed scheme during the survey effort, although the desk study noted the presence of Pine Marten, Red Squirrel, Hedgehog, Pygmy Shrew within 1km of the scheme which are all protected under the Wildlife Acts. While not afforded legal protection, Fox and Rabbit were also recorded from the desk study within areas of suitable habitat. The Proposed Scheme will not give rise to significant adverse impact on these other mammals given the local mammal populations will be habituated to the extant transport corridor, the majority of works will be to existing infrastructure, and smaller mammals are mobile and nocturnal in nature.

9.8.14. Birds

9.8.14.1. Breeding Birds

In relation to breeding birds the records along the Proposed Scheme comprise bird species common to suburban habitats that habituate residential and parkland areas. Breeding wetland and Riverine Bird species were also recorded in the wider area, which is to be expected given the location of the Proposed Scheme proximate to the coastline and crossing both the Grand Canal and River Dodder. There are records of several breeding bird species in the general area of the Proposed Scheme which are listed under Annex I of the Birds Directive, are SCI species, and/or are amber/red

listed (i.e. species of medium/high conservation concern in Ireland). The Proposed Scheme will result in the loss of breeding bird and nesting sites due to the loss of trees, treelines, hedgerow, and other planting. However, as such habitats are broadly in the immediate environs of a significant transport corridor they form a relatively small part of similar habitat types and mosaics in the wider locality (such as parks, pitches and other amenity spaces). Accordingly, I consider that while there may be a temporary decline in breeding bird abundance at a very local level the works will not affect the local ranges of bird species nor adversely affect populations. Breeding/ nesting birds could be adversely affected in a significant manner locally should clearing works be carried out in the breeding season. However, as set out in Section 12.5.1 of the EIAR vegetation will not be removed during the breeding season where practicable. Impacts on breeding birds could also arise during construction from disturbance and adverse impacts on water quality. Works will always cause some level of disturbance, however, given their temporary and phased nature, combined with the existing levels of disturbance already in place along this busy transport corridor I consider disturbance impacts to be negative, short-term and at a local scale. Potential issues arising from water quality are mitigated through the measures referenced previously²⁸.

9.8.14.2. Wintering Birds²⁹

Seventeen wintering bird surveys were carried out along two transects adjacent to Booterstown Marsh (which is within South Dublin Bay and River Tolka Estuary SPA) and within Blackrock Park (which is adjacent to the SPA) from 2020 to 2022. The Proposed Scheme is also hydrologically connected with Dublin Bay which is of considerable ornithological importance due to a number of SPAs and SCI birds that use it. Wintering bird species also use inland feeding sites such as open parkland and grassland adjacent to the Proposed Scheme. Five such sites have been identified along or near the Proposed Scheme (Blackrock Park, Blackrock College, Williamstown Park, Pembroke Cricket Club/Monkstown Rugby Club and St. Andrews playing pitch). The impact of the proposed works in relation to wintering birds have been set out in full in Section 10 of this report (Appropriate Assessment), however,

²⁸ Section 12.5, of the submitted EIAR, and 11.6.3.1 and 11.6.3.2 of this report refers

²⁹ i.e. those bird species which are SCIs of SPAs for their wintering populations or are listed on either the Birds of Conservation Concern in Ireland (BOCCI) Red or Amber lists for their wintering populations.

there will be permanent (0.03ha³⁰) and temporary (0.07ha) loss of GA2 habitat which could be used by wintering species. I do not consider this habitat loss to be significant as it occurs within the highly managed Blackrock Park along its existing boundary with the existing road with an absence/low frequency of use by wintering birds and is immediately adjacent to significant alternative more suitable and less disturbed land.

Disturbance/Displacement impacts could also arise from the loss of screening planting (trees, and other planting) at Blackrock Park and Blackrock College, for wintering birds using these amenity grasslands. Such impacts could be significant at the local level, however, given the size of the relevant grasslands, availability of alternatives and locations of such works (most proximate to the existing transport corridor) combined with the mitigation measures set out in 12.5.1.5.2 of the submitted EIAR which refers to timing of works and ecological consultation I consider that significant impacts will not arise. Disturbance/displacement impacts from construction noise and the construction compound are also likely on habitats, however, due to the temporary nature of these works and their proximity to a busy transport route/corridor, if disturbance arises it will result only in localised movement of birds. Accordingly, I do not consider that this impact will be significant with noise and activity levels returning broadly back to that already established after the construction phase.

Impacts on water quality also has the potential to adversely affect wintering birds through direct exposure to pollutants or effects on food supplies. The controls and mitigation measures in relation to water quality will ensure impacts are not significant during the construction phase. I also consider that operational impacts will not be significant on wintering birds having regard to the operational phase mitigation measures set out³¹, which include re-establishment of vegetation outside the winter bird season as soon as practicable after completion of works in any particular section, and annual post construction monitoring for a 2-year period to ensure planting is successful.

9.8.15. Reptiles, Amphibians, Fish, and Invertebrates – Potential Impacts:

³⁰ Referenced in the Applicants NIS.

³¹ Section 12.5.2.5.2 of the submitted EIAR refers

While Common Lizard (protected under the Wildlife Acts) was not recorded in surveys nor any suitable habitat for this species identified within the footprint of the proposed scheme, the presence of this species cannot be ruled out in the wider area. Similarly, no evidence of common frog or smooth newt (both protected species) was found during surveys, however, suitable amphibian habitat is present (vegetated riverbanks, surface water, drainage features with stagnant and relatively unpolluted water) and there are records of common frog within 1km of the Proposed Scheme. There is potential for impact to arise in relation to habitats (fragmentation and degradation) and general disturbance, having regard to the nature of the works along an existing busy transport route, the extent of the relative habitats and the temporary nature of works I do not consider the impacts on reptiles and amphibians to be significant. Notwithstanding this, the water quality controls, and mitigation measures will ensure effects are minimised. I note that there are no instream works proposed in the Proposed Scheme and accordingly no dedicated fish surveys were undertaken. Works are proposed at bridges over the Dodder and Grand Canal (including works to its associated towpath ramp), further works are also proposed in the vicinity of the Elm Park, Booterstown, Priory and Brewery Streams. Records show that the River Dodder supports Brown Trout, Atlantic salmon, European Eel, stone loach, three-spined stickleback, and minnow. Fifteen kilometres upstream of the Proposed Scheme the River Dodder is also recorded as supporting Lamprey. European Eel has also been recorded in the Grand Canal and it is a known angling destination for a number of species such as common bream, rudd, perch, as well as tench and pike. The Lower Liffey Estuary is also known to support Atlantic Salmon. The potential for impacts on fish arise from impacts on water quality as no instream works are proposed. Such impacts have the potential to be significant at a national/international scale, however, the water protection measures previously referenced provide comprehensive mitigation in this regard.

9.8.16. Invertebrates

There are no records of white-clawed crayfish in the vicinity of the Proposed Scheme. Freshwater molluscs have been recorded approximately 1km upstream and downstream of the scheme footprint. No records of Marsh Fritillary were returned in the footprint of the Proposed Scheme nor was any suitable habitat

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identified. Other red-listed invertebrates such as other Butterflies, Damselflies, Dragonflies and Bumblebees, require large areas of appropriate habitat to sustain populations with appropriate varied diets. While suitable habitats (such as ornamental planting, parkland other artificial lakes and ponds, canals, and gardens) do occur along the Proposed Scheme corridor, these are considered to be fragmented and disturbed and accordingly are not suitable for significant populations of red-listed invertebrates. In relation to invertebrates the Proposed Scheme has the potential to give rise to impacts on the habitat of freshwater molluscs which in the unmitigated scenario have the potential to give rise to local significant impacts, however, I consider the water protection mitigation measures will minimise any impact in this regard.

9.8.17. Biodiversity Conclusion

In conclusion in relation to Biodiversity I refer the Board to tables 12.16 (Summary of Construction Phase Significant Residual Impact) and 12.17 (Summary of Operational Phase Impacts) of the submitted EIAR. The findings of which I am in broad agreement with.

9.8.17.1. Construction Phase

In relation to habitats designated for nature conservation the potential for construction phase impacts generally arise from potential degradation through hydrological linkages, spread of non-native plant species, and adverse impacts on air quality. The potential significance of these impacts pre-mitigation are likely significant at the national to international geographic scale (dependent on the nature of the protected habitat). With the application of mitigation measures such as water quality controls, replacement planting, construction controls as set out in the CEMP, good site housekeeping, bespoke construction methodologies for retaining walls, proper storage of pollutants, dust controls, hoarding, and application of the ISMP I consider that no significant residual affects will arise.

Similar to the above habitats outside of the designated/protected areas (upper/lower salt marsh, canal, river, hedgerows, and treelines) could potentially experience adverse impacts arising from hydrology, invasives, and air quality resulting in degradation, as well as direct habitat loss (hedgerows, treelines, broadleaved

woodland, scattered trees). Such impacts pre-mitigation will have likely significant effect at the local to international scale, however, with the application of the mitigation measures set out previously above impacts will be reduced to having no significant residual effect, with the exception of mixed woodland and scattered trees, where the loss of mature trees which are not replaced in the immediate vicinity will continue to have a residual likely significant effect at the local scale.

In relation to faunal species, the majority (bats, otter, other mammals, marine mammals, SCI bird species, non-SCI kingfisher, amphibians, Eel, Lamprey, Atlantic Salmon, other fish and freshwater molluscs) could potentially be subject to likely significant effects at the local to international geographic scale due to disturbance/displacement, habitat degradation (water quality), habitat loss/fragmentation, and mortality risk), however, following the application of mitigation (including proper site management, application of good construction practices and water quality protections) I consider that the residual risks will reduce to having no significant effect.

In relation to all non-SCI birds (both wintering and breeding species) potential significant effects are likely from habitat loss, mortality risk, and disturbance/ displacement and habitat degradation through hydrological linkages. The application of the mitigation measures set out in the CEMP and Section 12.5.1 of the EIAR in relation to water quality will result in no significant residual effects regarding habitat degradation. There will, however, remain the likelihood of significant effect at the local level in relation to the other impacts including habitat loss.

9.8.17.2. Operational Phase

In relation to the operational phase of the proposed scheme I note that maintenance will be carried out by the relevant local authorities in accordance with all relevant guidelines and that the overall landuse will remain broadly consistent with that established (i.e. the route will remain a transport corridor). Areas designated for nature conservation (i.e. SPAs, SACs, NHAs, SPAs) will have the potential for operational impacts on habitat degradation to arise from hydrological connectivity, spread of invasives and air quality. The significance of such effects could range from national to international importance in terms of scale in the absence of mitigation. With the application of mitigation measures (as set out in Section 12.5.2.1 of the

submitted EIAR) which include replanting, landscaping post-construction monitoring, SuDs maintenance and inspection regime, ongoing local authority maintenance regimes, the residual impacts will have no significant impact on areas designated for nature protection with the exception of the Grand Canal pNHA which will continue to have a likely significant effect at the local geographic scale for air quality. This issue, I note arises in both the do minimum and do something scenarios, and has been raised as an issue in submissions on file. Furthermore, I note that the projections on air quality are conservative and do not take account of transportation targets set out in the Climate Action Plan 2023. In this regard, I consider that the proposed scheme remains acceptable and appropriate given the broader environmental benefits arising, particularly in the context of improving public transport services, cycling infrastructure and pedestrian facilities.

In relation to habitats outside of designated areas for nature conservation potential impacts could arise from hydrological connection, spread of invasives and air quality, such impacts vary from the local to international level of significance in the absence of mitigation. With the application of mitigation measures referenced in the preceding paragraph in relation to designated sites there will be no significant residual effects.

Relevant faunal species could potentially, in the absence of mitigation, experience likely significant effects of local to international scale (bats, badger, otter, other mammals, marine mammals, birds [both SCI and other species] amphibians, European eel, Lamprey, Atlantic salmon, all other fish and invertebrates) from habitat degradation (hydrology), mortality risk, habitat loss, as well as disturbance/ displacement, during the operational phase. With the implementation of the mitigation measures set out in sections 12.5.2.4 -.5 -.7 -.8 and -.9 which include surface water management, re-establishment (and monitoring of) vegetation replacement, there will be no significant residual effects arising.

9.8.17.3. Accordingly, I have considered all of the written submissions made in relation to biodiversity, and the relevant contents of the file including the EIAR. I am satisfied that the potential for adverse impacts can be avoided, managed, and mitigated by the mitigation measures which form part of the Proposed Scheme, and through suitable conditions. I note that while residual impacts may remain significant that these would be of local significance and not be national or international in

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scale/effect. I am, therefore, satisfied that the Proposed Scheme would not have any unacceptable direct or indirect impacts in terms of biodiversity. I am also satisfied that while some cumulative effects may arise from the Proposed Scheme together with existing and permitted developments, these would be avoided, managed, and mitigated by the measures which form part of the Proposed Scheme and through suitable conditions.

9.9. Water

9.9.1. **Overview**

9.9.1.1. Section 13 of the EIAR deals with Water, and it considers all classified and nonclassified Water Framework Directive (WFD) water bodies (rivers, lakes, and coastal) within 500m of the Proposed Scheme boundary to be receptors. The EIAR has been informed by a desk study as well as field walkover assessments carried out in March 2020 and March 2022 which recorded flow conditions, riverbed conditions (such as sediment types and deposition), water quality (visual assessment), bank stability, natural and man-made river features, runoff pathways and risk (i.e. identifying pathways for, and likelihood of, surface water reaching the river/receptor, vegetation, and outfalls/discharges). The Board should note that no water quality sampling was carried out and that this information was gathered using the EPA's online data.

9.9.2. Receiving Environment

9.9.2.1. The Proposed Scheme lies within the Liffey and Dublin Bay catchment (Hydrometric Area 09 – EPA), with the main Water Framework Directive (WFD) waterbodies within 500m being the Dodder River, Brewery Stream, Grand Canal, and Dublin Bay. In the interests of clarity the Board should note that the Brewery Stream WFD waterbody includes the Priory, Booterstown³², and Elm Park Streams (EPA named streams) as separate segments of the Brewery Stream_10 WFD water body which are (unusually) not hydrologically connected to each other but all flow into Dublin Bay. For ease of distinction this report will use the relevant EPA named streams. There

³² Booterstown Stream is also known as Trimlestown Stream.

are other surface water features within 500m of the Proposed Scheme which are not classified as WFD water bodies - namely Booterstown Marsh and Nutley Stream (which is a small watercourse running from Merrion House car park to Booterstown Marsh). I considered these features of significance due to their connectivity and the marsh forming part of the South Dublin Bay and Tolka River SPA. I also note the presence of the man-made saline pond in Blackrock Park which is not designated as or included as any WFD water body.

- 9.9.2.2. There are no nutrient sensitive sites within 2km of the proposed development and no known GSI recorded Drinking Water Supply (Surface Water Abstractions) within 500m of the Proposed Scheme. Overall surface/storm water from the site of the Proposed Scheme drains to either Brewery Stream, Priory Stream, Booterstown Stream, Elmpark Stream or the Ringsend WwTP where combined drainage systems are in place.
- 9.9.2.3. Appendix 13.1 of the submitted EIAR provides a Water Framework Directive (WFD) Assessment report which concludes that the Proposed Scheme will not cause a deterioration in status in any waterbody, nor will it prevent or compromise progress towards Good Ecological Status (GES) or Good Ecological Potential (GEP) of any relevant water bodies. Water body status of relevant water bodies is set out in table 13.7 of the submitted EIAR. The WFD also requires consideration of how a new scheme might impact on other water bodies and other EU legislation. AA of the proposed scheme has been carried out (Section 10 of this report below refers) which considers the requirements of the Habitats Directive.

9.9.3. Potential Impacts

- 9.9.3.1. Potential impacts on water could arise from both the construction and operational phases of the proposed development. Generally, the potential impacts that could arise during construction can be summarised as:
 - Hydrology disruption to local drainage systems, temporary increases in hard standing areas and/or compaction creating increased runoff.

- Water Quality sediment laden or otherwise polluted (e.g. hydorcarbons, concrete, re-mobilisation of settled contaminants etc) runoff from construction site activities.
- Physical character and water content of waterbodies sediment plumes could smother riverbed substrate and/or change existing features while direct physical alterations (e.g. along river banks) could also arise.
- 9.9.3.2. Potential operational phase impacts could arise from:
 - Deterioration in water quality from increased levels of road contaminants (e.g. hydrocarbons, metals, sediment) due to increase in sediment loads from new or widened roads, increases to impermeable areas, changes to nature, frequency and numbers of vehicles using upgraded or new/alternative routes.
 - Changes to the flow regime in existing watercourses due to increased surface water runoff or discharges in new locations causing different sedimentation processes and altering riverbank structures.
 - I note that if implemented the Proposed Scheme will result in changes to traffic flows in the operational phase. In relation to water Changes in traffic are considered to be significant where the AADT increases to above 10,000. The modelling carried out shows that this occurs in 8 no. side roads, all of which drain into the same water body as the Proposed Scheme, existing surface water drains, or to the combined sewer network and onto Ringsend WwTP. Accordingly, I consider that operational impacts on water bodies will not arise from traffic re-distribution.
 - The board should note that the air section also discusses potential impacts on water from deposition and from an air quality perspective, which are not considered to be significant, I do not intend to repeat this analysis in this section.

9.9.3.3. <u>Brewery Stream_10 (EPA - Brewery Stream, Priory Stream, Booterstown Stream</u> and Elm Park Stream)

The Brewery Stream_10 WFD Waterbody is crossed four times by the Proposed Scheme.

- Brewery Stream is crossed at the Temple Road and Frascati Road junction where the stream is culverted under the road. During construction the Proposed Scheme will necessitate widening within existing hardstanding area and infrastructure provision at this location, however, green space will be retained, I consider the nature of the works at this location to be intrusive but of a minor extent and be short term, adverse albeit of a small magnitude and therefore unmitigated would have a Moderate to Slight Impact.
- Priory Stream is crossed at the Frascati Road junction with Rock Hill where the stream is culverted under the road before emerging into Blackrock Park. There is already a significant junction at this location under which the stream is culverted and while works will be intrusive they are proposed within the existing hardstanding area with green spaces retained (and augmented). The nature of the proposed construction works have the potential in an unmitigated scenario to have a Moderate to Slight impact.
- Booterstown Stream is crossed by the Proposed Scheme on the Rock Road between Trimleston Avenue and St. Helens Road, just northeast of Booterstown Marsh where the stream is culverted under the existing road and beyond to the northeast to its confluence with Nutley Stream/Dublin Bay. Proximate to this crossing the Proposed Scheme construction includes widening and a set back of the boundary wall (northwest of the Booterstown Marsh). Although the stream is fully culverted and there can be no direct impacts on ecology or hydromorphology, there are surface water drains in the vicinity which could lead to impacts on water quality (silty water and hydrocarbons) and the potential for the stream to act as a conduit of contaminated water to Dublin Bay. This has the potential for short term, adverse, water quality impacts of a small magnitude (given the size and scale of the receptor Dublin Bay) and therefore in the unmitigated scenario has the potential to result in an impact of moderate to slight significance.
- Elm Park Stream is crossed at the Merrion Road just north of the Elmpark
 Green Development at the Petrol Station, the stream is culverted under the

existing roadway. The works at this location will take place within the existing hardstand areas. Surface Water from Nutley Lane also ultimately drains to Elm Park Stream (although I note that works along Nutley lane which requires land-take and widening are not located proximate to the stream, which predominantly runs through a golf course proximate to the lane). The works proposed along Nutley Lane while requiring widening do not require deep excavations. Overall due to the connectivity to Dublin Bay and nature of the works proposed I consider that the potential for impacts to arise in the unmitigated scenario from the crossing point and Nutley lane works to be moderate to slight.

The majority of the streams are culverted and can therefore be considered to be heavily modified although I note that they all have a short and direct connection to Dublin Bay which is subject to European designations and protections including South Dublin Bay SAC and South Dublin Bay and River Tolka Estuary SPA).

In relation to operational phase impacts on the various segments of the Brewery_10 waterbody there will be an increase in impermeable area of 3,466m² (423m² in the catchment of the Priory Stream, 1,232m² in the Booterstown Stream catchment and 1,811m² in the Elm Park Stream catchment). The design of the Proposed Scheme incorporates grassed areas and various elements of SuDs (including tree pits, filter drains, sealed drains and oversized pipes) which will ensure there is no net increase in runoff and provide a degree of treatment for the usual contaminants arising from the road network. Accordingly, in relation to the operational phase I consider the potential for impacts on various relevant segments of the Brewery Stream_10 waterbody to be permanent while being of negligible magnitude and therefore imperceptible significance.

9.9.3.4. Booterstown Marsh and Nutley Stream

These features are not traversed by the Proposed Scheme, however, it does run immediately adjacent to the marsh along its western boundary. Nutley Stream runs from the Merrion House car park into the Marsh along the landward side of the railway line and goes on to connect the Marsh tidally with Dublin Bay via an inlet under the railway line (opposite Willow Terrace) adjacent to the site of the proposed construction compound at Booterstown car park at Blackrock Park. Booterstown Marsh and that part of Nutley stream connecting it to the sea are designated as part of the South Dublin Bay and River Tolka Estuary SPA³³, and the stream has a short and direct connection to South Dublin Bay SAC.

The proposed construction compound is proximate to that part of Nutley Stream which provides the tidal connection to the sea from Booterstown Marsh (c. 14m separation distance). A slit drain within the car park is not shown on drainage records but it has been assumed that this connects to the stream. Natural vegetation banks with a paved cycle and pedestrian paths exist between the compound and the stream, however, during constriction a spillage of fuels or chemicals at the construction compound could have a significant to profound adverse impact at this location given the short connection distance to Dublin Bay and the designation of the Stream (and Marsh) as part of an SPA.

In relation to operational phase impacts the construction compound will no longer be in place and accordingly the only impacts that could potentially arise relate to direct pathways available to the marsh and stream. I consider that the potential impacts on Booterstown Marsh and Nutley Stream during the operational phase to be of imperceptible significance.

9.9.3.5. Dublin Bay

While there are no direct discharges to Dublin Bay but pathways do exist as set out above (potentially via Brewery, Priory, Booterstown, Elm Park and/or Nutley Streams). Accidental spillages of hydrocarbons or silty waters into the Bay via any of these pathways from works areas or the construction compound could potentially give rise to very significant to profound impacts.

In relation to operational phase impacts, there will remain the potential for indirect impacts via the various segments of Brewery Stream. I note the increased impermeable areas will remain in place and that there is potential for increased frequency/duration of the operations of storm water overflows however, the SuDs provided will ensure that there will be no net increase in runoff, and while impacts will be permanent they will be of negligible magnitude and imperceptible significance.

³³ Booterstown Marsh is also designated as a proposed Natural Heritage Area.

9.9.3.6. Dodder_050

Proposed works in the vicinity of the Dodder relate primarily to surface and/or shallow works required to reallocate road space, resurfacing, realigning junctions, provision of bus gates, cycle tracks and pedestrian facilities (i.e. deep excavations are not required). Works in the vicinity of the Dodder will be along the existing transport corridor and on the existing bridge. Furthermore, surface water drainage at this location (and in the wider area) is to the Ringsend WwTP via the combined sewer network. Accordingly, the only impacts that could arise on the Dodder would be from poor construction practices which having regard to the nature of the works in the area this would have potential imperceptible to slight significance.

There being no direct hydrological connection between the Proposed Scheme and the Dodder, and with the provision of SuDs throughout I consider that there will be a permanent beneficial impact of imperceptible significance in relation to runoff during the operational phase.

9.9.3.7. Grand Canal

Similar to the Dodder surface water drainage in the area of the Grand Canal is to Ringsend WwTP via the combined sewer network. Over and above the standard works for the proposed development works in the vicinity of the Canal will require more significant and proximate interventions in the form of upgrading the existing footpath and cycle ramp along the canal towpath at Wilton Terrace, this necessitates the provision of a new retaining wall and associated foundations, furthermore there is an oil insulated underground electricity cable (ESB) underlying the location of the existing footpath/towpath. Accordingly, there is the potential for silty water runoff, hydrocarbon leakage (from works, contaminated land and from breaking in the underground cable), and concrete washings which could give rise to a range of impacts from moderate through significant to profound at this location in the unmitigated scenario.

During the operational phase I consider that there is no potential for impacts to arise on the Grand Canal from any hydrological connectivity as surface water drainage at this location and in the vicinity will remain channelled to the Ringsend WwTP.

9.9.3.8. Blackrock Pond.

In relation to Blackrock Pond within Blackrock Park, I consider that this is a highly managed man-made water feature which is located in close proximity to the Proposed Works (c.20m distant). The works at this location constitute land-take, widening of the road, and provision of an additional retaining wall to support the widened route. The pond lies immediately downslope of these works. As a man-made structure I consider the pond to be a robust receptor, and there is significant grass area between proposed works and the pond to offset overland flows. Notwithstanding this, however, I consider that in the unmitigated scenario there remains the potential for this pond to be impacted from poor construction practices which having regard to the robust nature of the receptor I consider would have potential imperceptible to slight significance.

During the operational phase I consider that there is no potential for impacts to arise on the Blackrock Pool as there will be no direct hydrological connectivity.

9.9.4. Mitigation Measures

- 9.9.4.1. Mitigation measures in relation to water are set out in section 13.5 of the submitted EIAR which draws on the detailed measures and controls set out in the CEMP, including the provisions of the Surface Water Management Plan (SWMP), and Environmental Incident Response Plan (EIRP). The SWMP includes measures relating to management of construction compound, storage of fuels, control of sediment, use of concrete and vehicle and plant management, the CEMP provides for good site housekeeping and ensures good construction practices throughout.
- 9.9.4.2. Mitigation measures of note in relation to water protection, during the construction process (including in the vicinity of the construction compound and thus providing additional protections to Nutley Stream and Booterstown Marsh) are listed in Section 10.5.3.1 of my report below, while mitigation in relation to the operational period is summarised in Section 10.5.3.2.

9.9.5. Flooding

9.9.5.1. The EIAR documentation includes a Floodrisk Assessment (FRA - Appendix A13.2 of the submitted EIAR refers). There are a number of records of flood events at

different locations along the Proposed Scheme and it crosses a variety of floodrisk areas and zones and the Board should note the following:

- Areas of Merrion Road (proximate to its junction with Nutley Lane), Frascati Road (in the vicinity of where it crosses the culverted Brewery Stream³⁴), and Ballsbridge (extending from the RDS north-east to the approximately the junction between Lansdowne and Pembroke roads) are at risk of fluvial flooding. Merrion Road and Frascati Road lie within flood zone B however, the area at Merrion is defended and therefore floodrisk is low. Ballsbridge is in flood zone A, however, flood defences along both sides of the Dodder under the lower Dodder Alleviations Scheme will result in Pembroke Road, Ballsbridge and the Merrion Road being protected for up to the 1 in 100 year fluvial flood events.
- An area at Merrion Strand is at high risk of tidal flooding and is located within flood zone A, while the remainder of the route at low risk of tidal flooding in the present scenario. Parts of the route between Booterstown and Merrion, and from Merrion northeast towards Merlyn Road are predicted to be at risk of tidal flooding under the future mid-range and future high-end climate change scenarios (i.e. increase in sea levels of .5m and 1m and increase in rainfall of 20% and 30% respectively).
- The risk of pluvial flooding along the route is medium to high, hotspots for pluvial flooding have been identified (i.e. areas where PFRA mapping has highlighted potential pluvial flooding for longer than 150m of road or where previous flood events have been mapped or undrained low-points exist) and will be addressed where feasible though the drainage design (e.g. through additional inlets, upsizing of pipe network, localised re-grading). Generally, pluvial flooding will be mitigated through improvements in the surface water drainage system proposed and incorporation of SuDs.
- The risk of ground water flooding varies from low to moderate (Merrion Road from Nutley Lane junction - to Merrion Square including Nutley Lane section)

³⁴ Referred to as the 'Carysfort Maretimo' stream in the submitted floodrisk assessment, however, for consistency I will refer to this as the Brewery Stream as this is how it is referenced in the submitted EIAR and by the EPA.

and from medium to high (Stradbrook Road through Booterstown to Nutley Lane junction with Merrion).

- 9.9.5.2. Under the provisions of "The Planning System and Flood Risk Management -Guidelines for Planning Authorities" published by the Department and OPW in 2009 the Proposed Scheme is classified as 'Highly Vulnerable Development'. Accordingly, as works are proposed in three areas which fall within flood zones A and B the relevant justification tests must be applied. In regard to the Development Plan tests I note that the Proposed Scheme traverses two Local Authority Areas and is therefore subject to the provisions of two Development Plans (the Dublin City Council Development Plan 2022-2028 and the Dun Laoghaire Development Plan 2022-2028) both of which have been informed by the Floodrisk Management Guidelines and Strategic Floodrisk Assessment as well as the Strategic Environmental Assessment process. The Proposed Scheme runs along an existing transport corridor through a range of zoned lands as designated in the relevant recent Development Plans for the area that have been carried out in compliance with the Flood Risk guidelines, I therefore consider that the requirements of the Plan-making Justification Test³⁵ have been satisfied. (In this regard the Board should note that the Floodrisk Assessment submitted by the Applicant contains an erroneous reference to a Strategic Development Zone Planning Scheme in its discussion of the Plan-Making Justification Test, which is not relevant to nor does it influence my consideration of this issue).
- 9.9.5.3. The floodrisk guidelines also require the application of the justification test in terms of development management³⁶ where it is proposed to provide vulnerable forms of development in floodzones A and B. The requirements of which include that the lands have been zoned for development in accordance with the requirements of the floodrisk guidelines, that an appropriate floodrisk assessment has been carried out, the proposal will not increase floodrisk elsewhere and if practicable reduce the overall risk, the proposal includes measures to minimise floodrisk and to ensure residual risks can be manged regarding the adequacy of existing flood protection

³⁵ As set out in Box 4.1 of 'The Planning System and Flood Risk Management Guidelines for Planning Authorities', 2009.

³⁶ As set out in Box 5.1 of 'The Planning System and Flood Risk Management Guidelines for Planning Authorities', 2009

measures, or implementation of future flood risk management measures, provision of emergency services access, and in addressing these issues the proposal is compatible with wider planning objectives of achieving good urban design and active streetscapes. In my consideration of the above I note that the areas within flood zones A and B where works are proposed are in and along an existing transport corridor (accordingly the land use is not altered) and will increase connectivity, provide additional cycle tracks, and increase the provision of dedicated bus lanes and services. The Proposed Scheme incorporates SuDs features into the drainage design system where appropriate thus reducing the risk of pluvial flooding and minimising floodrisk. Furthermore, the flood defences along the Dodder (provided separately under the Dodder Flood alleviation Scheme) will provide protection for up to a 1 in 100-year flood event and these will not be impacted by the subject scheme. It is not intended to raise the road levels significantly as part of the Proposed Scheme and the floodrisk measures being proposed do not adversely affect streetscape or urban design within the A and B floodzone areas.

- 9.9.5.4. In relation to flooding, following review of the drainage measures proposed I note the following:
 - The Proposed Scheme includes the provision of new surface water sewers designed to ensure that no flooding will occur for a return period of 30 years through the provision of greater storage capacity in the network and incorporation of SuDs throughout which will reduce the pluvial flood risks.
 - The Proposed Scheme does not involve significant changes in levels, change of use or basement construction.
 - The works are proposed along existing roads with no known flooding arising from groundwater.
 - The Proposed Scheme does not incorporate any coastal defence measures, although there is a section of the proposed scheme at risk of coastal flooding, and in future climate change scenarios there is the potential for additional areas to be affected. However, I note that such flooding would be an extreme event and the works will be carried out along an existing transport corridor. In this regard I do not consider additional coastal defences to be necessary for, or required due to, the Proposed Scheme.

 Neither local Planning Authority nor any third-party submissions raised flooding as a significant concern in consideration of the Proposed Scheme.

Accordingly arising from the above I consider that the proposed development will not give rise to flooding implications elsewhere and that it will in fact improve the flooding situation through the improved drainage measures being provided along the route.

9.9.6. Residual Impacts

- 9.9.6.1. The Proposed Scheme provides a comprehensive suite of mitigation measures (including those which will control sediment release, ensure appropriate storage and use of hydrocarbons and provide bespoke methods of construction at sensitive locations) which will, in my opinion, ensure the protection of water quality and avoid significant impacts on water bodies in the vicinity.
- 9.9.6.2. I consider that the Proposed Scheme will not give rise to floodrisk impacts nor significant adverse impacts on water quality or flows. Overall, following the implementation of the stated mitigation measures I consider that impacts in relation to flooding and water quality arising from the construction and operational phases of the Proposed Scheme will be imperceptible. In this regard the Board should note that I have considered the potential for cumulative impacts with other developments in the vicinity and I am satisfied that no cumulative impacts will arise.
- 9.9.6.3. In relation to the WFD I consider that the Proposed Development does not prevent or compromise progress of any water body to GES or GEP, and that the works are consistent with the implementation of other European Community environmental legislation such as the Habitats and Bathing Water Directives.

9.9.7. Conclusion Water

I have considered all of the written submissions made in relation to Water in addition to the relevant application documentation. I am satisfied that the potential for impacts on water can be avoided, managed and/or mitigated by the measures which form part of the Proposed Scheme, the proposed mitigation measures and through suitable conditions. I am, therefore, satisfied that the Proposed Scheme would not have any unacceptable direct or indirect impacts on water. I am also satisfied that cumulative effects are not likely to arise from the Proposed Scheme together with existing and permitted developments.

9.10. Land Soils Geology and Hydrogeology

9.10.1. Overview

- 9.10.1.1. Chapter 14 of the submitted EIAR deals with land, soils, geology and hydrogeology. Landcover throughout the Proposed Scheme is predominantly described as continuous (/or discontinuous) urban fabric, with some exceptions such as artificial non-agricultural vegetated areas used for sport and leisure at the Elm Park Golf and Sports club, and the land between Ballsbridge and Lansdowne Road as well as those between Shrewsbury Road and Ballsbridge being classified as industrial and commercial units.
- 9.10.1.2. Soils along the Proposed Scheme are generally of low and medium importance with the exception of pockets at Blackrock Park, Stradbrook Road and Elm Park being of high importance due to their high fertility and/or well drained nature. The main subsoils along the Proposed Scheme are predominantly glacial tills with areas of made ground, alluvium, estuarine silts and clays, as well as marine beach sands and gravels. The majority of these are classified as being of low importance with the exception of the Estuarine and Marine deposits which are of a medium value.
- 9.10.1.3. Underlying bedrocks consist primarily of Lucan Formation limestone, Ballysteen Formation limestone and type 2p microcline pophyritic granite, with the only structural bedrock features identified in the EIAR being the two faults at the point of contact between each underneath in the Stradbrook Road to Booterstown Avenue Section of the Proposed Scheme. The EIAR considers the bedrock to be of low importance due to its widespread nature and low value locally, I concur with this finding.
- 9.10.1.4. Project specific ground investigations were undertaken in January 2021, with trial pits being carried out at Merrion Road and Nutley Lane as well as trial pits, boreholes and groundwater monitoring wells at Merrion Road and Rock Road.

Bedrock levels along the Proposed Scheme following investigations and on review of other historical ground investigations are anticipated as ranging from c. 4.3m to 12.3m below ground underneath deposits of topsoil, made ground, glacial till (and Estuarine Silts and Clays with Marine Sands from Booterstown Avenue to Nutley Lane) of varying thickness.

- 9.10.1.5. No karst features have been identified by the GSI along the Proposed Scheme, nor have there been any records of landslide events. In relation to contaminated soils the site-specific Ground Investigation (GI) soil analysis did not return any evidence of materials which would require disposal in a hazardous waste facility. Elevated concentrations of inter alia, Total Organic Carbon, Antimony, Chromium, Molybdenum, Total Petroleum Hydrocarbons, pH, were identified although the application documentation confirms that this could be dealt with in a non-hazardous waste facility. The Proposed Scheme does run through built up urban areas with extensive made ground and accordingly I consider that the potential for some sources of contamination in the works areas of the Proposed Scheme exists.
- 9.10.1.6. One Geological Heritage Area has been identified, Blackrock Breccia which is a coastal rock outcrop located in the intertidal zone adjacent to the Blackrock Dart Station (/ swimming baths) and in excess of 160m from the closest works of the Proposed Scheme.
- 9.10.1.7. There are two aquifer types along the Proposed Scheme corridor (a) Locally Important Aquifer (Bedrock is moderately productive only in local zones) and (b) Poor Aquifer – South of Booterstown (Bedrock is generally unproductive except for local zones). Groundwater vulnerability along the route covers all the ratings ranging from 'low', through 'moderate', 'high', and 'extreme' to 'extreme - rock at or near the surface'. The extreme rock at or near the surface vulnerability occurs in isolated pockets along the coastline that are most proximate to the Proposed Scheme at Blackrock Park and south of Booterstown Dart Station.
- 9.10.1.8. None of the relevant SACs, SPAs, NHAs or pNHAs (Grand Canal pNHA, South Dublin Bay and River Tolka Estuary SPA, Booterstown Marsh and South Dublin

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pNHA, South Dublin Bay SAC) are considered to be groundwater dependent habitats in the submitted EIAR.

9.10.2. Potential Impacts – Construction Phase

- 9.10.2.1. Following review of the application documentation, site visit, as well as consideration of submissions and relevant information I am satisfied that the Proposed Scheme could give rise to the following potential impacts:
 - Loss or damage of topsoil through potential spillages or construction contamination events (hydraulic fluids leakage, concrete washouts etc.), incorrect stockpiling of material leading to erosion/weathering, mobilisation of pollutants from excavation of contaminated soil, sediment release, waterlogging, as well as disposal of topsoil instead of reuse/reinstatement. The magnitude of the effects on the various identified types of topsoil across the site are considered to be small-adverse, with a slight significance.
 - Excavation of potentially contaminated land, due to the location of the Proposed Scheme in an urban area, the nature of the works requiring excavation/ground works across existing made-up ground throughout, and the development history of the wider area it is likely that excavations in areas where there are previous contaminants will be required. The EIAR has identified a number of such potentially contaminated sites including service station site, graveyards, former tramways, railways, industrial sites and laundries along the route. I consider the magnitude of this effect to be small adverse and to have a slight significance.
 - Loss of Future Quarry or Pit Reserve: the loss of future quarry or pit reserve is also a potential impact in relation to the proposed scheme. I note that the Institute of Geologists of Ireland state in their guidelines on the preparation of soils, geology and hydrogeology of chapters for Environmental Impact Statements (2013) that such information be included and impacts recorded. While construction activities including excavation will be carried out, given the location of the proposed works, concentration of residential and other properties in the vicinity, I do not consider that the Proposed Scheme could

be stated as having an impact on quarry reserves. I therefore consider the magnitude of effects to be negligible and being of imperceptible significance.

- Loss or damage of aquifer, the Proposed Scheme runs over two aquifers, one which is classified as being locally important and the other as being poor. In relation to the aquifer of local importance effects could arise from excavation or mobilisation of contaminants or spillage/pollution events from construction. As excavations are of a limited nature in the context of the underlying aquifers and depths of cover effects are considered to be negligible with an imperceptible significance. In relation to pollution events potential effects are considered to be moderate adverse with a moderate significance.
- Impact on designated geological heritage site, I note that the footprint of the Proposed Scheme is not proximate to the designated geological site and no works are proposed within 160m of same. The Blackrock Breccia itself constitutes a rare yet robust granite rock outcrop which is subject to daily inundation by the tide. I am therefore satisfied that the magnitude of effects arising will be negligible with an imperceptible significance.
- <u>Change to Groundwater Regime</u>, construction activities may require localised pumping of excavations. In this regard I note the nature and minimal depths of proposed excavations involved as well as the extent/depth of cover over bedrock that is generally in place. I therefore consider the magnitude of effects to be negligible with an imperceptible significance.

9.10.3. Potential Impacts – Operation Phase

9.10.3.1. In the event of the Proposed Scheme being implemented the operational phase has the potential to give rise to accidental leakage of oil, petrol, or diesel which could lead to contamination/pollution of the environment. Given that the works are proposed along an existing transport corridor I consider that the magnitude of such impacts to be negligible with an imperceptible significance.

9.10.4. Mitigation Measures

- 9.10.4.1. The design of the Proposed Scheme and nature of the subject works provide significant mitigation in relation to a range of the identified impacts. However, given the magnitude and significance of some of the potential impacts set out above standard construction Mitigation Measures and good practice are set out within the application documentation in relation to the protection of soils, geology and hydrogeology. These are set out in Section 14.5 of the submitted EIAR as well as within the submitted CEMP, and include the following:
 - Topsoil:
 - To be stockpiled using appropriate methodology,
 - Will be assessed for reuse within the Proposed Scheme, where practical removal will be avoided, and material handled appropriately.
 - Contaminated Ground:
 - Excavations to be kept to a minimum with shoring or trench boxes used where appropriate, additional bespoke excavation support measures will be designed where necessary for larger works.
 - Excavated soils will be regularly tested by the contractor regularly to monitor the soil for re-use. Testing will also be carried out on suspect ground and disposed to a suitably licensed/permitted site.
 - Dewatering in areas of contaminated ground will be designed to minimise potential mobilisation of contaminants.
 - Pollution of Soil/Groundwater
 - Good construction management practices as set out in section 14.5.1.3 of the submitted EIAR will be used including, only employing a competent workforce, provision of appropriate site-specific training, appropriate storage and containment of hydrocarbons and pollutant liquids, deployment of spill kits, design of fuel storage areas, implementation of Environmental Incident Response Plan and sediment control methods outlined in the SWMP (both included in the CEMP) and good on-site housekeeping and management.

9.10.4.2. The Operational phase does not require the provision of specific mitigation measures.

9.10.5. Conclusion Land, Soils, Geology and Hydrogeology

I have considered all of the written submissions made in relation to land, soils, geology and hydrogeology, as well as the relevant contents of the planning application documentation including the EIAR. I am satisfied that the potential for impacts to arise can be avoided, managed and/or mitigated by the measures which form part of the proposed scheme, the proposed mitigation measures and through suitable conditions. I am, therefore, satisfied that the Proposed Scheme would not have any unacceptable direct or indirect impacts in terms of land, soil, geology and hydrogeology. I am also satisfied that cumulative effects in the context of existing and permitted development in the vicinity and surrounding area of the Proposed Scheme are not likely to arise.

9.11. Archaeology, Cultural, and Architectural Heritage

9.11.1. Overview

9.11.1.1. Archaeological and Cultural Heritage is discussed in Chapter 15 of the submitted EIAR while Architectural Heritage is set out in Chapter 16. Various third-party submissions have made reference to concerns in relation to impacts on elements of architectural heritage (such as works in the vicinity of conservation areas, or protected buildings or other elements of built heritage merit), however, no submissions have raised any significant issues in relation to the potential for impact on archaeological features. The EIAR Archaeology and Cultural Heritage chapter is informed by an Inventory of Archaeological and Cultural Heritage sites and Archaeological Monitoring Report of GI works and is also supported by mapping (Appendices 15.1, and 15.2, and figure 15.1 of volume 3 of the EIAR refer respectively). The Architectural Heritage Chapter is supported by a Historical Background Report (Appendix A16.1), an Inventory of Architectural Heritage Sites (Appendix A16.2) and a Methodology for Works Affecting Sensitive and Historic Fabric (Appendix A16.4). In the interests of clarity the Board should note that in the following discussions features which remain standing (i.e. have a visible presence –

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buildings, street furniture etc) are generally considered as being of architectural heritage while those which only have potential sub-surface features are dealt with as being of archaeological heritage, while monuments or sculptures are considered as cultural heritage.

- 9.11.1.2. In terms of third-party submissions where issues of heritage are raised these have been generally focused on specific protected structures or conservation areas (such as Pembroke Road, Georgian streetscapes, impacts on individual protected structures such as 1-11 Pembroke Road, loss of gardens and alteration to frontage of dwellings 151-157 Merrion Road, set-back of boundary at Clayton Hotel Ballsbridge, setting back/removal of boundaries at Herbert Park, relocation of kiosk at Pembroke Road, amendments to curtilage of Pembroke Town Hall (now the CDETB building), and set back of heritage railings and plinths. Concerns are therefore focused on the potential for impacts to arise from the Proposed Scheme either directly (through boundary set-backs / changes to curtilage) or indirectly through the scheme introducing changes to the streetscape/character of an area.
- 9.11.1.3. DCC have raised some similar concerns in relation to street furniture, bus stops, and cantilevered signal poles at certain locations in conservation areas, Georgian heritage areas, and proximate to protected structures. The Board should also note that DCC considers the loss of front gardens and boundary revisions to no.'s 151-153 Merrion Road (RPS5090/5091) would seriously injure the composition of Estate Avenue and is regrettable. Furthermore DCC considers the provision of planting/trees at Fitzwilliam Street, and Baggot Street Lower is inappropriate given its Georgian character.

9.11.2. Baseline Conditions

9.11.2.1. The study area for archaeology and architectural heritage has been established as the full extent of the Proposed Scheme as well as 50m each side of the route. For archaeology consideration was also given to extending the study area where appropriate, and for architectural heritage where the demesne/curtilage/site of a relevant structure overlaps with this boundary the entirety of the demesne/curtilage is considered. Both the Architectural and Archaeological Heritage Assessments in the submitted EIAR have been informed by a desk study of relevant data sources (including previous archaeological surveys in the area) as well as field surveys.

9.11.3. Archaeology and Cultural Heritage Baseline

- 9.11.3.1. In order to assess the impacts on archaeology and cultural heritage the submitted EIAR considers sites which have been identified on the Record of Monuments and Places (RMP) and/or the Sites and Monuments Record (SMR) (should there be upstanding buildings associated they are also considered under Architectural Heritage), furthermore where a designated Zone of Archaeological Potential (ZAP) is established it is also considered.
- 9.11.3.2. For the purposes of the archaeological and historical background the site of the Proposed Scheme can be divided as follows:
 - Ballsbridge to Merrion Square, (Pembroke Road/Baggot Street and Fitzwilliam Street). Merrion Square, Fitzwilliam Square and environs were laid out from the mid-1700's and the distinct Georgian character of this area established, over the course of the 19th century development gradually extended along what is now Baggot Street and Pembroke Road. The Grand Canal dates from the mid-18th Century and is a notable feature along the route of the Proposed Scheme which crosses the canal via McCartney Bridge. There is a site of a 13th century castle (whose remains were demolished in the 1800's) in the vicinity of Eastmoreland place and while its exact location is not recorded its site is recorded on the RMP as DU018-055 and its associated ZAP overlaps with the Proposed Scheme. Ballsbridge's historic character is of a 19th century suburb of Dublin built and laid out between 1830 and 1860. The current 3arch Balls bridge over the Dodder was built in 1835 (RMP DU01-059) and is on the route of the Proposed Scheme. Other elements of cultural heritage along this length include a memorial at the junction of Pembroke Road and Herbert Park and historic street furniture (e.g. coal-hole covers, jostle stones etc.). A tramway (first horse-drawn, later electric) operated along the route of the Proposed Scheme until 1932 and there are locations identified where the lines may remain buried within the street.

- Merrion Road (Nutley Lane to Ballsbridge). This section's past is defined by the Victorian period with many of the houses along Merrion Road originating from this time albeit there are modern buildings interspersed along its length as well. The RDS is also a significant cultural heritage site in Ballsbridge since 1879, and there is an old stone trough opposite the RDS (and currently used as a planter) outside the site which has been identified as having potential cultural heritage interest. Locations have been identified along this section where the old tramlines may remain within the street.
- Booterstown Avenue to Nutley Lane is largely defined by its Victorian Past. The site of St. Mary's nursing home presents a number of items from the RMP. It is the site of the 15th century Merrion Castle (RMP DU023-001001), there is also an Armorial plaque (RMP DU023-001003), carved stone head (RMP DU023-001004), 18th century house (RMP 023-001002), and the site of a fishpond (RMP DU023-001005). To the south of Belleview Avenue there is the site of a church (RMP DU023-053001) and graveyard (RMP DU023-050032) both of whose ZAP overlap with the Proposed Scheme. Similar to the other sections there is a location identified where the old tramlines may remain within the street. The Dublin to Kingstown (Dun Laoghaire) railway line is also a feature proximate to the Proposed Scheme, it was the first railway in Ireland (opened in 1834) and its embankment led to the creation of the Booterstown Marsh which is now a bird sanctuary.
- Stradbrook to Booterstown Avenue, this area's historic character is largely defined by its Victorian past as many of the houses along Merrion and Road Roads were built during this period (such as Blackrock College and Willow Park schools which have their origins in this period). The railway continues to be a feature along this stretch and led to the reclamation of lands to form Blackrock Park (1873), and there are locations where the original tramways from the old on-street trams may still be within the street. There is also a Martello Tower (DU023-002) southeast of the proposed construction compound. The 'Blackrock Dolmen' a sculpture located adjacent to the Proposed Scheme at the junction of Temple Road and Frascati Road is a cultural heritage feature in this section, however, the works will not alter the location or prominence of this feature locally.

 Nutley Lane (R138 to Merrion Road) comprises a mix of 20th century residential development anchored by the RTE campus at the south and Merrion Shopping Centre and SVUH to the north. There are no areas of archaeological potential along this part of the route although the RTE campus can be considered a significant cultural site since it was established in 1960.

9.11.4. Architectural Heritage baseline

- 9.11.4.1. The majority of the proposed scheme lies outside the City Centre with the presence of milestones on the Rock Road and Pembroke Road highlighting the fact that this was one of the main routes from Blackrock to the City Centre. Blackrock, Merrion and Ballsbridge were small villages in the 18th Century, they and Booterstown expanded in the 19th century particularly following construction of the railway in 1843. Throughout the 18th and 19th centuries several villas were provided along the route in addition terraces of houses were constructed as were a number of churches. Ballsbridge also expanded with the development of terraces along Pembroke Road, Ballsbridge Terrace, Eglinton Road and Shelbourne Road. Baggott Street Upper is commercial in character but contains predominantly 19th century buildings and 20th century office blocks. Baggott Street Lower was developed in the late 18th and early 19th Centuries as part of the eastward expansion of the Georgian City. Fitzwilliam Street was developed in the 18th and early 19th century and it forms part of the Georgian Mile which is an almost continuous row of Georgian houses from Merrion Square to Leeson Street Lower. The Proposed Scheme stops at Merrion Square which is a well preserved Georgian square.
- 9.11.4.2. There are a significant number of items of architectural heritage features along and in the vicinity of the Proposed Scheme, and the locations of all such features are identified in Figure 16.1 of the EIAR, which includes items from the Record of Protected Structures (RPS), National Inventory of Architectural Heritage (NIAH) features (including garden survey), and other Architectural Heritage Sites considered of merit but not afforded any specific designation or protection.
- 9.11.4.3. There are five features which are considered to be of Architectural and Archaeological significance – Williamstown Martello Tower at Seafort Parade,

Merrion Churchyard, Merrion Castle (two associated sites in the Grounds of St. Mary's at Merrion Gates), and Balls Bridge. There are approximately 300 sites from the RPS along and within 50m of the Proposed Scheme, and a detailed description of each is included in Appendix A.16.2, Volume 4 of the EIAR.

- 9.11.4.4. The Proposed Scheme does not pass through any Architectural Conservation Areas (ACA) within the functional area of DCC, but it does pass proximate to one ACA and four candidate ACAs (cACA) within Dun Laoghaire Rathdown – Quaker Burial Ground, Temple Hill (cACA), Montpelier Place, Temple Hill (ACA), Blackrock Village (cACA), Seafort Parade (cACA), and Booterstown Avenue (cACA).
- 9.11.4.5. Within the DCC area the Proposed Scheme passes through conservation areas which are afforded some protection under the zoning provisions of the City Development Plan. The Proposed Scheme passes through such areas where it traverses the streets adjoining the Dodder, the Grand Canal, Baggot Street Upper, Baggot Street Lower, Fitzwilliam Street Lower, and Merrion Square.
- 9.11.4.6. I have also considered designed/man-made landscapes, most of these are associated with protected structures, demesnes, recorded monuments, or gardens with the main exceptions being Toverna/Temple Park (Newton Avenue), Blackrock Park, Booterstown Park, Booterstown Nature Reserve, Herbert Park, and Merrion Square Park. A total of 21 designed landscapes were identified and are listed in table 16.10 of the submitted EIAR.
- 9.11.4.7. Six industrial heritage sites occur along the Proposed Scheme, including four features associated with the railway at Merrion Gates (the former Merrion Railway Station, signal post to west of railway station, Merrion Gates level crossing, and railway/boundaries), as well as the Weir near Anglesea Road, and the Grand Canal.
- 9.11.4.8. Other structures not subject to designation but considered to be of architectural merit for assessment of impact include post boxes (13 cast-iron post boxes), lamp posts (150 of heritage significance), statuary and miscellaneous street furniture (10 features - 2 no. milestones [Rock Road and 170 Pembroke Road], Blackrock Dolmen [statue – Temple Road], 3 no. concrete benches [former swiftcall centre Merrion

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Road], concrete trough [opposite RDS], Celtic Cross [Herbert Park], Kiosk at Pembroke Road, and electrical cabinet at Pembroke Road.

9.11.4.9. Paving and surface treatments that were also considered of architectural heritage merit were identified at various locations and included granite kerbs and paving, jostle stones, coal holes, cellar lights with glass panels, and cobbled surfacing.
Eighty such features were identified and were largely contained within Merrion Road, Pembroke Road, Ballsbridge, Baggot Street and Fitzwilliam Street.

9.11.5. Potential Impacts – Archaeological and Cultural Heritage

- 9.11.5.1. In the do-nothing scenario no impacts will arise beyond those that may be associated within on-going maintenance and/or other developments which may require road alterations and would be subject to their own controls or mitigation. Accordingly, it is considered that there will be no impact on archaeological or cultural heritage arising in the do-nothing scenario.
- 9.11.5.2. Potential impacts on archaeology can arise from ground-breaking works associated with the construction process, including pavement construction, repairs, resurfacing, piling and any excavation works. Accordingly, the construction of the Proposed Scheme could give rise to the following impacts on archaeological and cultural heritage:
 - It is possible that the proposed works could have a negative, slight, and permanent impact on the former street tramlines which although not designated as an archaeological feature or exposed on the surface at any location are an item of industrial heritage interest along the Proposed Scheme Route.
 - The Proposed Scheme has the potential to have a slight negative impact on the following archaeological sites / monuments:
 - RMP DU023-053001, and -053002 (Church Site and Graveyard)
 - RMP DU023-001001, SMR DU023-001005 (sites of castle and fishpond)
 - The Proposed Scheme has the potential to have negative, moderate, permanent impacts on the following archaeological sites / monuments:

- RMP DU018-059, site of an earlier bridge crossing the Dodder at Balls bridge, Proposed Scheme crosses bridge and is within the RMP ZAP.
- RMP DU018-055, Proposed Scheme traverses the ZAP for a towerhouse/castle in the vicinity of Eastmoreland Place.
- The stone trough outside the RDS is a cultural heritage feature which could be subject to negative, slight and temporary impacts from the construction process.
- The Proposed Scheme will have a negative, slight and temporary impact on the memorial to the side of the pavement at the junction of Pembroke Road and Herbert Park arising from the implementation of landscaping works.
- The Proposed Scheme has the potential to have a negative, slight and temporary impact on coal hole covers at Fitzwilliam Street Lower, Baggot Street Upper and Baggot Street Lower during landscaping works. There is one coal hole (at 95 Baggot Street) that will be affected by proposed cycle track works which will require the access chamber to the coal chute to be lowered and result in a temporary loss of historic function (should such function survive intact - i.e. the connection between cellar and hole remain). The impact on this coal hole is considered to be negative, slight and permanent.
- 9.11.5.3. No impacts will arise on archaeological cultural heritage features during the operational phase.

9.11.6. Potential Impacts Architectural Heritage

- 9.11.6.1. In the do nothing scenario no impacts would arise on features of architectural heritage value and accordingly the predicted impact is neutral.
- 9.11.6.2. In the construction phase direct impacts on architectural heritage could arise where the Proposed Scheme requires alterations to sensitive fabric, e.g., through land-take or setting back boundaries (particularly along Rock Road, Merrion Road, Pembroke Road, and Nutley Lane) or by relocating street furniture to accommodate carriageway widening. Indirect physical impacts could arise where sensitive buildings or features offer a boundary to, or are in, the Proposed Scheme. Indirect visual impacts could arise where construction impacts the setting of sensitive features. The following impacts are anticipated in the absence of mitigation.

- Protected Structures:
 - Direct, negative, moderate, and permanent impacts are anticipated at 151 and 153 Merrion Road, arising from direct works which will require the set back of the front boundaries (plinths, cast-iron fencing and gates) by approximately 0.1- 0.m along the 7m frontage of no. 151, and varying from approximately 0.6m – 0.8m along the 10.6m frontage of no. 153 with the associated loss of garden amenity space within both property's sites. It is also proposed to widen the gates of no.'s 153 to 3.2m. The Proposed Scheme is anticipated as having a direct, negative, moderate and permanent impact on these dwellings arising from land-take and boundary setbacks.
 - In the interests of clarity at this stage the Board should note that throughout the application documentation the applicants refer to no.'s 155 and 157 Merrion Road (who neighbour no.'s 151 and 153 to the east) as protected structures and states that the DCC RPS reference no.'s 542 and 542a refer. Having reviewed both the current (2022) and previous (2016) lists of RPS included with the DCC City plan neither no. 155 nor 157 are included, nor is there any reference to a protected status of these dwellings referenced within any of the planning reports associated with applications at this location (including Pl. Ref. 2029/11 [ABP239103] and 1022/20). Furthermore, the residents of both these properties have made submissions to the Proposed Scheme but neither have referenced any protected status of the dwellings. I do note that no.'s 155 and 157 represent two early 19th century terrace dwellings which contribute positively to the built environment and setting of this area, and while the applicant's reference to them being included in the RPS may be erroneous I do not consider it to be misleading or impact the Boards ability to consider the merits of the case.
 - A direct, negative, moderate and permanent impact is anticipated at the Clayton Hotel (DCC RPS 5086) in Ballsbridge arising from boundary set back (of approximately 2.5m along a length of approximately 58m of its frontage with the Merrion Road) and

permanent land acquisition. Similar impacts are predicted at the former Pembroke Town Hall (DCC RPS 5084) arising from alterations to iron boundary gate, vehicular access and parking arrangements on its site.

- The Proposed Scheme will alter the vehicular access and egress arrangements at 1-11 Pembroke Road which is a terrace of 6 houses that share a common driveway and front lawn area with mature trees and all of which are Protected Structures (DCC RPS 6552, 6554, 6556, 6558, 6560, and 6562). The impacts of these works which includes stopping vehicular access at one of the existing gates, adding controls to the other and putting a new vehicular access onto Waterloo Road, are predicted to be direct, negative, moderate and permanent.
- Proposed works at the existing access ramp at the corner of McCartney Bridge (DCC RPS 872) and the Grand Canal tow path are predicted to be indirect, negative, moderate and temporary.
- Works in the vicinity of Lios An Usice (residential dwelling on the RPS -DLR RPS 107 - will require land take, and boundary set back (iron fence on plinth) at a side/rear vehicular access gate, I consider these impacts to be direct, negative, moderate and permanent.
- Indirect negative, significant and temporary impacts are anticipated at three RPS locations adjacent to the Proposed Scheme – RDS Complex (DCC RPS 5085), Department of Health Baggot Street Lower (DCC RPS 370) and 53 Merrion Square South (DCC RPS 5151), at the other 302 locations where protected structures are adjacent to the Proposed Scheme an indirect, negative, moderate and temporary impact is predicted.
- Architectural Conservation Areas,
 - The EIAR predicts indirect, negative, moderate and temporary impacts on two of the cACA's within the study area, (the Seafort Parade cACA, and the Booterstown Avenue cACA), both of which front onto the site of the Proposed Scheme.
- Conservation Areas:

- The Proposed Scheme travels through several areas that are designated as conservation areas in the DCC City Plan. These are centred on the Dodder, Baggot Street Upper, the Grand Canal, Baggot Street Lower, Fitzwilliam Street, and Merrion Square. These contain heritage features that will be directly impacted (such as street furniture, lamp posts, granite kerbing, and coal holes) which will require relocation/movement and while RPS structures within these areas will not be directly impacted by construction, as the Proposed Scheme will run adjacent, there is potential for damage to occur during construction. Accordingly, the potential for direct impact on these conservation areas is negative, significant and temporary, while indirect impacts will be negative, moderate and temporary.
- NIAH Structures:
 - NIAH structures along the proposed scheme have the potential for damage to occur during construction and impacts are therefore considered to be indirect, negative, moderate, and temporary.
- Designed Landscapes:
 - Impacts on Toverna/Temple Park will be indirect, negative, slight and temporary from the construction process.
 - Blackrock Park contains three protected structures entrance gates, bandstand and pavilion – (DLR RPS 115, 1888 and 112 respectively) as well as a folly (which is not a protected structure). The Proposed Scheme runs along the frontage of the park and requires works to set back the existing boundary/retaining wall along a portion of the park boundary (existing wall along footpath edge to be set back by approximately 2.8m over a distance of approximately 90m), the existing wall at this location is not an original feature of the park and was provided to facilitate previous road widening works, the wall is low, however, which allows views over the park and beyond to the sea. The folly is the closest structure to the proposed new boundary wall and will be approximately 4m distant. The entrance gates to the park are protected and while the Proposed Scheme envisages footpath

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improvements at their location the gates will not be subject to works. The construction phase impacts on Blackrock Park are considered to be direct, negative, slight, and permanent.

- The dressed granite piers, plinth, wrought iron railings and main entrance gates along the boundary of Blackrock College fronting onto the Proposed Scheme are proposed to be relocated/set back (by approximately 3m over a distance of approximately 210m, tapering off north of the entrance gates) to accommodate works. Setting back of the front boundary will reduce the demesne area and result in the loss of trees along the boundary. The main entrance gates to Blackrock College are on the RPS (DLR RPS 99) and these are to be rotated/relocated slightly to facilitate the proposed scheme and their setting will be altered by the changes to the front boundary, loss of trees in the vicinity and provision of the Proposed Scheme. In this regard the Board should note that the difference between the current and proposed locations of the main entrance gates are best illustrated on the asset alteration drawings (sheets 6) of the ESB or Foul Sewer Asset alteration drawings). The potential construction phase impact along the frontage of Blackrock College is direct, negative, moderate and permanent.
- The Proposed Scheme will also require the removal of bollards from the west of the entrance to Willow Park School gates which are on the RPS (DLR RPS 28), the gates themselves will not be subject to works but their setting will be affected. The Board should note that while the Arboricultural Impact Assessment Report (Appendix 17.1 of the submitted EIAR) clearly shows that trees at this location will be retained and <u>will not</u> be removed, section 16.4.3.5 of the EIAR (design landscapes) states that while most trees will be retained, the works will result in the removal of trees. I note that some scrub or planting may need to be removed, however, in order to resolve this ambiguity, I recommend that in the event of favourable consideration, a specific condition be included ensuring the retention of trees as committed to in

the Arboriculture report. I consider the potential construction impact to be direct, negative, slight and temporary at this location.

- A dressed limestone gothic gateway at St. Mary's home, constructed in 1866 is proposed to be set back to accommodate the scheme, this gate is not a protected structure, and the adjoining boundary wall is not the original demesne boundary of Merrion Castle. The works will reduce the extent of the demesne and impacts are predicted to be direct, negative, moderate and permanent.
- The gothic gateway and gates at the frontage of the Gas Networks Ireland facility on the Merrion Road (south of SVUH) are proposed to be removed and relocated to the north, near the Merrion Road/Nutley Lane Junction. This gateway is not protected but was formerly associated with the demesne and is all that survives of the demesne landscape. The DCC submission notes that its relocation has no relevance to the lands and will blur the historical record. Anticipated impacts are direct, negative, moderate and permanent.
- Wrought iron gate, granite plinths and railings at the corner of Roly's bistro and which are associated with Herbert Park are proposed to be removed along with 6 no. trees which will impact the vista along Herbert Park, the potential construction phase impact is direct, negative, moderate and permanent.
- Direct, negative, moderate and permanent impacts will arise on the RTE Montrose campus and Elm Park Golf and Sports Club (EPGSC) due to set-back of their boundaries and land-take. The setting of Montrose House (RPS 7847) will not be impacted by the Proposed Scheme due to its set-back from the Proposed Scheme, the presence of significant modern buildings and the RTE campus, and the fact that the existing boundary wall at this location is not original. Nutley House (not on the RPS) is now the club house of the EPGSC and its demesne is now a golf course and tennis courts, the boundary treatments in place are largely non-original. Impacts on the demesne of Nutley House will be indirect, negative, slight and temporary.

- Other Structures of Architectural Interest:
 - The majority of the 201 other structures (or groups of structures) of industrial or other architectural interest will not be impacted by the Proposed Scheme. Section 16.4.3.6 of the EIAR states that the gate piers and gates adjacent to no. 12 Merrion View Avenue Road will be repositioned, these are interesting features but not protected. I note that while a set-back in the wall is shown on drawings, the gate pillars do not appear to be moved to any significant degree and impact will be direct, negative, moderate and permanent. The easternmost gate pillar, plinth and railings at the entrance to the Rock Road halting site will also be set back, this gateway is not protected, and impacts will be direct, negative, moderate and permanent.
 - Where other structures of regional importance in terms of architectural heritage merit (although not protected or designated) have been identified occurring along the route of the Proposed Scheme potential construction phase impacts will be indirect, negative, moderate and temporary. In relation to similar structures identified as having local importance construction phase impacts are considered to be indirect, negative, slight, and temporary.
- Street Furniture:
 - Thirteen cast iron post-boxes occur along the route, they will be retained in position and not be directly impacted, although disruption to access to the boxes will occur during construction and accordingly indirect, negative, moderate, and temporary impact will arise.
 - There are 69 lamp posts of regional importance and medium sensitivity that are proposed to be repositioned as part of the Proposed Scheme, and therefore potential for damage and loss during the construction phase gives rise to potential direct, negative, significant and temporary impact. Seventy-two such lamp posts will be retained in position and not directly impacted, although due to proximity damage could occur and as such indirect, negative, moderate and temporary impact could arise. One further lamp post of local importance and low sensitivity will

be relocated on Herbert Park Road giving rise to direct negative slight and temporary impact. Three lamp posts of local importance and low sensitivity are to be retained on Fitzwilliam Street Upper, and similarly could experience indirect, negative, slight and temporary impact for potential damage during works.

- Five of the ten items of statuary and miscellaneous street furniture will experience direct impacts. The three no. concrete benches at the former Swiftcall/Jacobs Factory are to be removed and are not proposed to be replaced, these are not recorded or protected and are therefore considered to experience direct, slight and long-term impacts. A concrete trough (opposite RDS) is to be removed for construction and repositioned with direct, negative, significant and temporary impact. The Kiosk and railings at corner of Pembroke and Northumberland Roads is to be re-positioned thereby experiencing a direct, negative, moderate, temporary impact. A further five items (Black Rock Dolmen, milestones (one at Pembroke Road other Rock Road), Electrical cabinet (Pembroke Road) and Celtic Cross (Herbert Park) will adjoin the scheme but not experience direct impacts. Due to their proximity to the Proposed Scheme and the fact that ground surfaces in the vicinity will be changed they will experience indirect, negative, moderate and temporary impacts.
- The Proposed Scheme requires repositioning of existing granite heritage kerbs of regional importance and medium sensitivity at 16 locations, these will experience direct negative significant and temporary impact. Three locations with similar kerbing of local importance and local sensitivity will have direct, negative slight and temporary impacts. These impacts arise due to the risk of loss or damage during the works.
- One coal hole (at 95 Baggot Street Lower DCC RPS 392) requires repositioning to provide for the cycle track. Due to its connection to a protected structure, and location within a conservation zone as designated in the DCC City Plan, the potential construction impacts are direct, negative, significant and permanent.

- Cobbled surfaces at Fitzwilliam Street lower will require removal and reinstatement or burial with impacts arising being direct, negative, significant and temporary.
- Kerb realignments at MacCartney bridge, and works adjacent to jostle stones, coal holes, cellar lights, grille, cellar hatches on Baggot Street Upper, /Lower, and Fitzwilliam Street Lower will potentially have indirect, negative, moderate, and temporary impacts.
- 9.11.6.3. Operational phase impacts prior to mitigation on architectural heritage features can arise from the presence of new/relocated/removed bus stops/ shelters, new cantilevers signal poles as well as urban realm alterations including new trees and removal of established trees. Potential impacts are summarised below.
 - Protected Structures:
 - The Proposed Scheme provides for a bus shelter at Temple Hill adjacent to (but outside the high wall boundary of) Mount Temple (DLR RPS 208), impact is therefore indirect, negative, not significant and long term.
 - The proposed location of cantilevered signal poles and/or bus shelters along the Proposed Scheme at locations close to protected structures including - St. Theresa's lodge, Mount Merrion Avenue, Trimleston Lodge, the Spanish Embassy, Masonic School/Clayton Hotel, RDS, Balls Bridge, the former Pembroke Town Hall/CDETB, 166a Shelbourne Road, 71 – 77 Pembroke Road, 63 and 90 Pembroke Road, 1 – 11 Pembroke Road, 1, 2 and 50 Baggot Street Upper, 47, 65, and 66 Baggot Street Lower, 5 and 7 Fitzwilliam Street are all predicted to experience indirect, negative, slight and long-term impacts.
 - Architectural Conservation Areas,
 - The provision of a cantilevered sign at Rock Road/Booterstown Avenue junction will lead to an indirect negative slight and long-term impact on the Booterstown cACA.
 - Conservation Areas:

- The provision of bus shelters and cantilevered signal poles at various locations within the conservation areas set out in the DCC City Plan is considered to give rise to indirect, negative, slight and long-term impacts. In this regard I note that DCC have raised concerns in particular in relation to the provision of bus shelters and I have discussed this matter further in section 9.11.11 below.
- Designed Landscapes:
 - Operational impacts on designed landscapes are predicted to be indirect negative slight and long-term throughout with some exceptions. The replacement of the existing concrete retaining wall at Blackrock Park with a modern more suitable and safer structure is considered to result in an indirect, positive, moderate, long-term impact. The cantilevered signal poles in the vicinity of Booterstown Park and Nature Reserve are set back and screened by trees and accordingly impacts are indirect, negative, not significant, and long term. While the impacts at Herbert Park are considered to be direct, positive, moderate and long-term arising from the public realm improvements that the EIAR considers will improve the vista at this junction notwithstanding the proposed loss of trees at the junction and set back of heritage boundaries.
- Other Structures of Architectural Interest:
 - Impacts on other structures of architectural interest are considered to be indirect, negative, slight and long-term throughout the scheme.

9.11.7. Mitigation Measures

9.11.8. Archaeological Mitigation Measures

9.11.8.1. Archaeological mitigation measures can be achieved by avoiding, preventing, reducing or offsetting negative effects through preservation insitu, by design and/or recording, and include the following:

- A suitably qualified archaeologist will be appointed as part of the team administering and monitoring the works, further the appointed contractor will employ a competent archaeologist to advise on archaeological and cultural heritage during construction.
- Archaeological monitoring will be carried out under license and will ensure full recognition, the proper excavation, and recording of archaeological soils, features, fines, and deposits which may be disturbed. Such monitoring will take place along the route of the former tramline at identified locations, and relevant SMR and RMP sites.
- For cellars, coal cellars or basements provision for a geodetic survey and recording of each individual structure which could be impacted will be carried out in advance of any works.
- Provision will be made for archaeological monitoring, inspection, and excavation works that may arise on site during the construction phase.
- Should archaeological features or material be uncovered, all machine work will cease in the immediate area to allow the archaeologist/s time to inspect and fully record any such material.

9.11.9. Cultural Heritage Mitigation Measures

- Features of a cultural heritage interest will be protected, however, should they be required to be removed on a temporary basis (e.g., Stone trough at RDS, Memorial, coal covers), this will be done under archaeological supervision and in accordance with an appropriate method statement and the feature returned to its setting upon completion of the works.
- It is intended that the memorial at Herbert Park will be protected during construction, however, if necessary, it may be temporarily removed and stored under archaeological supervision.

9.11.10. Architectural Heritage Mitigation Measures

 The methodology for works affecting sensitive historic fabric arising from the Proposed Scheme is set out in Appendix A16.3 and Section 16.5 of the EIAR. The Appendix sets out the general principles of the conservation approach i.e., that consultation will be held with the relevant local authorities, carrying out of surveys and protection measures for specific items of architectural heritage. Detailed approaches to works to and around a range of features is also included, such as:

- Boundary treatments rubble, coursed boundary, brick, walls plinths and railings, gate piers, gates and railings, will be recorded, removed, stored and re-used of materials. Samples of mortar/render will also be taken for reconstruction. Gates and railings will be restored prior to their reinstatement.
- Historic paving and surface treatments will be surveyed/photographed, protected, or removed where necessary, cleaned, repaired and stored prior to reinstatement/relaying in an appropriate manner. Where replacement/new paving is required a source which is a good match for historic fabric will be used, and historic slabs will take precedence over new inserts.
- Cobbles and stone sets will be surveyed, recorded, preserved/buried or reinstated where possible.
- Grates, pavement lights, coal holes, and other iron fixtures will be protected, if removal is required this will only be done by an experienced contractor, inventoried and recorded.
- Statues and other street furniture including post-boxes and lamp posts will be recorded and protected, as appropriate and where removal is necessary, they will be recorded, stored and reinstated.
- The Architectural mitigation for direct works to the boundaries of protected structures such as at no. 151 and 153 Merrion Road, Clayton Hotel (former Masonic school), Blackrock College boundary/gate, and other heritage gate/gateways includes:
 - Recording the existing boundaries in position.
 - Affected masonry, brickwork, railings, gates, gate posts, capping stones will be labelled prior to careful removal, to safe storage and their

reinstatement along the new line/location. All works will be undertaken by an appropriate architectural heritage specialist.

- In relation to the works to the curtilage of the CDETB/former Pembroke Town Hall and 1-11 Pembroke Road where it is proposed to alter the means of vehicular access and curtilage, similar mitigation to the above is proposed, while removed railings will be adapted to form gates to match the existent boundary treatment, similarly existing kerbing will be reused within the landscaping schemes as appropriate. Historic fabric not subject to direct works will be protected with all works overseen by an architectural heritage consultant.
- Similar protection, to that set out above, recording measures and oversight will be adopted in relation to works at the grand canal tow path.
- In relation to indirect construction phase impacts for properties of heritage value, ACAs, zoned conservation areas, NIAH structures, other heritage structures, street furniture (incl. lamp posts and post boxes), statuary, and heritage paving, cobblestones (at Fitzwilliam Street Lower), jostle stones etc. along the route of the Proposed Scheme recording, protection and monitoring is proposed both prior to and during construction activities, and where identified features (heritage kerbing, paving, Pembroke Road kiosk, trough, coal holes etc.) are to be removed and reinstated the methodologies set out in Appendix 16.3 of the EIAR will be followed to ensure careful dismantling and re-erection, and all works will be subject to oversight by an architectural heritage consultant.
- In relation to impacts on designed landscapes the mitigation is recording, protection and monitoring of boundaries, the re-use of materials where appropriate along new boundary lines as appropriate, oversight by suitable architectural heritage consultant. Similarly, relocation, storage and re-erection of gates, at relocated positions will be carried out in accordance with the methodologies set out in Appendix 16.3 and appropriately monitored.
- There are no specific operational phase mitigation measures proposed as it is stated that these have been inherently included within the design of the overall scheme.

9.11.11. Residual Impacts and Conclusion

Archaeology and Cultural Heritage.

9.11.11.1. With the application of the mitigation measures during the pre-construction and construction period all archaeological and cultural heritage items will have been preserved by record (archaeological excavation), preservation and situ, preservation by design, and / or archaeological monitoring. Accordingly, no residual significant impacts are anticipated.

Architectural Heritage

9.11.11.2. With the application of mitigation measures the predicted impacts on architectural heritage varies from indirect/direct, negative, slight to not significant, over temporary (construction) to long-term (operational) durations for all features with the exception of the replacement boundary to Blackrock Park which is considered to have a direct, positive, slight long term impact as the replacement of the existing concrete wall with a more modern intervention is considered to be an improvement over the existing situation.

9.11.12. **Conclusion**

- 9.11.12.1. Having considered in detail all the submissions lodged and the application documentation I am broadly in agreement with the conclusions and impacts of the Proposed Scheme as set out in the EIAR, however, there are certain amendments to the scheme that could be made to further minimise impacts. In this regard I note the following:
 - I acknowledge that the consideration of impacts at Herbert Park (railings and plinth removal adjacent to 7 Ballsbridge Terrace), in combination with the removal of 6 mature (category A) trees may be accurate in the context of the extent and significance of impacts. However, I also note that the existing built environment (the existing pergola to the side of no. 7) was not considered in the initial junction design nor the submitted EIAR. In this regard, none of the application drawings, EIAR assessments, nor photomontages include

consideration of the pergola structure. In response to a submission from the operator (Wappinger Foods Ltd.) the applicant has submitted a response to alter/augment their consideration of land take impacts on commercial receptors during the operational phase of the Proposed Scheme, noting that in their consideration it would be 'negative, moderate and long-term'. I note this submission, however, in my opinion the character of this corner which brings mature trees into the streetscape behind existing railings and plinth of heritage merit along the edge of Herbert Park, merits retaining as it is. There is ample room at this junction to accommodate both the existing alignment of the plinth and fenceline as well as retaining the six trees, while also carrying out the junction safety and functionality improvements sought. The applicant has highlighted the design iterations that have been carried out at this location, however, having regard to the established character of this area, and the importance of retaining mature trees insofar as practicable (a point raised by a significant number of third-parties including the NPWS) I consider that this junction and the space available provides the sole opportunity throughout the scheme to prioritise the retention of existing mature trees while also achieving the junction design standards to ensure the project requirements can be satisfied. Accordingly, I recommend that a condition be attached requiring a re-design of this junction to allow for the existing trees and fenceline to be retained as is. In so doing, I note that an additional tree (currently in the traffic island) in the middle of this junction may be jeopardised. Again, however, there is ample space at this location to facilitate its re-planting/relocation (as recommended generally by the NPWS) and in so doing I note that the Proposed Scheme provides for a significant landscaping area at this location and that sufficient space can be provided from existing underground services at this location to facilitate transplanting. I also note that this would be the sole tree within the scheme which would be transplanted and while I accept the difficulties involved in transplanting existing trees elsewhere throughout the scheme the probability of success at this location is sufficient to merit the effort in this situation. The primary consideration in prioritising the retention of trees at this junction is to retain the character of the immediate area insofar as practicable while also

harnessing the public realm improvements inherent in the scheme I also note the biodiversity improvements that may accrue in retaining existing trees within the established streetscape.

The removal of the three concrete benches described as "3 no. concrete benches with fluted grooves to the back rest, set in a dwarf wall", is proposed. These are located along the boundary of the former swiftcall centre, Merrion Road and have been noted as being of local significance. These benches were also raised by the Merrion Road Residents Association in their submission who refer to them as "IMCO concrete seats", and state that the originate from the 1930s and are the only remnants of a significant laundry building that was in place at this location. Due to the local interest and industrial heritage associated and the fact that they could be easily relocated to the new boundary wall at this location (or in the immediate vicinity) I consider it appropriate that these seats be removed and reinstated along the new boundary wall.

9.11.12.2. I note that the Proposed Scheme requires the relocation of heritage gates (Blackrock College, St. Marys nursing home and the Bloomfield demesne gate). The Blackrock college gate is essentially being pivoted and slightly moved but it will retain both its function and character, and I am satisfied that the subject works can be carried out in an appropriate manner to maintain the architectural merit and features and that the works, while altering the orientation of the gate slightly, will not give rise to significant adverse effects on this protected structure. Similarly, I consider that the setting back of the St. Marys Home gate (not on the RPS) can be achieved without significant adverse effects. The Bloomfield demesne gate (at the entrance to GNI facility near SVUH) is not a protected structure, however, DCC in their submission noted that moving this gate to the proposed alternate location (public realm space at Merrion Road/Nutley Lane Junction) would 'blur the historical record'. I consider that the removal and relocation of these gates to be acceptable in the context of the proposed works but recommend that a plaque/information board be provided setting out the history of the gate and clarifying its original position be included at the new location.

- 9.11.12.3. In relation to the provision of widening, land-take and boundary set back at 151 to 157 (odd numbers only) on Merrion Road. I note that third parties have lodged submissions seeking that the inbound bus lane recommence only after no. 151 following the controlled junction at the Merrion gates. This alteration could ensure that the retention of the three mature trees outside these dwellings while also retaining the existing boundaries of all four of the properties (two of which – no's 151 and 153 are protected structures). Such a solution may seem appealing given that longer lengths of bus signal priority/control are proposed along Merrion Road between its Ailesbury Road and Shrewsbury Road junctions, and reducing the length of inbound bus lane at this location would negate the need to carry out any direct works on the sites of the protected structures especially given the DCC position that the set-back in these property boundaries would be 'regrettable' and impact the setting of Estate Avenue. The application documentation states that the inbound bus lane must commence where it is proposed due to the need to ensure sufficient capacity and queuing at the SVUH junction further to the north. While limited information and justification is provided in this regard, on balance, I consider that the mitigation measures incorporated into the design of the set-back boundaries at this location in combination with the overall need to improve bus, cycling and pedestrian infrastructure justify the design and extent of the Bus Lane at this location and will ensure that significant impacts do not arise from increased congestion while also ensuring junction efficiency at SVUH. Should the Board consider it appropriate to omit that part of the inbound bus lane in front of no.'s 151 to 157 Merrion road, I would note that this could be achieved by condition and advise that further design alterations may be required to the bus-stop/lane in front of Elm Park Apartments and alterations would also be necessitated to the CPO order.
- 9.11.12.4. I note that in their submissions the Local Authorities recommended that conditions be imposed to ensure agreement and implementation of the proposed construction practices relating to heritage features, boundaries and works to protected structures. I consider the imposition of such a condition to be prudent and will ensure that adequate protections are provided in relation to works to protected structures and heritage features.

- 9.11.12.5. The Proposed Scheme incorporates the provision of additional bus stops and planting in areas which have significant architectural heritage merit on the basis of their streetscape. DCC and others in their third-party submissions have raised concerns in relation to the provision of bus shelters at certain locations including 1 Merrion View Avenue, 45-50 Baggot Street Upper, 67-68 Baggot Street Lower, 63-67 and 86-88 Pembrooke Road, and Fitzwilliam Street Lower, and sought for these bus shelters to be omitted. Given the heritage value of these locations, and the necessity of providing appropriate and improved facilities for bus passengers along the corridor I consider the following in this regard:
 - Advertising panels should be omitted from the bus shelters at 1 Merrion View Avenue, given that there is an existing bus shelter on the opposite side of the road and the narrowness of the path at this location. I consider the provision of a bus shelter at this location to be appropriate but its impact should be minimised.
 - Bus Shelters at Baggot Street Upper and Lower are considered appropriate, however, due to the nature and character of these streets and heritage value of the built environment in the vicinity the advertisement panels should be omitted.
 - The sole proposed bus shelters at Fitzwilliam Street Lower should be omitted in order to minimise visual impacts and further reduce the potential for visual impacts to arise at these locations that would reduce the established and acknowledged streetscape character along this Georgian streetscape, having particular regard to the narrowness of the footpath at this location and its context within an established Georgian heritage streetscape.
- 9.11.12.6. In the interests of clarity and having also considered the visual amenity and impact of the Proposed Scheme (discussed further in section 9.12 below) I consider that the provision of cantilevered signal poles to be necessary (to the overall successful operation and safety of the scheme) and are appropriate along the transport corridor, furthermore I consider that they will not have an adverse impact on the overall streetscape and/or setting of any protected structures. These structures are located within the context of an urban built environment along an important and busy transport corridor, and the provision of transportation

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infrastructure will not therefore adversely affect their settings or their ability to continue to contribute positively to the streetscape, nor will the cantilevered signage adversely impact on the curtilage of RPS properties or features of heritage value.

9.11.12.7. The proposed scheme provides for the introduction of a new tree-line along the southern western side of Fitzwilliam Street Lower through the introduction of 11 no. street trees. As set out above this street forms part of the 'Golden Mile', which provides a largely uninterrupted Georgian styled and proportioned streetscape from Merrion Square East, through Fitzwilliam Street Lower and Upper, Fitzwilliam Square East, and Fitzwilliam Place (in this regard I note the presence of the ESB building on Fitzwilliam Street Lower as a modern design intervention although it does respect its Georgian setting in terms of streetscape and proportions). While the introduction of trees along any streetscape is of inherent value and should generally be encouraged where possible, the introduction of a tree line along Fitzwilliam Street Lower within this DCC zoned conservation area, would, in my opinion adversely affect the established heritage value of the streetscape and ultimately would be inappropriate. In this regard I note that my opinion concurs somewhat with that of the City Architects Division of DCC who have raised this as an issue in their contribution to the DCC submission on file stating "New street trees are proposed in the scheme in the footpaths along Baggot Street Lower and Fitzwilliam Street, both of which are within a Red-lined Conservation Area. It is considered that historic Georgian Streetscapes do not normally feature street trees in the footpaths and hence are considered inappropriate at this location and should be omitted." In the interests of clarity and completeness I wish to state that while I agree with this opinion in relation to the omission of trees along Fitzwilliam Street Lower, I consider that the introduction of the proposed 6 no. street trees along the footpath on the western side of Baggot Street Lower (inclusive of 2 no. on Herbert Street Junction and 1 no. set back on James Street East) and 1 no. tree on the eastern side to be appropriate, due to the established character of Baggot Street Lower which has mature trees in place (albeit along the centre-median of the carriageway), the modern building design interventions in place and the overall benefits of introducing trees into the urban streetscape where possible. Should the Board consider that the provision of additional trees along Baggot Street Lower to be inappropriate (having regard to streetscape and architectural heritage considerations as set out in the DCC

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submission) I would like to highlight the fact that of the 7 no. trees proposed (in the vicinity of Lower Baggot Street), 3 of these (2 no. at the Herbert Street Junction, and 1 no. at James Street) will be read as being on these side streets, are stepped back from the building line of Baggot Street Lower, and will not impact on its character and should therefore be retained within the scheme regardless. In light of the above, I consider it appropriate to omit the 11 street trees proposed along Fitzwilliam Street Lower in the interests of protecting the inherent heritage value of the existing Georgian streetscape, while I consider that the proposed trees in the vicinity of Baggot Street Lower to be appropriate.

9.11.12.8. I have considered all of the written submissions made in relation to archaeological, cultural, and architectural heritage, in addition to those specifically identified in this section of the report. I am satisfied that significant adverse impacts can be avoided, managed, and mitigated by the measures which form part of the proposed scheme, the proposed mitigation measures and through suitable conditions. I am, therefore, satisfied that the Proposed Scheme would not have any unacceptable direct or indirect impacts in terms of archaeological, cultural or architectural heritage. I am also satisfied that while some cumulative effects with other existing and permitted developments will not arise due to the nature of the design of the Proposed Scheme and with the implementation of the mitigation measures as set out.

9.12. Landscape (Townscape) & Visual

9.12.1. Landscape (Townscape) and Visual is dealt with in Chapter 17 of the submitted EIAR which is supported by 20 no. photomontages, and an Arboricultural Impact Assessment (AIA - Appendix A17.1). The AIA has surveyed a total of 1300 trees along the route of the Proposed Scheme, classifies them as either; Category A (trees of high quality - 198 no. trees, 15% of total), Category B (trees of good quality – 839 no., 94% of total) Category C (trees of low quality or <75mm diameter – 255 no., 20%), or Category U (trees to be removed due to poor condition, 8 no., 1%) Individual photomontages are also presented in Figure 17.2 (in volume 3) of the EIAR. I have reviewed these in the context of the Proposed Scheme and should the</p>

Board require further details section 17.5.2.1 pf the EIAR provides a commentary on each of the 22 viewpoints.

- 9.12.2. The study area in terms of landscape/townscape is considered to be the length and width of the Proposed Scheme corridor which is expanded where possible to incorporate wider viewpoints where available. The EIAR was supported by desktop studies as well as full route walkovers.
- 9.12.3. Several submissions have raised concerns that the Proposed Scheme will give rise to adverse visual impacts affecting both individual properties, as well as the established character of particular areas. In this regard I note that the primary concerns in relation to adversely impacting the character of an area are centred on the Nutley Lane, Baggot Street Upper, Pembroke Road, Fitzwilliam Street, and Merrion Road portions of the Proposed Scheme. Furthermore I note that concerns raised not only refer to the physical works but also the nature of the operational phase, in that increased bus activity and potential grouping/gathering/clustering of additional buses on the route (for example at the terminal location in the vicinity of Merrion Square) would have an adverse impact on the amenities, character and streetscape at various locations throughout the route.
- 9.12.4. The Board should note that there is a degree of overlap between the consideration of impacts on townscape/streetscape and visual impact and those of architectural heritage set out in the previous section. Insofar as is practicable and in the interests of brevity I do not intend to repeat consideration of any impacts previously considered in that section.

9.12.5. Overview - Baseline

- 9.12.6. The Proposed Scheme runs through suburban and city landscape/townscape ranging in character from residential, commercial, and mixed-use areas as well as along a variety of recreational and heritage areas. The preceding section of this report sets out the character of the various sections of the Proposed Scheme, the main townscape/streetscape considerations for each are summarised below:
 - Section 1: (Stradbrook Road to Booterstown Avenue), characterised as a major road through outer suburban villages along the coastal corridor with town/coastal parks, overlooked by residential and large institutional sites.

Primarily residential in use with local retail uses and services. There are protected views designated in the DLR development Plan from the Rock Road over Blackrock Park and to the sea.

- Section 2: (Booterstown Avenue to Nutley Lane), characterised as a major road through outer suburban areas close to coastal corridor with coastal mature park at southern end. Enclosed by residential and mixed uses including institutional lands (SVUH). Some areas have mature street tree planting.
- Section 3: (Merrion Road Nutley Lane to Ballsbridge), characterised by outer city suburbs, residential with some embassies, hotel and major institutional (RDS) land uses. Mix of traditional brick and render properties with small front gardens, mature street trees in place and garden landscaping.
- Section 4: (Ballsbridge to Merion Road), characterised by inner city village and urban streetscape, road lined by urban terraces with some modern infill.
- Section 5: (Nutley Lane): Characterised as an enclosed suburban road corridor with residential, amenity, institutional and local retail uses in place. Single carriageway road connecting two major roads (Stillorgan Road and Merrion Road).

9.12.7. Potential Impacts

- 9.12.8. Section 17.7.4.2 of the EIAR provides a list of changes that were incorporated through the iterative design process to improve/reduce the impact of the Proposed Scheme, these include the provision of a bus gate (and associated rearranged access proposals for no.'s 1-11 Pembroke Road) on Pembroke Road to reduce the carriageway requirements from 4 to 2 vehicular lanes, along with a number of other measures to reduce land-take to minimise the extent and associated impacts of the Proposed Scheme.
- 9.12.9. The characteristics of the Proposed Scheme which could give rise to impacts in terms of townscape and visual assessment during the construction phase include: site mobilisation, fencing, hoarding, removal of material/boundaries, operation of construction machinery, diversion of existing services and links, temporary relocation

of bus stops, as well as all general construction activities including amendments to existing road network and junctions (surfacing, kerbing, lighting, drainage, verges, medians etc.), provision of cycle tracks throughout the existing transport corridor, widening of transport corridor (through land-take and construction activities), and the provision and use of construction compound.

- 9.12.10. The areas which will potentially experience the largest intervention/change in terms of townscape/streetscape during the construction phase include:
 - Blackrock Park, route widening will require boundary set back and provision of retaining wall (photomontage figures 17.2.1.1/2/3/4 provides imagery)
 - Works in the vicinity of Lios An Usice (residential dwelling on the RPS surrounded by Blackrock Park) will require land take, and boundary set back (iron fence on plinth) at a side/rear vehicular access gate.
 - Removal of vegetation and planting along the northern (seaward) boundary of the Rock Road/Merrion Road opposite (and in the vicinity of) the Trimlestone Avenue junction (photomontage figures 17.2.1/2/3/4 refer). In this regard the Board should note that the removal of the existing vegetation/trees at this location are along the frontage of the permissions issued under ABP 308900 and 308845 under which boundary changes/interventions have already been permitted.
 - Glenalla and Blackrock Clinic widening, frontage set back and provision of retaining wall, (photomontage figures 17.2.1/2/3/4 refer).
 - Blackrock College widening, set back of front boundary frontage boundary (iron fence on plinth), re-orientation/pivoting of entrance gate (RPS), loss of existing trees and provision of new street trees (photomontage figures 17.2.3.1/2/3/4 and 17.2.4.1/2/3/4 refer).
 - Changes at Merrion Gates junction, including route widening, carriageway reallocation of space, setting back of Telford/St. Marys Nursing Home stone arch gates, (photomontage figures 17.2.6.1/2/3/4 refer).
 - Elm Court Apartments route widening provision of cycle track, land-take, removal of bus stop and removal of large mature street tree (not to be

replaced) along site frontage, (removal of tree and bus stop shown in photomontage figures 17.2.7.1/2 refer)

- No's 151 157 Merrion Road (odd numbers only), footpath alterations, provision of cycle track, removal of 2 no. category A street trees (not to be replaced/replanted), set-back of front boundaries, land-take from residential front gardens, no.'s 151 and 153 are on the RPS, (photomontage figures 17.2.2.7.1/2/3/4 refer).
- Relocation of Bloomfield Arch gateway from its current location at the frontage of the GNI facility south of SVUH, to a location in the public realm approximately 200m northwest close to the Merrion Road/Nutley Lane junction.
- No. 85 Merrion Road set back of front boundary wall removal of 2 no. category A trees from frontage (to be replaced and more established trees in the vicinity (photomontage figures 17.2.8.1/2 refer),
- Clayton Hotel boundary (granite plinth and railings) set back and land take noting the existing mature trees will be retained to immediate frontage while those street trees to the south are proposed to be removed and not replaced, (photomontage figures 17.2.10.1/2/3/4 refer).
- Revised vehicular access arrangements, landscaping alterations to boundary (plinth and railings) to CDETB premises (former Pembroke Townhall), photomontage figures 17.2.11.1/2/3/4 and 17.2.12.1/2 refer.
- Changes to Pembroke Road/Shelbourne Road/Herbert Park/Elgin Road junction, including the loss of trees, heritage railings and plinth to side of no. 7 Ballsbridge terrace, and changes to amenity space provisions, photomontage figures 17.2.13.1/2/3/4 and 17.2.14.1/2 refer. The Board should note, however, that figures 17.2.14.1/2 do not show the extant pergola structure that is currently in place to the side of no. 7 Ballsbridge terrace (Roly's Bistro).
- Changes at Pembroke Road/Lansdowne Road/Northumberland Road junction including relocation of kiosk photomontage figures 17.2.15.1/2/3/4 refer.

- Provision of cycle track and re-arranged parking provisions along Pembroke Road leading to Baggot Street Upper (noting the street trees are to be retained on this portion, (photomontage figures 17.2.16.1/2/3/4 refer).
- Changes to carriageway allocation, provision of cycle track through Baggot Street Upper and Lower and along Fitzwilliam Street Lower – noting the majority of trees along this portion of the route will be retained.
- Nutley Lane substantial works proposed which will result in the removal of a significant number of street trees, land acquisition and boundary set-back/changes at RTE campus and EPGSC frontages. The boundary set-back and in particular the removal of the footpath, provision of a bi-directional cycle lane, removal of existing back-planted fencing and its replacement with a concrete vegetated wall will introduce a very significant change along the Nutley Lane streetscape, furthermore I consider that the provision of the scheme along this lane will impact the overall character of this road albeit the overall design adopted will minimise impacts on individual residential properties insofar as practicable. Photomontage figures 17.2.19.1/2/3/4, 17.2.20.1/2/3/4, 17.2.21.1/2/3/4, and 17.2.22.1/2/3/4, refer to the proposed amendments along Nutley Lane.
- Provision of a construction compound at Booterstown car park which will be surrounded by hoarding and give rise to significant activity throughout the construction phase.
- 9.12.11. Overall, impacts through the construction phase in the absence of mitigation range from negative, significant to very significant, temporary/short term in relation to townscape and streetscape character through the five sections of the Proposed Scheme. Streetscape Impacts in relation to ACA's, conservation areas (DCC zoning), protected structures, amenity designations, preserved views, trees and vegetation are all considered to be negative but ranging from temporary to short-term and slight to very significant.
- 9.12.12. The characteristics of the Proposed Scheme which could give rise to impacts in terms of townscape and visual assessment during the operational phase arise from changes to traffic movements along the Proposed Scheme and adjoining roads, and changes to streetscape features including allocation of carriageway space,

provision of cycle tracks, changes to footpaths and public realm facilities including lighting, signage, surface treatments as well as junction changes. Impacts will also arise from permanent land-takes and changes to access arrangements and boundary relocation/reinstatement at various properties throughout, provision of landscaping areas, permanent loss of trees, planting of street trees etc.

- 9.12.13. Overall, impacts from the operational phase are generally consistent with those of the construction phase arising at the various sections, with the various design interventions carried out at construction continuing to impact in the operational stage, however, throughout the operational phase the public realm works, planting and landscaping will further mature and be assimilated within the built and natural environment and thus mitigation is provided through natural growth and acclimatisation.
- 9.12.14. The set-back of the frontage railing and plinth along the frontage of Blackrock College will give rise to the loss of a significant amount of trees (approximately 32 no.) while the Proposed Scheme will provide 15 no. new street trees along this frontage, and additional trees and shrubs behind the newly established boundary line it is considered that this change will be locally significant at this location.
- 9.12.15. The operational phase impacts are considered to be negative, moderate and long term in Sections 1 (with the exception of locally significant impacts at Blackrock College), 2, 3 and 5 of the proposed scheme. I consider that the impacts will be positive moderate and long term in relation to Section 4, (Ballsbridge to Merrion Square) and, for clarity this consideration is on the basis of the omission of the proposed tree line along Fitzwilliam Street which I have recommended in the previous section. Streetscape impacts on ACAs, conservation areas, protected structures, amenities, preserved views are all long-term and considered as ranging from neutral to negative, and not significant to significant.

9.12.16. Mitigation Measures

- 9.12.17. Mitigation measures provided for within the Proposed Scheme in relation to streetscape and visual impacts are set out in section 17.5 of the EIAR and include:
 - Where practicable trees will be retained as set out in the AIA included with the application documentation. Protection of trees to be retained and works to

remove trees will be carried out in accordance with relevant standards and in accordance with project specific methodology set out by a qualified professional arborist.

- For properties subject to permanent/temporary acquisition and boundary alterations an inventory of features that may be disturbed will be taken and recorded, and appropriate protection measures/screening applied to features, trees and planting to be retained.
- Appropriate access will be retained to all properties.
- 9.12.18. The design of the Proposed Scheme incorporates the following elements relative to mitigation for townscape and streetscape impacts.
 - New boundaries will be established on the setback line to match existing boundaries and take account of existing trees planting and other features.
 - Where paving, existing trees, hedges or planting is removed from temporary acquisition areas new planting and paving will be provided using similar and semi-mature species/trees if practicable.
 - Urban realm works will consider the established character of the area and have regard to heritage features.
 - Landscaping proposals have regard to biodiversity, water and SuDs considerations.
 - All elements of the proposed scheme within public areas will revert to ongoing management and maintenance by the relevant Local Authority once works are completed.

9.12.19. Residual Impacts and Conclusions

9.12.20. Mitigation measures in relation to streetscape/visual amenity/townscape do not have a significant effect on construction phase impacts as the works to provide the Proposed Scheme will give rise to impacts which cannot be practicably mitigated until the work activities cease. Accordingly, the residual impacts post mitigation for the construction phase continue to be negative, ranging from significant to very significant across all considered criteria. These impacts are all, however, temporary and short term in nature and I consider that the design scheme adopted has given sufficient consideration to all streetscape and townscape issues in the design approach adopted.

- 9.12.21. I consider operational impacts on street/townscape after mitigation (which is predominantly on-going through the establishment and maturing of landscaping and visual measures) to be long term, predominantly negative and ranging from slight to moderate in significance in relation to 4 of the Sections of the scheme (sections 1, 2, 3, and 5). The local impact at Blackrock College/Park rises to being of significant scale due to the nature of the boundary works at these locations. I consider residual impacts in section 4 (Ballsbridge to Merrion Square) to be positive, moderate/significant and long term due to the nature of the design interventions and landscaping proposed.
- 9.12.22. I consider operational residual impacts on conservation areas, protected structures, individual properties (where land-take or direct works are proposed), and trees (removal) to be negative, ranging from slight to significant and long-term. In concluding some impacts as being significant, I note that the design of the Proposed Scheme has insofar as practicable minimised impacts, and that the general benefits of the scheme in improving the provision of sustainable travel infrastructure are of sufficient merit to justify the interventions proposed and that the impacts arising are not unacceptable given the nature of the environment and the existing uses and infrastructure associated with this busy transport corridor.
- 9.12.23. I have previously (under my conclusions in relation to architectural/cultural/ archaeological heritage) detailed where improvements can be applied through the Proposed Scheme including in relation to the recommended omission of a proposed tree line at Fitzwilliam Street Lower, and the need to improve the junction design arrangements at Merrion/Pembroke/Shelbourne/Herbert Park Roads junction.
- 9.12.24. I note that concerns have been raised in relation to the operational period due to the potential for adverse visual impacts to arise on the streetscape/character of an area from either the increase in buses transiting or the accumulation/clustering of buses along or at the end of the route. In relation to this issue I consider that bus vehicles moving along the Proposed Scheme will not give rise to adverse impacts on the character or amenities of the streetscape throughout the Scheme. Bus movements are transitory in nature and with the improved infrastructure being

proposed buses will move more quickly along the route and congestion (which has a range of more pronounced impacts on the character of an area as well as increased noise, emissions, visual, and human health impacts) will be reduced. Considering this matter further in relation to the other sustainable modes of transport (cycling and walking) which will be facilitated by the Proposed Scheme, I note that the additional bicycles and pedestrians being encouraged through the improved infrastructure proposed could impact the character of the route. Such impacts will, in my opinion, bring greater vitality and life at a human scale throughout the impacted streetscapes and would overall have beneficial impacts on the streetscape character. In relation to the potential for clustering or accumulation of buses and the potential for impacts on the streetscape, I note that the proposed bus lane and priority infrastructure proposed will improve the movement of buses throughout the route and will facilitate better management and real-time monitoring of bus locations and routes. The management of buses will therefore be improved and clustering or gathering of buses in particular locations (such as the terminal point of the Proposed Scheme at Merrion Square) will not arise. In consideration of potential cumulative effects arising from all the other BusConnects projects in relation to this matter, similarly, I consider that the improvement of bus priority infrastructure with the availability of real time monitoring of all the routes will make the management of buses throughout the city easier, and with the increased priority being afforded to buses the cumulative effects of the BusConnects CBCs throughout the City will, in fact, facilitate the prevention of buildups, congestion and accumulation of buses.

9.12.25. I have considered all of the written submissions made in relation to visual impacts and impact on townscape/streetscape in addition to those specifically identified in this section of the report. I am satisfied that these can be sufficiently avoided, managed and mitigated by the measures which form part of the proposed scheme, the proposed mitigation measures, and through the imposition of suitable conditions. I am, therefore, satisfied that the Proposed Scheme would not have any unacceptable direct or indirect impacts in terms of visual impact. I am also satisfied that while some cumulative effects may arise from the Proposed Scheme together with existing and permitted developments, these would be avoided, managed and mitigated by the measures which form part of the Proposed Scheme and through suitable conditions.

9.13. Material Assets - Traffic, Roads & Transport, Waste & Resources Management, and Utilities.

9.13.1. Material Assets are separated into separate components/headings within the submitted EIAR – Traffic and Transport (Chapter 6 of the EIAR), Waste and Resource Management (Chapter 18 of the EIAR) and impacts on utilities/general (Chapter 19 of the EIAR). For ease I intend to consider these elements below in the same order.

9.13.2. Traffic and Transport

- 9.13.2.1. Chapter 6 of the submitted EIAR assesses the proposed pedestrian, cycling infrastructure changes as well as the reassignment of carriageway priority and other physical changes to the transportation corridor (including traffic controls, parking and loading provisions and public transport priority measures). Chapter 6 also carries out a modelling assessment for people movement, bus performance indicators and general traffic. This section of the EIAR is informed by and draws from a Transport Impact Assessment, a Transport Modelling Report, a Junction Design Report, and Impact Assessments which are set out in Appendices A6.1, A6.2, A6.3 and A6.4 of the EIAR respectively.
- 9.13.2.2. Traffic impact arising from the Proposed Scheme is a significant concern raised in third-party submissions with issues raised including loss of car parking, accessibility to property, works increasing traffic congestion, re-distribution of traffic in the wider area giving rise to additional traffic and parking on quieter streets, traffic safety, modelling data not being updated to consider the post-COVID commuter environment and work practice environment, and traffic safety as well as concerns in relation to commercial loading and unloading facilities.

Methodology

9.13.2.3. The Proposed Scheme was designed using an iterative approach supported by a multi-tiered modelling framework. The EIAR states that the iterative design process stopped when the design team were satisfied that the movement capacity of the

Proposed Scheme was maximised and environmental and residual impacts were minimised. There were four tiers of modelling used to support the design process:

- Tier 1 At strategic level, the NTAs East Regional Model (ERM) was used to provide the multi-modal demand outputs for the proposed forecast years.
- Tier 2 At local level a local Area Model (LAM) was used to provide a more detailed understanding of local traffic movements.
- Tier 3 At corridor level a micro-simulation model was developed to support junction design and signal control strategies.
- Tier 4 Local junction models were developed for each junction along the scheme based on people movement prioritisation.
- 9.13.2.4. The various impact assessments in the EIAR consider three scenarios; (1) 'Do Nothing' (DN) which represents the current baseline traffic and transport conditions without the Proposed Scheme or any of the other GDA strategy projects; (2) 'Do Minimum' (DM) representing the likely 2028 and 2043 traffic and transport conditions without the Proposed Scheme, but including for any transport schemes which have taken place, been approved or planned (i.e. based on the progressive roll-out of the GDA Transport Strategy) with partial and full implementation by 2028 and 2043 respectively; (3) 'Do Something' (DS) represents the traffic and transport conditions with the proposed scheme and including any transport schemes which have taken place, been approved, or planned. Each scenario considers 2024 as the worst-case period for the construction of the scheme, as well as 2028 (opening year) and 2043 (design year opening year plus 15 years).
- 9.13.2.5. The models consider the direct study area (i.e. area within the boundary of the Proposed Scheme) and the indirect area (the wider area of influence that the Proposed Scheme has on changing traffic volumes above a defined threshold with reference to TII's Traffic and Transport Assessment Guidelines).
- 9.13.2.6. To allow straightforward comparison of the changes in conditions between scenarios the EIAR has adopted a Level of Service (LoS) approach which allows a mix of quantitative and qualitative indicators to be used/summarised and various grades to be applied from 'A' (highest quality) down to 'F' (lowest quality).

9.13.2.7. The EIAR assessments were informed through site surveys focusing on the provision for the movement of pedestrians, cyclists and vehicles, locations of, and facilities at, bus stops and existing parking and loading areas. Available mapping data was also used to identify the functional class of each road link and points of interest (including sensitive community receptors). Quantitative Assessment Data in the form of existing traffic survey data from the NTA Traffic County Database and permanent TII traffic counters was collected. Traffic surveys were also undertaken specifically for the Proposed Scheme in November 2019 and February 2020 (neutral times when schools are in session and pre-Covid), these included Junction Turning Counts (JTCs) and Automatic Traffic Counts (ATCs). Bus journey times were sourced from the NTA from the Automatic Vehicle Local dataset. Road journey time data as sourced from Tom Tom journey time data which uses vehicle position data from GPS-enabled devices and is commercially available.

Baseline

9.13.2.8. Overall, the EIAR describes the baseline of the existing corridor as providing 41% cycle priority inbound (5% segregated cycle tracks, 36% non-segregated cycle lanes), 53% outbound priority (4% segregated cycle tracks and 49% non-segregated cycle lanes). Bus services are described as operating in a constrained and congested environment with 39% and 35% inbound and outbound priority respectively, and the standard deviation in bus journey time on the corridor of 11 minutes. The EIAR breaks these overall figures down further and describes the baseline data for each of the 5 sections of the Proposed Scheme (i.e. Section 1-Stradbrook Road to Booterstown Avenue; Section 2 – Booterstown Avenue to Nutley Lane; Section 3 – Nutley Lane to Ballsbridge; Section 4 – Ballsbridge to Merrion Square; and Section 5 – Nutley Lane) in terms of the presence of controlled pedestrian crossings with tactile paving and dropped kerbs, cycling infrastructure (whether on- or off-road cycle lanes tracks), bus priority measures, bus stops (and associated facilities, i.e. Real Time Passenger Information (RTPI), timetable information, shelter, seating, accessible kerbs, indented drop off area), frequency of bus services, general traffic provisions (roads, lane provisions, traffic calming and junctions) as well as parking and loading provisions.

Relevant Characteristics

- 9.13.2.9. Section 3 of this Report provides a detailed description of the Proposed Scheme and the primary characteristics which have the potential to impact on traffic and transportation can be summarised as follows:
 - Alterations to the pedestrian environment and increase in pedestrian signal crossings of 41%, increasing from 68 to 96, revised footpaths and urban realm.
 - The provision of cycle tracks throughout the length of the corridor, providing segregated cycling facilities along 7.88km inbound and 8.27 outbound of the route providing 100% cycle track coverage (currently at 4%),
 - Provision of 201 cycle parking spaces along the route,
 - Upgrading all signalised junctions along the route,
 - Removal of left turning filter lanes, provision of raised table crossings on side roads (proposed to increase from 9 no. to 55 no.) tightening of turning radii at all left turns.
 - Provision of bus priority measures throughout the corridor which includes:
 - Dedicated bus lanes along the majority (7.4km inbound and 7.3km outbound) but not all of the route,
 - Bus priority signals at Monkstown Road/Temple Hill, Merrion Shopping Centre, Pembroke Road/Lansdowne Road, Fitzwilliam Street Lower/Mount Street Upper, Merrion Gates, Nutley Lane/SVUH, Merrion Road/Ailesbury Road and Merrion Road Shrewsbury Road junctions as well as at Baggot Street Upper and Baggot Street Lower (either side of McCartney Bridge).
 - Bus Gate with associated traffic restrictions on Pembroke Road between Lansdowne Road junction and Baggot Street Upper.
 - In relation to the above the submitted documentation states that all proposed facilities have been designed in accordance with DMURS and the National

Disability Authority 'Building for Everyone: A universal Design Approach' (2020).

- General traffic restrictions are proposed which include traffic control measures at George's Avenue restricting egress to Frascati Road to authorised vehicles only, traffic turning restrictions at Seafort Parade, no right turn from Merrion to Shelbourne Road, access only into Elgin Road from Merrion Road (i.e. one way junction entry only); no right turn from Mespil road to Baggot Street Upper, no right turn from Wilton Terrace to McCartney Bridge, no right turn from Pembroke Park to Herbert Park, and no entry (except for bicycles) into Clyde Lane from Clyde Road.
- Reduction of 165 car parking spaces along the route of the Proposed Scheme with the majority of these being lost from Section 4 (Ballsbridge to Merrion Square) losing approximately 100 spaces, and Section 5 (Nutley Lane) the next most affected losing approximately 46 no. spaces.

9.13.3. Potential Impacts – Traffic and Transport

9.13.3.1. The potential impacts of the Proposed Scheme on traffic and transport are assessed through comparison of the following scenarios:

Do Nothing Scenario:

 In the Do Nothing (DN) scenario there is no change and congestion would continue along with journey time reliability on the bus network that would be exacerbated over time as car dominated traffic would grow in line with travel demand.

Do Minimum Scenario:

 The Do Minimum (DM) scenario considers the roll out of the other BusConnects programme elements (e.g. new services, routes, and bus fleet as well as next generation ticketing) apart from the Proposed Scheme and the other CBC routes, and other notable transport schemes including Dart+ programme, Luas Green Line capacity enhancement, the Greater Dublin Area Cycle Network Plan, Metro Link, Dart+ tunnel, and Luas line extensions to Bray, Lucan, and Finglas. The DM scenario traffic forecasting is based on population growth of 11% to 2028, 25% by 2043 (from the 2016 census base), employment growth of 22% and 49% by 2028 and 2043 respectively, and a 45% and 77% increase in goods vehicles (HGV and LGV) in 2028 and 2043 respectively.

The GDA Strategy has the effect of limiting the growth in car demand on the road network, while total trip demand will grow it is envisaged that a greater share of this demand will be met by sustainable modes of travel (i.e. public transport, walking and cycling). In this regard overall private car demand will not grow in a linear fashion in line with demographics as has occurred in the past. This will be achieved though the roll out of demand management measures. In the DM scenario no demand management measures are applied for 2028 other than constraining car parking at existing levels, however, for 2043 measures are included to achieve a 45% driver commuter mode target share across the GDA in line with the strategy.

Do Something Scenario:

- The Do Something (DS) scenario is assessed for the construction and operational phases. It is estimated that the construction phase will take a total of 24 months to complete and will be subdivided into 16 sub-sections, with works envisaged to proceed concurrently on multiple fronts to minimise the overall construction period. All construction will be managed in line with the submitted CEMP, which includes a CTMP for managing construction traffic.
- 9.13.3.2. The potential impacts of the Proposed Scheme on traffic and transport in the DS scenario can be summarised as follows:
- 9.13.3.3. Do Something Scenario Construction Impacts
 - It is stated that haulage of material on site is anticipated as being minimal, however, excavated material will have to be removed and construction materials delivered, the construction vehicle traffic routes have been identified as the M50, N11, N31 and on through the network of regional roads, and this will give rise to potential impacts.
 - There will be potential impacts on people's day-to-day activities along the corridor as temporary diversions (or temporary road closures) will be required where a safe separation distance cannot be obtained to carry out works.

- The temporary closure of sections of existing dedicated bus lanes will be required to facilitate construction and some existing bus stops may need to be temporarily relocated, suitable temporary alternate locations will be set up and provided.
- Parking and loading provisions along the route will also be disrupted during the construction phase.
- I consider that the impacts on pedestrians, cyclists, bus service users, residents to be negative, slight, and temporary throughout the construction process.
- General traffic will also be subject to management during the construction process, the EIAR states that it is not anticipated that significant impacts will arise due to redistribution of traffic, as the works will be progressive along the corridor and traffic flows in both directions will be maintained (as will emergency vehicle access at all times), however, there will be a requirement for short-term lane closures throughout construction. While I note that lane closures will be short term and management measures applied I consider that impacts on general traffic for construction will be negative, moderate and temporary.
- Construction activities will involve 200 250 staff, with working hours typically between 07.00-23.00 across two shifts to minimise clashing with peak hour traffic. A total of 74 two-way traffic movements are predicted (totalling 157 Passenger Car Units PCUs) in each of the AM and PM peak hours from construction activities (car/van arrivals [am peak only] and 32 two-way HGV movements). This level falls below the thresholds set out in TII's guidelines for transports assessments in relation to traffic generated. Accordingly, I consider the impacts from generated construction traffic to be Negative, Slight and Temporary.

9.13.3.4. Do Something Scenario – Operational Impacts

 In terms of the DS scenario operational phase the EIAR breaks this assessment into Qualitative (i.e. pedestrian, cycling, and bus infrastructure as well as consideration of parking and loading) and Quantitative (i.e. people movement, bus network performance indicators (journey time and bus reliability) and general traffic network performance indicators (junction capacity and redistributed traffic flows).

DS Scenario – Operational Qualitative Impacts

- In terms of pedestrian infrastructure the Proposed Scheme will provide 2m wide footpaths (with some localised reductions to 1.2m to navigate local constraints or preserve mature trees), raised table treatments and removal of left across side road junctions to facilitate curtesy crossing, additional pedestrian and toucan crossings on arms of junctions, new landscaped areas for pedestrians, consolidation of R118 Pembroke Road/Herbert Park junction into a single crossroads with increase in public realm space, the provision of wider footpaths over the MacCartney Bridge, removal of southern side of the Nutley Lane between SVUH and EPGC. The findings of the level of service (LoS) qualitive assessment comparison between the DM and DS scenarios across the 5 sections of the Proposed Scheme are summarised below for impacted junctions (i.e. those junctions whose pedestrian facilities experience an impact from the Proposed Scheme):
 - Section 1 (17 no. impacted junctions): The LoS for pedestrians in the DM scenario for impacted junctions ranges between B and E, with 13 of the 17 junctions achieving a low D/E rating. In the DS scenario the Proposed Scheme results in 11 of the 17 junctions achieving the highest A / B LoS ratings. The six junctions achieving a C rating in the DS scenario still represents improvement as the relevant junctions are all rated D / E in the DM scenario with the C ratings arising from having to achieve balance between pedestrian, cyclist, bus and general traffic demands at certain junctions. Overall, medium, positive, long-term impacts are anticipated in relation to pedestrian facilities in Section 1.
 - <u>Section 2</u> (10 no. impacted junctions): The LoS for pedestrians in the DM scenario for impacted junctions ranges between D and E with six of the ten junctions given a low D/E rating. In the DS scenario all impacted junctions achieve the highest A/B rating. The remainder of the junctions along this section either experience negligible or no

change in relation to the LoS, (i.e. no junction experiences a reduction in LoS for pedestrians) Overall, medium, positive, and long-term impacts are anticipated in relation to pedestrian facilities in Section 2.

- <u>Section 3</u> (15 no. impacted junctions): The LoS for pedestrians in the DM scenario for impacted junctions ranges between B and E, with eight of the junctions achieving a low D/E rating. In the DS scenario the Proposed Scheme results in all of the 15 impacted junctions achieving the highest A / B LoS ratings (with the single junction given a B LoS in the DM scenario achieving an A LoS in the DS scenario). Overall, medium, positive, and long-term impacts are anticipated in relation to pedestrian facilities in Section 3.
- <u>Section 4</u> (18 no. impacted junctions): The LoS for pedestrians in the DM scenario for impacted junctions ranges between B and E, with nine of the 18 junctions achieving a low D/E rating. In the DS scenario the Proposed Scheme results in all 18 of the junctions achieving the highest A / B LoS ratings. Overall, medium, positive, and long-term impacts are anticipated in relation to pedestrian facilities in Section 4.
- Section 5 (11 no. impacted junctions): The LoS for pedestrians in the DM scenario for impacted junctions ranges between C and F, with ten of the eleven junctions achieving a low D or F rating. In the DS scenario the Proposed Scheme results in ten of the eleven junctions achieving the highest A / B LoS ratings. The Stillorgan Road/Nutley Lane/Greenfield park junction achieves a LoS rating of D in the DS scenario which represents an improvement from the F rating it achieves in the DM scenario. Overall, positive, and significant longterm effects are anticipated in relation to pedestrian facilities in Section 5.
- For cycling infrastructure the key characteristics of the Proposed Scheme are the general provision of 2m wide (at some locations 3.5m bi-directional, while at others localised reductions to 1.5m/1.4m to navigate local constraints or preserve mature trees) segregated cycle tracks (parking protected with a minimum buffer of 0.75m from parking), raised table treatments on priority

side roads with cycle symbol markings, provision of toucan crossings, protected treatment for cyclists at signalised junctions in the form of dedicated cycle crossings, kerb segregation at corners and green signal priority for cyclists (and buses) at some junctions. The LoS rating comparisons for cycling infrastructure between the do minimum and do something scenarios are summarised below for each section of the Proposed Scheme.

- Section 1 has a LoS rating of B for cycling infrastructure in the DM scenario which is improved to a rating of A throughout in the DS scenario, through the provision of wider cycle lanes and protected treatment at signalised junctions. Accordingly, the effects are positive, moderate and long term.
- Section 2 has a LoS rating of C (2 locations) with one section (Booterstown to Trimleston Avenue) having a LoS B rating in the DM scenario. These ratings are all improved to B or A ratings in the DS scenario, and therefore considered to be a Positive, Significant and Long-Term effect.
- Section 3 has a LoS rating of B (2 locations) and C (2 locations) in the DM scenario. These ratings are all improved to A (3 locations) and B (1 location) ratings in the DS scenario, and therefore considered to be a Positive, Moderate and Long-Term effect.
- Section 4 has a LoS rating ranging from D (3 locations) to C (1 location) in the DM scenario. These ratings are all improved to ratings of A (2 locations) and B (2 locations) in the DS scenario, and therefore considered to be a Positive, Very Significant and Long-Term effect.
- Section 5 has a LoS rating of D throughout in the DM scenario which is improved to an A rating throughout in the DS scenario, and therefore considered to be a Positive, Very Significant and Long-Term effect.
- In relation to buses key infrastructure includes new bus stop layouts, provisions of new and relocation of stops, provision of additional bus stop facilities, dedicated bus lanes, other bus priority measures (bus gate, bus priority signals) and private bus bays. The specific changes over the DM scenario along the sections of the Proposed Scheme are summarised below:

- Section 1 Real Time Passenger Information (RTPI), timetable information, shelters, seating to be provided at all stops and two additional stops proposed in the DS scenario to be more convenient for the local community. The predicted result will be a positive, very significant and long-term effect over the DM scenario.
- Section 2: RTPI, to be added to all stops, two bus stops to be removed, one new stop added (to serve as waiting point for long-distance services) location, and 4 no. relocated stops in the DS scenario. The rationalisation of bus stops is proposed to improve journey times while maintaining appropriate spacing, overall a medium, positive, long-term impact for bus passengers is predicted over the DM scenario.
- Section 3: RTPI, shelters, seats, accessible kerbs, and timetables to be provided at all stops, with two stops being removed and five being relocated in the DS scenario. Impacts on bus passengers for this section are considered to be low, positive over the DM scenario.
- Section 4: RTPI, shelters, seats, accessible kerbs, and timetables to be provided at all stops, with two stops being removed and six being relocated in the DS scenario. Impacts on bus passengers for this section are considered to be low, positive over the DM scenario.
- Section 5: RTPI, shelters, seats, accessible kerbs, and timetables to be provided at all stops, with two stops being relocated in the DS scenario.
 Impacts on bus passengers for this section are considered to be Medium Positive over the DM scenario.
- In terms of parking and loading provisions the DS scenario will result in the following changes over the DM scenario:
 - Section 1: DS scenario results in the loss of approximately 12 car parking spaces and the provision of one additional loading bay space, for a predicated low negative impact.
 - Section 2: DS scenario results in the loss of approximately 8 car parking spaces resulting in a predicated low negative impact.

- Section 3: DS scenario results in no net loss of car parking spaces overall (albeit 5 no. spaces will be removed from Merrion Road between Anglesea Road and Beatty's Avenue, 5 additional spaces will be provided at Ballsbridge Avenue), and one additional loading bay will be provided, for a predicted negligible impact.
- Section 4: DS scenario results in the loss of approximately 100³⁷ car parking spaces and while the net number of loading bays between the DM and DS scenarios remains the same one is smaller in size and two have been relocated, for a predicted negative, slight and long-term impact. This Section (Ballsbridge to Merrion Square) will experience the largest reduction in car parking of all the sections in the Proposed Scheme. The EIAR states that there is ample parking or equivalent spaces available within 200m of the locations from which parking is proposed to be removed.
- Section 5: DS scenario results in the loss of approximately 40 standard car parking spaces, 2 no. loading bays and 4 no. disabled/accessible parking spaces. (In this regard I note that the 2 loading bays, and 4 no. disabled/accessible spaces are proposed to be removed from outside the Merrion Shopping Centre which also has its own onsite parking). The majority of lost parking spaces are proposed to occur along the eastern side of Nutley Lane between Nutley Road and Avenue. The EIAR states that where spaces are being lost equivalent parking is available within 200m and that overall a negative, slight and long-term effect is predicted.

DS Scenario – Operational Quantitative Impacts

Modelling carried out highlights the differences between the DS and DM scenarios for the operational phase. In 2028 there is a predicted 50% reduction in the number of people travelling by car, an increase of 100% in the number of people travelling by bus and an increase of 67% in the number of people walking or cycling inbound along the Proposed Scheme in the AM peak hour. The total number of people moved along the route by the

³⁷ Bord should note that the totals in columns of table 6.43 of the submitted EIAR are not accurately summed.

Proposed Scheme increases by 6% in the DS scenario with an increase of 86% in people moved by sustainable modes (public transport, walking or cycling). In relation to walking the Board should note that the modelling predicts an overall reduction in walkers along the route in the peak hours throughout the assessments, but all other sustainable modes increasing significantly, with the sustainable modes accounting for 72% of hourly trips in the DS scenario compared to 41% in the DM scenario.

- For the PM peak hour in 2028 there is a reduction of 55% in the number of people travelling by car, an increase of 145% of people travelling by bus and a 67% increase in those walking or cycling outbound along the route. The sustainable modes of travel along the corridor account for 71% of hourly trips in the DS scenario compared to 35% in the DM scenario.
- For the 2043 design year in the AM peak hour there is a decrease of 47% in the number of people travelling by car, an increase of 167% in the numbers traveling by bus, and an increase of 48% cycling and walking traveling inbound along the route. The sustainable modes of travel inbound along the corridor account for 78% of hourly trips in the DS scenario compared to 46% in the DM scenario.
- For the PM peak hour in 2043 there is a reduction of 55% in the number of people travelling by car, an increase of 164% of people travelling by bus and a 52% increase in those walking or cycling outbound along the route. The sustainable modes of travel along the corridor account for 76% of hourly trips in the DS scenario compared to 41% in the DM scenario.
- When modelling the people movement by bus the EIAR considers the Nutley Lane section separately to the remainder of the corridor, albeit there are increases in people moved throughout. In the 2028 AM Peak Hour passenger volumes (inbound) the modelling shows an increase of approximately 150-200 additional passengers along the Nutley Lane Section and 300 to 400 throughout the remainder of the route in the DS scenario when compared with the DM scenario. These figures further increase to an additional 300-350 passengers along Nutley Lane, and 400-800 for the remainder of the route

inbound in the 2043 AM peak hour when comparing the DS to the DM scenario.

- Modelling of outbound PM Peak hour bus passengers in 2028 shows an increase of approximately 100 along Nutley Lane with 300-400 additional users along the remainder of the route when comparing DS to DM scenarios. This trend continues in the modelling for the 2043 design year which shows outbound PM bus passengers increasing along Nutley Lane by approximately 100, and increases of 350-400 along the remainder of the corridor in the DS scenario when compared to the do minimum.
- In 2028, there will be an 11.3% increase in people boarding bus routes using the proposed scheme (including boarding at stops outside the Proposed Scheme) during the AM peak and a 12.3% increase during PM peak. The equivalent figures for 2043 are 16% in the AM (1,980 passengers) and 18% in the PM peak (1,880 passengers).
- In terms of people movement, the preceding figures are considered to have a positive, very significant and long-term effect.
- In modelling bus journey times the EIAR uses the B3 service as a comparator as this service runs along the length of the majority of the Proposed Scheme route, (the only section it doesn't run along is Section 5, Nutley lane). In the peak hour inbound AM 2028 the average journey time for the B3 service in the DS scenario will be 26.9 minutes, representing a 6.6min time saving (-20%) over the DM scenario. For 2043 the same figures are 26.8mins representing a 5.2min (11%) time saving over the DM scenario. The PM peak hour savings for 2028 is 3.7 minutes (12%), and for 2043, 3.2 minutes (11%).
- Outbound journey time savings for the B3 service are modelled to be up to 9.4 minutes (27%) in 2028 (PM Peak hour) and 7.6 mins (23%) in 2043. The AM outbound Peak Hour time savings are modelled to be 4.7 minutes (15%) and 2028 and 7.6 mins (23%).
- For Section 5 the B1 service which encompasses Nutley Lane was considered and modelling showed average journey time savings of up to 4.1 minutes (21%) in 2028 AM, and 4 minutes (20%) in 2043 AM inbound and 4.3 minutes (2028 AM and PM) and 4.1(AM), 4.8 PM outbound in 2043.

- Total Bus journey time is predicted to be reduced by up to 18% in 2028 and from 16 – 18% in 2043. Bus journey time reliability is also shown to be improved across all AM and PM, 2028 and 2043 peak hour DS scenarios when compared with the DM scenario.
- The bus service modelling was based on the same number of buses-per-hour in both the DS and DM scenarios (i.e. 45 inbound, and 45 outbound buses per hour over the busiest section). To assess whether the Proposed Scheme would cater for increased service frequency while maintaining journey time reliability additional micro-simulation modelling was carried out to assess if an additional 10 buses per hour over the busiest section would alter reliability. The results of the micro-simulation demonstrated that a high level of journey time reliability was maintained.
- Overall I consider that the Proposed Scheme will have a positive, very significant and long-term impact on bus network performance indicators.
- In terms of general traffic the operational capacity of the route (i.e. direct study area) will be reduced as the transport corridor and carriageways are proposed to be prioritised to encourage modal shift and improve infrastructure for sustainable modes of travel. The Local Area Modelling (LAM) carried out comparing the DS and DM scenarios shows a reduction of between 220 PCUs (Nutley Lane) and 1,074 PCUs (Frascati Road) along the route during the AM Peak hour in 2028 under the DS scenario, with no increases in flows predicted along the Proposed Scheme. These reductions are considered to be a positive, significant, and long-term impact.
- The modelling also shows reductions of ≥100 combined traffic flows along 31 road links within the indirect study area in the vicinity of sections 1, 2, 3, and 4 of the Proposed Scheme during the AM peak (2028) in the DS scenario, varying between -102 (Deans Grange Road) and -1,394 (Shelbourne Road). This impact is considered to be positive, slight and long term.
- There are 53 road links in the indirect study area which have been predicted to experience an increase >100 combined traffic flows in the AM peak Hour (2028) under the DS scenario. The additional traffic varies between combined flows of 101 (Stradbrook Road) and 591 (Haddington Road). This

redistributed traffic from the Proposed Scheme will have a ≤5% impact on turning flows at junctions with national roads which does not exceed the threshold (greater than 5%) established by the TII for assessment of impacts on National Road junctions.

- The LAM carried out comparing the DS and DM scenarios for the PM 2028 peak hour in the direct study area shows a reduction of between 221 PCUs (Fitzwilliam Street Lower) and 1,511 PCUs (Merrion Road) along the route under the DS scenario. These reductions are considered to be a positive, very significant and long-term.
- The LAM indicates that in the 2028 PM Peak hour for the indirect study area 35 road links will experience a reduction of ≥100 combined traffic flows varying between -101 (Leeson Street Lower) and -1,336 (Shelbourne Road).
- Increases of greater than 100 combined traffic flows have been predicted in the PM peak 2028 at 53 road links, with increases varying from +108 (Trimleston Road and Avenue) to +800 (Fleurville). These increases have been considered in the context of the TII threshold for assessment of impacts on National Road junctions (greater than 5% turning flow difference) and it was found that one junction on the N31 (Mount Merrion Avenue/Woodlands Park) was in exceedance. In relation to this junction, however, further analysis demonstrates that in the DS scenario it remains well within its theoretical operational capacity (junction capacity assessment is discussed further below). At all other junctions the modelling predicts either a negligible increase ≤5%, or a decrease in turning flows as a result of the Proposed Scheme.
- Junction analysis is based on modelling of volume over capacity ratios (V/C ratios) at peak hours in 2028 and 2043, with a junction at ≤85% being well within theoretical operational capacity, over 100% above capacity(with queues and delays being experienced regularly within the hour), and any figure in between predicting approaching capacity (occasional queues and delays may be experienced within the hour). The EIAR considers magnitude of effect on the basis of comparing the DS and DM capacity outcomes at each junction (i.e. where the V/C outcomes are the same there is a negligible impact, where

there is an improvement predicted impacts move into the positive and where V/C ratios outcomes are worse in the DS scenario impacts move to negative. A sensitivity is also assigned to the relevant roads dependent on volumes and speed of traffic (e.g. national primary and secondary roads – high speeds and volumes have negligible sensitivity, roads interconnecting these with a lower level of mobility than national roads have low sensitivity, roads that can cater for high traffic volumes with moderate speed limits (30-50kmph) have medium sensitivity and high sensitivity is assigned to roads that can cater for lower volumes of traffic with a lower speed limit - 30kmph).

- Junction analysis carried out to consider the increased traffic flows in the indirect study area demonstrate that the majority of junctions assessed have V/C ratios of below 85% in the DS and DM scenarios and can therefore satisfactorily accommodate the redistributed traffic with impacts considered to be imperceptible to not significant and long-term.
- Increases in V/C ratios are predicted at a number of junctions in the indirect study area. The Board should note that section 6.4.6.2.8.5 and its associated tables in the submitted EIAR considers junctions where the significance of effect is slight or higher, and those where the ratio will exceed 100%. I consider that the junctions which have the potential to experience significant capacity issues are those junctions which have been modelled to be operating at ≥100 % V/C in the indirect study area, which I have summarised below.
 - Stillorgan Road/Newtownpark Avenue/Leopardstown Road junction will have a V/C ratio >100% for the AM and PM peaks in 2028 and 2043 DS scenario, however, it will also be at >100% in the DM scenario at these times and accordingly I consider this effect to be imperceptible.
 - Stillorgan Road/Airfield Park junction will have a V/C ratio >100% in the DS scenario for the AM peaks in 2028 and 2043, however, it will also be at >100% in the DM scenario and accordingly I consider the effect to be imperceptible.
 - Eglington Road / Milltown Road / Sandford Road / Clonskeagh Road junction will have a V/C ratio >100% in the DS scenario for the AM peak in 2028 which represents an increase from the 85% - 100% ratio

it will experience in the DM scenario. The road has been assigned a low sensitivity, however, and therefore I consider the overall significance of effect to be negative, moderate, and long-term.

- 4. Leeson Street Upper / Wellington Place / Morehampton Road junction will have a V/C ratio >100% in the DS scenario for the AM peak in 2028 which represents an increase from the 85% - 100% ratio it will experience in the DM scenario and is considered a medium magnitude of impact. The road is low sensitivity, however, and therefore I consider the overall significance of effect is negative moderate and long-term.
- 5. Shelbourne Road / Haddington Road / South Lotts Road / Grand Canal Upper junction will have a V/C ratio >100% in the DS scenario for the AM peak in 2028 which represents an increase from the ≤ 85% ratio it will experience in the DM scenario and is considered a high magnitude of effect. The road has been assigned a low sensitivity, however, and therefore the overall significance of effect is negative moderate and long term.
- Only the two Stillorgan Road junctions (No.'s 1 and 2 above) are predicted to continue to experience a V/C ratio >100 in the 2043 design year (No. 1 in the AM and PM peaks, and No. 2 only in the AM peak).
- Overall results of the general traffic assessment from modelling for the indirect study area show that the majority of junctions will have V/C of below 85% and will therefore operate within capacity, and the DS scenario will have an imperceptible to not significant long-term impact. The Board should note that section 6.4.6.2.8.5 and its associated tables in the submitted EIAR considers junctions where the significance of effect is slight or higher, and there are a number (not referenced above) whose V/C ratio increases into the 85-100% bracket in the DS scenario when compared to the DM scenario. The significance of effects in such instances as well as those listed (1-5) above is negative, moderate and long-term or lower.
- As the large majority of junctions will not experience capacity issues, and of those that do, the significance of the impact is considered to be moderate negative, the overall impact of the Proposed Scheme on capacity in the

indirect study area is considered to be negative, slight and long term. In this regard I also note the location of the Proposed Scheme (within an extensive urban environment) and the fact that one of its primary motivations is to encourage modal shift to reduce the reliance on the private car and encourage the use of more sustainable transport means.

9.13.4. Mitigation Measures

- 9.13.4.1. In relation to construction the submitted CEMP (Appendix A5.1 of the EIAR) provides a range of mitigation measures which will be put in place to ensure that impacts arising from construction processes are minimised and provides for phasing of the overall construction programme. A Construction Traffic Management Plan (CTMP) is provided for within the CEMP which will ensure adequate road safety measures are provided for pedestrian, cyclists, bus traffic and all other users of the route, minimise disruption, maintain access to properties along the route, and to control traffic impacts of construction insofar as it may affect the environment, local residents, and the public in the vicinity of construction works. Other construction mitigation measures in the CTMP include:
 - Where footpaths and off-road cycle tracks are affected by construction a safe route will be provided past the work area and where practicable provisions for matching existing facilities for pedestrians and cyclists will be made.
 - Existing public transport routes will be maintained throughout construction albeit occasional road closures/diversions may be necessary.
 - Should temporary relocation of bus stops be required they will be safely accessible to all users.
 - Local arrangements will be made on a case-by-case basis to maintain continued access to homes and businesses affected by the works, at all times, where practicable, and access egress will be maintained at all times.
 - The project will aim to minimise parking and loading disruption through discussions with the relevant local authority and direct engagement with the affected parties (both residents and businesses)

- A construction stage mobility plan will be used to encourage construction personnel to commute by sustainable means. Car parking in the construction compound will be limited/restricted.
- Timing of material deliveries to the site will be managed to minimise impacts.
- Road closures and diversions will only be used where necessary and will be minimised and carried out in full consultation with residents, business owners, and Gardai, and sufficient advance notice provided.
- All temporary traffic measures to facilitate the works will be undertaken in accordance with Department of Transport's 'Traffic Signs Manual, Chapter 8 Temporary Traffic Measures and Signs for Roadworks' (DTTAS 2019a) and associated guidance.
- 9.13.4.2. In relation to operational phase mitigation measures as the Proposed Scheme will result in positive impacts on walking, cycling, bus and people movement no mitigation is necessary. Mitigation in relation to general traffic and parking/loading have been incorporated into the Proposed Scheme through the iterative design process. As set out above redistributed traffic arising from the Proposed Scheme does not give rise to significant adverse impact on the operational capacity of the surrounding road network and accordingly no specific mitigation measures are proposed.

9.13.5. Residual Impacts

- 9.13.6. With the implementation of the mitigation measures the residual impacts remain consistent with those outlined previously in this section:
 - Pedestrian Infrastructure Positive, Moderate to Significant and Long-term
 - Cycling Infrastructure Positive, Moderate to Very Significant and Long-term
 - Bus infrastructure Positive, Moderate to Very Significant and Long-term
 - Parking and Loading Negative, Slight and Long-term
 - People Movement Positive, Very Significant and Long-term
 - Bus Network Performance Positive, Very Significant and Long-term

 General Traffic Network – Positive, Moderate and Long term in relation to general traffic flows along the proposed scheme, and Negative, Slight and Long-term in relation to redistributed general traffic within the indirect study area.

9.13.7. Conclusions on Traffic and Transport

- 9.13.7.1. I have considered in detail the third-party submissions lodged and EIAR that has been submitted in relation to the Proposed Scheme. I am satisfied that the documentation submitted provides a robust assessment of the qualitative (physical infrastructure changes) and quantitative (traffic modelling and predictive analysis) impacts arising from the Proposed Scheme. The modelling carried out provides strategic/regional level outputs as well as local area simulation and junction level analysis, that considers the peak hours (both AM and PM) for 2028 and 2043. I consider it appropriate that the modelling focuses on the peak hours in these years as this represents (and will continue to represent) the busiest periods in terms of traffic and people movements.
- 9.13.7.2. Notwithstanding issues raised by third parties in relation to modelling accuracy following post-covid changes in work practices, I am satisfied that while the pandemic provisions did bring about a short-term change in travel patterns, traffic demand and patterns of travel have broadly returned to pre-pandemic levels with all the associated impacts. In this regard, I note Figure 3.1 of the Central Statistics Office (CSO) transport bulletin for October 2023 which shows that the number of bus journeys in Dublin have returned to (and more frequently exceed) levels in 2019 the last full normal year prior to the pandemic. The modelling, surveys and assessments consider the busiest period scenarios and I am satisfied that the impacts (both positive and negative) as set out above to be an accurate reflection of the impacts that will arise from the Proposed Scheme.
- 9.13.7.3. I am also satisfied that the beneficial impacts set out above in relation to pedestrian, and cycling facilities are an accurate reflection and that the Proposed Scheme will not only facilitate but encourage the modal split towards more sustainable travel patterns. Some third-party submissions state that the Proposed Scheme could have

an adverse impact on communities by dissecting communities such as Pembroke Road, Baggot Street and along Nutley Lane. In this regard I note that the Proposed Scheme reallocates carriageway space along an existing transport corridor to favour more sustainable modes of transport, and therefore the use of the corridor remains consistent with that already in place. The changes are viewed by some, however, as cutting off neighbours and amenities presenting more difficulties to residents and visitors to cross cycle tracks, bus lanes and general traffic lanes. I do not share this opinion as the Proposed Scheme provides ample pedestrian crossing facilities that have been designed in accordance with the relevant accessibility standards therefore ensuring connectivity is assured for all including the most vulnerable.

- 9.13.7.4. Bus time improvements and reliability will enhance bus passengers experience and further encourage additional use of public transport and make it a more attractive proposition along the route which will serve to provide a viable and more user-friendly alternative to the private car.
- 9.13.7.5. I acknowledge that the Proposed Scheme will have a negative impact at certain junctions in the indirect study area with operational capacity of junctions increasing to various levels throughout and some junctions operating at levels exceeding their capacity. I also note that modelling shows that the overall adverse impact will lessen with time closer to the design year albeit certain junctions will continue to operate at higher V/C ratios in the DS scenario than they would in the DM scenario and so the impact remains. Notwithstanding this, however, I note that DMURS recognises that a certain level of traffic congestion is an inevitable feature of urban road networks and that junctions have to operate at saturation levels for some periods.
- 9.13.7.6. The Proposed Scheme will result in the loss of car parking throughout the scheme resulting in a total reduction of approximately 165 spaces, with Section 4 (losing approximately 100 spaces) and Section 5 (losing approximately 46 spaces- including accessible spaces and loading bays) having the largest reductions, and sections 1 and 2 losing 11 and 8 spaces respectively. Section 3 gains one parking space. I concur with the findings in the EIAR that this impact is negative, slight, and long-term in Sections 1, 2, 4, and 5, as negligible in Section 3. In this regard I consider that the Proposed Scheme provides significant upgrades to the public bus infrastructure,

cycling and pedestrian facilities, while minimising general loss of on-street parking, maintaining the ability (where it is currently available) for residents to park in their own driveways and noting that there are alternative equivalent parking spaces in the vicinity of the route. Furthermore, I note that while accessible parking is proposed to be removed from the Merrion Shopping Centre frontage that it provides alternative accessible parking within its own site.

- 9.13.7.7. Some submissions have raised concern that the loss of car-parking will lead to an adverse impact on commercial businesses and connectivity to services within urban village centres along the route such as at Baggot Street Upper, and that this may have adverse impact on vulnerable car users to access services (e.g., such as pharmacies). I fully acknowledge the important role played by such centres and their contribution to community vitality. In relation to the loss of car parking spaces I note that while it is proposed that there will be a reduction in the quantum of car parking spaces along the Proposed Scheme, pockets of car parking (including accessible car parking spaces) are provided within and in the vicinity of such centres, thus ensuring that community connectivity will be retained. I also note that the Proposed Scheme will result in the improved connectivity of such centres by public transport, pedestrian and cycling infrastructure as well as improvements to the public realm and thereby facilitate a transformative shift in the modal share towards sustainable modes of transport. I, therefore, consider that the Proposed Scheme will improve and enhance the accessibility and connectivity between the urban village centres and their catchments.
- 9.13.7.8. Third party submissions have also raised concerns in relation to the commercial impact arising from the relocation and removal of loading bays. In this regard I note that loading bays are retained and relocated throughout the scheme with the most notable change being the relocation of loading bays in the vicinity of Baggot Street Upper. While a loading bay is being relocated on Baggot Street Upper to facilitate bus infrastructure I consider that this impact is not significant and can be mitigated through amending delivery management provisions. One commercial operator at this location has noted a potential safety issue arising from the width of the separation distance being proposed from the loading bay to the cycle track (750mm) and has requested that this be widened to 846mm to facilitate frequent trolley/pallet deliveries

– if the buffer is left as it is, delivery trolleys will protrude into the cycle lane by approximately 1m while the operator is unloading. The footpaths at this location are of sufficient width to accommodate such a change and in the interests of cyclist safety and preserving cycle lane capacity at this location which has a specifically identified issue arising from the established delivery practices, I consider it appropriate that such a change be provided by condition.

- 9.13.7.9. Some third parties have raised concerns in relation to traffic, bus, cycling and pedestrian traffic at large scale events in the RDS or Aviva Stadium which are proximate to the Proposed Scheme. While I note pedestrian and other infrastructure associated with sustainable travel modes will be improved by the Proposed Scheme, I consider this to be an event management issue which will be dealt with on a case-by-case basis by event organisers and Gardai.
 - 9.13.8. I have considered all of the written submissions made in relation to traffic and transport, as well as the content of the submitted EIAR. I am satisfied that adverse impacts identified would be avoided, managed and mitigated by the measures which form part of the proposed scheme, the proposed mitigation measures and through suitable conditions. I am, therefore, satisfied that while impacts will arise that the Proposed Scheme would not give rise to any unacceptable direct or indirect impacts in terms of traffic and transport. I am also satisfied that while some cumulative effects may arise from the Proposed Scheme together with existing and permitted developments, these would be avoided, managed and mitigated by the measures which form part of the Proposed Scheme and through the application of suitable conditions.

9.14. Material Assets - Waste

9.14.1. Overview

9.14.2. Section 18 of the submitted EIAR considers the waste that will be generated by the Proposed Scheme and resources used both during the construction and operational phases. Waste will arise from demolition, site clearance, excavations and other construction activities while during the operational phase the primary wastes arising will be from ongoing infrastructure maintenance works. It is anticipated that municipal waste will be generated only in small quantities during the construction and operational phases by workers.

9.14.3. The EIAR identifies the capacity and types of waste facilities in the area that will be used, and presents desk study data on types and quantities of waste products that are predicted to be generated by the Proposed Scheme. The EIAR reviews the Proposed Scheme in terms of the waste hierarchy, quantities of waste requiring disposal and the capacity waste infrastructure in the area, it also confirms that the available construction and demolition (C&D) waste and by-product capacity in the Eastern Midlands Waste Region (EMWR) for 2020 as 10.7 million tonnes.

9.14.4. Potential Impacts

- 9.14.4.1. The main impacts arising in relation to waste will occur during the construction phase, and specifically will be arising from demolition, and excavation activities. Surplus organic materials (vegetation from landscaping works, site clearance, tree removal etc.) will also generate organic waste material that will need to be treated at appropriate waste facilities during the construction stage. The operational phase will generate waste from maintenance activities, however, maintenance will also be required on the transport corridor in the do nothing/do minimum scenarios.
- 9.14.4.2. The application documentation states that all demolition waste will be considered for reuse within the Scheme or in other construction projects. It is estimated that demolition works associated with the Proposed Scheme will give rise to 1,600 tonnes of concrete, bricks, tiles and similar, 410 tonnes of metal and 60 tonnes of segregated wood, glass, and plastic, which will have to be managed. The total waste arising (2,070 tonnes) from demolition amounts to 0.02% of the capacity of C&D Waste in the EMWR from 2020. Pre-mitigation the impact of this generation of waste is considered to be adverse, not significant and short term.
- 9.14.4.3. Excavations will be required of existing carriageways, footpaths, cycle tracks, pedestrianised areas and utility diversions/protections. Excavated material with either be reused within the Proposed Scheme (where it is deemed suitable) or delivered to appropriate recovery, recycling or disposal facilities. Should any hazardous waste arise, this will be dealt with under the appropriate legislation and all

transportation will be carried out by suitable permit holders. It is anticipated that the excavations will give rise to 45,000 tonnes of soil and stone, 7,000 tonnes of concrete, bricks, tiles and similar, and 24,000 tonnes of bitumous mixtures which will all need management. The total excavation waste arising amounts to 76,000 tonnes which is equivalent to 0.71% of the C&D waste capacity for the EMWR in 2020. Premitigation the impacts are considered to be adverse, slight, and short-term.

- 9.14.4.4. Construction activities themselves will give rise to both non-hazardous and hazardous waste, such as excess/damaged works materials, batteries, fuels etc. The quantities of such materials will be small and segregation facilities will be provided. There is adequate capacity for the management of such waste arisings and the premitigation impact is considered to be adverse, imperceptible and short-term.
- 9.14.4.5. While municipal waste will be generated by the on-site workers the impact is considered to be negligible and segregation facilities will be available at the construction compound. During the operational phase municipal waste impacts are considered neutral and long-term.
- 9.14.4.6. For the operational phase maintenance works will be required, while a certain amount of maintenance would be necessary in the do minimum/do nothing scenarios, I acknowledge that the Proposed Scheme will give rise to the need for increased maintenance due to the widening of the carriageway and additional infrastructure (it is estimated that over the 60-year lifetime of the Proposed Scheme the bitumen requirements for maintenance will be 9,871 tonnes greater than in the do nothing scenario). Bitumen containing materials will be the primary resource used in maintenance and will be reused or salvaged for reuse within carriageway maintenance or construction projects elsewhere where practicable. The potential impact of the proposed scheme on waste in the operational phase is therefore considered to be adverse, not significant and long-term prior to mitigation.

9.14.5. Mitigation Measures

9.14.5.1. A Construction and Demolition Resource and Waste Management Plan (CDRWMP) is included within the CEMP and will be implemented. This document sets out all

relevant roles and responsibilities for the contractor and ensures that waste will be managed and disposed of in a way that complies with the Waste Management Act, 1996 (as amended) and associated Regulations. The CDRWMP will also facilitate reuse and recycling and divert waste from landfill insofar as is practicable. In this regard it is estimated that up to approximately 36,500 tonnes of recycled/reused aggregates could potentially be incorporated into the Proposed Scheme (9,000 tonnes bituminous planings, 14,500 tonnes sub-base material, 12,500 tonnes capping material and 500 tonnes concrete bound granular material (CBGM))

- 9.14.5.2. Specific measures used during construction will include temporary stockpiling of material for reuse and reclaimed bituminous materials will be specified where practicable within the Proposed Scheme.
- 9.14.5.3. Management measures will follow best practice and include:
 - Avoiding waste generation where possible, and minimising the need for waste disposal.
 - Reuse of materials throughout the Proposed Scheme where possible.
 - Source segregating of materials into their waste streams during construction and removal off-site as necessary by approved transport to licenced facilities.
 - Hazardous waste, if it arises, will be managed by the contractor in accordance with the relevant legislation.
 - Waste auditing will be carried out to ensure materials leaving site are recorded and sent to the proper facilities.
- 9.14.5.4. No specific mitigation measures are proposed for operational wastes as these are not considered to give rise to significant effects.
- 9.14.5.5. I am satisfied that with the application of the mitigation measures and through the design and management of the Proposed Scheme that there will be no significant residual impacts will arise from the construction or operational phases of the scheme.

9.14.6. Material Assets - Waste Conclusion

9.14.7. I have considered all of the written submissions made in relation to material assets – waste, and the potential effects and impacts that could arise. I am satisfied that significant adverse impacts can be avoided, managed, and mitigated by the measures which form part of the proposed scheme, the proposed mitigation measures and through suitable conditions. I am, therefore, satisfied that the Proposed Scheme would not have any unacceptable direct or indirect impacts in terms of waste. I am also satisfied that while some cumulative effects may arise from the Proposed Scheme together with existing and permitted developments, these would be avoided, managed, and mitigated by the measures which form part of the Proposed Scheme and through suitable conditions.

9.15. Material Assets – General – (Services and Materials)

9.15.1. Overview

- 9.15.2. Section 19 of the EIAR considers the potential impacts on material assets in terms of built services (utilities) and major infrastructure (e.g., canals, railway lines, etc.) as well as potential impacts arising from the importation of construction materials to the site (aside from those re-used as part of the assessment on waste and recycled materials set out previously above).
- 9.15.3. The Proposed Scheme is a large-scale construction project which will require the import of a range of key materials to facilitate the construction processes.
- 9.15.4. In relation to impact on utilities this is assessed in terms of diversion and changes necessitated by the Proposed Scheme.
- 9.15.5. Several submissions have raised concerns in relation to the need to maintain service provisions throughout construction works and have sought assurance that the works will not lead to breaks in services which could adversely affect property or business operations. Gas Networks Ireland (GNI) made a submission referencing the need for additional liaison, clarity as well as the health and safety requirements for works in the vicinity of their assets and in particular in relation to their AGI at St. Vincent's Hospital.

9.15.6. Baseline:

- 9.15.7. Given the urban location of the proposed works there are a number of utilities in place, which include the following networks and all their associated infrastructure:
 - ESB electricity lines (high, medium and low voltage),
 - Gas Networks Ireland (GNI) gas mains (high, medium and low pressure),
 - Irish Water (IW) water mains, sewer lines (foul and combined),
 - Local Authority surface water drainage networks,
 - Eir, Enet, and virgin media telecommunication lines,
 - Local Authority traffic signal ducting
- 9.15.8. In terms of major infrastructure the Proposed Scheme traverses the Grand Canal at McCartney Bridge.
- 9.15.9. The only materials currently imported to the site are those required for maintenance purposes along the existing transport corridor.

9.15.10. **Potential Impacts**

- 9.15.10.1. In the do-nothing scenario there will be no impacts arising as there will be no changes to existing infrastructure or utilities, accordingly there will be a neutral impact.
- 9.15.10.2. The do something scenario impacts are summarised below in relation to the relevant topics.

Major Infrastructure and Utilities:

9.15.10.3. Construction of the Proposed Scheme and in particular associated excavations have the potential to impact existing infrastructure and utilities. If protection of these assets is not an option realignment, upgrade or replacement of services/utilities will be necessary. The Board should note that tables 19.6 (electricity), 19.7 (Water), 19.8 (Gas) and 19.9 (Telecommunications) of the submitted EIAR lists the proposed major infrastructure diversions necessitated by the Proposed Scheme, and as such interruption to services will require management. The Proposed Scheme itself will also require use of utilities in its construction and operational phases and accordingly could give rise to potential demand impacts. The impacts on utilities can be summarised as follows:

- Electricity Construction phase will have a negative, moderate temporary impact regarding service interruption, and negative, not significant, short-term impact in terms of demand. During operational phase electricity will be required for street-lights, signalling and RTPI displays, such impacts are considered negative, imperceptible and long-term.
- Water Construction will require water use for welfare facilities and dust suppression/mitigation which can be supplied through connection to mains or water tankers. Impacts on demand are considered to be negative, not significant, and short term, while interruption to service impacts during construction are negative, moderate and temporary. The Proposed Scheme will not result in any additional water provisions being required during the operational phase and accordingly no significant impacts are anticipated.
- Wastewater and Surface Water runoff There will be wastewater (welfare facilities on construction compound may be connected to mains or portable toilets used as necessary) and surface water run-off generated by the construction phase whose impacts are considered negative, not significant and short term on the demand side. No major interfaces have been identified between the Proposed Scheme and the foul drainage network and limited upgrade works are required for surface water drainage into the existing network, accordingly no significant impacts are predicted in terms of service interruption. In relation to the operational phase while there will be an increase in impermeable areas from the Proposed Scheme, drainage upgrades and SuDs measures included within the overall design will attenuate any additional runoff, and no foul sewer connections are required, accordingly no significant operational phase impacts are anticipated.
- Gas No significant impacts are considered to arise in terms of demand (as no connections to gas services are required) while there will be a negative, moderate, and temporary impact in terms of service interruption during the construction phase as diversion of gas assets will be required. The Proposed Scheme does not require any gas connection in its operational phase and accordingly no significant impacts are anticipated.

- Telecommunications Negative, not significant and short-term impact is predicted to arise in terms of demand as access to the network will be required from the construction compound, while a negative, moderate, and temporary impact is considered in terms of service interruption during the construction phase as some diversions of infrastructure will be required. During the operational phase telecommunications links will be required throughout the Proposed Scheme for the RTPI displays, signal controllers, and bus information applications. Such infrastructure is already in place in certain locations along the route and while the Proposed Scheme will make this available throughout at additional locations the anticipated impact on telecommunications demand is anticipated to be negative, imperceptible and long-term.
- 9.15.10.4. The construction of the Proposed Scheme will required the importation of materials to the site, while this is a significant construction project the amounts of materials (e.g., 23,900 tonnes of asphalt, 15,000 tonnes of concrete) are not significant in terms of the available supply chain in Ireland, are readily available and demand will be spread throughout the construction phases so potential impacts (beyond those assessed in the traffic, air, climate and noise and vibration sections previously) are considered to be negative, slight and long term. Similarly, during the operational phase as the materials needed for maintenance purposes are readily available and as the amounts needed will be very small in the context of the material available, and so impacts are considered to be neutral and long-term.
- 9.15.10.5. Access to the Grand Canal towpath walk will be restricted to facilitate the works within the Proposed Scheme to improve accessibility to the walkway, so the construction period will give rise to negative, slight and temporary impacts on the Canal. There are no impacts arising on the Grand Canal as a material asset during the operational phase beyond those identified in the air quality and biodiversity section of this assessment.

9.15.11. Mitigation Measures

- 9.15.11.1. While, the Proposed Scheme has been designed to avoid impacts on utilities precautions are included to avoid unplanned interruptions to services during construction, such as:
 - Investigations in working areas to identify the precise location of utilities prior to excavations.
 - Utilities will be protected in line with best practice where works are proposed.
 - Consultation with the utilities companies whose infrastructure is to be diverted will continue.
 - Where utility diversions and interruption to services are necessary, they will be planned, minimised, generally only occur for a set period of time and not be continuous for full days at a time. Prior notification will be given to all impacted parties,
 - Materials for construction will be sourced as locally as practicable from authorised suppliers and a just-in-time supply scheme will be adopted to reduce the need for storage on site.
 - Due to the nature of the works required during the operational phase (maintenance by the relevant local authorities) impacts on major utilities are not anticipated and therefore no specific mitigation measures are included.

9.15.12. Material Assets – General (Services and Materials) Conclusion

9.15.13. The primary concerns raised by third parties in relation to material assets are those surrounding adverse impacts from interruptions to services (businesses, commercial operations, community resources and residents), and in relation to works to particular assets (GNI have indicated specific health and safety requirements in relation to elements of their infrastructure along the route). I am satisfied that the proposed works have been designed to minimise impacts insofar as it practicable and where interruptions to services are required these can be adequately managed, implemented and provided with appropriate continencies to avoid significant adverse impacts arising. The submitted EIAR demonstrates that the applicant is aware of sensitive properties and uses along the route of the Proposed Scheme which includes hospitals, residential areas, community facilities and businesses, and the need to ensure continuity of services and minimum impact is highlighted throughout.

Construction works related to the Proposed Scheme will require additional liaison, and discussions with all affected properties along the route and this has been committed to in the documentation.

9.15.14. I have considered all of the written submissions made in relation to material assets (General, Services and Materials), in addition to the relevant details on file including the EIAR. I am satisfied that the potential for impacts can be avoided, managed and mitigated by the measures which form part of the proposed scheme, the proposed mitigation measures and through suitable conditions. I am, therefore, satisfied that the Proposed Scheme would not have any unacceptable direct or indirect impacts in terms of services or materials. I am also satisfied that cumulative effects in the context of existing and permitted developments in the surrounding area are not likely to arise.

9.16. Risk of Major Accidents and/or Disasters

9.16.1. Overview

- 9.16.2. Chapter 20 of the EIAR considers the vulnerability of the proposed scheme to risks of major accidents and/or disasters and incorporates a risk assessment that was carried out in three stages (Identification and Screening setting out a list of potential incidents, Risk Classification evaluating the likelihood of the potential incident arising as well as classifying its consequence, and Risk Evaluation determining the level of significance). This process facilitates the assessment of the likely impacts of such incidents/disasters in relation to all environmental, social and economic receptors.
- 9.16.3. The risks identified for the construction phase resulting in a medium or high-risk category are listed in table 9.16.1 below:

Potential Event	Likelihood /Consequence	Risk Category
Disk of goe symposium due to striking mains		Madium
Risk of gas explosion due to striking mains	Unlikely/Serious	Medium
Structural damage/collapse	Unlikely/Serious	Medium
Contamination Event, Pollution event leading to environmental damage	Likely/Very Serious	High

Table 9.16.1 – Likelihood and Category of Major Accidents

Potential Event	Likelihood /Consequence	Risk Category
Major transport accident from collision	Likely/Serious	Medium
Risk of Spread of Invasive Species	Likely/Serious	Medium
Extreme Weather Event resulting in sediment load runoff and storm damage	Unlikely/Very Serious	Medium
Disruption to Emergency response vehicles (Fire, Ambulance, and Garda)	Likely/Very Serious	High

- 9.16.4. No medium or high-risk category events have been identified for the operational phase.
- 9.16.5. The Proposed Scheme is not located within the consultation zone of any Seveso sites. The nearest Seveso site to the proposed scheme are National Oil Reserves Agency Ltd. Pigeon House Road, Ringsend, and Shellybanks Road Ringsend as well as Synergen Power Ltd. t/a ESB Dublin Bay Power Pigeon House Road, Ringsend. All of these Seveso Sites are in excess of 2km distant from the Proposed Scheme.

9.16.6. Conclusion in Relation to Major Accidents and/or disasters

9.16.7. The Proposed Scheme has been designed through an iterative process to avoid and mitigate environmental impacts. I am satisfied that an appropriate suite of mitigation measures will be implemented throughout the construction phase that will reduce the level of risk for impacts or environmental effects to non-significant levels. The proposed schemes construction incorporates a range of plans and procedures that will effectively manage and minimise risk. In this regard, I note that the CEMP will address Construction and Demolition Resource and Waste Management, Construction Traffic Management, Non-Native Invasive Species Management, Surface Water Management and also provides an Environmental Incident Response Plan. With the implementation of the construction methodologies, and mitigation measures set out within the submitted EIAR and CEMP in relation to all proposed works the potential for any identified risks to arise will be reduced to low throughout the construction phase.

- 9.16.8. I am satisfied that given the nature of the proposed development, its design and character as well as the mitigation measures proposed, together with the low probability of a major accident/ natural disaster, it is not likely that significant effects on the environment will arise in this regard.
- 9.16.9. I have considered all of the written submissions made in relation to major accidents, as well as the content of the submitted EIAR. I am satisfied that adverse impacts identified would be avoided, managed and mitigated by the measures which form part of the proposed scheme, the proposed mitigation measures and through suitable conditions. I am, therefore, satisfied that while impacts will arise that the Proposed Scheme would not give rise to any unacceptable direct or indirect impacts in terms of major accidents. I am also satisfied that while some cumulative effects may arise from the Proposed Scheme together with existing and permitted developments, these would be avoided, managed and mitigated by the measures which form part of the Proposed Scheme and through the application of suitable conditions.

9.17. Cumulative Impacts and Environmental Interactions

9.17.1. Overview

9.17.1.1. Section 21 of the EIAR considers the potential for cumulative impacts to arise and the potential for interactions between factors to occur. Cumulative impacts are considered in the context of other permitted and planned development in the area as well as the eleven other bus connects routes that are proposed throughout Dublin in the context of the foregoing sections of the EIAR. Section 21 of the EIAR is augmented by three appendices (A21.1 – Record of Stages 1 & 2 Cumulative Effects Assessment, A21.2 Specialist Assessments (including cumulative assessments of air quality, noise and vibration, population, human health, biodiversity, water, architectural heritage, as well as landscape and visual). The Board should note that the projects/consents listed in Appendix A21.1 does not include the full list of planning history cases outlined in Section 4.20 above, nor that listed in the applicant's own review of planning history in the area contained in Sub Appendix 2 of their Planning Report. In the interests of clarity please note that I have considered all

the relevant projects from the planning history section of this report within this cumulative assessment.

- 9.17.1.2. As well as the BusConnects projects other developments considered in the context of cumulative assessment have been identified on the basis of the relevant zones of influence and anticipated timeframes for construction of other projects. The applicants have screened, reviewed, and shortlisted projects (using planning status, potential for temporal overlap with the Proposed Scheme, scale, location relevant to respective ZOIs, and likelihood of significantly contributing to the effects of the Proposed Scheme criteria) to establish the potential extent and nature of cumulative impacts across the range of EIAR environmental media. For the operational phase it was assumed that all 12 Dublin Core Bus Corridor (CBC) schemes will be operational as will all shortlisted projects, while in the construction phase it was considered that all shortlisted projects would be constructed concurrently unless sequential construction would represent the worst-case scenario for any particular environmental topic. Other types of projects included within the cumulative assessment include local planning applications and SHD projects, DART+ Tunnel Element (Kildare Line to Northern Line); DART+ Coastal South project; and the Greater Dublin Area Cycle Network Plan.
- 9.17.1.3. Having regard to the traffic assessments and modelling carried out for all the BusConnects projects in Dublin the NTA have identified the potential for significant adverse impacts on traffic in the event of all 12 BusConnects bus corridor projects being constructed concurrently. For this reason the NTA clearly state that the following schemes <u>will not be</u> constructed concurrently with adjacent BusConnects Core Bus Corridor schemes:
 - Bray to City Centre will not \be constructed concurrently with the Proposed Scheme (Belfield/Blackrock) and Templeogue/Rathfarnham to City Centre Scheme.
 - Ballymum/Finglas to City Centre will not be constructed concurrently with Swords to City Centre and Blanchardstown to City Centre Schemes.
 - Lucan to City Centre will not be constructed concurrently with Liffey Valley to City Centre and Blanchardstown to City Centre schemes, and

 Templeogue/Rathfarnham to City Centre will not be constructed concurrently with Kimmage and Bray schemes.

Adopting this approach will minimise additional congestion and associated cumulative impacts from arising in relation to the scheduling of these major projects which are under the control of the same applicant. Controlling the implementation of the various core BusConnects corridor schemes (in the event of favourable consideration being provided for all) will ensure that significant adverse cumulative impacts do not arise through the construction phases of projects within relative proximity to each other and which are proposed to operate within the same population catchment (or a subset of same), perform or serve similar functions within the same larger spatial area or which offer an alternative route that traffic may rely on while construction of another corridor is underway.

- 9.17.1.4. In terms of the operational phase the 'do minimum' and 'do something' scenarios for 2028 and 2043 are modelled and compared, with the do minimum scenario assuming the full implementation of the other GDA strategy schemes (e.g. DART+, etc.) and forecasted growth in population and general travel demand.
- 9.17.1.5. The applicant has also had regard to and considered the relevant plans for the area within the EIAR. I note that some plans have been reviewed/updated (as set out in Section 4.0 of this report above), however, I am satisfied that the applicable and relevant provisions of the updated plans remain consistent with the overall objectives of the Proposed Scheme and I have considered these within this cumulative assessment.

9.17.2. Traffic and Transport

9.17.2.1. As referenced above the applicants have clarified that in order to minimise the potential for significant adverse cumulative impacts to arise in terms of traffic, air quality and noise during the construction phase a commitment has been made to ensure concurrent construction of certain corridors will not take place. Limiting concurrent construction in this manner will ensure only limited overlap of traffic dispersion within each of the study areas and thus reduce the potential to cause cumulative traffic impacts above the levels of the individual schemes. It is anticipated

that neither the DART+ Tunnel element (Kildare Line to Northern Line) nor DART+ Coastal South scheme will be under construction within the timeframe of the Proposed Scheme and accordingly cumulative impacts will not arise. The Proposed Scheme aims to co-ordinate construction with other major infrastructure projects and other construction projects along the route, and a Construction Traffic Management Plan will be in operation by the appointed contractor. In this manner I am satisfied that there will be no significant cumulative effects on Transport and Traffic other than those identified as attributable to the Proposed Scheme in isolation for the construction period.

- 9.17.2.2. In terms of the operational phase in the 2028 AM peak the Proposed Scheme (in combination with the other BusConnects CBC projects) will result in an approximate 10% increase in passenger boardings across all public transport services, and 17% more on bus services (with 11% and 18% increases respectively in the PM peak), which will again rise to 9% for both AM and PM peak for all public transport passengers boarding in 2048, and 23% and 22% increases in bus passengers boarding respectively. Accordingly, I consider this cumulative effect on people movement by sustainable means to be long-term, profound and positive. I am satisfied that the traffic modelling carried out demonstrates that the Proposed Scheme, cumulatively with other BusConnects corridors and the implementation of the wider GDA Transport Strategy measures will cater for the overall projected growth in travel demand through sustainable means.
- 9.17.1. I do not consider that any cumulative negative effects will arise in the operational period beyond those identified in the stand-alone assessment of the Proposed Scheme. In this regard I note that the improvements in bus priority infrastructure throughout Dublin will improve the ability to manage and control all bus activity and scheduling across the city. The infrastructure will facilitate overall improved bus services and activities over the long-term which is considered to be a positive long-term impact, however, with this arises a potential concern in relation to the accumulation of buses at certain locations such as the terminal points of the various projects or the city centre in general. In this regard I consider that the proposed bus lane and priority infrastructure proposed will improve the movement of buses and their flow throughout the City and will facilitate better management and

real-time monitoring of bus locations and routes. The management and flow of buses will therefore be improved, as will the ability to be moved throughout the city, accordingly, in my opinion, the clustering, build-up, or accumulation of buses at particular locations will therefore not arise as a cumulative issue of any significance.

9.17.2. Air Quality

- 9.17.2.1. In terms of assessing the potential for cumulative impacts arising on air quality during the construction phase, projects within the 350m ZOI of the Proposed Scheme have been considered. Consistent with the Proposed Scheme larger construction projects are all subject to dust control and mitigation measures being adopted during the construction phase and accordingly I do not anticipate significant cumulative adverse impacts to arise. In terms of air quality from construction traffic, when considering the cumulative effects, while the majority of results show negligible changes, one additional significant adverse impact has been identified at Leeson Street Lower when comparing the Do Something and Do Minimum scenarios as the NO₂ concentrations exceed the limit value during construction, this is considered a negative, significant and short-term impact. In terms of cumulative impact on ecological receptors during construction due to temporary redistribution of traffic the impacts are considered to be negative, slight, and short term, which is the same as viewing the scheme in isolation.
- 9.17.2.2. In terms of the cumulative operational phase impacts of the Proposed Scheme, no new additional significant adverse impacts are identified in the cumulative assessment when compared with the Proposed Scheme's stand-alone assessment. Accordingly, I am satisfied that cumulatively the Proposed Scheme generates little or positive change in overall local air quality.
- 9.17.2.3. In terms of impacts from air quality on proximate sites of ecological sensitivity I note that the NO_x levels are exceeded in both the do minimum and do something scenarios. The only sensitive site which returns results of a higher NO_x deposition level in the do something over the do minimum scenario is the Grand Canal pNHA, however, all locations return results below the lower critical load for the designated habitat sites in both DM and DS scenarios. This is consistent with the Proposed

Scheme when assessed in isolation. I am therefore satisfied that significant cumulative impacts do not arise.

9.17.2.4. In considering regional air quality I am satisfied that the Proposed Scheme will result in reductions in emissions of all pollutants modelled for cars and buses due to the predicted modal shift (decreased car usage). Goods vehicles show continued increases due to the projected increases and challenges with implementing improved technology on delivery/HGV vehicles, accordingly I am satisfied that cumulative impacts in regional air quality will be neutral with no additional significant adverse impacts over and above those assessed for the Proposed Scheme as a stand-alone project.

9.17.3. Climate

- 9.17.3.1. In terms of climate the embodied construction carbon arising from the Proposed Scheme when considered cumulatively with the other 11 BusConnects CBC projects is the equivalent of 0.14% of Irelands Non-ETS (Emissions Trading Scheme target) for 2020 or 0.16% of the 2030 target. Emissions will come from both construction practices themselves as well as traffic being diverted onto longer routes for the construction phase. Mitigation measures are proposed, where feasible, such as using less carbon intensive concrete and good construction practices. Notwithstanding this there will remain a short term negative and significant impact on Climate during the construction phase.
- 9.17.3.2. In the operational phase both direct (transport network along the proposed schemes) and indirect (area of influence that the proposed scheme has cumulatively with the other 11 CBCs) have been considered. A comparison between the 'do minimum' and cumulative 'do something' GHG emissions for total car and bus in 2028 predicts a decrease of 27% CO_{2eq}, and a similar 25% decrease in total car and bus emissions in the design year (2043). While bus, cycling and pedestrian infrastructure is improved it is noted that there will be an overall reduction in operational capacity for general traffic (private car) along the direct study area which will redistribute some traffic onto alternative and sometimes longer routes, such indirect impacts cumulatively are predicted to give rise to increases of a total of 4.5% and 5.2% in

CO_{2 eq} emissions in the opening year and design years respectively. The CBCs have been designed to cater for increased cycling, bus frequency(/reliability/resilience) and demand management. The increase in bus frequency and resilience that would be facilitated by the overall BusConnects CBCs will provide the schemes with the capacity to remove approximately 105,500 and 102,200 car trips per weekday in 2028 and 2043 if all residual capacity is used, or the removal of 74,400 and 69,700 weekday car trips in 2028 and 2043 respectively should 50% of the residual capacity be taken up. These figures would represent a significant contribution towards the 20% reduction in total car kilometres by 2030 targeted in CAP 23. Accordingly, I am satisfied that cumulative the CBC works will make a significant and long-term contribution towards carbon reduction.

9.17.4. Noise and Vibration

- 9.17.4.1. Cumulative noise and vibration impacts will not arise due to the separation distances between schemes, and other projects and the temporary, and linear nature of the construction phases of the Proposed Scheme. Consideration has been given to a variety of projects within 300m of the Proposed Scheme in relation to construction noise. Due to the nature of the proposed works and locations of noise sensitive locations, the Proposed Scheme will remain the dominant noise and vibration source therefore the standalone assessment results remain valid, and I note that the works will be subject to a full suite of mitigation measures to minimise noise impacts and accordingly cumulative noise impacts will not arise. In relation to the assessment of cumulative construction traffic a 1km study area has been considered and while cumulative impacts are predominantly shown to be neutral, imperceptible to slight and temporary, a negative slight to moderate and temporary impact is predicted at Eglin Road and a negative, moderate and temporary noise impact is predicted along Pembroke Lane. Both these are temporary in nature and as construction activities will be co-ordinated with other projects I am satisfied that no likely significant cumulative effects will arise on noise and vibration during construction.
- 9.17.4.2. In relation to operational impacts, modelling has demonstrated that cumulatively during the opening year 2028- higher initial short to moderate term noise impacts will rise along certain roads with all 12 Dublin CBCs operational. This will fall by the

design year 2043 as traffic volumes reduce along the roads in question. I also note that these impacts will in actual fact be further reduced with increased penetration of electrical vehicles into the national fleet. Therefore I do not consider that cumulative adverse impacts will arise apart from local temporary effects as traffic patterns assimilate to the CBCs.

9.17.5. Population and Human Health

- 9.17.6. There could be potential cumulative construction impacts on population from the land-take that is required to facilitate the Proposed Scheme and the timing of relevant activities during the construction period. In this regard I note that all relevant projects permitted and in use along the route are aware of the works and any construction activities will be co-ordinated insofar as practicable. The land-take at Roly's bistro would reduce the floorspace available to that business, however, the pergola in place has been provided as a temporary structure on lands that are in the ownership of the local authority. Accordingly, I consider cumulative impacts overall from construction activities for the Proposed Scheme to be neutral and not significant on Population. I am satisfied that the operational period will not give rise to any adverse impacts on the various population considerations.
- 9.17.7. In terms of human health, I note that cumulative construction activities (particularly with the Greater Dublin Area Cycle Network Plan) could result in increased inconvenience and annoyance for walkers and cyclists, however, such impacts while negative, are temporary and moderate. During the operational phase I consider that the cumulative improvements the CBCs propose to walking, cycling, and public transport infrastructure will have a very significant positive long-term benefit to the study areas health and wellbeing.

9.17.8. Biodiversity

9.17.8.1. The potential cumulative impacts on Biodiversity could only arise in relation to residual impacts identified from the Proposed Scheme (such as impacts on habitat loss, disturbance/displacement of fauna, impacts on specific fauna species, hydrology etc.) being exacerbated by other developments or projects. In this regard I note that cumulative impacts with other projects are unlikely to increase the

significance of impacts above the local geographic scale. The Proposed Scheme is located in an urban area and is compliant with the relevant Development, Biodiversity and River Basin Management plans that are currently in place along its route and any permitted or future developments and projects must also remain compliant with the relevant plans, policies and objectives of these plans, and thus significant adverse cumulative effects will not arise. Furthermore, any projects with the potential to impact on designated sites have either undergone (or will undergo) Appropriate Assessment to ensure adverse effects do not arise (in this regard the Board should also note the conclusions and assessment of In-combination cumulative projects included in Section 10.8 of this report – Appropriate Assessment – In combination Effects, which concludes that the Proposed Scheme will not adversely affect the integrity of any European Sites either alone or in combination with any other plans or projects). Accordingly, I am satisfied that the Proposed Scheme will not give rise to additional significant cumulative impacts on Biodiversity during the construction phase.

9.17.8.2. During the operational phase the conservative modelling adopted (which does not consider for example improvements to vehicle emission rates) identifies that adverse impacts could arise at the Grand Canal pNHA. I note that this impact cumulatively could be significant albeit at the local scale.

9.17.9. Water.

9.17.9.1. In relation to Water with the implementation of the measures set out in the Surface Water Management Plan (SWMP) the Proposed Scheme will not give rise to any impacts of perceptible significance during construction. The incorporation of SuDS measures will ensure that no perceptible impacts will arise cumulatively on water during the operational phase. I am therefore satisfied that cumulative effects will not arise.

9.17.10. Land, Soils, Geology and Hydrogeology

9.17.10.1. The residual impacts arising from the Proposed Scheme on Land, Soils, Geology and Hydrogeology are of negligible magnitude and imperceptible significance and accordingly no significant cumulative impacts can arise when considered with other plans and project during the construction or operational phases.

9.17.11. Archaeology, Architectural, Cultural Heritage and Landscape

- 9.17.12. Consideration was given to a range of projects within the archaeological and cultural heritage zone of influence for the Proposed Scheme. There are, however, no potential impacts arising from the Proposed Scheme at the locations of these projects, further any additional proposals within the relevant ZOI with potential to impact elements of cultural heritage or archaeological assets will be subject to standard assessment and control, and accordingly I am satisfied that no cumulative effects on Archaeology or Cultural Heritage can arise, and further consideration or mitigation is not required.
- 9.17.13. In relation to potential architectural heritage impacts the Proposed Scheme will give rise to its own impacts in terms of land-take, boundary treatments and potential for damage to buildings of interest, conservation areas and RPS buildings. The Proposed Scheme includes a range of mitigation measures which include reuse/appropriate set back of boundary treatments, recording features and protection of historic fabric. There also remains the potential for cumulative impacts to arise on the character of conservation areas, however, with the implementation and application of the heritage and architectural protection policies and objectives from the relevant Development Plans, I do not consider that significant cumulative or novel effects can arise beyond those set out in the consideration of the Proposed Scheme in isolation.
- 9.17.14. In relation to townscape/landscape, should construction of the shortlisted projects, other BusConnects CBCs and other permitted projects occur within the same (or overlapping) timeframes, there is the potential for cumulative adverse impacts to arise, however, I consider such impacts (inclusive of loss of mature trees) will be contained to the immediately surrounding built form and to be temporary/short-term in nature. In terms of the operational period I note that the Proposed Scheme includes significant public realm improvements and incorporates significant planting which will mature and grow throughout the operational phase. In this regard I consider that while impacts will arise that as planting and the public

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realm measures mature, cumulative effects will be slight and temporary to short term in duration.

9.17.15. Material Assets – Waste and Resources

- 9.17.15.1. Cumulative effects for waste management must be considered on a regional basis due to management practices in Ireland, and therefore large-scale regional projects considered in assessing potential impacts include Metrolink, Dart underground, Dublin Port Masterplan and the Greater Dublin Drainage Project as well as the other 11 CBC projects. All of these projects will generate C&D waste and will add to the need for off-site capacity for recovery, recycling, treatment and disposal of waste. While opportunities will always arise for reuse of materials not needed on one project within another in the wider area, I note that the East Midlands Waste Region has the most capacity within the country to deal with C&D waste and recovery. Accordingly, I consider that that there will be no likely significant cumulative effects arising. I note that during the operational phase maintenance measures will be required which will give rise to waste, I do not consider such maintenance measures to be significant across the cumulative network as the proposed CBCs are along existing transport corridors which would necessitate ongoing maintenance even in the do minimum scenario.
- 9.17.15.2. Having regard to the nature of the Proposed Scheme which is refurbishing an existing transport corridor and reallocating carriageway priority there is potential for a range of utility diversions and services to be diverted, disrupted and managed during the construction phase. Such measures will be undertaken by agreement with those affected as would be the case in any of the other projects along the route or beyond. I, therefore, consider that this element will be managed appropriately, and no significant cumulative impacts will arise.

9.17.16. Interactions

9.17.16.1. I have considered the interrelationships between the various EIAR topics and whether these may as a whole affect the environment, even though the effects may be acceptable when considered on an individual basis. Table 21.29 of the EIAR provides a matrix of interactions between environmental factors during the

construction and operational phases of the proposed development. Significant interactions occur between population, human health (which are treated as an individual Section in my EIA as these topics are intrinsically linked) and these two topics are further linked to varying degrees of significance to all the other topics (biodiversity, land and soils, water, air quality, climate, noise and vibration, waste, landscape/ townscape/visual, traffic and transport, cultural/architectural/ archaeological heritage, traffic and transport as well as major accidents) either through direct connection, perception or appreciation.

- 9.17.16.2. The interaction between traffic and transport and climate is one of the main drivers behind the Proposed Scheme. The reduction in operational phase traffic and modal shift to more sustainable means of transport will reduce GHG emissions and associated impacts on climate.
- 9.17.16.3. The proposed construction phase of the development has the most potential to interact with human health and biodiversity in relation to water contamination with the potential for pollutants to enter waterbodies through spillage to directly impact human health and biodiversity. In this regard I note that with the application of the CEMP measures to protect water quality residual impacts to water were expected to be imperceptible and as such there is no likely significant interaction between Water and Human Health, Population or Water and Biodiversity from the construction phase of the Proposed Scheme. Similarly, with the application of SuDS and the proposed maintenance programme provided for there will be no significant interactions between these topics during the operational phase.
- 9.17.16.4. Population / Human health and biodiversity interact with air quality, noise and vibration, as well as traffic. While I note some adverse localised air quality impacts will arise in the vicinity of the Grand Canal pNHA, I am satisfied on the basis of the assessment set out above, information provided, and having regard to the location and nature of the Proposed Scheme (representing works to an existing transport corridor within an urban environment) that no significant impacts are expected in this regard and there is no likely significant interaction between these topics and human health/population.
 - 9.17.17. Traffic and population/human health interactions will occur during construction where access may be disrupted and diversions required, this can lead to stress. The construction phase could also potentially affect local drainage and present an

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increase of flood risk with associated impacts on human health. These impacts are likely to be imperceptible, and are capable of management and control, I am therefore satisfied that no significant interaction will occur between these factors during the construction phase. In terms of the operational phase the modal shift encouraged and facilitated by the Proposed Scheme will provide for beneficial interactions from traffic and population/human health due to increased accessibility, improved cycling, walking and public transport infrastructure.

- 9.17.18. Interactions will also arise between population/human health and landscape/ townscape/visual. The construction phase will have impacts on a number of local amenities and open spaces, as well as representing the removal of a significant number of trees from along the route which are enjoyed by the community. On the basis of the information provided access to community spaces will be maintained insofar as practicable during construction and that phase will also provide for additional planting of trees and improvements to the public realm which will mature through the operational phase. I am satisfied therefore that the significance of interactions in this regard will be negligible and balanced against the public realm improvements and increased accessibility that will arise from the Proposed Scheme which will influence wellbeing, as well as providing opportunities for increased outdoor activity and social interactions with associated health benefits.
- 9.17.19. There is also the possibility of interactions between population/human health and material assets during the construction phase due to the potential for disruption to services/utilities. I am satisfied on the basis of information received that any such disruptions will be minimised and where necessary appropriate management and mitigation can be applied through the construction process to ensure that any such interactions will not give rise to significant effect.
- 9.17.20. I acknowledge the potential for interactions between the topics of Biodiversity, Traffic, Land, Soils, Geology and hydrology, water, air quality, noise and vibration as well as landscape/visual. These potential interactions arise from tree removal and replanting (townscape), mortality risk (traffic), habitat degradation (water and air quality), and spread of invasives (soil). I am satisfied that while the potential for interactions exists that the mitigation measures provided within the submitted documentation will ensure these will be managed effectively and not give rise to

significant impacts beyond those previously set out in the individual topic assessments above.

- 9.17.21. Potential interactions could also arise between land, soils, geology, and hydrology, and water due to the potential impact on water from works polluting watercourses, ground water or water supplies, including contaminated ground works. Such interactions have been discussed in the relevant topic sections and I am satisfied that the measures set out in the submitted documentation will ensure that the significance of interactions will be minimal.
- 9.17.22. There are also interactions between Landscape (townscape) and Visual, with Archaeology, Architectural and Cultural Heritage. All these factors influence the quality of townscape and place; however, I am satisfied that these interactions have been assessed, discussed and mitigated within the relevant sections of the EIA set out above.
- 9.17.23. Other potential interactions of a more minor nature include risks of major accidents with all topics, material assets and traffic, climate and water, climate and air quality, waste, traffic, among others. I consider these topics will not give rise to significant interactions and have been adequately considered and discussed within the individual topic discussions set out above.

9.17.24. Cumulative Impacts and Environmental Interactions Conclusion

9.17.25. Having regard to the foregoing I am satisfied that cumulative impacts and effects as a result of interactions, both indirect and direct can be avoided, managed and / or mitigated for the most part by the measures which form part of the Proposed Scheme and where appropriate the stated mitigation measures can be augmented by specific conditions. I consider the methodology carried out in the submitted EIAR to be appropriate as it assesses the Proposed Scheme with the other CBC projects, together with the other major transport proposals in the Greater Dublin Area and where appropriate considers other permitted developments, which I have augmented by considering the current relevant development and biodiversity plans and any additional relevant permissions/consents. I consider this to be a robust approach which allows a comprehensive assessment of the Proposed Scheme both by itself and in the context of any cumulative interactions with projects and plans in the area.

9.18. Reasoned Conclusion

- 9.18.1. Having regard to the examination of environmental information contained above, and in particular to the EIAR and supplementary information provided by the developer, and the submissions from third parties and from prescribed bodies in the course of the application, it is considered that the main significant direct and indirect effects of the proposed development on the environment are as follows:
 - Positive long-term impacts on population and human health through facilitation of improved pedestrian and cyclist safety, faster and more reliable bus services, reduced traffic congestion, improved air quality and noise reduction, improved road/ street safety, more social interaction and positive accessibility and amenity impacts for community areas.
 - Negative short-term impacts on population and human health from the construction phase in terms of access restrictions, noise, vibration, dust, contaminated material, traffic and visual impact. This will be adequately mitigated through compliance with the CEMP and measures outlined in the Land, Soils, Water, Air and Climate and Material Assets sections of the EIAR.
 - Negative impacts on population and human health arising from land take (both permanent and temporary) required to facilitate the Proposed Scheme, from various individual residential, educational, services, and commercial properties. Where properties are directly affected the boundaries will be replaced on a like-for-like basis and access will be maintained throughout the construction process.
 - Negative Impacts on Townscape and Landscape arising from construction activities (which will be temporary in nature) as well as longer term impacts on streetscape from the removal of a significant number of street trees.
 While these will be replaced where and as possible throughout the Proposed Scheme the loss of mature street trees will be a long-term negative impact.
 - Positive Impacts on Townscape and Landscape arising from the provision of improved public realm and pedestrian facilities throughout the proposed scheme.

- Negative impacts on Architectural Cultural Heritage which will range in significance from the lower-level impacts associated with the provision of new signage and cantilevered signal poles in the vicinity of Protected Structures, to higher-level impacts arising from direct impacts arising from the need to alter protected structures and their boundaries that occur directly along the route including properties whose boundaries will be set back (and sites reduced in size).
- Adverse impacts on **biodiversity** from the proposed removal of habitat. Vegetation removal within the Proposed Scheme involves the permanent removal of 329 no. street trees and 1,040m of hedgerow. Mitigation is designed into the Proposed Scheme as it also includes the provision of 349 trees and 558m of hedgerow. My consideration of the EIAR recommends that 11 no proposed trees along Fitzwilliam Street Lower be omitted from the scheme (in the interests of maintaining architectural heritage/integrity) and that the junction at Herbert Park and Merrion Road be redesigned to allow the protection of six additional trees and the established rail/boundary). The new planting will provide new nesting habitat for birds and the landscaping proposed will reduce the significance of habitat loss. Trees with potential roosting habitats for bats will not be removed and pre-construction surveys will ensure significant impacts on Bats do not arise. Similarly, preconstruction surveys for other fauna and invasive species within works areas will ensure that impacts will not arise as results will inform further mitigation measures. The Proposed Scheme does include works within designated sites, where such works are proposed the habitats involved are not sensitive and the integrity and reasons for the ecological protection of these sites will not be adversely impacted. Suitable mitigation is also incorporated within the CEMP in relation to invasive species. Impacts on biodiversity will therefore not be significant.
- Negative impacts on Water could arise as a result of accidental spillages of chemicals, hydrocarbons or other contaminants entering watercourses, the sea or groundwater via piling activities during the construction phase of the development. These impacts will be mitigated by measures outlined within the application and can therefore be ruled out.

- Potential adverse impacts on land, soils, geology and hydrogeology from loss or damage of topsoil, excavation of potentially contaminated ground and contamination of parts of an aquifer could arise during the construction phase. These impacts will be adequately mitigated through the implementation of the various environmental measures and best practice set out in the CEMP and therefore impacts will not be significant.
- Potential negative impacts on water quality could arise during construction due to runoff from the works areas containing fine sediments, or accidental spillages/ leakages of contaminants and direct disruption to the local drainage networks. The application documentation (EIAR and associated CEMP) contains a comprehensive suite of mitigation measures which are adequate and will protect water quality and ensure that significant adverse impacts will not arise.
- There is potential for impacts to **air quality** to arise from dust during construction works. These will be minimised with implementation of the appropriate mitigation measures set out within the EIAR and CEMP which will minimise dust emissions arising. During the operational phase there will be localised impacts on air quality at certain locations arising from re-distributed traffic patterns, and in particular along the Grand Canal in terms of NOx concentrations, this impact is considered to be negative, slight and long-term.
- There is potential for **noise** disturbance to arise during the construction phase, works will generally be carried out in daytime hours causing no significant effects and mitigation measures will be applied in relation to works areas proximate to sensitive properties. Where works are required to be carried out at night-time and weekends (to avoid significant traffic impacts) liaison will be held with affected property owners and appropriate mitigation applied as practicable. Furthermore, significant noise abatement and controls are provided for within the CEMP to minimise noise arising from construction activities. During the operational phase the use of the transport corridor will remain consistent with its established use and overall impacts will be negligible, having particular regard to the changes (technological improvements) to the bus fleet and with the reduction in car numbers facilitated by the improved sustainable transport infrastructure being provided

in the Proposed Scheme. Accordingly, significant impacts from noise can be ruled out during all phases of the Proposed Scheme.

- Potential for positive long-term impacts on climate through removal of the equivalent of approximately 3,000 and 3,300 car trips per weekday from the road network in 2028 and 2043 respectively (these numbers increase with increased uptake in residual bus capacity) and associated reduction in CO₂ / GHG emissions.
- Positive impacts on traffic and transport by maximising the capacity of the Proposed Scheme to move more people by sustainable modes, whilst also providing for general traffic movements and activities.
- Short-term negative impacts on traffic and transport arising from the construction phase and the need to adequately divert and control traffic movements in and around works areas. Such impacts will be mitigated through the implementation of the traffic and transportation plan and CEMP.
- Potential adverse impacts on cultural heritage due to construction works
 potentially impacting on underlying archaeology and other cultural or heritage
 features such as monuments. Mitigation measures including archaeological
 monitoring and provision for protection / recording / monitoring underlying
 archaeology and heritage features in the vicinity of works.
- Potential adverse impacts on Architectural Heritage could arise from the Proposed Scheme due to the direct construction interventions on lands within the curtilage of protected structures or to protected structures themselves or where infrastructure is proposed within the wider setting of Protected Structures. Where works are proposed to protected structures, I am satisfied that these are necessary to secure the overall wider beneficial impacts of the Proposed Scheme and that these interventions have been designed to have minimum impact. Where boundaries are to be altered/set back to facilitate the Proposed Scheme I am satisfied the existing boundary materials are to be removed and reused/repurposed in an appropriate manner and using sensitive methodologies. Similarly, where heritage gateway features and/or Protected Structures are to be reorientated, relocated or altered I am satisfied

that the methodologies and supervision set out are appropriate and will ensure impacts are not significantly adverse.

9.18.2. The EIAR has considered that the main significant direct and indirect and cumulative effects of the proposed development on the receiving environment. Following mitigation, no residual significant long-term negative impacts on the environment or sensitive receptors will arise. I am satisfied that the information provided is reasonable and sufficient to allow the Board to reach a reasoned conclusion on the significant effects of the project on the environment, taking into account current knowledge and methods of assessment. Overall, I am satisfied that the information contained in the EIAR complies with the provisions of Article 3, 5 and Annex (IV) of EU Directive 2014/52/EU.

10.0 Appropriate Assessment

This section provides the consideration of the likely significant effects on European sites arising from the Proposed Scheme.

10.1. Article 6(3) of the Habitats Directive

- 10.1.1. The requirements of Article 6(3) as related to appropriate assessment of a project under part XAB of the Planning and Development Act, 2000 (as amended) are considered fully in this section. The areas addressed in this section are as follows:
 - The Natura Impact Statement,
 - Screening for appropriate assessment, and
 - Appropriate Assessment (AA) of implications of the Proposed Scheme on the integrity of each European site.

10.2. The Natura Impact Statement and Supplemental Information

- 10.2.1. The application is accompanied by an Appropriate Assessment Screening Report (AASR) and a Natura Impact Statement (NIS) dated March 2022. The NIS provides a description of the Proposed Scheme, the methodology and consultations undertaken, an overview of the receiving environment, lists potential impacts, identified zones of influence and identifying European sites at risk of effects, an assessment of potential effects on European sites, as well as setting out a summary of mitigation measures and residual impacts before presenting its conclusion. The NIS Appendices include (I) the general arrangement drawings for the scheme, (II) proposed surface water drainage works drawings, (III) the Construction Environmental Management Plan (CEMP), (IV) Desk Study, (V) Water Framework Directive Assessment and (VI) Air Quality Assessment.
- 10.2.2. All ecology and appropriate assessment related documents have been prepared by staff ecologists from Scott Cawley Ltd. (the project ecological consultants) and informed by desk study including reference material from the NPWS website and database as well as by field surveys.

- 10.2.3. A description of all baseline surveys is outlined within Section 4.6 of the NIS. The following is a list of surveys undertaken (the Board should note that no aquatic habitat surveys were carried out as the desk study confirmed that no waterbodies would be subject to significant disturbance from the Proposed Scheme nor instream works proposed, furthermore, the proposed scheme is not hydrologically linked to any European Site designated for Annex II fish species or white-clawed crayfish):
 - Habitat and Floral Surveys were undertaken in June and August 2018, as well as August and October 2020, with additional surveying carried out along any new route sections added since 2018.
 - Fauna surveys were undertaken as follows:
 - Terrestrial mammals (excluding bats) within the Proposed Scheme footprint and suitable lands (i.e., greenfield sites immediately adjacent) between June and August 2018, August 2020, and February 2021.
 - A desk study and habitat suitability assessment (October 2020) identified two sites along or adjacent to the Proposed Scheme with potential for wintering birds. These sites were subject to transect wintering bird surveys, namely CBC14154WB001 which is adjacent to Booterstown Marsh, and CBC1415WB002 centred on the large open grassy areas around Blackrock Park and its pond. A total of 27 wintering bird surveys were carried out from February to March 2020, and additionally twice a month from November 2020 to March 2021, and October 2021 to March 2022. In general, the survey approach was a 'look-see' methodology (based on Gilbert et al. 1998). All birds present within a site were identified and were recorded using the British Trust for Ornithology (BTO) species codes. The total flock size of birds present, their general location within the site and any activity exhibited were also recorded. Evidence of bird droppings were recorded at predefined transect lines. The length of the transect line varied per site.
- 10.2.4. The receiving environment is described in line with standard methodology (Fossitt 2000) and results of the field surveys are presented in NIS Section 5 and considered further in my assessment below. The Proposed Scheme is located in an urbanised environment and none of the habitats present within the footprint corresponds to

Annex I or Qualifying Interests Habitat. The NIS does note however, that Booterstown Marsh which runs along the Proposed Scheme boundary is documented as supporting a number of coastal Annex I habitats and is also a subsite of the South Dublin Bay and River Tolka Estuary SPA.

- 10.2.5. No records of any Annex II plant species were recorded within the footprint of the Proposed Scheme during field surveys.
- 10.2.6. There was one non-native invasive plant species (three-cornered garlic Allium Triquetrum) listed on the Third Schedule of the European Communities (Birds and Natural Habitats) Regulations, identified along the Proposed Scheme near the northwestern corner of the Booterstown Marsh during field surveys. The desk study (Appendix IV) returned records of a total of 20 species listed on the Third Schedule within 1km of the Proposed Scheme. These records include aquatic species associated with the Grand Canal and River Dodder, water fern Azolla filiculoides, curly waterweed Lagarosiphon major and Nuttall's waterweed Elodea nuttallii. There are also records of Himalayan balsam Impatiens glandulifera and Japanese knotweed *Reynoutria japonica* along the Dodder in multiple locations, as well as localised records of giant rhubarb Gunnera tinctoria. There is also stand of Japanese knotweed along the Grand Canal and a single record of giant hogweed Heracleum mantegazzanium is noted at Blackrock College. The NIS notes these species were not present within the footprint of the Proposed Scheme just recorded in the wider area. Common cordgrass Spartina anglica is known to be locally present on exposed muds within the saline parts of Booterstown Marsh. It is acknowledged that indirect impacts could arise where water draining off the Proposed Scheme could potentially result in seed dispersal to other areas of bare saline mudflats or into Annex I coastal habitats.
- 10.2.7. No signs of otter, an Annex II species, were recorded during surveys within the footprint of the Proposed Scheme. A follow-on survey in February 2021 noted a single mustelid footprint (which could belong to either an otter or mink specific species was not identified) in the vicinity of the Ballsbridge crossing over the river Dodder, although there was no evidence of Otter habitation features. It was noted that the provision of flood walls in the area preclude otter habitation while vegetation clearance reduces the potential for otter habitation. The closest European site for which this species is a qualifying interest is the Wicklow Mountains SAC which is

stated in the submitted NIS to be approx. 11.9km upstream³⁸. The NIS at para 91 states that the populations of Otters within the footprint of the proposed scheme were deemed not to be connected to the SAC populations, however, a number of erroneous statements are included in this paragraph of the NIS (and in para. 70 of the AASR). In this paragraph it is stated that the Wicklow Mountains SAC is located in a different sub-catchment to the proposed scheme, however, the SAC is within the Dodder catchment (and the same WFD sub-catchment) as the proposed scheme, it is also incorrectly stated that the proposed scheme drains into the Tolka Estuary, as the proposed scheme ultimately drains into the Liffey Estuary and Dublin Bay. These initial erroneous statements are corrected later in the submitted AASR (paragraphs 85, 106, 107, 125, 126, and 170, refer) and NIS (paragraphs 65, 105, 124, 125, 143, 145, 157, 163, 217, 218, 244, 256, 280, 303, 328, 353, 378, 406, 407, 428 and 440 refer) with various statements confirming the hydrological connection to Dublin Bay (downstream) and the Wicklow Mountains SAC (upstream) as well as acknowledging a potential connection to the Wicklow Mountains SAC Otter population. The ranges of the Otter are stated as being between 7.5km (female) to 21km (male). This maximum range of 21km would suggest there is a possible/potential link between these populations, as the hydrological distance from the proposed scheme to the closest parts of the Wicklow Mountains SAC is within the male range, therefore there is the possibility of otter associated with the SAC population to move downstream and come within the zone of influence of the Proposed Scheme. I consider that the NIS does consider the potential impacts on Otter in full and follows a conservative and precautionary approach. While there are initial inconsistent statements in relation to hydrological connectivity and drainage catchment in both the NIS and AASR, I consider these to be typographical in nature and when considered in light of the overall NIS document they can be seen to be outlying statements that are inconsistent with the remainder of the document and therefore while they may lead to initial confusion they could not be stated to be misleading taking into account the entirety of the document.

10.2.8. The Proposed Scheme is hydrologically linked with Dublin Bay via the River Liffey and runs in close proximity to the Bay at times. Harbour Seal, Grey Seal (both Annex

³⁸ My own measurements from the Boards internal mapping system suggests the hydrological separation distance is closer to 14.5km, however, I accept this 11.9km distance as a conservative estimate.

II³⁹ species) and Harbour Porpoise (Annex IV) are present in Dublin Bay, with the closest European Sites for which these species are qualifying interests (QIs) being Lambay Island SAC (both seals) located c. 21.5km north-east of the proposed scheme, and Rockabill to Dalkey Island SAC (harbour porpoise) c.5.3km east.

- 10.2.9. In relation to invertebrates a review of the National Biodiversity Date Centre (NBDC) database returned a potential for marsh fritillary and white-clawed crayfish. There were no records for the white-clawed crayfish in the zone of influence of the proposed scheme nor were there any records of marsh fritillary (or its potential habitats) within the footprint.
- 10.2.10. In relation to Birds, Kingfisher (Annex I) are known to occur within 1km of the Proposed Scheme and in the wider area, however, none were recorded during site surveys within the footprint of the scheme. The closest SPA for which kingfisher is designated is the River Boyne and River Blackwater SPA which is in excess of 40km northwest of the scheme. It is therefore considered that the kingfisher in the vicinity of the Proposed Scheme are not an SPA population. Wintering bird surveys were carried out for the Proposed Scheme at transects CBC1415WB001 (Booterstown Marsh) and CBC1415WB002 (Blackrock Park). Species of conservation concern recorded were Black-headed gull, Light-bellied brent goose, Little grebe and Mallard. Wintering bird activity was stated as being low across all visits. One SPA wintering bird feeding site has been identified within the footprint (Booterstown Marsh) and there are a further 5 no. within 300m (the disturbance Zone of Influence/ZOI), these are Blackrock Park, Blackrock College, Williamstown Park, Pembroke Cricket Club/Monkstown Rugby Club, and St. Andrews Playing Pitch. Due to the potential for disturbance a number of SPAs have been included within the NIS on a precautionary basis as it cannot be stated with certainty that their SCI species do not use areas in the vicinity of the proposed scheme as an ex-situ habitat.
- 10.2.11. The Proposed Scheme crosses the following watercourses,
 - Grand Canal, at Baggot Street Bridge.
 - Dodder River at Ballsbridge where Merrion Road merges into Pembroke Road.

³⁹ Of the Habitats Directive

- Elm Park Stream⁴⁰ under Merrion Road northwest of petrol station.
- Booterstown Stream, culverted crossing under Merrion Road from Trimleston Avenue.
- Priory Stream, Crossing point under Frascati Road/Rock Hill Road near Blackrock Park.
- Brewery Stream, culverted crossing under Temple Road/Frascati Road changeover.

Other water bodies of relevance are Dublin Bay (located to the east of the proposed scheme and most proximate at the location of the temporary works compound [c. 45m distant] and at Merrion Strand [c. 30m distant]). Booterstown Marsh runs adjacent to the Proposed Scheme on the Rock Road and the Nutley Stream runs from Merrion House car park to Booterstown Marsh.

- 10.2.12. Surface waters will also drain to Dublin Bay via existing drainage across the Proposed Scheme. Dublin Bay contains eight European sites: North Dublin Bay SAC, South Dublin Bay SAC, North Bull Island SPA, South Dublin Bay and River Tolka SPA, Howth Head SAC, Howth Head Coast SPA, Rockabill to Dalkey Island SAC and Dalkey Island SPA.
- 10.2.13. Details on the water quality of each watercourse, as sourced from the Environmental Protection Agency (EPA), and the distances from the proposed crossing point to downstream waterbodies are provided in Table 6 of the NIS.
- 10.2.14. It is important to note at this juncture that the NIS states that the proposed scheme does overlap with two European sites. The overlap between the Proposed Scheme and the South Dublin Bay and Tolka Estuary SPA is stated as being 4.3m² (at Booterstown Marsh), and 2.7m² with the South Dublin Bay SAC (on the coastal side of the Merrion Gates). The NIS clarifies that neither of these overlap areas *"currently correspond to QI habitats and/or habitats on which QI/SCI species of nearby habitats rely on for foraging, resting / roosting and / or commuting.."* Furthermore, these overlap areas comprise of pre-existing hardstanding surfaces which are of low ecological value and are not listed on Annex I of the Directive, the

⁴⁰ For clarity please note that Elm Park, Priory and Booterstown streams are all considered as constituent parts of the Brewery Stream_10 WFD Waterbody by the EPA as discussed in above in Section 9.9 (Water) of the EIA.

relevant areas will be replaced by new road surface i.e., proposed scheme will result in existing hardstanding areas being replaced with equivalent to that already in place.

- 10.2.15. The scientific assessment to inform the AA (Potential Impacts, Zone of Influence, identification of European Sites at Risk of Effects and Assessment of Potential Effects on European sites) is presented in sections 6 and 7 of the NIS. The conservation objectives of the various qualifying interest features and special conservation interest species are listed (Table 3 of the NIS refers). Impact pathways are identified and the assessment of likely significant effects which could give rise to adverse effects on site integrity are presented.
- 10.2.16. Mitigation measures are presented in section 7.1.4 of the NIS as well as their application/implementation relevant to each of the European sites (Sections 7.1 to 7.12 of the NIS refers). Mitigation measures are also detailed in full in the Construction Environment Management Plan (CEMP) which includes a Construction Traffic Management Plan, Invasive Species Management Plan, Surface Water Management Plan, Construction and Demolition Waste Management Plan, Environmental Incident Response Plan. Assessment of potential in-combination effects is presented in Section 9 of the NIS.
- 10.2.17. The NIS together with supplemental information concludes that:

".... following an examination, analysis and evaluation of the relevant information, including in particular the nature of the predicted impacts from the Proposed Scheme, and with the implementation of the mitigation measures proposed that the Proposed Scheme will not adversely affect (either directly or indirectly) the integrity of any European site, either alone or in combination with other plans and projects."

10.2.18. Adequacy of information submitted by the applicant.

10.2.19. Having reviewed the NIS and supplemental information that accompanies the application, I am satisfied that there is adequate information to undertake Screening and Appropriate Assessment of the Proposed Scheme which runs from the Blackrock to the City Centre from the R113 at Temple Hill along the N31 (Frascati Rd) R118 (Rock/Merrion/Pembroke Roads) R816 (Pembroke Rd.), Baggot Street

(Upper and Lower), Fitzwilliam Street Lower to the junction of Mount Street Upper Merrion Square South and East, as well as the Nutley Lane section running from the R138 (Stillorgan Road) to the R118 (Merrion Road) all in County Dublin within the administrative areas of Dublin City and Dun Laoghaire Rathdown County Councils.

- 10.2.20. I am satisfied that all possible European Sites that could in anyway be affected have been considered by the Applicant at the time of submission. I do note, that since the application and NIS was submitted that a new candidate SPA (the North-West Irish Sea cSPA) has been designated. The submitted NIS could not take account of this as it had not been identified at the time of submission (the cSPA was announced in July 2023). Notwithstanding this, however, given the nature of potential impacts that could arise from the construction and operational phase of the Proposed Scheme, as well as the nature of SCIs identified in this cSPA and publication of the sites Conservation Objectives (September 2023) as well as the survey work completed to inform the submitted NIS, I consider that there is sufficient detail on file to allow full consideration of potential impacts on the North-West Irish Sea cSPA.
- 10.2.21. I am satisfied that all ecological survey work and reporting has been undertaken and prepared by competent experts in line with best practice and scientific methods. Information on the competencies and professional memberships of the Ecological team are provided in the NIS. I am also satisfied that all potential impact mechanisms have been considered and appropriately assessed within the NIS document insofar as practicable. While I note clarifications in relation to text, typographical errors and certain statements in the submitted NIS documentation, in my report this is done as a matter of clarification for the Board and I do not consider that these prevent the Board from completing its AA of the Proposed Scheme.

10.3. Screening for Appropriate Assessment

10.3.1. The first test of Article 6(3) is to establish if the Proposed Scheme could result in likely significant effects to a European site, in which case the development is 'screened in' for further detailed appropriate (stage 2) assessment.

- 10.3.2. The screening assessment undertaken on behalf of the applicant concluded that the potential for significant effects could not be ruled out for **18**⁴¹ **no. European Sites** within the wider Dublin area in view of the conservation objectives of those sites and thus the Proposed Scheme must proceed to (stage 2) Appropriate Assessment, and an NIS prepared to inform this stage.
- 10.3.3. I note that in determining the potential significant effects of the Proposed Scheme, the applicant took account of the potential for ex-situ effects for foraging birds and mammals such as Otter as well as the potential for adverse impacts arising from water runoff, potential spread of invasive seeds, air and water quality. It is of note that a precautionary approach has been taken in including SPA sites in the wider area in the screening exercise. Given that bird species can travel up to 20km from designated sites the applicant has included sites at some remove from the Proposed Scheme site. In relation to SPA's I note that the North Irish Sea cSPA was not considered as it had not been identified, I have considered this site in the screening process below.
- 10.3.4. Similarly, a precautionary approach has been taken in relation to Qualifying Interests (QIs) associated with SACs in the wider area. Potential impacts and effects considered are presented in **Table 10.1** below.

Potential impacts and zone of influence of effects	European sites within Zone of Influence
Habitat loss and FragmentationWhile two European sites (South Dublin Bay SACand South Dublin Bay and River Tolka EstuarySPA) overlap slightly with the Proposed Scheme.The overlap areas comprise of pre-existinghardstanding surfaces which are of low ecologicalvalue and are not listed on Annex I of the Directive.These extant hardstanding areas are proposed tobe replaced by new road surface i.e. replacingexisting with equivalent to that already in place.Accordingly, while there is an overlap there is nodirect loss of any Annex I habitats listed as a QI ofthe SAC nor do the affected habitats support theSCI species of the SPA.There is potential for loss of/impact on ex situinland feeding sites used by SCI bird species.	Yes The European sites at risk of ex-situ habitat losses: Malahide Estuary SPA; Baldoyle Bay SPA; North Bull Island SPA; South Dublin Bay and River Tolka Estuary SPA; Rogers town Estuary SPA; Skerries Islands SPA Ireland's Eye SPA; Lambay Island SPA; North-West Irish Sea cSPA, and The Murrough SPA;

Table 10.1 Summary of European Sites for which the likelihood of significant effects cannot be ruled out, (based on applicants assessment with consideration added for North West Irish Sea cSPA).

⁴¹ Noting that the North-West Irish Sea cSPA had neither been identified or established when the application was lodged.

Potential impacts and zone of influence of effects	European sites within Zone of Influence
Habitat degradation/ effects on QI/SCI species	Yes
as a result of hydrological impacts: Habitats and species downstream of the Proposed Scheme and the associated surface water drainage discharge points, and downstream of offsite wastewater treatment plants	The European sites at risk of hydrological effects associated with the Proposed Scheme: North Dublin Bay SAC, South Dublin Bay SAC, Wicklow Mountains SAC, Howth Head Coast SPA (listed in table 7 of NIS, but not referenced in Section 6.2 of submitted NIS), Howth Head SAC, (not listed in table 7 of the NIS but referenced in Section 6.2 of submitted NIS) Lambay Island SAC, Rockabill to Dalkey Island SAC, North Bull Island SPA, South Dublin Bay and River Tolka Estuary SPA, Malahide Estuary SPA, Baldoyle Bay SPA, Baldoyle Bay SAC, (listed in table 7 of NIS, but not referenced in section 6.2 of submitted NIS), Rogerstown Estuary SPA, Skerries Islands SPA, Ireland's Eye SAC (listed in table 7 of NIS, but not referenced in section 6.2 of submitted NIS), Ireland's Eye SPA Rockabill SPA, Lambay Island SPA, Dalkey Islands SPA, North-West Irish Sea, and The Murrough SPA,
Habitat degradation as a result of hydrogeological impacts: Groundwater-dependant habitats, and the species those habitats support, in the local area that lie downgradient of the Proposed Scheme.	Yes There is one European site at potential risk of hydrogeological effects associated with the Proposed Scheme – South Dublin Bay and River Tolka Estuary SPA, at Booterstown Marsh.
Habitat degradation as a result of introducing/spreading non-native invasive species: Habitat areas within, adjacent to, and potentially downstream of the Proposed Scheme Air quality impacts	Yes There are non-native invasive species present within or adjacent to the Proposed Scheme and in the surrounding area, therefore due to the nature of the sites there is a risk associated with the Proposed Scheme to the adjacent European site - South Dublin Bay and River Tolka Estuary SPA and the following downstream European sites in Dublin Bay from the spread/introduction of non-native invasive species South Dublin Bay and River Tolka Estuary SPA, South Dublin Bay SAC, North Dublin Bay SAC, and North Bull Island SPA. Yes

Potential impacts and zone of influence of effects	European sites within Zone of Influence
Potentially up to 50m from the Proposed Scheme boundary and 500m from the Construction Compound during the Construction phase and up to 200m during the Operational Phase. [A significant change in AADT (Annual Average Daily Traffic) flows is predicted to occur on Rock Road adjacent to two European Sites].	The Proposed Scheme is adjacent to two European sites and there is potential for air quality impacts associated with the Proposed Scheme. South Dublin Bay and River Tolka Estuary SPA and South Dublin Bay SAC [Note – Para 137 of the NIS incorrectly states that <i>"There are no European sites present within these distances"</i> [50m, 200m or 500m from the Proposed Scheme], this is corrected within the NIS later by naming the two European Sites above and acknowledging their presence in the ZOI.
Disturbance and displacement impacts: Potentially up to several hundred metres from the Proposed Scheme, dependent upon the predicted levels of noise, vibration and visual disturbance associated with the Proposed Scheme, taking into account the sensitivity of the qualifying interest species to disturbance effects (e.g., Otter may be 150m while wintering birds may be beyond 300m).	Yes, There is one European site within the potential zone of influence of disturbance effects associated with the Construction or Operation of the Proposed Scheme: South Dublin Bay and River Tolka Estuary SPA at Booterstown Marsh. There are also identified ex situ inland feeding sites both adjacent to the Proposed Scheme (Blackrock Park and Blackrock College) and further afield, which are utilised by SCI wintering bird species within the potential disturbance Zol of the Proposed Scheme: Malahide Estuary SPA, Baldoyle Bay SPA, Rogerstown Estuary SPA, North Bull Island SPA, South Dublin Bay and River Tolka SPA, Skerries Islands SPA, Ireland's Eye SPA, Lambay Island SPA, North-West Irish Sea cSPA, and The Murrough SPA. Otter is a QI for a single distal SAC, namely Wicklow Mountains SAC and for which there is potential for Construction and Operation impacts.

10.4. Screening Determination (recommendation)

10.4.1. Having regard to the information presented in the AA Screening Report, NIS, submissions, the nature, size and location of the Proposed Scheme and its likely direct, indirect and cumulative effects, the source - pathway - receptor principle and sensitivities of the ecological receptors, I broadly concur with the applicant's screening determination that there is potential for significant effects on the following European Sites: North Dublin Bay SAC, South Dublin Bay SAC, Howth Head SAC, Rockabill to Dalkey Island SAC, Lambay Island SAC, Wicklow Mountains SAC, Howth Head Coast SPA, North Bull Island SPA, South Dublin Bay and River Tolka

Estuary SPA, Baldoyle Bay SPA, Dalkey Islands SPA, Malahide Estuary SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA and, The Murrough SPA. Having regard to the North-West Irish Sea cSPA I note that this was not considered by the applicant as it had not been designated at the time of application, however, having regard to the nature of the relevant SCI species and nature of the Proposed Scheme I have also concluded that there is potential for impacts to arise on the cSPA, and I have therefore carried it through for further consideration in Stage II.

- 10.4.2. In consideration of the fact that both Baldoyle Bay SAC and Ireland's Eye SAC are listed in table 7 of the submitted NIS, (in relation to potential for habitat degradation as a result of hydrological impacts) but are not listed within the remainder of the NIS as European Sites that have the potential to be impacted, I wish to clarify as follows. I have considered these two sites, their QI's, the source pathway receptor principle, as well as the likely direct, indirect and cumulative effects of the Proposed Scheme and have concluded that the potential for significant effects arising on either of these sites does not arise, specifically due to the nature of the QI's of the sites, their separation distances from the Proposed Scheme, their locations (on the opposite side of Howth Head) and the lack of direct hydrological links. Furthermore, as a matter of clarity the Board should note, there are two references made (in paragraph 127 of the submitted NIS and paragraph 109 of the AASR) to "North Dublin Bay SPA" which is not a designated site, this appears to be a simple misnaming/ transcription error in those paragraphs where the reference should be to North Bull Island SPA which overlaps in area extensively with the North Dublin Bay SAC.
- 10.4.3. Given the hydrological connections and proximity of the proposed works to ex-situ feeding sites associated with the Qualifying Interests of the European sites listed above and the proximity of the Proposed Scheme to the South Dublin Bay and River Tolka Estuary SPA, and South Dublin Bay SAC as well as the potential relationship with all European sites within the zone of influence, and their conservation objectives, it is reasonable to conclude that there is a potential for impacts to arise (using a very conservative approach) in relation to habitat degradation, disturbance, displacement, habitat loss and fragmentation. As screening is considered a pre-assessment stage, further analysis is required to determine the significance of such impacts and to apply any mitigation measures to exclude adverse effects. Therefore,

North Dublin Bay SAC, South Dublin Bay SAC, Howth Head SAC, Howth Head Coast SPA, Rockabill to Dalkey Island SAC, Lambay Island SAC, Wicklow Mountains SAC, South Dublin Bay and River Tolka Estuary SPA, North Bull Island SPA, Dalkey Islands SPA, Malahide Estuary SPA, Baldoyle Bay SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA, North-West Irish Sea cSPA, and The Murrough SPA are brought forward for inclusion in the AA.

10.5. Appropriate Assessment (recommendation)

- 10.5.1. The following is an objective assessment of the implications of the proposal on the relevant conservation objectives of the European sites based on the scientific information provided by the applicant and taking into account expert opinion and submissions on nature conservation. It is based on an examination of all relevant documentation and submissions, analysis and evaluation of potential impacts, findings and conclusions. A final determination will be made by the Board.
- 10.5.2. All aspects of the project which could result in significant effects are assessed and mitigation measures designed to avoid or reduce any adverse effects on site integrity are examined and evaluated for effectiveness. I have relied on the following guidance:
 - DoEHLG (2009). Appropriate Assessment of Plans and Projects in Ireland: Guidance for Planning Authorities. Department of the Environment, Heritage and Local Government, National Parks and Wildlife Service, Dublin.
 - EC (2018) Managing Natura 2000 sites. The provisions of Article 6 of the Habitats Directive 92/43/EEC.
 - EC (2021) Assessment of plans and projects in relation to Natura 2000 sites. Methodological guidance on Article 6(3) and 6(4) of the Habitats Directive 92/43/EC.

10.5.3. Mitigation Measures

Prior to reviewing in detail the potential specific impacts that could arise on the various European sites, within the Stage II Appropriate Assessment, I have first summarised below the range of main mitigation measures being proposed within the

Proposed Scheme and referenced in tables 10-2 to 10-10 below of my assessment. Section 7.1.4 of the submitted NIS sets out the full suite and details of mitigation measures being incorporated/implemented during construction and operation phases to avoid or reduce potential impacts on European Sites which have been developed in consideration of a range of standard best international practices. The mitigation measures referenced are summarised below under the relevant headings referenced in the assessment tables (it should also be noted that the various mitigation measures are also set out in full in the submitted CEMP).

10.5.3.1. Measures to Protect Surface Water Quality during Construction:

- Specific measures to prevent the release of sediment over baseline conditions in the downstream receiving water environment, during the construction work. These measures include, but are not limited to, the use of silt fences, silt curtains, settlement lagoons and filter materials.
- Provision of exclusion zones and barriers (e.g., silt fences) between earthworks, stockpiles and temporary surfaces to prevent sediment washing into the existing drainage systems and hence the downstream receiving water environment.
- Provision of temporary construction surface drainage and sediment control measures to be in place before earthworks commence.
- Weather conditions will be taken into account when planning construction activities to minimise risk of run-off from the site.
- Prevailing weather and environmental conditions will be considered prior to the pouring of cementitious materials for the works adjacent to any surface water drainage features, or drainage features connected to same. Pumped concrete will be monitored to ensure no accidental discharge. Mixer washings and excess concrete will not be discharged to existing surface water drainage systems. Concrete washout areas will be located remote from any surface water drainage features, to avoid accidental discharge to watercourses. Concrete trucks will not be washed out on site.
- Any fuels or chemicals (including hydrocarbons or any polluting chemicals) will be stored in a designated, secure bunded area(s) within the construction

compound to prevent any seepage of potential pollutants into the local surface water network. These designated areas will be clearly sign-posted and all personnel on site will be made aware of their locations and associated risks.

- All mobile fuel bowsers shall carry a spill kit and operatives will have spill
 response training. All fuel containing equipment such as portable generators
 shall be placed on drip trays. All fuels and chemicals required to be stored onsite will be clearly marked. Care and attention will be taken during refuelling and
 maintenance operations.
- A register of all hazardous substances, which will either be used on site or expected to be present (in the form of soil and/or groundwater contamination) will be established and maintained.
- Response measures will be implemented to potential pollution incidents, an Environmental Incident Response Plan (EIRP) is included in Section 5.6 of the CEMP. Emergency procedures/precautions and spill kits will be available and all staff appropriately trained.
- All trucks carrying excavated materials will have tarpaulin covers and wheel wash facilities will be provided.
- Measures to be implemented by the appointed contractor to minimise the risk of spills and contamination of soils and waters include: appropriately trained workforce, liquids storage and cleaning carried out in designated areas isolated from surrounding areas within a secondary containment system, good housekeeping, storage facilities will be secure in line accordance with guidelines and best practice and will be fully bunded.
- Water supplies shall be recycled for use in the wheel wash and shall be drained through appropriate filter material prior to discharge.
- The removal of any made ground material, which may be contaminated, from the construction site and transportation to an appropriate licenced facility shall be carried out in accordance with the Waste Management Act, best practice and relevant guidelines.

- A discovery procedure for contaminated material will be prepared and adopted by the appointed contractor prior to excavation works commencing on site which will detail how potentially contaminated material will be dealt with during excavations.
- Implementation of measures to minimise waste and ensure correct handling, storage and disposal of waste.
- All of the above measures implemented on site will be monitored throughout the duration of construction to ensure that they are working effectively, to implement maintenance measures if required/applicable and to address any potential issues that may arise.
- For Booterstown Marsh, Nutley Stream and Dublin Bay, potential for impacts have been identified associated with the proposed construction compound and its proximity to Booterstown Marsh, accordingly additional measures have been included including the following:
 - The slit drain in the centre of the car park will be sealed for the duration of the construction programme;
 - The appointed contractor will ensure that appropriate spill control equipment is available (e.g., a suitably sized floating boom), to control any spillages to the watercourses should a spillage occur;
 - The existing gravel-like surface will be retained to reduce the likelihood of silty water runoff. Geotextile membranes will be installed in high-risk areas;
 - Existing grassed areas which provide a buffer to the pond outlet will be retained;
 - Silt fencing will be installed along the boundary to the pond outlet (as a defence against any overland runoff of silty water or spillages of chemicals or hydrocarbons);
 - Fuel and other materials storage will be located on the western boundary of the construction compound – nearest the road and as far as possible from the slit drain or pond outlet. There is an existing wall here which will prevent any spillages reaching surface water drains in the road. All fuel will be stored in accordance with the Surface Water Management Plan;
 - All potentially contaminating materials will be stored in covered areas;

- Wheel wash areas will be closed cycle. There will be no discharge of wheel wash water to surface water drains. Off-site disposal of contaminated and silty water and sludge will be required; and
- Wastewater from cabins will be contained.
- In relation to the movement of the existing boundary wall in land to the north of Booterstown Marsh the following measures to protect surface water quality are included (as well as those previously stated above):
 - If dewatering of the footings of the wall is required, water will be settled in a siltbuster tank (or similar) before being discharged as clean, uncontaminated surface water to local surface water systems;
 - Surface water drains will be clearly identified and marked as such;
 - Surface water drains in the road will be protected through the use of a silt curtain (or similar) to prevent silty water runoff from entering during construction. This will be placed as close to the works as is practicable and at the very least no further than alongside the footpath edge;
 - No refuelling will take place at this location refuelling of plant and machinery will be undertaken at the Construction Compound; and
 - The generic mitigation measures outlined in the SWMP for the management of vehicles and plant will be implemented by the appointed contractor.
- In relation to the upgrading works to the ramp at the Grand Canal tow path the following measures will be applicable to protect surface water quality (as well as those previously stated above):
 - For the retaining wall concrete foundations will be poured in dry weather only, silt fences will be used along the top of the bank, and any water collected behind the silt fences will be settled using a siltbuster tank (or similar) prior to discharge to foul drainage (with consent).
 - For the oil filled cable, ground investigation will be carried out to determine whether there is contamination present, if detected, excavated materials will be removed to a licenced facility by licenced contractor. Construction contractor will develop a construction method

statement detailing the measure taken to avoid the cable in advance of construction at this location.

10.5.3.2. Measures to Protect Surface Water and Groundwater Quality During Operation:

- The additional surface water from the net increase in impermeable area ultimately draining into either Ringsend WwTP or Dublin Bay from the proposed scheme (3,466m², into the various sections of the Brewery Stream_10 waterbody and 662m² into the Ringsend WwTP) will be managed through a range of Sustainable Drainage (SuDs) measures including filter drains, sealed drains, tree pits, oversized pipes, bio-retention/rain garden areas which have been designed in accordance with the Greater Dublin Strategic Drainage Study.
- Where no new paved areas are proposed the existing drainage network will be retained and utilised.
- The maintenance regime for the drainage systems will be carried out by the Local Authorities and subject to their management procedures.

10.5.3.3. <u>Measures to prevent the spread of non-Native Invasive Species to Downstream</u> <u>European Sites during Construction</u>:

 Pre-construction invasive species survey will be undertaken to confirm presence/absence of invasive species within footprint of the Proposed Scheme.
 Where invasives are identified the Non-Native Invasive Species Management Plan (ISMP - contained in the CEMP/Appendix III of NIS) will be implemented by appropriately qualified and trained personnel.

10.5.3.4. <u>Measures to prevent the Spread of non-Native Invasive Species to Downstream</u> <u>European Sites during Operation</u>:

 In the operational phase the Local Authorities will implement a maintenance and management regime subject to their management procedures, accordingly no additional mitigation is required.

10.5.3.5. <u>Measures to Reduce Impacts to SCI Birds due to Vegetation Loss during</u> <u>Construction</u>:

Where practicable, the removal of vegetation (e.g., hedgerows, trees, scrub, etc.) from Booterstown Marsh, Blackrock College, and Blackrock Park will be undertaken outside the breeding bird season and before the arrival of the wintering birds, (i.e., it will commence in September and be concluded before the start of October). Where seasonal restriction is not practicable the areas will be inspected by a suitably qualified ecologist for the presence of wintering birds prior to clearance. If wintering birds are present the ecologist will advise how the works will be appropriately undertaken.

10.5.3.6. Measures to Prevent Disturbance and Displacement Impacts During Construction:

- Due to the proximity of the Construction Compound to the coastal SPA as well as to known *ex situ* feeding sites at Blackrock College and Blackrock Park the following mitigation is proposed:
 - Construction compound will be established outside the wintering bird season (Oct – March). If the construction programme does not allow this seasonal restriction, then the area will be inspected by a suitably qualified ecologist who shall advise how works will be appropriately undertaken.
 - Construction compound perimeter hoarding will be in place prior to the arrival of wintering birds and will be retained on all sides of the compound for the duration of the works.
 - The lighting design will ensure that light-spill will not occur in the direction of Dublin Bay, and where night-time works are required, the contractor will liaise with the ecologist and implement measures to mitigate impacts.

10.5.3.7. Measures to Reduce Impacts to SCI Birds due to Vegetation Loss During Operation:

 Re-establishment of vegetation and planting will be carried out in the first appropriate season outside the wintering bird season following completion of the section of works. The appointed contractor will carry out annual post construction monitoring over a two-year period to ensure successful reestablishment of vegetation within the Proposed Scheme.

10.5.3.8. <u>Measures to Prevent Air Quality Impacts to QI/SCI Species Habitat during</u> <u>Construction</u>:

- CEMP includes full details of dust management measures and mitigation which is summarised below, the contractor will also monitor effectiveness of the measures and revise as necessary:
 - Public roads affected by the Proposed Scheme works will be regularly inspected for soiling associated with the construction activities and cleaned as necessary;
 - Material handling systems and stockpiling of materials will be designed and laid out to minimise exposure to wind. Water misting or sprays (or similar dust suppression methods) will be used as required if particularly dusty activities associated with the construction contract are necessary during dry or windy periods;
 - During movement of dust generating materials both on and off-site, trucks will be covered with tarpaulin, and before entrance onto public roads, trucks will be checked to ensure the tarpaulins are properly in place; and
 - The appointed contractor will provide a site hoarding of 2.4m height along sensitive boundaries, at a minimum, at the construction compound, which will assist in minimising the potential for dust impacts off-site.

10.5.3.9. Measures to prevent impacts arising on Otter:

- Confirmatory pre-construction check of all suitable otter habitat to be completed within 12 months prior to commencement of any works within the Zone of Influence of the Proposed Scheme. Should presence of new holt or couch sites be identified they will be treated and/or protected in accordance with the Guidelines for the Treatment of Otters prior to the Construction of National Road Schemes (NRA, 2006b).
- Where practicable open excavations will be covered when not in use and backfilled as soon as practicable. Excavations will also be covered at night, where practicable, and any deep excavations which must be left open will have appropriate egress ramps in place to allow mammals to safely exit should they fall in.

- Fencing requirements as per the Guidelines for the Treatment of Otters Prior to the Construction of National Road Schemes (NRA, 2006) will be erected around the construction compound and other working areas which are in close proximity to significant watercourses and have suitable roaming territory for otter.
- The lighting design at the construction compound or active works areas proximate to watercourses with known Otter activity will be designed in conjunction with an ecologist to minimise light spill. Where any new lighting is required at a watercourse crossing it should be cognisant of downward lightspill into the watercourse. In this regard accessories such as baffles, hoods, or louvres can be deployed.

10.5.3.10. <u>Measures to minimise Noise Impacts</u>:

The CEMP submitted as Appendix III of the NIS contains a range of mitigation measures aimed at controlling the levels of construction noise arising from the Proposed Scheme in order to reduce impacts on sensitive receptors (Table 5.2 of the CEMP refers), these include:

- Contractor will be required to manage works to comply with the construction noise thresholds set out in Section 9.2.4.1 of the EIAR which sets out daytime, evening night time and weekend noise thresholds for properties and commercial buildings in the vicinity.
- The best means practicable, including proper maintenance of plant and equipment, will be employed to minimise the noise produced by on site operations.
- The appointed contractor will put in place the most appropriate noise control measures depending on the level of noise reduction required at individual working areas. The least noisy item of plant or equipment will be selected wherever practicable. Placement of construction compound buildings and stores will consider noise sensitive boundaries.
- In the construction compound mufflers and acoustic canopies will be used on mobile plant and/or enclosure panels will be maintained closed during operations. Noisy plant/equipment will be sited away from noise sensitive

receptors, compressors, generators and pumps will be surrounded by acoustic lagging or provided within acoustic enclosures.

 Localised demountable enclosures or screens will be used around breakers or drill bits and hoarding deployed along noise sensitive boundaries.

10.6. Relevant European sites:

- 10.6.1. In the absence of mitigation or further detailed analysis, the potential for significant effects could not be excluded for:
 - North Dublin Bay SAC,
 - South Dublin Bay SAC,
 - Howth Head SAC,
 - Rockabill to Dalkey Island SAC,
 - Lambay Island SAC,
 - Wicklow Mountains SAC,
 - Howth Head Coast SPA,
 - North Bull Island SPA,
 - South Dublin Bay and River Tolka Estuary SPA,
 - Baldoyle Bay SPA,
 - Dalkey Islands SPA,
 - Malahide Estuary SPA,
 - Rogerstown Estuary SPA,
 - Skerries Islands SPA,
 - Rockabill SPA,
 - Ireland's Eye SPA,
 - Lambay Island SPA
 - North West Irish Sea cSPA, and
 - The Murrough SPA.
- 10.6.2. A description of the sites and their Conservation Objectives and Qualifying Interests/Special Conservation Interests, including relevant attributes and targets for

these sites, are set out in the NIS Section 7 - *"Assessment of Potential Effects on European Sites"*, and are set out in tables 10-2 to 10-10 below.

10.6.3. Consideration of Individual Relevant European Sites

- 10.6.4. I have examined the Conservation Objectives Supporting Documents for the relevant European Sites listed above, available through the NPWS website (<u>www.npws.ie</u>).
- 10.6.5. Tables 10.2 10.10 below summarise the information considered for the Appropriate Assessment and site integrity test. I have taken this information from that provided by the applicant within the NIS and I have expand on certain issues further in my report.

10.6.5.1. North Dublin Bay SAC [000206]

Table10.2 below sets out the Qualifying Interests (QIs), Conservation Objectives (summary of targets and attributes) and potential adverse effects that could arise on the European Site from the Proposed Scheme, the relevant measures being incorporated to mitigate and avoid effects are also listed and an overall conclusion presented in relation to the integrity of the North Dublin Bay SAC in the context of the Proposed Scheme.

North Dublin Bay SAC [000206]				
Detailed Conservation Objectives available: ConservationObjectives.rdl (npws.ie)				
	Summary of Appropriate Assessment			
Qualifying	Conservation Objectives	Potential adverse	Mitigation	
Interests (QI)	Targets and attributes (summary- inserted)	effects	measures	
1140 Mudflats and sandflats not covered by seawater at low tide	To maintain the favourable conservation condition in relation to habitat, community -extent/structure/distribution including extent and quality of the Mytilus edulis (common Mussel) dominated community, and conservation of the following community types in a natural condition: Fine sand to sandy mud with Pygospio elegans and Crangon crangon community complex; Fine sand with Spio	The Proposed Scheme is hydrologically connected to Dublin Bay. An accidental pollution event during construction or operation could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either alone	Detailed pollution control Measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.	

Table 10.2: AA summary matrix for North Dublin Bay SAC

North Dublin Bay SAC [000206]

Detailed Conservation Objectives available: <u>ConservationObjectives.rdl (npws.ie)</u>

	Summary of Approp	riate Assessment		
Qualifying Interests (QI)	Conservation Objectives Targets and attributes (summary- inserted)	Potential adverse effects	Mitigation measures	
	martinensis community complex.	or cumulatively with other pollution sources, could affect the quality of the intertidal habitats and the fauna communities they support. The introduction and/or spread of invasive species to downstream European sites could potentially result in the degradation of existing habitats present, in particular coastal habitats not permanently or regularly inundated by seawater. These species may outcompete other native species present, negatively impacting the species composition, diversity and abundance and the physical structural integrity of the habitat	other pollution sources, could affect the quality of the intertidal habitats and the fauna communities theymeasures de in Section 7.2 the NIS (para 200) to preve introduction a	See the mitigation measures described in Section 7.1.4 of the NIS (para's 195 – 200) to prevent the introduction and/or spread of invasive
1210 Annual vegetation of drift lines	Restore the favourable conservation condition in relation to habitat - extent/distribution/structure as well as the vegetation zonation and composition. Maintain presence of sea rocket (Cakile maritima), sea sandwort (Honckenya peploides), prickly saltwort (Salsola kali) and oraches (Atriplex spp.), while maintaining negative indicator species to represent <5%.		species summarised in this report in Section 10.5.3.3 and 10.5.3.4 above.	
1310 Salicornia and other annuals colonising mud and sand.	Restore the favourable conservation condition in relation to habitat - extent/distribution/structure, vegetation – structure /zonation/composition and no significant expansion of common cordgrass.			
1330 Atlantic salt meadows (Glauco- Puccinellietalia maritimae) 1410 Mediterranean salt meadows (Juncetalia maritimi)	To maintain the favourable conservation condition in relation to habitat, extent/structure, vegetation structure – zonation/height/cover /composition and no significant expansion of common cordgrass			
2110 Embryonic shifting dunes 2120 Shifting dunes along the shoreline with Ammophila arenaria ('white dunes')	To restore the favourable conservation condition in relation to habitat – extent/distribution/physical structure/vegetation structure and composition.	Terrestrial habitats above the high tide line are not at risk of effects from water pollution in Dublin Bay		

North Dublin Bay SAC [000206]

Detailed Conservation Objectives available: <u>ConservationObjectives.rdl (npws.ie)</u>

	Summary of Approp	riate Assessment	
Qualifying Interests (QI)	Conservation Objectives Targets and attributes (summary- inserted)	Potential adverse effects	Mitigation measures
2130 Fixed coastal dunes with herbaceous vegetation ('grey dunes') 2190 Humid dune slacks 1395 Petalophyllum ralfsii (Petalwort)	To maintain the favourable conservation condition in relation to distribution/ population size/ habitat / hydrological conditions/ vegetation structure.	The introduction and/or spread of invasive species to downstream European sites could potentially result in the degradation of existing habitats present, in particular coastal habitats not permanently or regularly inundated by seawater. These species may outcompete other native species present, negatively impacting the species composition, diversity and abundance and the physical structural integrity of the habitat	See the mitigation measures described in Section 7.1.4 of the NIS (para's 195 – 200) to prevent the introduction and/or spread of invasive species summarised in this report in Section 10.5.3.3 and 10.5.3.4 above.

Overall conclusion: Integrity test

The applicant determined that following the implementation of mitigation, the construction and operation of this Proposed Scheme alone or in combination with other plans and projects will not adversely affect the integrity of this European site.

The Proposed Scheme is hydrologically connected to Dublin Bay via the Dodder_50, Brewery Stream_10, Grand Canal, Booterstown Marsh and Nutley Stream as well as a network of interconnecting existing surface or combined sewer/surface pipes. Therefore, there is potential for impacts on North Dublin Bay SAC due to this hydrological (and downstream) connection. Based on the information provided and my review, I am satisfied that adverse effects can be excluded for North Dublin Bay SAC. No wetland habitat loss will occur. Adverse effects from water contamination and sediment release can be effectively prevented by mitigation measures ensuring the protection of the relevant watercourses and pipe networks which drain into Dublin Bay. There will be no net increase in the existing runoff rates through the use of appropriate SuDs and appropriate treatment will ensure runoff quality.

The spread of invasive species is to be controlled via mitigation measures, pre confirmatory surveys will be carried out in order to avoid or adequately treat or remove invasive plants prior to construction being carried out in accordance with the Invasive Species Management Plan appended to the NIS within the CEMP.

Based on the information submitted, surveys carried out analysis provided I am satisfied that no uncertainty remains.

North Dublin Bay SAC [000206]				
Detailed Conservation Objectives available: ConservationObjectives.rdl (npws.ie)				
	Summary of Appropriate Assessment			
Qualifying Interests (QI)	Conservation Objectives Targets and attributes (summary- inserted)	Potential adverse effects	Mitigation measures	
The Proposed Scheme would not delay or prevent the attainment of the Conservation objectives of the North Dublin Bay SAC and adverse effects on site integrity can be excluded.				

10.6.5.2. South Dublin Bay SAC [000210]

Table 10.3 below sets out the Qualifying Interests, Conservation Objectives (summary of targets and attributes) and potential adverse effects that could arise on the European Site from the Proposed Scheme, the relevant measures being incorporated to mitigate and avoid effects are also listed and an overall conclusion presented in relation to the integrity of the South Dublin Bay SAC in the context of the Proposed Scheme.

South Dublin Bay SA	South Dublin Bay SAC [000210]			
Detailed Conservatio	Detailed Conservation Objectives available: <u>ConservationObjectives.rdl (npws.ie)</u>			
	Summary of Approp	oriate Assessment		
Qualifying Interests (QI)	Conservation Objectives Targets and attributes (summary - inserted)	Potential adverse effects	Mitigation measures	
[1140] Mudflats and sandflats not covered by seawater at low tide.	Maintain favourable conservation condition in relation to habitat area, community extent/vegetation structure/distribution including Zostera dominated community and fine sands with Angulus tenuis.	An accidental pollution event during construction or operation could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either alone or cumulatively with other pollution sources, could affect the quality of the intertidal habitats and the fauna communities they support. Habitat Loss/Fragmentation	Detailed pollution control Measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report. Overlap works area does not	

Table 10.3: AA summary matrix for South Dublin Bay SAC

South Dublin Bay SAC [000210]

Detailed Conservation Objectives available: <u>ConservationObjectives.rdl (npws.ie)</u>

Summary of Appropriate Assessment			
Qualifying Interests (QI)	Conservation Objectives Targets and attributes (summary - inserted)	Potential adverse effects	Mitigation measures
[1210] Annual vegetation of drift lines [1310] Salicornia and other annuals colonising mud and sand [2110] Embryonic shifting dunes	Restore the favourable conservation condition in relation to habitat – extent /distribution, physical and vegetation structure as well as the vegetation zonation and composition. Restore the favourable conservation condition in relation to habitat - extent/ distribution/ physical structure, vegetation structure and zonation/composition Restore favourable conservation condition in relation to habitat area, distribution, physical structure, vegetation structure and composition	arising from overlap of works and SAC area for 2.7m ² . The introduction and/or spread of invasive species could potentially result in the degradation of existing habitats present, in particular coastal habitats not permanently or regularly inundated by seawater. These species may outcompete other native species present, negatively impacting the species composition, diversity and abundance and the physical structural integrity of the habitat. A reduction in air quality within the immediate vicinity of the construction works may occur as a consequence of dust deposition associated with these construction activities.	affect any QI habitat. See the mitigation measures described in Section 7.1.4 of the NIS (para's 195 – 200) to prevent the introduction and/or spread of invasive species summarised in this report in Section 10.5.3.3 and 10.5.3.4 above. See the mitigation measures described in Section 7.1.4 of the NIS (para's 208 – 209) to prevent air quality impacts as summarised in Section 10.5.3.8 of this report above.

Overall Conclusion: Integrity test

The applicant determined that following the implementation of mitigation, the construction and operation of this proposed scheme alone or in combination with other plans and projects will not adversely affect the integrity of this European site.

The Proposed Scheme is hydrologically connected to Dublin Bay via the Dodder_50, Brewery Stream_10, Grand Canal, Booterstown Marsh and Nutley Stream as well as a network of interconnecting existing surface or combined sewer/surface pipes. Therefore, there is potential for impacts on South Dublin Bay SAC due to this hydrological (and downstream) connection, furthermore the Proposed Scheme is located proximate to this SAC and accordingly there is the potential for air

South Dublin Bay SA	C [000210]			
Detailed Conservation Objectives available: <u>ConservationObjectives.rdl (npws.ie)</u>				
	Summary of Appropriate Assessment			
Qualifying Interests	Conservation	Potential adverse	Mitigation	
(QI)	Objectives	effects	measures	
	Targets and attributes			
	(summary - inserted)			

quality impacts to arise during construction. I note the overlap between the Proposed Scheme and the SAC in that 2.7m² of existing hardstanding is to be replaced/upgraded by similar materials, this is not an existing sensitive habitat nor is it a QI habitat of the SAC, I consider that these works will not give rise to adverse effect on the integrity of the SAC.

Based on the information provided and my review, I am satisfied that adverse effects can be excluded for South Dublin Bay SAC. No wetland habitat loss will occur. Adverse effects from water contamination and sediment release can be effectively prevented by mitigation measures ensuring the protection of the relevant watercourses and pipe networks which drain into Dublin Bay. There will be no net increase in the existing runoff rates through the use of appropriate SuDs systems and appropriate treatment will ensure runoff quality. Air Quality can also be assured throughout construction through the implementation of the stated mitigation measures.

Based on the information submitted, surveys carried out analysis provided I am satisfied that no uncertainty remains.

The Proposed Scheme would not delay or prevent the attainment of the Conservation objectives of the South Dublin Bay SAC and adverse effects on site integrity can be excluded.

10.6.5.3. Howth Head SAC [000202]

Table 10.4 below sets out the Qualifying Interests, Conservation Objectives (summary of targets and attributes) and potential adverse effects that could arise on Howth Head SAC [000202] from the Proposed Scheme, the relevant measures being incorporated to mitigate and avoid effects are also listed and an overall conclusion presented in relation to the integrity of the SAC in the context of the Proposed Scheme.

Table 10.4: AA summary matrix for Howth Head SAC

Howth Head SAC [000202]			
Detailed Conservation Objectives available: ConservationObjectives.rdl (npws.ie)			
	Summary of Appropriate	Assessment	
Qualifying Interests	Conservation Objectives	Potential adverse	Mitigation
(QI)	Targets and attributes	effects	measures
	(summary- inserted)		
[1230] Vegetated sea cliffs of the Atlantic and Baltic coasts	Maintain favourable conservation condition in relation to habitat: length/distribution/structure and hydrological regime, vegetation structure: zonation/height/composition/, transitional zones, natural processes etc, – negative indicator species to be below 5%, bracken < 10% and woody species <etc.< th=""><th>An accidental pollution event during construction or operation could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either along or cumulatively with other pollution sources, could potentially affect the quality (vegetation structure and composition) and area/distribution of intertidal/coastal habitats.</th><th>Detailed pollution control Measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 - 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.</th></etc.<>	An accidental pollution event during construction or operation could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either along or cumulatively with other pollution sources, could potentially affect the quality (vegetation structure and composition) and area/distribution of intertidal/coastal habitats.	Detailed pollution control Measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 - 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.
[4030] European dry heaths Overall conclusion: Inf	Maintain favourable conservation condition in relation to habitat length/distribution/Ecosystem – maintain soil nutrient status/community diversity/vegetation composition-number of positive indicator species at monitoring stop at least 2. Vegetation percentage cover per species in line with that outlined in Objective.	Terrestrial habitats above the high tide line are not at risk of effects from water pollution in Dublin Bay	N/A

The applicant determined that following the implementation of mitigation, the construction and operation of this Proposed Scheme alone or in combination with other plans and projects will not adversely affect the integrity of this European site.

The Proposed Scheme is hydrologically connected to Dublin Bay via the Dodder_50, Brewery Stream_10, Grand Canal, Booterstown Marsh and Nutley Stream as well as a network of interconnecting existing surface or combined sewer/surface pipes. Therefore, there is potential for impacts on Howth Head SAC due to this common hydrological connection. Based on the information provided and my review I am satisfied that adverse effects can be excluded for Howth Head SAC. No habitat loss will occur. Adverse effects from water contamination and sediment release can be effectively prevented by mitigation measures ensuring the protection of the relevant watercourses

Howth Head SAC [000202]					
Detailed Conservation Objectives available: ConservationObjectives.rdl (npws.ie)					
	Summary of Appropriate	Assessment			
Qualifying Interests	Conservation Objectives	Potential adverse	Mitigation		
(QI)	Targets and attributes	effects	measures		
	(summary- inserted)				
and pipe networks which	h drain into Dublin Bay. There w	ill be no net increase ir	n existing runoff rates		
and appropriate treatme	and appropriate treatment will ensure runoff quality.				
Based on the information submitted, and my review I am satisfied that no uncertainty remains.					
The Proposed Scheme would not delay or prevent the attainment of the Conservation objectives of the Howth Head SAC and adverse effects on site integrity can be excluded.					

10.6.5.4. Rockabill to Dalkey Island SAC [000300]

Table 10.5 below sets out the Qualifying Interests, Conservation Objectives (summary of targets and attributes) and potential adverse effects that could arise on Rockabill to Dalkey Island SAC [000202] from the Proposed Scheme, the relevant measures being incorporated to mitigate and avoid effects are also listed and an overall conclusion presented in relation to the integrity of the SAC in the context of the Proposed Scheme.

Rockabill to Dalkey Island SAC [003000] Detailed Conservation Objectives available: ConservationObjectives.rdl (npws.ie) Summary of Appropriate Assessment				
Qualifying Interests (QI)	Conservation Objectives Targets and attributes (summary- inserted)	Potential adverse effects	Mitigation measures	
[1170] Reefs	Maintain favourable conservation condition in relation to habitat area, distribution and community structure.	An accidental pollution event during construction or operation could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either along or cumulatively with other pollution sources, could potentially affect the quality (vegetation structure and composition) and area/distribution of intertidal/coastal habitats	Detailed pollution control Measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.	

Table 10.5: AA summary matrix for Rockabill to Dalkey Island SAC

species.

Overall conclusion: Integrity test

The applicant determined that following the implementation of mitigation measures the construction and operation of this Proposed Scheme alone or in combination with other plans and projects will not adversely affect the integrity of this European site.

The Proposed Scheme is hydrologically connected to Dublin Bay via the Dodder_50, Brewery Stream_10, Grand Canal, Booterstown Marsh and Nutley Stream as well as a network of interconnecting existing surface or combined sewer/surface pipes. Therefore, there is potential for impacts on Rockabill to Dalkey Island SAC due to this common hydrological connection.

Based on the information provided and my review I am satisfied that adverse effects can be excluded for the Rockabill to Dalkey Island SAC.

No habitat loss will occur. Adverse effects from water contamination and sediment release can be effectively prevented by mitigation measures ensuring the protection of the relevant watercourses and pipe networks which drain into Dublin Bay. There will be no net increase in existing runoff rates and appropriate treatment will ensure runoff quality.

Based on the information submitted, surveys carried out analysis provided I am satisfied that no uncertainty remains.

The Proposed Scheme would not delay or prevent the attainment of the Conservation objectives of the Rockabill to Dalkey Island SAC and adverse effects on site integrity can be excluded.

10.6.5.5. Lambay Island SAC [000204]

Table 10.6 below sets out the Qualifying Interests, Conservation Objectives (summary of targets and attributes) and potential adverse effects that could arise on Lambay Island SAC [000204] from the Proposed Scheme, the relevant measures being incorporated to mitigate and avoid effects are also listed and an overall conclusion presented in relation to the integrity of the SAC in the context of the Proposed Scheme.

Lambay Island SAC [000204] Detailed Conservation Objectives available: <u>ConservationObjectives.rdl (npws.ie)</u>					
	Summary of Appropriate Assessment				
Qualifying Interest feature	Conservation Objectives Targets and attributes (summary- inserted)	Potential adverse effects	Mitigation measures		
[1170] Reefs	Maintain favourable conservation condition in	No. There is no pathway for	N/A		

Table 10.6 AA Summary matrix for Lambay Island

Lambay Island SAC [000204]					
Detailed Conservation	Detailed Conservation Objectives available: <u>ConservationObjectives.rdl (npws.ie)</u> Summary of Appropriate Assessment				
Qualifying Interest feature		Potential adverse effects	Mitigation measures		
	relation to habitat area/distribution/community structure; intertidal reef community complex and Laminaria-dominated community complex in natural condition.	impacts to occur on any habitats associated with this SAC as it is located a significant distance from the Proposed Scheme on the far side of the Howth peninsula.			
[1230] Vegetated sea cliffs of the Atlantic and Baltic coast	Maintain favourable conservation condition in relation to habitat length; no decline in habitat distribution; no alteration to natural functioning of geomorphological and hydrological processes; maintain range of sea cliff habitat zonations; maintain structural variation within sward; maintain range of Irish Sea Cliff Survey species; negative indicator species less than 5%; and cover of bracken and woody species on grassland/heath less than 10% and 20% respectively	No. There is no pathway for impacts to occur on any habitats associated with this SAC as it is located a significant distance from the Proposed Scheme on the far side of the Howth peninsula.	N/A		
[1364] Halichoerus grypus (Grey Seal)	Maintain the favourable conservation condition of this species, range should not be restricted by artificial barriers to site use; breeding, moult and resting haul-out sites maintained in natural condition; and human activities should occur at levels that do not adversely affect the species at the site.	A pollution event during construction or operation could potentially affect downstream waters and the quality of the intertidal /marine habitats which support grey seal and harbour seal.	Detailed pollution control Measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.		

Lambay Island SAC [000204] Detailed Conservation Objectives available: <u>ConservationObjectives.rdl (npws.ie</u>)				
Detailed Conservation C			<u>ows.iej</u>	
Qualifying Interest	Summary of Appropriate Assessment Conservation Objectives Potential adverse Mitigation			
feature	Targets and attributes	effects	measures	
	(summary- inserted)			
[1365] Phoca vitulina (Harbour Seal)	Maintain the favourable conservation of this species, range should not be restricted by artificial barriers to site use; breeding, moult, resting and haul-out sites maintained in natural condition; and human activities should occur at levels that do not adversely affect the species at the site.			

Overall conclusion: Integrity test

The applicant determined that following the implementation of mitigation measures the construction and operation of this Proposed Scheme alone or in combination with other plans and projects will not adversely affect the integrity of this European site.

Based on the information provided and my review, I am satisfied that adverse effects can be excluded for Lambay Island SAC. No habitat loss will occur. Adverse effects from water contamination and sediment release can be effectively prevented by mitigation measures ensuring the protection of the hydrological links (watercourses, drains and pipework) to Dublin Bay. No increase in existing runoff rates will occur and appropriate treatment will ensure runoff quality.

Based on the information submitted, surveys carried out analysis provided I am satisfied that no uncertainty remains.

The Proposed Scheme would not delay or prevent the attainment of the Conservation objectives of the Lambay Island SAC and adverse effects on site integrity can be excluded.

10.6.5.6. Wicklow Mountain SAC [002122]

Table 10.7 below sets out the Qualifying Interests, Conservation Objectives (summary of targets and attributes) and potential adverse effects that could arise on Wicklow Mountains SAC [000204] from the Proposed Scheme, the relevant measures being incorporated to mitigate and avoid effects are also listed and an overall conclusion presented in relation to the integrity of the SAC in the context of the Proposed Scheme.

Table 10.7: AA summary matrix for Wicklow Mountains SAC

Wicklow Mountains SAC [000199]				
Detailed Conservation Objectives available: <u>ConservationObjectives.rdl (npws.ie)</u>				
Qualifying Interest feature	Conservation Objectives Targets and attributes (summary- inserted)	Appropriate Assessment Potential adverse effects	Mitigation measures	
[1355] Lutra lutra (Otter)	To maintain the favourable conservation condition of this species, in terms of distribution, extent of habitat, and no significant increase of barriers to connectivity.	Yes. Due to the hydrological distance to the Proposed Scheme from the SAC being within the range of male otters from QI population of the SAC there is the potential for impacts to arise. An accidental pollution event during construction or operation could affect surface water downstream. Such an event of a sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the otter population through direct contact with pollutants, or a decline in fish prey.	Detailed pollution control Measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.	
		Construction disturbance in the vicinity of the River Dodder and Grand Canal could result in disturbance to and potentially displacement of otter, particularly if works are undertaken at night-time.	Measures described in Section 7.12.4 (para's 448 to 452 of NIS) and summarised at 10.5.3.9 above of this report will address disturbance/ displacement impacts.	
[3110] Oligotrophic waters containing very few minerals of sandy plains	Maintain the favourable conservation condition of Oligtrophic waters [3110], Natural dystrophic lakes and ponds [3160], Calaminarian grasslands, across a range of criteria including habitat areas, distribution, and vegetation composition. To restore the favourable	Maintain the avourableNo.avourable conservationAs the SAC is located upstream of the ProposedCondition of Dligtrophic waters 3110], Natural dystrophic lakes and ponds [3160], Calaminarian grasslands, across a range of criteria ncluding habitatNo.Maintain the avourableAs the SAC is located upstream of the Proposed Scheme and at a hydrological distance of in excess of 11km there is no potential for a pollution event of any magnitude to affect any QI habitats or associated plant species for which	N/A	
[3160] Natural dystrophic lakes and ponds				
[4010] Northern Atlantic wet heaths with Erica tetralix				
[4030] European dry heaths				
[4060] Alpine and Boreal heaths				

Wicklow Mountains SAC [000199]				
Detailed Conservation Objectives available: ConservationObjectives.rdl (npws.ie)				
Qualifying Interest feature	Summary of Conservation Objectives Targets and attributes (summary- inserted)	Appropriate Assessment Potential adverse effects	Mitigation measures	
[6130] Calaminarian grasslands of the Violetalia calaminariae	conservation condition of Northern Atlantic Wet heaths [4010], European Dry heaths [4030],			
[6230] Species-rich Nardus grasslands, on siliceous substrates in mountain areas (and submountain areas, in Continental Europe)	Alpine and Boreal heaths [4060], species rich Nardus grasslands [6230], blanket Bogs [7130], siliceaous scree of the montane [8110], Calcareous rocky			
[7130] Blanket bogs (* if active bog)	slopes [8210], Sliceous rocky slopes [8220], Old Sessile Oak Woods			
[8110] Siliceous scree of the montane to snow levels (Androsacetalia alpinae and Galeopsietalia ladani)	[91A0], across a range of criteria including habitat areas, distribution, vegetation structure and composition.			
[8210] Calcareous rocky slopes with chasmophytic vegetation				
[8220] Siliceous rocky slopes with chasmophytic vegetation				
[91A0] Old sessile oak woods with Ilex and Blechnum in the British Isles				
Overall conclusion: Integrity test				
The applicant determined that following the implementation of mitigation measures the construction				

The applicant determined that following the implementation of mitigation measures the construction and operation of this Proposed Scheme alone or in combination with other plans and projects will not adversely affect the integrity of this European site.

Wicklow Mountains SAC [000199]						
Detailed Conservati		ole: ConservationObjectives.re	<u>dl (npws.ie)</u>			
	Summary of	Appropriate Assessment				
Qualifying Interest	Conservation	Potential adverse effects	Mitigation measures			
feature	Objectives					
	Targets and					
	attributes					
	(summary-					
inserted)						
Based on the information provided and my review, I am satisfied that adverse effects can be excluded						
for the Wicklow Mountains SAC. No habitat loss will occur, and there is no potential for effects to arise						
on the designated habitats of the SAC from the Proposed Scheme. While the potential for any adverse						
effects on Otter is low considering the separation distances between the SAC and ranges involved						
the link is there and this gives rise to the potential for effects. Adverse effects from water contamination						
and sediment release can be effectively prevented by mitigation measures ensuring the protection of						
the receiving waters. No increase in existing runoff rates will occur and appropriate treatment will						
ensure runoff quality. Specific mitigation measures have also been incorporated in order to ensure						
the protection of otters.						

Based on the information provided, I am satisfied that adverse effects can be excluded for the Wicklow Mountains SAC site in view of conservation objectives of the site.

The Proposed Scheme would not delay or prevent the attainment of the Conservation objectives of the Wicklow Mountains SAC and adverse effects on site integrity can be excluded.

10.6.5.7. South Dublin Bay and River Tolka Estuary SPA [004024]

Table 10.8 below sets out the Special Conservation Interests, Conservation Objectives (summary of targets and attributes) and potential adverse effects that could arise on South Dublin Bay and River Tolka Estuary SPA from the Proposed Scheme, the relevant measures being incorporated to mitigate and avoid effects are also listed and an overall conclusion presented in relation to the integrity of the SPA in the context of the Proposed Scheme.

Table 10.8: AA summary matrix for South Dublin Bay and River Tolka Estuary SPA [004024]

South Dublin Bay and River Tolka Estuary SPA [004024]

Detailed Conservation Objectives available: <u>ConservationObjectives.rdl (npws.ie)</u>

Special Conservation Interests (SCI)

[A046] Light-bellied Brent Goose (Branta bernicla hrota), [A130] Oystercatcher (Haematopus ostralegus), [A137] Ringed Plover (Charadrius hiaticula), [A141] Grey Plover* (Pluvialis squatarola - is proposed for removal from the list of SCI's for the site so no site specific conservation objective is included for the species), [A143] Knot (Calidris canutus), [A144] Sanderling (Calidris alba), [A149] Dunlin (Calidris alpina), [A157] Bar-tailed Godwit (Limosa lapponica), [A162] Redshank (Tringa totanus), [A179] Black-headed Gull (Chroicocephalus ridibundus).

Summary of Appropriate Assessment

Conservation Objectives Targets and attributes (summary)	Potential adverse effects	Mitigation measures
Maintain favourable conservation condition of the species in the SPA in terms of population trend (stable or increasing) and distribution (no significant decrease in the range, timing of intensity of use other than that occurring from natural patterns of variation)	Overlap of works and SPA area for 4.3m ² at Booterstown Marsh. An accidental pollution event during construction or operation could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either along or cumulatively with other pollution sources, could potentially affect the quality of intertidal/coastal habitats.	Overlap works area does not affect SCI habitat or species (refers to existing hard- standing area). Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.
	The introduction and/or spread of non-native invasive species to downstream European sites could potentially result in the degradation of existing habitats present, in particular coastal habitats not permanently or regularly inundated by seawater. This in turn could affect the use of habitat areas by birds and have long-term effects on the SPA populations.	See the mitigation measures described in Section 7.1.4 of the NIS (para's 195 – 200) to prevent the introduction and/or spread of invasive species summarised in this report in Section 10.5.3.3 and 10.5.3.4 above.
	The potential for habitat loss/fragmentation could result in the loss of feeding habitat for SCI birds both within the SPA and in inland feeding sites. The removal of non-SCI screening vegetation e.g. screening woodland/scrub vegetation could result in increases to visual and noise disturbance. This could potentially affect the use of habitat areas by birds leading to displacement of feeding birds and/or abandonment of feeding sites and have long-term effects on the SPA populations.	The mitigation measures presented in Section 7.1.4 (incl. para.'s 203 to 207) of the NIS and summarised in Sections 10.5.3.5, 10.5.3.6, 10.5.3.7 of this report in relation to disturbance and displacement and impacts to SCI birds due to vegetation loss. Noise mitigation measures included in table 5.2 of the CEMP (Appendix III of NIS) and summarised above in Section 10.5.3.10 of this Report above also refers.
	Habitat Loss/Fragmentation arising from temporary loss of 0.07ha and permanent loss of 0.03Ha of GA2 habitat at Blackrock Park.	Proposed Scheme will return habitat to GA2 status for lands temporarily needed for construction on completion of the relevant stage of the works.
Special Conservation Intere	ests (SCI)	
Roseate Tern (Sterna dougal paradisaea) [A194]	lii) [A192], Common Tern (sterna hirun	do) [A193], Artic Tern (Sterna
		Mitiantian measures
Conservation Objectives	Potential adverse effects	Mitigation measures
Targets and attributes		
(summary)		

Maintain the favourable conservation condition of the species in the SPA in terms of no significant decline in passage population, distribution of roosting areas, prey biomass available, no significant increase in barriers to connectivity and human activities should not occur at levels that would cause adverse affects. As well as targeting no	An accidental pollution event during construction or operation could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either along or cumulatively with other pollution sources, could potentially affect the quality and quantity of fish prey as well as the quality of and suitability of roosting sites within this SPA. This could potentially affect the use of habitat areas by SCI species.	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.
significant decline in roosting areas, breeding colonies, productivity rate, and breeding population abundance in relation to the Common Tern.	The introduction and/or spread of non-native invasive species to downstream European sites could potentially result in the degradation of existing habitats present, in particular coastal habitats not permanently or regularly inundated by seawater. This in turn could affect the use of habitat areas by birds and have long-term effects on the SPA populations.	See the mitigation measures described in Section 7.1.4 of the NIS (para's 195 – 200) to prevent the introduction and/or spread of invasive species summarised in this report in Section 10.5.3.3 and 10.5.3.4 above.

Special Conservation Interests (SCI)

[A999] Wetland and Water Birds

Conservation Objectives Targets and attributes (summary)	Potential adverse effects	Mitigation measures
Maintain the favourable conservation condition of the wetland habitat in the SPA as a resource for the regularly occurring migratory water birds that use it. In terms of its extent not falling significantly below the estimated/established/map ped area of 2,192ha other than natural patterns of	An accidental pollution event during construction or operation could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either along or cumulatively with other pollution sources, could potentially affect the quality (vegetation structure and composition) and area/distribution of intertidal/coastal habitats.	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.
variation.	The introduction and/or spread of non-native invasive species to downstream European sites could potentially result in the degradation of existing habitats present, in particular coastal habitats not permanently or regularly inundated by seawater. This in turn could affect the use of habitat areas by birds and have long-term effects on the SPA populations.	See the mitigation measures described in Section 7.1.4 of the NIS (para's 195 – 200) to prevent the introduction and/or spread of invasive species summarised in this report in Section 10.5.3.3 and 10.5.3.4 above.

A reduction in air quality within the	See the mitigation measures
vicinity of the proposed construction works, could potentially arise from	described in Section 7.1.4 of the NIS (para's 208 – 209) to
dust deposition associated with	prevent Äir Quality Impacts to
construction activities.	QI/SCI Species habitat
	summarised in this report in
	Section 10.5.3.8 above

Overall conclusion: Integrity test

The applicant determined that following the implementation of mitigation measures the construction and operation of this Proposed Scheme alone or in combination with other plans and projects will not adversely affect the integrity of this European site.

The Proposed Scheme is located in proximity to, and overlaps (for 4.3m²) with, this SPA. This overlap is at a location which is already a hardstanding surface where the habitat does not correspond to QI habitat or habitat on which SCI species rely for foraging, resting/roosting and/or commuting, furthermore the Proposed Scheme will be replacing this non-sensitive habitat with new road surface (i.e. similar to that in place) thus neither affecting sensitive habitats, the extent, nature nor integrity of the SPA in this regard.

The ex-situ feeding areas of SCI species from the listed SPAs could be impacted by loss of GA2 habitat in Blackrock Park, disturbances arising from construction dust, construction noise, loss of screening planting and/or potential pollution events from materials entering watercourses and drains hydrologically linked to downstream (and proximate) suitable sites. I am satisfied that the measures set out in the documentation and summarised above will mitigate these impacts to ensure significant adverse effects will not arise. Furthermore, winter bird survey results show a low frequency of use by SCI species at the location of temporary and permanent loss of GA2 habitat at Blackrock Park, and there is availability of similar habitat in the immediate vicinity (and over the wider area).

I note the potential for air quality emissions from the operational period of the project could have the potential to have adverse impact on the SPA proximate to the scheme as well as ex-situ feeding sites of SCI species in the vicinity. In this regard I note the content of the submitted Air Quality Assessment (Appendix VI of the NIS) as well as the location and nature of the proposed works along an existing urban road within an urban environment, in all cases where modelling shows exceedances of NO_x and NO₂ occur the future baseline environment is already in excess of the 30µg/m³ limit (critical) value and reduces below critical levels at 150m from Rock Road, modelling shows that NO₂ deposition will remain below the critical loads for inland and surface water habitats and accordingly significant adverse impact is avoided.

There is potential for downstream Dublin Bay to experience affects due to the hydrological connection to Dublin Bay from the Proposed Scheme via the Dodder_50, Brewery Stream_10, Grand Canal, Booterstown Marsh and Nutley Stream as well as a network of interconnecting existing surface or combined sewer/surface pipes. Based on the information provided and mitigation measures included in relation to protection of water, I am satisfied that adverse effects can be excluded for the Dublin Bay South and Tolka Estuary SPA. No permanent sensitive or ecologically important habitat loss will occur. Adverse effects from water contamination and sediment release can be effectively prevented by mitigation measures ensuring the protection of the relevant watercourses and pipe networks which drain into Dublin Bay. There will be no net increase in existing runoff rates and appropriate treatment will ensure runoff quality. Similarly, the surface water mitigation measures will ensure no impacts on groundwater or groundwater dependent habitats. In this regard I note that direct hydrogeological impacts will not arise due to the nature of the works (which will not interact with any groundwater bodies) leaving the only potential for hydrogeological impact to arise being indirect and local through surface water interactions.

The spread of invasive species is to be controlled via mitigation measures, pre-confirmatory surveys will be carried out in order to avoid or adequately treat or remove invasive plants prior to construction being carried out in accordance with the Invasive Species Management Plan.

I note that displacement of SCI species could occur in proximity to the works areas and construction compound due to increased noise impacts during the construction phase. In this regard SCI species are likely to use other suitable and readily available lands in the locality but at greater distance from works areas for a period of 12 months (1 winter season) for standard works and 24 months in proximity to the construction compound. Noise Mitigation measures are proposed within the CEMP and summarised in section 10.5.3.10 above, which will help control/reduce construction noise. I consider the displacement impact temporary in nature during the construction phase and will not give rise to significant adverse impact on the SPA. In terms of operational noise the Proposed Scheme will operate within an urban environment catering for traffic loadings and noise levels during the operational phase will be consistent with that currently experienced.

The mitigation measures presented in Section 7.1.4 of the NIS in respect of re-establishing vegetative cover and/or potential feeding habitat will also mitigate impact on SCI species using the SPA territory and also ensure that ex-situ inland feeding sites continue to be available for SCI bird species.

Based on the information submitted, surveys carried out analysis provided and my review I am satisfied that no uncertainty remains.

The Proposed Scheme would not delay or prevent the attainment of the Conservation objectives of the South Dublin Bay and River Tolka Estuary SPA and adverse effects on site integrity can be excluded.

10.6.5.8. North Bull Island SPA South Dublin Bay and River Tolka Estuary SPA [004024]

[004006], Baldoyle Bay SPA [004016], Malahide Estuary SPA [004025], Dalkey Islands SPA [004172], Howth Head Coast SPA [004113], Rogerstown Estuary SPA [004015], Skerries Islands SPA [004122], Rockabill SPA [004014], Ireland's Eye SPA [004117], and Lambay Island SPA [004069] and North-West Irish Sea cSPA [004236]

Table 10.9 below sets out the Special Conservation Interests, Conservation Objectives (summary of targets and attributes) and potential adverse effects that could arise on the listed SPAs from the Proposed Scheme, the relevant measures being incorporated to mitigate and avoid effects are also listed and an overall conclusion presented in relation to the integrity of the SPAs in the context of the Proposed Scheme.

Table 10.9: AA Summary matrix for North Bull Island SPA, Baldoyle Bay SPA, Malahide Estuary SPA, Dalkey Islands SPA, Howth Head Coast SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA and North-West Irish Sea cSPA.

North Bull Island SPA [004006],

Detailed Conservation Objectives available: <u>https://www.npws.ie</u>

Special Conservation Interests (SCI)

Light-bellied Brent Goose (Branta bernicla hrota) [A046], Shelduck (Tadorna tadorna) [A048], Teal (Anas crecca) [A052], Pintail (Anas acuta) [A054], Shoveler (Anas clypeata) [A056], Oystercatcher (Haematopus ostralegus) [A130], Golden Plover (Pluvialis apricaria) [A140], Grey Plover (Pluvialis squatarola) [A141], Knot (Calidris canutus) [A143], Sanderling (Calidris alba) [A144], Dunlin (Calidris alpina) [A149], Black-tailed Godwit (Limosa limosa) [A157], Bar-tailed Godwit (Limosa lapponica) [A157], Curlew (Numenius arquata) [A160], Redshank (Tringa totanus) [A162], Turnstone (Arenaria interpres) [A169], Black-headed Gull (Chroicocephalus ridibundus) [A179], Wetland and Waterbirds [A999].

Summary of Appropriate Assessment		
Conservation	Potential adverse effects	Mitigation measures
Objectives Targets and		
attributes (summary)		
Maintain the favourable conservation condition of the relevant species according to the following trends: long term pop trend stable or increasing, and no significant decrease in distribution range, timing or intensity of use of areas by all the SCI species other than	An accidental pollution event during construction could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the quality of intertidal/coastal habitats that support the special conservation interest bird species of the SPA. This could potentially affect the use of habitat areas by birds and have long- term effects on the SPA populations.	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.
occurring from natural patterns of variation. In terms of Wetlands it is the conservation objective to maintain the favourable conservations condition of the habitat in the	The introduction and/or spread of invasive species to downstream European sites could potentially result in the degradation of existing habitats present, in particular coastal habitats not permanently or regularly inundated by seawater. This in turn could affect the use of habitat areas by birds and have long-term effects on the SPA populations.	See the mitigation measures described in Section 7.1.4 of the NIS (para's 195 – 200) to prevent the introduction and/or spread of invasive species summarised in this report in Section 10.5.3.3 and 10.5.3.4 above.
SPA. The target is that the permanent area occupied by the wetland habitat should be stable and not significantly less than the estimated area of habitat (1,713ha) other than that occurring from natural patterns of variation.	There is potential for impacts to occur on any SCI bird species population of North Bull Island SPA due to disturbance and/or displacement from inland feeding/roosting sites due to construction activities and increased levels of disturbance arising from removal of non-SCI screening vegetation e.g. screening woodland/scrub vegetation, potentially affecting the use of habitat areas by birds leading to displacement of feeding birds and/or abandonment of feeding sites.	The mitigation measures presented in Section 7.1.4 (incl. para.'s 203 to 207 – disturbance/displacement/veget ation, 208- 209- Air Quality) of the NIS and summarised in Sections 10.5.3.5, 10.5.3.6, 10.5.3.7, 10.5.3.8 of this report in relation to disturbance, displacement, air quality and impacts to SCI birds due to vegetation loss. Noise mitigation measures included in Table 5.2 of the CEMP (Appendix III of NIS) and summarised above in Section 10.5.3.10 of this Report above also refers.

Summary of Appropriate Assessment

	Loss of suitable GA2 habitat from potential ex-situ feeding site	Proposed Scheme will return habitat to GA2 status for lands temporarily needed for construction on completion of the relevant stage of the works.
Baldoyle Bay SPA [004016]		

Detailed Conservation Objectives available: <u>https://www.npws.ie</u>

Special Conservation Interests (SCI)

Light-bellied Brent Goose (Branta bernicla hrota) [A046], Shelduck (Tadorna tadorna) [A048], Ringed Plover (Charadurius hiaticula) [A137], Golden Plover (Pluvialis apricaria) [A140], Grey Plover (Pluvialis squatarola) [A141], Bar-tailed Godwit (Limosa lapponica) [A157] Wetlands and Waterbirds [A999].

Summary of Appropriate assessment		
Conservation Objectives Targets and attributes (summary)	Potential adverse effects	Mitigation measures
Maintain the favourable conservation condition of the species according to the following targets - long term population trend stable or increasing and no significant decrease in range, timing or intensity of use of areas other than that occurring from natural patterns.	An accidental pollution event during construction could affect surface water downstream in Dublin Bay which SCI bird species could use outside of their core SPA foraging areas. An accidental pollution event of a sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the quality/quantity of fish prey species and the intertidal/coastal habitats that support the special conservation interest bird species of the SPA. This could potentially affect the use of habitat areas by birds and have long- term effects on the SPA populations.	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.
	The introduction and/or spread of invasive species to downstream European sites could potentially result in the degradation of existing habitats present, in particular coastal habitats not permanently or regularly inundated by seawater. This in turn could affect the use of habitat areas by birds and have long-term effects on the SPA populations.	See the mitigation measures described in Section 7.1.4 of the NIS (para's 195 – 200) to prevent the introduction and/or spread of invasive species summarised in this report in Section 10.5.3.3 and 10.5.3.4 above.
	There is potential for impacts to occur on any SCI bird species population due to disturbance and/or displacement from inland feeding/roosting sites due to construction activities and increased levels of disturbance arising from removal of non-SCI screening vegetation e.g. screening woodland/scrub vegetation, potentially	The mitigation measures presented in Section 7.1.4 (incl. para.'s 203 to 207) of the NIS and summarised in Sections 10.5.3.5, 10.5.3.6, 10.5.3.7 of this report in relation to disturbance and displacement and impacts to SCI birds due to vegetation loss. Noise mitigation measures included in table 5.2

In terms of Wetlands it is the conservation objective to maintain the favourable conservations condition of the habitat in the SPA. The target is that the permanent area occupied by the wetland habitat should be stable and not significantly less than the estimated area of habitat (263ha) other than that occurring from natural patterns of variation. Dalkey Islands SPA [004	affecting the use of habitat areas by birds leading to displacement of feeding birds and/or abandonment of feeding sites. Temporary and permanent loss of suitable GA2 habitat from potential ex- situ feeding site. No potential impacts can occur on habitats associated with Baldoyle Bay SPA due to its separation distance to the Proposed Scheme, the location of the SPA (north of Howth Head) and the lack of a direct hydrological connection.	of the CEMP (Appendix III of NIS) and summarised above in Section 10.5.3.10 of this Report above also refers. Proposed Scheme will return habitat to GA2 status on completion of the relevant stage of the works. N/A	
Special Conservation Int			
Roseate Tern (Sterna dou paradisaea) [A194]	Roseate Tern (Sterna dougallii) [A192], Common Tern (sterna hirundo) [A193], Artic Tern (Sterna		
	Summary of Appropriate assessm	ent	
Conservation Objectives Targets and attributes (summary)	Potential adverse effects	Mitigation measures	
To maintain or restore the favourable conservation condition of the bird species listed as SCI for this SPA. (There are no site- specific conservation objectives for this site, accordingly the NIS considers the attributes and targets available for the relevant three tern species available in the South Dublin Bay and River Tolka Estuary SPA, including passage/breeding populations, distribution, prey biomass availability, no	An accidental pollution event during construction could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the quality/quantity of fish prey species and the intertidal/coastal habitats that support the special conservation interest bird species of the SPA. This could potentially affect the use of habitat areas by birds and have long- term effects on the SPA populations.	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report	

significant increase in barriers to connectivity, abundance, productivity rate, distribution, prey availability, barriers to connectivity and disturbance of breeding site). Howth Head Coast SPA Detailed Conservation C	[004113] bjectives available: <u>https://www.npws.ie</u>	
Special Conservation In		
Kittiwake (Rissa tridactyla	Summary of Appropriate assessm	ent
Conservation Objectives Targets and attributes (summary)	Potential adverse effects	Mitigation measures
To maintain or restore the favourable conservation condition of the bird species listed as Special Conservation Interests for this SPA. (There are no site- specific conservation objectives for this site, accordingly the NIS considers the attributes and targets available for Kittiwake available in the Saltee islands SPA, relating to breeding population abundance, productivity rate, distribution, prey availability, barriers to connectivity and disturbance of breeding site).	An accidental pollution event during construction could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the quality/quantity of fish prey species and the intertidal/coastal habitats that support the speciel conservation interest bird species of the SPA. This could potentially affect the use of habitat areas by birds and have long- term effects on the SPA populations.	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report
Ireland's Eye SPA [0041	17]	
Detailed Conservation Objectives available: <u>https://www.npws.ie</u>		
Special Conservation Interests (SCI)		
Cormorant (Phalacrocorax carbo) [A017], Herring Gull (Larus argentatus) [A184], Kittiwake (Rissa tridactyla) [A188], Guillemot (Uria aalge) [A199], Razorbill (Alca torda) [A200].		
Summary of Appropriate assessment		
Conservation Objectives Targets and attributes (summary)	Potential adverse effects	Mitigation measures

To maintain or restore the favourable conservation condition of the bird species listed as Special Conservation Interests for this SPA. As there are no site- specific conservation objectives for this SPA the NIS has considered targets based on the specific objectives available for Rogerstown Estuary.	An accidental pollution event during construction could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the quality/quantity of fish prey species and the intertidal/coastal habitats that support the special conservation interest bird species of the SPA. This could potentially affect the use of habitat areas by birds and have long- term effects on the SPA populations.	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.
These targets relate to stable or increasing population trends, and no significant decrease in the range. Timing and intensity of use of areas by SCI species other than that occurring from natural patterns of variation.	There is potential for impacts to occur on any SCI bird species population due to disturbance and/or displacement from inland feeding/roosting sites due to construction activities and increased levels of disturbance arising from removal of non-SCI screening vegetation e.g. screening woodland/scrub vegetation, potentially affecting the use of habitat areas by birds leading to displacement of feeding birds and/or abandonment of feeding sites.	The mitigation measures presented in Section 7.1.4 (incl. para.'s 203 to 207) of the NIS and summarised in Sections 10.5.3.5, 10.5.3.6, and 10.5.3.7 of this report in relation to disturbance and displacement and impacts to SCI birds due to vegetation loss. Noise mitigation measures included in table 5.2 of the CEMP (Appendix III of NIS) and summarised above in Section 10.5.3.10 of this Report above also refers.
Melebide Fetuery 204 f	Temporary and permanent loss of suitable GA2 habitat	Proposed Scheme will return habitat to GA2 status for lands temporarily needed for construction on completion of the relevant stage of the works.
Malahide Estuary SPA [004025]		

Detailed Conservation Objectives available: <u>https://www.npws.ie</u>

Special Conservation Interests (SCI)

Great Crested Grebe (Podiceps cristatus) [A005], Light-bellied Brent Goose (Branta bernicla hrota) [A046], Shelduck (Tadorna tadorna) [A048], Pintail (Anas acuta) [A054], Goldeneye (Bucephala clangula) [A067], Red-breasted Merganser (Mergus serrator) [A069], Oystercatcher (Haematopus ostralegus) [A130], Golden Plover (Pluvialis apricaria) [A140], Grey Plover (Pluvialis squatarola) [A141], Knot (Calidris canutus) [A143], Dunlin (Calidris alpina) [A149], Black-tailed Godwit (Limosa limosa) [A156], Bar-tailed Godwit (Limosa lapponica) [A157] Redshank (Tringa tetanus) [A162], Wetland and Waterbirds [A999]

Summary of Appropriate Assessment		
Conservation Objectives Targets and attributes (summary)	Potential adverse effects	Mitigation measures
Maintain the favourable conservation condition of the species in the SPA defined by the	An accidental pollution event during construction could affect surface water downstream in Dublin Bay. An accidental pollution event of a	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194)

following targets: long term population trend stable or increasing, and no significant decrease in range, timing or intensity of use of areas	sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the quality/quantity of fish prey species and the intertidal/coastal habitats that support the special conservation interest bird species of the SPA. This could potentially affect the use of habitat areas by birds and have long- term effects on the SPA populations.	of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.	
	There is potential for impacts to occur on any SCI bird species population due to disturbance and/or displacement from inland feeding/roosting sites due to construction activities and increased levels of disturbance arising from removal of non-SCI screening vegetation e.g. screening woodland/scrub vegetation, and loss of habitat potentially affecting the use of habitat areas by birds leading to displacement of feeding birds and/or abandonment of feeding sites	The mitigation measures presented in Section 7.1.4 (incl. para.'s 203 to 207) of the NIS and summarised in Sections 10.5.3.5, 10.5.3.6, and 10.5.3.7 of this report in relation to disturbance and displacement and impacts to SCI birds due to vegetation loss. Noise mitigation measures included in table 5.2 of the CEMP (Appendix III of NIS) and summarised above in Section 10.5.3.10 of this Report above also refers. Proposed Scheme will reinstate temporarily removed GA2 habitat post-construction.	
In relation to Wetland Habitat area, the permanent area occupied by the wetland habitat should be stable and not significantly less than the area of 765ha, other than that occurring from natural patterns of variation	No potential impacts can occur on habitats associated with Malahide SPA due to its separation distance to the Proposed Scheme, the location of the SPA (north of Howth Head) and the lack of a direct hydrological connection.	N/A	
Rogerstown Estuary SP	A [004015]		
Detailed Conservation C	bjectives available: <u>https://www.npws.ie</u>		
Special Conservation In	Special Conservation Interests (SCI)		
Greylag Goose (Anser anser) [A043], Light-bellied Brent Goose (Branta bernicla hrota) [A046], Shelduck (Tadorna tadorna) [A048], Shoveler (Anas clypeata) [A056], Oystercatcher (Haematopus ostralegus) [A130], Ringed Plover (Charadrius hiaticula) [A137], Grey Plover (Pluvialis squatarola) [A141], Knot (Calidris canutus) [A143], Dunlin (Calidris alpina) [A149], Black-tailed Godwit (Limosa limosa) [A156], Redshank (Tringa totanus) [A162], Wetland and Waterbirds [A999]			
Summary of Appropriate Assessment			
Conservation Objectives Targets and attributes (summary)	Potential adverse effects	Mitigation measures	
To maintain or restore the favourable conservation condition of the bird species listed	An accidental pollution event during construction could affect surface water downstream in Dublin Bay. An accidental pollution event of a	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194)	

as Special Conservation Interests for this SPA, considering the following targets: stable or increasing population trends, and no significant decrease in the range, timing and intensity of use of areas by SCI species other than that occurring from natural patterns of variation.	sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the quality/quantity of fish prey species and the intertidal/coastal habitats that support the special conservation interest bird species of the SPA. This could potentially affect the use of habitat areas by birds and have long- term effects on the SPA populations. There is potential for impacts to occur on any SCI bird species population due to disturbance and/or displacement from inland feeding/roosting sites due to construction activities and increased levels of disturbance arising from removal of non-SCI screening vegetation e.g. screening woodland/scrub vegetation, and loss of habitat areas by birds leading to displacement of feeding birds and/or abandonment of feeding sites.	of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report The mitigation measures presented in Section 7.1.4 (incl. para.'s 203 to 207) of the NIS and summarised in Sections 10.5.3.5, 10.5.3.6, and 10.5.3.7 of this report in relation to disturbance and displacement and impacts to SCI birds due to vegetation loss. Noise mitigation measures included in table 5.2 of the CEMP (Appendix III of NIS) and summarised above in Section 10.5.3.10 of this Report above also refers. Proposed Scheme will reinstate temporarily removed GA2 habitat post-construction. N/A
Habitat area, the permanent area occupied by the wetland habitat should be stable and not significantly less than the area of 646ha, other than that occurring from natural patterns of	• •	IN/A
variation Skerries Islands SPA [00)4122]	
	bjectives available: <u>https://www.npws.ie</u>	
Special Conservation Int	terests (SCI)	
Cormorant (Phalacrocorax carbo) [A017], Shag (Phalacrocorax aristotelis) [A018], Light-bellied Brent Goose (Branta bernicla hrota) [A046], Purple Sandpiper (Calidris maritima) [A148], Turnstone (Arenaria interpres) [A169], Herring Gull (Larus argentatus) [A184]		
Summary of Appropriate Assessment		
Conservation Objectives Targets and attributes (summary)	Potential adverse effects	Mitigation measures
Maintain or restore the favourable conservation condition of the SCI bird species listed as Special Conservation Interests for this SPA	An accidental pollution event during construction could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either alone or cumulatively with other pollution	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised

	sources, could potentially affect the quality/quantity of fish prey species and the intertidal/coastal habitats that support the special conservation interest bird species of the SPA. This	above in Section 10.5.3.1 and 10.5.3.2 of this Report.
	could potentially affect the use of habitat areas by birds and have long- term effects on the SPA populations.	
	There is potential for impacts to occur on any SCI bird species population due to disturbance and/or displacement from inland feeding/roosting sites due to construction activities and increased levels of disturbance arising from removal of non-SCI screening vegetation e.g. screening woodland/scrub vegetation, and loss of habitat potentially affecting the use of habitat areas by birds leading to displacement of feeding birds and/or abandonment of feeding sites	The mitigation measures presented in Section 7.1.4 (incl. para.'s 203 to 207) of the NIS and summarised in Sections 10.5.3.5, 10.5.3.6, and 10.5.3.7 of this report in relation to disturbance and displacement and impacts to SCI birds due to vegetation loss. Noise mitigation measures included in table 5.2 of the CEMP (Appendix III of NIS) and summarised above in Section 10.5.3.10 of this Report above also refers. Proposed Scheme will reinstate temporarily removed GA2
Lambay Island SPA [004069]		

Detailed Conservation Objectives available: https://www.npws.ie

Special Conservation Interests (SCI)

Fulmar (Fulmarus glacialis) [A009], Cormorant (Phalacrocorax carbo) [A017], Shag (Phalacrocorax aristotelis) [A018], Greylag Goose (Anser anser) [A043], Lesser Black-backed Gull (Larus fuscus) [A183], Herring Gull (Larus argentatus) [A184], Kittiwake (Rissa tridactyla) [A188], Guillemot (Uria aalge) [A199], Razorbill (Alca torda) [A200], Puffin (Fratercula arctica) [A204]

Summary of Appropriate Assessment

Conservation Objectives Targets and attributes (summary)	Potential adverse effects	Mitigation measures
To maintain or restore the favourable conservation condition of the bird species listed as Special Conservation Interests for this SPA.	An accidental pollution event during construction could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.
(As there are no site- specific conservation objectives for this SPA the NIS has considered targets based on the specific objectives available for Rogerstown Estuary.	quality/quantity of fish prey species and the intertidal/coastal habitats that support the special conservation interest bird species of the SPA. This could potentially affect the use of habitat areas by birds and have long- term effects on the SPA populations.	
These targets relate to stable or increasing	There is potential for impacts to occur on any SCI bird species population	The mitigation measures presented in Section 7.1.4 (incl.

population trends, and no significant decrease in the range. Timing and intensity of use of areas by SCI species other than that occurring from natural patterns of variation.)	due to disturbance and/or displacement from inland feeding/roosting sites due to construction activities and increased levels of disturbance arising from removal of non-SCI screening vegetation e.g. screening woodland/scrub vegetation, and loss of habitat potentially affecting the use of habitat areas by birds leading to displacement of feeding birds and/or abandonment of feeding sites	para.'s 203 to 207) of the NIS and summarised in Sections 10.5.3.5, 10.5.3.6, and 10.5.3.7 of this report in relation to disturbance and displacement and impacts to SCI birds due to vegetation loss. Noise mitigation measures included in table 5.2 of the CEMP (Appendix III of NIS) and summarised above in Section 10.5.3.10 of this Report above also refers. Proposed Scheme will reinstate temporarily removed GA2 habitat post-construction
Rockabill SPA [004014]	bjectives available: https://www.npws.ie	
Special Conservation Interests (SCI) Purple Sandpiper (Calidris maritima) [A148], Roseate Tern (Sterna dougallii) [A192], Common Tern (Sterna hirundo) [A193], Arctic Tern (Sterna paradisaea) [A194] Summary Of Appropriate Assessment		
Conservation	Potential adverse effects	Mitigation measures
Objectives Targets and attributes (summary)		
In relation to the Purple Sandpiper long-term population trend stable or increasing, and no significant decrease in the range, timing or intensity of use of areas other than that occurring from natural patterns of variation. In relation to the three tern species no significant decline in - breeding population abundance, fledged young per breeding pair, distribution of breeding colonies, prey biomass available. No significant to barriers to connectivity, and human activities should occur at levels that do not adversely affect the breeding populations. North-West Irish Sea cS	There is no pathway for impacts to occur on the Purple sandpiper due to the separation distance (by a large marine waterbody) from the Proposed Scheme and its location on the far side of the Howth Peninsula. In relation to the tern species an accidental pollution event during construction could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the quality/quantity of fish prey species and the intertidal/coastal habitats that support the special conservation interest bird species of the SPA. This could potentially affect the use of habitat areas by birds and have long- term effects on the SPA populations.	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.
North-West Irish Sea cSPA [004014]		
Detailed Conservation Objectives available: <u>https://www.npws.ie</u>		
Special Conservation Interests (SCI)		

Red-throated Diver (Gavia stellata) [A001], Great Northern Diver (Gavia immer) [A003], Fulmar (Fulmarus glacialis) [A009], Manx Shearwater (Puffinus puffinus) [A013], Cormorant (Phalacrocorax carbo) [A017], Shag (Phalacrocorax aristotelis) [A018], Common Scoter (Melanitta nigra) [A065], Little Gull (Larus minutus/Hydrocoloeus minutus) [A177/A862], Black-headed Gull (Chroicocephalus ridibundus) [A179], Common Gull (Larus canus) [A182], Lesser Black-backed Gull (Larus fuscus) [A183], Herring Gull (Larus argentatus) [A184], Great Black-backed Gull (Larus marinus) [A187], Kittiwake (Rissa tridactyla) [A188], Roseate Tern (Sterna dougallii) [A192], Common Tern (Sterna hirundo) [A193], Arctic Tern (Sterna paradisaea) [A194], Little Tern (Sterna albifrons) [A195], Guillemot (Uria aalge) [A199], Razorbill (Alca torda) [A200], Puffin (Fratercula arctica) [A204]

Summary Of Appropriate Assessment			
Conservation	Potential adverse effects	Mitigation measures	
Objectives Targets			
and attributes			
(summary)			
To maintain or restore the favourable conservation condition of the bird species listed as Special Conservation Interests for this cSPA, considering the following targets: no significant decline, stable or increasing population trends, sufficient number of locations, area and availability of suitable	An accidental pollution event during construction could affect surface water downstream in Dublin Bay. An accidental pollution event of a sufficient magnitude, either alone or cumulatively with other pollution sources, could potentially affect the quality the of intertidal/coastal habitats that support the special conservation interest bird species of the cSPA. This could potentially affect the use of habitat areas by birds and have long- term effects on the cSPA populations.	Detailed pollution control measures to protect water quality as outlined in within section 7.1.4 (para.'s 183 – 194) of the NIS and summarised above in Section 10.5.3.1 and 10.5.3.2 of this Report.	
habitat to support the population, sufficient number of locations, area of suitable habitat and available forage biomass to support population target, intensity, frequency, timing and duration of disturbance, barriers not	The introduction and/or spread of invasive species to downstream European sites could potentially result in the degradation of existing habitats present, in particular coastal habitats not permanently or regularly inundated by seawater. This in turn could affect the use of habitat areas by birds and have long-term effects on the cSPA populations.	See the mitigation measures described in Section 7.1.4 of the NIS (para's 195 – 200) to prevent the introduction and/or spread of invasive species summarised in this report in Section 10.5.3.3 and 10.5.3.4 above.	
populations access to the SPA or other ecologically important sites outside the SPA.	Temporary and permanent loss of suitable GA2 habitat	Proposed Scheme will return temporary habitat loss to GA2 status on completion of the relevant stage of the works.	
timing and duration of disturbance, barriers not significantly impacting populations access to the SPA or other ecologically important	have long-term effects on the cSPA populations. Temporary and permanent loss of suitable GA2 habitat	Proposed Scheme will re temporary habitat loss to (status on completion of	

Overall conclusion: Integrity test

The applicant determined that following detailed assessment of potential impacts and the implementation of mitigation, the construction and operation of this Proposed Scheme alone or in combination with other plans and projects will not adversely affect the integrity of these European sites in view of their conservation objectives.

Based on the information provided and my review, I am satisfied that adverse effects can be excluded for these SPA sites (and the cSPA site) from the Proposed Scheme site and that no effects of any significance will occur.

There is potential for downstream Dublin Bay to experience affects due to the hydrological connection to Dublin Bay from the Proposed Scheme via the Dodder_50, Brewery Stream_10, Grand Canal, Booterstown Marsh and Nutley Stream as well as a network of interconnecting existing surface or combined sewer/surface pipes. Based on the information provided and mitigation measures included in relation to protection of water, I am satisfied that adverse effects can be excluded for the listed SPAs.

No habitat loss within these European designated sites will occur. Adverse effects from water contamination and sediment release can be effectively prevented by mitigation measures ensuring the protection of the relevant watercourses and pipe networks which drain into Dublin Bay. There will be no net increase in existing runoff rates and appropriate treatment will ensure runoff quality.

The spread of invasive species is to be controlled via mitigation measures, pre confirmatory surveys will be carried out in order to avoid or adequately treat or remove invasive plants prior to construction being carried out in accordance with an Invasive Species Management Plan.

The ex-situ feeding areas of SCI species from the listed SPAs could be impacted by loss of GA2 habitat in Blackrock Park, disturbances arising from construction dust, construction noise, loss of screening planting and/or potential pollution events from materials entering watercourses and drains hydrologically linked to downstream (and proximate) suitable sites. I am satisfied that the measures set out in the documentation and summarised above will mitigate these impacts to ensure significant adverse effects will not arise. Furthermore, winter bird survey results show a low frequency of use by SCI species at the location of temporary and permanent loss of GA2 habitat at Blackrock Park, and there is availability of similar habitat in the immediate vicinity (and over the wider area).

I note the potential for air quality emissions from the operational period of the project could have the potential to have adverse impact on the SPA proximate to the scheme as well as ex-situ feeding sites of SCI species in the vicinity. In this regard I note the content of the submitted Air Quality Assessment (Appendix VI of the NIS) as well as the location and nature of the proposed works along an existing urban road within an urban environment, in all cases where modelling shows exceedances of NO_x and NO₂ occur the future baseline environment is already in excess of the $30\mu g/m^3$ limit (critical) value and reduces below critical levels at 150m from Rock Road, modelling shows that NO₂ deposition will remain below the critical loads for inland and surface water habitats and accordingly significant adverse impact is avoided.

I note that displacement of SCI species could occur in proximity to the works areas and construction compound due to increased noise impacts during the construction phase. In this regard SCI species are likely to use other suitable and readily available lands in the locality but at greater distance from works areas for a period of 12 months (1 winter season) for standard works and 24 months in proximity to the construction compound. Noise Mitigation measures are proposed within the CEMP and summarised in section 10.5.3.10 above, which will help control/reduce construction noise. I consider the displacement impact temporary in nature during the construction phase and will not give rise to significant adverse impact on the SPAs. In terms of operational noise the Proposed Scheme will operate within an urban environment catering for traffic loadings and noise levels broadly consistent with those already established, and to which species have been and will become habituated. Accordingly, I do not consider adverse impacts will arise from operational noise, furthermore I do not consider that the Proposed Scheme will create any barrier to species accessing SPAs or any other ecologically important sites.

The mitigation measures presented in Section 7.1.4 of the NIS in respect of re-establishing vegetative cover and/or potential feeding habitat will also mitigate impact on SCI species using the SPA territory and also ensure that ex-situ inland feeding sites continue to be available for SCI bird species.

Therefore, based on the information submitted, surveys carried out and analysis provided I am satisfied that no uncertainty remains.

The Proposed Scheme would not delay or prevent the attainment of the Conservation objectives of any of the listed SPA sites in Dublin Bay and beyond (North Bull Island SPA, Baldoyle Bay SPA, Malahide Estuary SPA, Dalkey Islands SPA, Howth Head Coast SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA and the North Irish Sea cSPA) and adverse effects on these sites integrity can be excluded.

10.6.5.9. The Murrough SPA [004186]

Table 10.10 below sets out the Special Conservation Interests, Conservation Objectives (summary of targets and attributes) and potential adverse effects that could arise on the Murrough SPA from the Proposed Scheme, the relevant measures being incorporated to mitigate and avoid effects are also listed and an overall conclusion presented in relation to the integrity of the SPA in the context of the Proposed Scheme.

Table 10.10: AA summary for The Murrough SPA.

The Murrough SPA [004186]		
Detailed Conservation Objectives		
Special Conservation Interests (S	•	
,	[A001], Greylag Goose (Anser anser)	
· · · · · · ·	46], Wigeon (Anas penelope) [A050],	
	is ridibundus) [A179], Herring Gull (Lar	rus argentatus) [A184], Little
Tern (Sterna albifrons) [A195], Wet		
Sum	mary Of Appropriate Assessment	
Conservation Objectives	Potential adverse effects	Mitigation measures
Targets and attributes		
(summary- inserted)		
To maintain or restore the	An accidental pollution event during	Detailed pollution control
favourable conservation condition	construction could affect surface	measures to protect water
of the SCI bird species.	water downstream in Dublin Bay.	quality as outlined in
-	An accidental pollution event of a	within section 7.1.4
There being no site-specific	sufficient magnitude, either alone or	(para.'s 183 – 194) of the
conservation objectives available the submitted NIS used objectives	cumulatively with other pollution sources, could potentially affect the	NIS and summarised above in Section 10.5.3.1
and targets for these species in	quality/quantity of fish prey species	and 10.5.3.2 of this
other SPAs and considered and the intertidal/coastal habitats Report.		
population trend - stable or	that support the special	
increasing, range/timing &	conservation interest bird species	
intensity of use - not significantly	of the SPA. This could potentially	
decreasing, other than that	affect the use of habitat areas by	
occurring from natural patterns of	birds and have long-term effects on	
variation.	the SPA populations.	
For little Tern targets from the	There is potential for impacts to	The mitigation measures
Boyne Estuary were used in	occur on any SCI bird species	presented in Section 7.1.4
relation to no significant decline in	population due to disturbance	(incl. para.'s 203 to 207)
occupied nests/ abundance,	and/or displacement from inland	of the NIS and
productivity rate, distribution, prey	feeding/roosting sites due to	summarised in Sections
biomass available, and human	construction activities and increased	10.5.3.5, 10.5.3.6, and
activity should be at levels that do	levels of disturbance arising from	10.5.3.7 of this report in
	removal of non-SCI screening	relation to disturbance

To maintain or restore the	vegetation e.g. screening woodland/scrub vegetation, and loss of habitat potentially affecting the use of habitat areas by birds leading to displacement of feeding birds and/or abandonment of feeding sites.	and displacement and impacts to SCI birds due to vegetation loss. Noise mitigation measures included in table 5.2 of the CEMP (Appendix III of NIS) and summarised above in Section 10.5.3.10 of this Report above also refers. Proposed Scheme will reinstate temporarily removed GA2 habitat post-construction
favourable conservation condition of the wetland habitat at the SPA as a resource for the regularly- occurring migratory waterbirds that utilise it	No potential impacts can occur on habitats associated with the Murrough SPA due to its separation distance to the Proposed Scheme (in excess of 19km distant), the location of the SPA (significantly south of Dublin Bay) and the lack of a direct hydrological connection.	N/A

Overall conclusion: Integrity test

The applicant determined that following detailed assessment of potential impacts and the implementation of mitigation, the construction and operation of this Proposed Scheme alone or in combination with other plans and projects will not adversely affect the integrity of the Murrough SPA in view of the conservation objectives of those sites.

Based on the information provided and my review, I am satisfied that adverse effects can be excluded for this SPA site and that no effects of any significance will occur.

There is potential for downstream Dublin Bay to experience affects due to the hydrological connection to Dublin Bay from the Proposed Scheme via the Dodder_50, Brewery Stream_10, Grand Canal, Booterstown Marsh and Nutley Stream as well as a network of interconnecting existing surface or combined sewer/surface pipes. Based on the information provided and mitigation measures included in relation to protection of water, I am satisfied that adverse effects can be excluded for the Murrough SPA. No habitat loss within this European site will occur. Adverse effects from water contamination and sediment release can be effectively prevented by mitigation measures ensuring the protection of the relevant watercourses and pipe networks which drain into Dublin Bay. There will be no net increase in existing runoff rates and appropriate treatment will ensure runoff quality.

The ex-situ feeding areas of SCI species from the listed SPAs could be impacted by loss of GA2 habitat in Blackrock Park, disturbances arising from construction dust, construction noise, loss of screening planting and/or potential pollution events from materials entering watercourses and drains hydrologically linked to downstream suitable sites. I am satisfied that the measures set out in the documentation and summarised above will mitigate these impacts to ensure significant adverse effects will not arise. Furthermore, winter bird survey results show an absence/low frequency of use by SCI species at the location of temporary and permanent loss of GA2 habitat, as well as the availability of large areas of similar habitat in the immediate vicinity (and wider area).

I note the potential for air quality emissions from the operational period of the project could have the potential to have adverse impact on the SPA proximate to the scheme as well as ex-situ feeding sites of SCI species in the vicinity. In this regard I note the content of the submitted Air Quality Assessment (Appendix VI of the NIS) as well as the location and nature of the proposed works along an existing urban road within an urban environment, in all cases where modelling shows exceedances of NO_x and NO₂ occur the future baseline environment is already in excess of the 30µg/m³ limit (critical) value and reduces below critical levels at 150m from Rock Road, modelling shows that NO₂ deposition will remain below the critical loads for inland and surface water habitats and accordingly significant adverse impact is avoided.

I note that displacement of SCI species could occur in proximity to the works areas and construction compound due to increased noise impacts during the construction phase. In this regard SCI species are likely to use other suitable and readily available lands in the locality but at greater distance from works areas for a period of 12 months (1 winter season) for standard works and 24 months in proximity to the construction compound. Noise Mitigation measures are proposed within the CEMP and summarised in section 10.5.3.10 above, which will help control/reduce construction noise. I consider the displacement impact temporary in nature during the construction phase and will not give rise to significant adverse impact on the SPA. In terms of operational noise the Proposed Scheme will operate within an urban environment catering for traffic loadings and noise levels broadly consistent with those already established, and to which species will have become habituated. Accordingly, I do not consider adverse impacts will arise from operational noise.

The mitigation measures presented in Section 7.1.4 of the NIS in respect of re-establishing vegetative cover and/or potential feeding habitat will also mitigate impact on SCI species using the SPA territory and also ensure that ex-situ inland feeding sites continue to be available for SCI bird species.

Therefore, based on the information submitted, surveys carried out and analysis provided I am satisfied that no uncertainty remains.

The Proposed Scheme would not delay or prevent the attainment of the Conservation objectives of the Murrough SPA sites and adverse effects on site integrity can be excluded.

10.7. Potential for Adverse effects

- 10.7.1. As outlined above the main potential for adverse effects relates to the changes to water quality from pollution and sedimentation of watercourses arising at various locations and associated with various operations during the construction of the development and the deterioration of habitats and/or sedimentation arising from the spread of invasive plant species.
- 10.7.2. In addition to the foregoing I also consider it important to examine the potential for impacts to arise in relation to noise and vibration disturbance from construction works and in relation to Air Quality deterioration arising from both construction works and the operational phase of the development.

10.7.3. Noise & Vibration Disturbance

- 10.7.3.1. Potential adverse effects in relation to noise disturbance and vibration have been examined by the applicant within the NIS and are not considered to be likely to give rise to significant adverse effect to the majority of Natura 2000 sites, given the separation distances involved and known ex-situ sites from the proposed works. Effects would not be expected beyond 150m for mammals such as otter and 300m for wintering birds. It is stated that noise levels arising from construction would attenuate to existing background noise levels at that distance, however, this issue remains a concern as there are two Natura Sites within the stated 300m distance. In relation to these, I do not consider that the QIs of the South Dublin Bay SAC are significantly sensitive to noise and vibration impacts, however, the SCIs of South Dublin Bay and River Tolka Estuary SPA would be. In this regard, I consider that impacts will only arise in relation to the construction phase. The operational stage of the Proposed Scheme will not give rise to any significant changes to existing noise levels given the urban location of the Proposed Scheme and its nature (i.e. carrying out alterations to existing traffic corridors). The impact on the SPA will likely therefore result in the temporary displacement of certain SCI species from locations within 300m of works areas to other suitable lands in the locality for the duration of the works (maximum of 12 months / 1 season) when construction activities are being carried out. I also note that while works along the route will be transient in nature the construction compound will be in place for the full duration of works and is therefore likely to give rise to noise/vibration/disturbance impact over 2 seasons/years. The SPA areas (and exitu feeding sites) within 300m of works and the construction compound are also most proximate to existing urban and traffic corridors and as such SCI species using these areas will already be habituated to noise typically arising from anthropogenic activities including traffic. I also note that the NIS and CEMP contain a comprehensive suite of mitigation measures in order to minimise noise and construction disturbance.
- 10.7.3.2. In relation to the Wicklow Mountains SAC I note that the Proposed Scheme is within the potential home range of male otter that could originate from that Natura site. The Proposed Scheme could therefore potentially have an impact on this QI population as noted in the submitted NIS, albeit in my opinion such an impact is quite unlikely as otters at, or utilising, this location would already be habituated to high intensity urban and traffic activities including noise and vibration. Notwithstanding this,

however, the NIS contains a range of specific provisions to mitigate impact on this species in terms of noise controls, work practices and lighting.

10.7.3.3. In consideration of the above I conclude that significant adverse effects will not arise on European sites as a result of noise and vibration from the Proposed Scheme.

10.7.4. Air Quality deterioration

- 10.7.4.1. South Dublin Bay SAC and South Dublin Bay and River Tolka Estuary SPA are both within the acknowledged zone of influence of potential air quality impacts, which is stated within the submitted NIS as being 50m from the Proposed Scheme boundary and 500m from the construction compound for the construction phase. During the operational phase the air quality ZOI is within 200m of the Proposed Scheme boundary where there is a change in Annual Average Daily Traffic (AADT) flows greater than 1,000 is predicated to occur (such a change has been predicted on the Rock Road). Air quality impacts could potentially occur from dust deposition during construction activities and/or emissions from vehicle exhausts and deposition of particulate matter and heavy metals from engine, brake and tyre wear. All of which can result in deposition of oxides of nitrogen (NO, and NO_x) volatile organic compounds (VOCs) particulate Matter (PM) heavy metals (HM) and Ammonia in the vicinity of a road carriageway which can affect ecosystem and vegetation.
- 10.7.4.2. I am satisfied that the suite of mitigation measures provided for within the NIS and CEMP (summarised previously above) will ensure that significant impacts on European Sites will not arise from dust deposition during the construction phase.
- 10.7.4.3. In relation to operational impacts, I note the provisions of the Air Quality Standards 2011 and the relevant critical limits for NO and NO_x for the protection of vegetation and natural ecosystems (which has been established at 30µg/m³). This limit is exceeded in both the "do minimum⁴²" and "do something⁴³" scenarios for the construction and operational phases for the two relevant European sites within the relevant ZOI. In all cases where exceedances occur the modelled baseline environment is already in excess of the limit and reduces below the critical level at

⁴² "Do Minimum" – represents the likely traffic and transport conditions providing for the implementation of any transport schemes which have taken place, been approved or are planned for implementation without the Proposed Scheme in place.

⁴³ ""Do Something" – represents the likely traffic and transport conditions of providing for all schemes in the do minimum scenario with the Proposed Scheme in place.

150m from Rock Road. During the operational phase in the do something scenario NOx is modelled to reduce below the critical level at 160m from Rock Road, therefore resulting in an additional area of the SPA being subject to higher levels. However, Nitrogen deposition levels have been compared to the critical loads for the most sensitive features within the sites and in all scenario's levels are below the lower critical loads for terrestrial habitats (critical loads being defined as an estimate of an exposure to a given pollutant below which significant harmful effects on specified sensitive elements of the environment do not occur). All sites are below the lower load of inland and surface water habitats of 5-10 Kg(N)/ha/yr (National Roads Authority, 2011) within both scenarios. On the basis of the above it is therefore predicted that there will not be any harmful effects on habitats/vegetation within the SAC or SPA from NO and NO₂ and as a result there will not be any reduction in habitat area of the QIs (SAC), or SCI wetland habitat (SPA) nor any resulting change in the use of the wetland habitat as a resource for the relevant SCI species.

- 10.7.4.4. I note that amenity grassland habitats adjacent to the SPA, have the potential to be used by wintering birds as ex-situ sites, similar to the above the NIS and associated Air Quality Assessment (Appendix VI of the NIS) states that NO₂ deposition will remain below the critical loads of inland and surface water habitats of 5-10 Kg(N)/ha/yr (National Road Authority, 2011), and accordingly adverse effects will not arise.
- 10.7.4.5. It is predicted therefore that there will not be any reduction in the permanent area occupied by the wetland habitat as specified by the conservation objectives for South Dublin Bay and River Tolka Estuary SPA, nor any permanent change on how SCI birds utilise the SPA. Similarly, it is not predicated that there will be any reduction in the permanent area occupied by the habitats listed as QI's for the Dublin Bay South SAC.

10.7.5. Habitat loss and fragmentation

10.7.5.1. It is important to reiterate at this juncture that the proposed scheme does overlap with two European sites. The overlap between the proposed scheme and the South Dublin Bay and Tolka Estuary SPA is 4.3m² (at Booterstown Marsh), and between the proposed scheme and the South Dublin Bay SAC is 2.7m² on the coastal side of the Merrion Gates. Neither of these overlap areas are within QI habitats or habitats

on which QI/SCI species rely on for foraging, resting/roosting or commuting. The overlap areas comprise of pre-existing hardstanding surfaces which are of low ecological value, are not listed on Annex I of the Directive, and are proposed to be replaced by new road surface i.e. proposed scheme will result in existing hardstanding areas being replaced with equivalent to that already in place. Accordingly, I do not consider that the Proposed Scheme will give rise to adverse impacts on either the SPA or SAC in relation to the proposed works within these overlapping areas.

- 10.7.5.2. SCI species for which SPAs in the vicinity of the Proposed Scheme have been designated (namely Malahide Estuary SPA, Baldoyle Bay SPA, North Bull Island SPA, South Dublin Bay and River Tolka SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Ireland's Eye SPA, Lambay Island SPA, Dalkey Islands SPA and even potentially The Murrough SPA and the North West Irish Sea cSPA) are known to use ex-situ feeding sites in the Dublin Area.
- 10.7.5.3. Ex-situ areas suitable for foraging and/or roosting habitat for SCI species have been identified within the footprint of the Proposed Scheme, namely grassland adjacent to Booterstown Marsh (which was found not to support wintering bird species) and grassland at Blackrock Park where temporary loss of 0.07ha as well as the permanent loss of 0.03Ha of GA2 habitat that is suitable to support breeding gull and wintering bird species is required to facilitate the Proposed Scheme. I consider that adverse impacts will not arise on European Sites from the Proposed Scheme due to (a) the low frequency of SCI bird species using these specific areas, (b) 0.07ha of the GA2 land-take at Blackrock Park is temporary (and will be returned to GA2 habitat following construction activities at that location), (c) the 0.03ha of permanent habitat loss is most proximate to the existing transport corridor (and is therefore a location which is already most exposed to higher disturbance levels and activity from existing vehicular and pedestrian traffic along the corridor), and (d) that there remains a significant amount of similar lands in the vicinity and wider area to accommodate the SCI species.
- 10.7.5.4. Surveys were undertaken in order to determine the importance of these sites for the SCI species. I note that survey results demonstrated a relatively low frequency of occurrence of SCIs from the aforementioned Natura 2000 sites. Low occurrence suggests that these species do not regularly use or rely upon these lands as foraging

and/or roosting habitat and are likely to use other suitable sites available in the wider area on a similar or more regular basis. The availability of large areas of suitable foraging and/or roosting habitat for these SCI bird species in the wider locality of the Proposed Scheme, including those in closer proximity to nearby SPAs ensures that the extent of temporary and permanent loss of GA2 habitat as outlined above will not have a significant adverse effect on the SCIs listed and consequently on the conservation objectives of the following SPAs Malahide Estuary SPA, Baldoyle Bay SPA, North Bull Island SPA, South Dublin Bay and River Tolka SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Ireland's Eye SPA, Lambay Island SPA, Dalkey Islands SPA, the Murrough SPA as well as the North West Irish Sea cSPA.

10.7.6. Habitat degradation/effects on QI/SCI species as a result of hydrological impacts

- 10.7.6.1. The Proposed Scheme is hydrologically connected to Dublin Bay downstream via the Dodder_50, Brewery Stream_10, Grand Canal, Booterstown Marsh and Nutley Stream as well as a network of interconnecting existing surface or combined sewer/surface pipes. Dublin Bay contains a number of European sites: South Dublin Bay SAC, North Bull Island SPA, South Dublin Bay and River Tolka SPA, Howth Head SAC, Howth Head Coast SPA, Rockabill to Dalkey Island SAC, North West Irish Sea cSPA and Dalkey Islands SPA.
- 10.7.6.2. The release of contaminated surface water runoff and/or an accidental spillage or pollution event into any surface water features during construction, or operation, has the potential to affect water quality in the receiving aquatic environment. Such a pollution event may include: the release of sediment into receiving waters and the subsequent increase in mobilised suspended solids and the accidental spillage and/or leaks of contaminants into receiving waters. The associated effects of a reduction of surface water quality could potentially extend for a considerable distance downstream of the location of the accidental pollution event or the discharge.
- 10.7.6.3. Therefore, this reduction in water quality albeit unlikely (either alone or in combination with other pressures on water quality) could potentially result in the degradation of sensitive habitats present within Dublin Bay. As a worst case scenario there is potential to affect mobile SCI bird species that commute, forage and loaf in

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Dublin Bay. It could also negatively affect the quantity and quality of prey available to SCI bird species. These potential impacts could occur to such a degree that they result in significant effects which could have implications for the conservation objectives of North Dublin Bay SAC, South Dublin Bay SAC, Howth Head SAC, Rockabill to Dalkey Island SAC, Lambay Island SAC, Howth Head Coast SPA, North Bull Island SPA, South Dublin Bay and River Tolka Estuary SPA, Baldoyle Bay SPA, Dalkey Islands SPA, Malahide Estuary SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA, the Murrough SPA and the North-west Irish Sea cSPA. Also there is the slight possibility that impacts could arise in relation to QI species (otter) in the Wicklow Mountains SAC.

10.7.6.4. Based on the information provided and mitigation measures included in relation to protection of water, I am satisfied that adverse effects can be excluded for these sites. No loss of habitat on which the protected species within these European sites will occur. Adverse effects from water contamination and sediment release can be effectively prevented by mitigation measures ensuring the protection of the relevant watercourses and pipe networks which drain into Dublin Bay. There will be no net increase in existing runoff rates and appropriate treatment will ensure runoff quality.

10.7.7. Habitat degradation/effects on QI/SCI species as a result of hydrogeological impact

10.7.7.1. Having regard to the nature of the works and the extent/depth of excavations/ construction required I consider that the Proposed Scheme will not have a direct impact on ground waters or habitats which rely on ground water. The only potential for hydrogeological impacts to arise on a protected site is from surface water interactions. I am satisfied that the suite of mitigation measures set out above in relation to protection of surface waters will accordingly serve the dual purpose of ensuring that in-direct impacts on hydrogeology will not arise on the South Dublin Bay and River Tolka Estuary SPA or any other protected sites.

10.8. In combination Effects

10.8.1. In combination effects are examined within Section 9 of the submitted NIS. The proposed works were considered in combination with all plans and/or projects with

the potential to impact upon the European sites outlined above. Such plans and projects included any national, regional and local land use plans or any existing or proposed projects (in place at the time of lodgement of the Proposed Scheme for the consideration of the Board) that could potentially affect the ecological environment within the ZoI of the Proposed Scheme. The Plans and Projects considered in the NIS are listed in Table 38 of the submitted NIS. Each plan and project has been individually considered for any potential in combination effects, these considerations are detailed in table 39 of the submitted NIS.

10.8.2. It is important to consider at this juncture that some concerns have been raised within the submissions received in relation to the potential for in-combination effects with regard to other projects in and around the city and along the route of the Proposed Scheme. In this regard I note that the Proposed Scheme is located in an urban location with a significant number and wide range of projects both permitted and proposed along the scheme corridor, in the vicinity, and in the wider area. I also note that while the submitted NIS has considered a range of projects individually in table 40 (including the other BusConnects proposals, SHD developments – which are discussed together under a single heading as well as various transport infrastructure proposals – Metrolink, DART+ and LUAS enhancements etc.) there are certain planning permissions/consents along the route that have not been specifically referenced and/or have been referenced in the received submissions from third parties. Of note in this regard would be the Development of the National Maternity Hospital at St. Vincent's, alterations to access at Blackrock Clinic, residential development at Elmpark Green, as well as various other residential and commercial developments along the route. In the interests of clarity I wish to state that I have considered these consents as part of this assessment in relation to the potential to give rise to in-combination effects on the relevant European Sites. In particular, I have considered the context of the permissions that have issued for these projects (being located very much within a fully serviced urban environment), as well as the nature and character of the consents (which have considered all relevant environmental factors and included appropriate conditions/design/mitigation measures as relevant). I also note that all projects which have been permitted, or are currently proposed must comply with all applicable planning and environmental approval requirements and be in accordance with the objectives and policies of the

relevant land use plans (Development Plans, Local Area Plans etc.) which include protections for Natura 2000 sites and areas of ecological sensitivity. In this regard all such projects are subject to the environmental protection policies included within the relevant land use plans and have all been, or will be, (in the case of current not-yet consented projects) subject to the full rigours of the relevant consenting and appropriate assessment processes. In this regard I have considered all relevant projects and am satisfied that all such projects have been considered in the context of potential for in combination effects on the relevant European Sites.

- 10.8.3. I am satisfied that the range of mitigation measures included in the Proposed Scheme will avoid significant impacts and that alone the Proposed Scheme will not adversely affect the integrity of any European sites, I am also satisfied that other such projects within the zone of influence of the Proposed Scheme will not act in combination with the Proposed Scheme to have an adverse effect on the integrity of any European sites.
- 10.8.4. I note that in consideration of Plans for the purposes of in-combination effects on European sites there are some listed within the submitted NIS (Table 39 and section 9.2 of that document refers), that have been updated, in this regard and in the interests of clarity, please note that for the purposes of this assessment I have considered the current Fingal County Development Plan 2023-2029, Dun Laoghaire-Rathdown Development Plan 2022-2028, South Dublin County Development Plan 2022-2028, Dublin City Development Plan 2022-2028 and Wicklow County Development Plan 2022-2028. These landuse plans (which were all subject to relevant Appropriate Assessment/Habitats Directive Reporting as part of the planpreparation and adoption processes) continue to include objectives and policies to ensure the protection of European sites from any projects proposed within their functional areas (similar to the previous plans in these areas whose objectives and policies are listed in the submitted NIS).
- 10.8.5. The updated landuse plans contain the following overarching plan level environmental protection policies:
 - Dun Laoghaire Rathdown Development Plan 2022-2028.
 - Policy objective GIB18 provides for the protection of Natural Heritage and the Environment including SPAs and SACs, GIB19 also protects

the Natura 2000 network while GIB21 reiterates this protection and promotes their maintenance and as appropriate promotes the delivery of favourable conservation status of habitats and species within SACs, SPAs (and NHAs).

- Dublin City Development Plan 2022-2028.
 - Policy GI9 states it is policy to conserve, manage protect and restore the favourable conservation condition of all QIs/SCIs of all designated SACs and SPAs.
- Fingal County Development Plan 2023-2029.
 - Policies GINHP17 and GINHP12 ensure the protection of areas designated as Natura 2000 sites (i.e., SACs and SPAs)
- South Dublin Development Plan 2022-2028.
 - Policy NCBH3 states that Natura 2000 sites will be conserved and protected, while objective 1 of this policy prevents development and activities that would adversely affect the integrity of these sites, objective 2 states plans can only be adopted if they will not have significant adverse effects on sites, and objective 3 states that permission can only be granted for development where such affects (either alone or in combination) will not arise.
- Wicklow County Development Plan
 - Objective CPO 17.4 refers to contributing as appropriate towards the protection of designated ecological sites including SACs and SPPAs.
 Objective CPO 17.5 states that projects which give rise to adverse effects on the integrity of European sites will not be permitted, while CPO 17.6 ensures development proposals will contribute as appropriate towards protection and where possible enhancement of the European site network and goes on to state that all projects and plans arising from the Development Plan will be screened for the need to undertake AA.
- 10.8.6. As a matter of clarity, I also note that given the recent new legislative provisions that have been enacted in relation to maritime consents for marine/coastal developments

for both An Bord Pleanála and the relevant Marine Coastal Area Local Authorities, that the consideration of the National Marine Planning Framework, 2021 (NMPF) is pertinent. In this regard I note that the provisions of the NMPF require that any proposals must demonstrate that they can be implemented without adverse effects on the integrity of SACs or SPAs (Protected Marine Sites Policy 1 refers).

- 10.8.7. Considering the environmental protection policies included within these land use plans (similar to their predecessors) as well as the NMPF, and given that, as concluded previously above, on its own the Proposed Scheme will not give rise to adverse impact on the integrity of any European site I do not consider there will be any in-combination impacts arising. In this regard I note that all local area plans (currently in place and any forthcoming updated plans) must also fit within and follow the framework policies and objectives established within the higher-level City and County Level landuse plans in the policy hierarchy.
- 10.8.8. The in-combination assessment within Section 9.3 of the NIS submitted has concluded that there is no potential for adverse effects on the integrity of any European sites including those within its zone of influence, to arise as a consequence of the Proposed Scheme in-combination with any other plans or projects.
- 10.8.9. Mitigation measures detailed in Section 7 of the NIS and summarised previously above in Section 10.5.3 of this report will ensure that no adverse effects on European sites integrity will arise from the implementation of the Proposed Scheme.
- 10.8.10. The implementation of, and adherence to, the policies and objectives of the relevant plans set out above (similar to the policies of the previous plans as set out in Section 9.2 of the submitted NIS) will ensure the protection of European sites across all identified potential impact pathways and will ensure any future project must undergo Screening for Appropriate Assessment and/or Appropriate Assessment, as required.
- 10.8.11. As the Proposed Scheme will not affect the integrity of European sites and given the protection afforded to European sites under the overarching land use plans and NMPF, I am satisfied that there will be no adverse effects on the integrity of any European sites to arise as a consequence of the Proposed Scheme acting incombination with any other plans or projects.

- 10.8.12. The Department of Housing, Local Government and Heritage submission to the project has noted the submitted NIS and the various appropriate measures included to prevent any pollution arising from the compound or other works associated with the Proposed Scheme. The Department has also noted the contents of the CEMP, Surface Water Management Plan (SWMP), and Environmental Response Incident Plan and states that *"If these various plans are fully adhered to and implemented during the construction of the proposed bus corridor this Department considers that any detrimental effects to the South Dublin Bay and River Tolka Estuary and the South Dublin Bay SAC should be successfully avoided."* It concludes in this regard by recommending a condition be imposed to ensure that the stated mitigation measures in the CEMP, NIS and SWMP be implemented.
- 10.8.13. On the basis of the foregoing, overall I am satisfied that the NIS and supplementary information provided as part of the application has examined the potential for all impact mechanisms in terms of the conservation objectives of the North Dublin Bay SAC, South Dublin Bay SAC, Howth Head SAC, Rockabill to Dalkey Island SAC, Lambay Island SAC, Wicklow Mountains SAC, Howth Head Coast SPA, North Bull Island SPA, South Dublin Bay and River Tolka Estuary SPA, Baldoyle Bay SPA, Dalkey Islands SPA, Malahide Estuary SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA and, the Murrough SPA. While not included within the submitted NIS (as it had not vet been identified) the Board should note that I have included the North West Irish Sea cSPA within my consideration above. The potential for adverse effects can be effectively ameliorated by both design-based and applied mitigation measures associated with the Proposed Scheme which will ensure that in-combination effects will not arise, this will be further assured through the legislative requirements in place in relation to the consideration of currently proposed and future developments in the vicinity.

10.9. Mitigation Measures and Monitoring

10.9.1. Full details of the mitigation measures are provided in the NIS, Construction Management Plan and Invasive Species Management Plan and summarised previously above in Section 10.5.3 of this report. I consider that all measures proposed are implementable and will be effective in their stated aims. Furthermore, an Environmental Manager (EM) or equivalent role will be appointed by the contractor during the construction phase who will, inter-alia, co-ordinate the day-today management of environmental impacts and commitments, and also a suitably qualified Ecologist will be appointed to advise the contractor on ecological matters during construction.

10.10. Appropriate Assessment Conclusion: Integrity Test

- 10.10.1. In screening the need for Appropriate Assessment, for the Proposed Development it was determined that the proposal to develop a multimodal sustainable transport route had the potential to result in significant effects on North Dublin Bay SAC, South Dublin Bay SAC, Howth Head SAC, Rockabill to Dalkey Island SAC, Lambay Island SAC, Wicklow Mountains SAC, Howth Head Coast SPA, North Bull Island SPA, South Dublin Bay and River Tolka Estuary SPA, Baldoyle Bay SPA, Dalkey Islands SPA, Malahide Estuary SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA, the North West Irish Sea cSPA, and the Murrough SPA. Consequently, an Appropriate Assessment was required of the implications of the project on the qualifying features of these sites in view of their conservation objectives.
 - 10.11. Following a detailed examination and evaluation of the NIS all associated material submitted with the application as relevant to the Appropriate Assessment process and taking into account submissions of third parties, I am satisfied that based on the design of the Proposed Scheme, combined with the proposed mitigation measures, adverse effects on the integrity North Dublin Bay SAC, South Dublin Bay SAC, Howth Head SAC, Rockabill to Dalkey Island SAC, Lambay Island SAC, Wicklow Mountains SAC, Howth Head Coast SPA, North Bull Island SPA, South Dublin Bay and River Tolka Estuary SPA, Baldoyle Bay SPA, Dalkey Islands SPA, Malahide Estuary SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA, the North West Irish Sea SPA, and the Murrough SPA can be excluded with confidence in view of the conservation objectives of those sites.
 - 10.12. Accordingly following an appropriate assessment, it has been ascertained that the Proposed Scheme/Project, individually or in combination with other plans or

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projects would not adversely affect the integrity of these European sites, or any other European site, in view of the sites' Conservation Objectives. No reasonable scientific doubt remains as to the absence of such effects

This conclusion is based on the following:

- Full and detailed assessment of all aspects of the Proposed Scheme that could result in significant effects or adverse effects on European Sites within a zone of influence of the development site.
- Consideration of the conservation objectives and conservation status of qualifying interest species and habitat.
- A full assessment of risks to special conservation interest bird species and qualifying interest habitats and species.
- Complete and precise survey data and analysis of wintering birds in particular those encountered at lands at Blackrock Park and Booterstown Marsh. The Proposed Scheme site has been scientifically verified as not being of significance to, or an area favoured by, SCI bird species at any stage of the wintering or summer seasons.
- Detailed assessment of in combination effects with other plans and projects including historical projects, current proposals and future plans.
- Application of mitigation measures designed to avoid adverse effects on site integrity and likely effectiveness of same.
- The Proposed Scheme will not undermine the favourable conservation condition of any qualifying interest feature or delay the attainment of favourable conservation condition for any species or habitat qualifying interest for these European sites.

11.0 Compulsory Purchase Order

11.1. Overview

- 11.1.1. The National Transport Authority ("NTA") is seeking confirmation of the Belfield / Blackrock to City Centre Core Bus Corridor Scheme Compulsory Purchase Order 2022 ("the CPO"). The purpose of the CPO is to facilitate the construction of the Belfield / Blackrock to City Centre Core Bus Corridor Scheme ('the Proposed Scheme') to facilitate public transport and all ancillary and consequential works.
- 11.1.2. Sections 1.1.2, 1.2.2, and 1.3.3 of my report (above) has previously set out the introduction, legislative provisions, and listed the submitted documentation relevant to the CPO respectively. A detailed description of the Proposed Scheme is set out in Section 3, and the policy context in section 4.
- 11.1.3. Schedule Part I of the CPO order lists 39 plots of land permanently affected by the CPO and the Schedule part II lists 44 plots that will be temporarily affected during construction works. There are no plots listed in Schedule III (Section A) as there will be no public rights of way extinguished. Public rights of way which will be restricted or otherwise interfered with are listed in Schedule III (Section B). There are two such locations, the first is at George's Avenue where vehicular traffic (other than bicycles, emergency, maintenance or refuse vehicles) is proposed to be restricted, and the second at the junction of Elgin and Pembroke Roads which is proposed to be closed to traffic. Private rights are to be acquired at twelve locations. Finally, private rights of way will be temporarily restricted or otherwise interfered with at four locations.
- 11.1.4. The lands described in the schedule are lands other than land consisting of a house or houses unfit for human habitation and not capable of being rendered fit for human habitation at reasonable expense.
- 11.1.5. For the Board to confirm the CPO, it must be satisfied that the National Transport Authority ('NTA') as the relevant acquiring authority has demonstrated that the CPO *"is clearly justified by the exigencies of the common good"*⁴⁴. This has been

⁴⁴ Set out in the judgment of Geoghegan J. in Clinton v An Bord Pleanála (No. 2) (2007) 4 IR 701.

interpreted by legal commentators⁴⁵ and broadly accepted as a requirement to satisfy the following criteria:

- That there is a community need that is to be met by the acquisition of the site in question.
- That the particular site is suitable to meet the community need.
- Any alternative methods of meeting the community need have been considered but are not demonstrably preferable (taking into account environmental effects, where appropriate), and
- The works to be carried out should accord or at least not be in material contravention of the provisions of the statutory development plan.

Another test set out in "Planning and Development Law" (Garrett Simons – Second Edition) requires consideration of whether the proposed CPO measures will have a disproportionate or excessive effect on the interests of the affected persons. This issue of proportionality, along with other issues arising from the matters raised by the objectors to the compulsory acquisition are all discussed in order in the following sections. In assessing the CPO I have considered throughout whether the lands/rights being acquired are necessary and suitable to facilitate the provision of the Belfield Blackrock to City Centre Core Bus Corridor Scheme. The Board should also note that a number of these issues (in particular, justification/need for the scheme, development plan compliance, and assessment of alternatives) have been discussed throughout the Planning Assessment (Section 8) and EIA (Section 9) of my report above and accordingly these preceding sections should be read in conjunction with this CPO assessment.

11.2. Community Need

11.2.1. The proposed scheme is being developed in response to the need for a sustainable, reliable form of public transport, and a safe and comfortable active transport network along the main radial routes of Dublin City. Sustainable transport infrastructure is known to assist in creating better communities and places to live and work, while

⁴⁵ As per 'Compulsory Purchase and Compensation in Ireland: Law and Practice, Second Edition, by James Macken, Eamon Galligan, and Michael McGrath, published by Bloomsbury Professional (2013)',

also stimulating economic development and enhanced health and well-being when delivered effectively. In this context, it can be reasonably argued that a community need would be fulfilled with the implementation of this project.

- 11.2.2. The National Planning Framework forecasts that the population of the Greater Dublin Area will increase by 25% by 2040. This population growth will give rise to increased traffic demands on a transportation network which is already experiencing significant congestion due to over-dependence and reliance on the private car. This congestion will only continue and increase unless suitable, viable and attractive alternative transport solutions can be provided to increase and maximise people movement. A double-decked bus takes up the same road space as 3 no. standard cars but typically carries 50-100 times more people, making it generally 20 times more efficient in providing people movement capacity within the same spatial area (i.e. three cars). As a simple comparison, using average occupancy levels, 50 or more cars would be required to provide the equivalent people movement capacity of one double decked bus, similarly walking and cycling take up much less space than the private car. Accordingly, prioritising the movement of buses and providing safer and more attractive cycling and pedestrian facilities will provide a more sustainable, efficient, and effective means of moving people around the City versus the current car dominated model. Such an intervention is vital along the Belfield / Blackrock corridor as the route is already experiencing congestion and the forecasted growth in population, jobs and all vehicle numbers (private car and goods vehicles) are all set to increase. The modelling carried out demonstrates that in the 2028 AM peak hour the Proposed Scheme will result in a reduction of 50% of people travelling via car, an increase of 100% in the number of people travelling by bus and an increase of 67% in people travelling along the corridor by cycling or walking. As a matter of clarity the Board should note that I am satisfied that the modelling carried out is robust and arrives at reasonable conclusions.
- 11.2.3. Moving more people using less space will result in less congestion and less emissions along the corridor over the short and long terms. Increased traffic without intervention will increase congestion and emissions, leading to longer journey times, significant adverse impacts on the amenities and character of the area, as well as on community health and wellbeing. While I note that the increased penetration of electric vehicles into the transport sector and with technological improvements over

the medium to long term that emissions should reduce, modelling shows that the Proposed Scheme has the potential to reduce CO_{2e} emissions equivalent to the removal of approximately 3,000 and 3,300 car trips per weekday from the road network in 2028 and 2043 respectively.

- 11.2.4. The current infrastructure along the route does not prioritise people movement, with only 37% of it having bus priority measures, and 4% having segregated cycling facilities, and accordingly there is a clear community need for improvements to reduce congestion. The Proposed Scheme will provide bus priority measures and segregated cycling infrastructure across 100% of the corridor as well as improving pedestrian facilities and the public realm. This will create attractive, efficient, and sustainable alternative modes of travel to the private car, thus improving journey times, reliability and combat increased congestion throughout the corridor.
- 11.2.5. The CPO is in relation to the Belfield/Blackrock to City Centre Core Bus Corridor Scheme, which is a significant existing transport route, serving the City Centre as well as significant nodes (village and commercial centres), services and trip generators (such as the RDS, SVUH etc.) along its length. Congestion is already a common experience along this route, and without appropriate intervention the additional population and forecasted economic growth will increase traffic volumes and potentially lead to gridlock becoming a common feature along the route. Planning and transport policy all clearly point to the need to provide a better alternative to facilitate increased people movement along transport corridors to reduce emissions and congestion which adversely effects the population, economy and climate.
- 11.2.6. Overall, the Proposed Scheme as facilitated by the CPO will deliver critical and necessary physical infrastructure which is required to sustain and cater for the projected population growth. It will also provide more accessible, resilient, efficient and reliable public transport to the most disadvantaged and vulnerable in society, in a safer environment while also allowing travellers to benefit from better journey times and providing comfortable, predictable and attractive alternative to the private car. I also note that the private car will continue to be accommodated within the corridor albeit reallocation of road space will be in favour of public transport, cycling and pedestrian facilities.

11.2.7. From the above it is clear that there is distinct and obvious community need and justification for the proposed scheme from a population growth and congestion perspective; through the provision of the necessary infrastructure to facilitate connections and connectivity throughout the corridor and the wider area. The infrastructure facilitated by the CPO will provide greater opportunities and enhanced connectivity for all sections of the local community (and those who need to transit through this area) and all will be able to enjoy the wider benefits arising in terms of modal shift, reduced congestion, and reduced emissions, as well as providing healthier and more sustainable transport options.

11.3. Suitability of site/land to meet community need

- 11.3.1. Under the CPO it is proposed to acquire land (both on a permanent and temporary basis), restrict or otherwise interfere with public rights of way and private rights, acquire private rights, and temporarily restrict/interfere with private rights, all along and in proximity to existing roads and streets throughout the identified Belfield / Blackrock transport corridor. A detailed description of the Proposed Scheme and its route has been provided previously in Section 3 above.
- 11.3.2. The lands subject to the CPO are currently subject to a range of land uses which include private amenity space (gardens and driveways), public amenity spaces (for example Blackrock Park), residential developments communal (and private) landings, footpaths, recreational use (such as tennis court or golf course), education use (e.g. boundaries of Blackrock College), commercial (landings or curtilage of commercial premises), medical uses (for example amenity space/car park/frontage of premises such as SVUH and Blackrock Clinic). No habitable dwellings are proposed to be permanently acquired albeit portions of the driveways, and gardens of some private residential properties are included.
- 11.3.3. The Board should note that the Proposed Scheme relates predominantly to lands within and immediately proximate to the existing public roads, streets, and pedestrian areas where there are no specific zoning objectives in place. The Proposed Scheme runs through the functional area of two local authorities. The zoning pertaining to the lands within the functional area of Dun Laoghaire Rathdown include the following:

- A: To provide residential development and improve residential amenity while protecting the existing residential amenities.
- E: To provide for economic development and employment.
- F: To preserve and provide for open space with ancillary active recreational amenities.
- DC: To protect, provide for and/or improve mixed-use district centre facilities.
- SNI: To protect, improve and encourage the provision of sustainable neighbourhood infrastructure.
- NC: To protect, provide for and-or improve mixed-use neighbourhood centre facilities.

While the zoning provisions pertaining to the lands in the functional area of Dublin City Council include the following:

- Z1 (sustainable residential neighbourhoods),
- Z2 (residential neighbourhoods conservation area),
- Z3 (neighbourhood centres),
- Z4 (key urban villages / urban village),
- Z6 (employment/enterprise),
- Z9 (Amenity / Open Space / Green Network) and
- Z15 (Community and Social Infrastructure).
- 11.3.4. The Proposed Scheme occurs along existing roads and streets with the reallocation of road space and provision of cycle tracks being highly compatible with both the existing uses on and along the corridor. All works and ancillary elements included (such as bus shelters and their associated infrastructure along with amenity space improvements, planting etc.) are all compatible with the relevant zoning objectives of the two development plans. Furthermore, I note that under the Dublin City Plan the works would be considered as Public Service Installations which is listed as a compatible use within all the relevant zoning provisions along the corridor in the DCC area. Within Dun Laoghaire Rathdown the Proposed Scheme route is designated as a Core Bus Corridor, and as such the subject works are also considered compatible.

- 11.3.5. Within the DCC area the Proposed Scheme does not pass within any ACAs however, it does pass through areas that have been designated as Georgian or Residential Conservation areas. The Proposed Scheme is not within any ACA within Dun Laoghaire Rathdown although it does pass proximate to the Montpelier Place, Temple Hill (ACA). I consider that the Proposed Scheme is consistent with the provisions of these conservation areas albeit I have recommended minor alterations in terms of the omission of a bus shelter and planting provision along Fitzwilliam Street Lower within the DCC area, these are cosmetic and do not alter the nature/character or its suitability within this location.
- 11.3.6. The deposit map booklet identifies all lands that are being acquired on both a permanent and temporary basis and identifies lands on which public and private rights of ways will be altered or interfered with. Individual submissions/objections received in relation to the CPO lands, and impacts on rights have been set out in detail previously in Section 5.4 of this report.
- 11.3.7. The extent of the land that would be acquired under the order is determined by the specifications of the proposed core bus corridor layout and associated construction works. I consider that the Proposed Scheme has been designed to minimise the impacts on third party landowners and there are examples throughout where preferred infrastructure widths have been reduced to the minimum (e.g. cycle tracks being reduced from 2m to 1.5m in width) to reduce the extent of the associated land take.
- 11.3.8. Lands to be temporarily acquired are generally located adjacent to works areas and lands that are to be permanently acquired from third parties, and typically are narrow roadside strips, road entrances and access points/landings. The most significant areas of permanent/temporary land take in terms of size associated with the CPO include the following:
 - Along the boundary of Blackrock Park to facilitate route widening and provision of a retaining wall.
 - Along the frontage of the Blackrock Clinic to facilitate route widening and provision of a retaining structure.
 - Along the frontage of Blackrock College to facilitate route widening.

- On the open space/disused car park between College House and Carrol and Kinsella Motors at the Rock Road, to facilitate the provision of the temporary construction compound.
- Lands along the frontage and to the southeast of Merrion House to facilitate route widening.
- Lands at St. Mary's Centre, to facilitate route widening and junction improvements at the Merrion Gates junction.
- Lands along the Nutley Lane frontage of SVUH to facilitate route widening.
- Lands along the frontage of the EPGSC to facilitate route widening.
- Lands along the frontage of the RTE campus on Nutley Lane to facilitate route widening.
- Lands along the frontage of the Clayton Hotel to facilitate route widening and tree preservation.
- Lands at Pembroke Town Hall and Library being temporarily acquired to facilitate alterations to the access and parking arrangements for this building to ensure traffic safety and junction functionality.
- Public lands adjacent to 7 Ballsbridge terrace to facilitate junction improvements.
- Public lands along the Grand Canal near Wilton Terrace to facilitate tow-path ramp improvements.
- 11.3.9. Private residential lands that are impacted by the CPO (temporary/permanent land take and/or permanent/temporary interference with rights) include:
 - No.'s 151, 153, 155, and 157 Merrion Road, and Elmpark Apartment development, Merrion Road to facilitate route widening,
 - No. 85 Merrion Road and 12 Merrion View Avenue, to facilitate route widening.
 - Lios An Uisce (Blackrock), to facilitate route widening and tie-in to retaining structure.
 - No. 118 Stillorgan Road, to improve safety and junction design.

- No.'s 1-11 Pembroke Road, to facilitate bus gate functionality and effectiveness and junction safety.
- No.'s 31-33 Merrion Road, to facilitate tie in between residential development private landing and the proposed scheme, and
- Gowan Motors Site (145 Merrion Road) residential apartment scheme (under construction at site inspection) to facilitate route widening.
- 11.3.10. Overall, I am in agreement that the land-take for the proposed CPO along the corridor is necessary and proportional to ensure the delivery of the proposed scheme to appropriate standards and that the subject lands to be acquired are suitable for the use proposed given the current land use, the location of the land take (immediately adjacent to the existing transport corridor carriageway and footpaths) and the design of the Proposed Scheme which has minimised the land take requirements from third parties. I am satisfied that the land and rights subject to the CPO are suitable for the uses and purposes for which the CPO is being brought (i.e. to facilitate public transport, cycling and pedestrian infrastructure improvements along the Belfield / Blackrock Core Bus Connects Corridor and all associated works).

11.4. Alternative Methods of Meeting the Community Need

- 11.4.1. The next criteria to be satisfied in assessing the CPO is whether alternative methods of meeting the community need have been considered but are not demonstrably preferable (taking into account environmental effects where appropriate). Detailed consideration of alternatives is set out within section 3 of the submitted EIAR in relation to the application for the Proposed Scheme (ABP-313509-22). I have considered the available alternatives at Section 9.4 of this report above and have also considered the merits of a range of design alternatives in relation to route selection (Section 8.5 above) and specific junction and infrastructure design (at section 8.6 above). Alternatives to the Proposed Scheme were considered at three levels, strategic alternatives, route alternatives and design alternatives.
- 11.4.2. Strategic alternatives were considered primarily by the quantum of passenger traffic that is required to be accommodated and balanced against the potential impacts (including environmental impacts) that would arise. Alternatives considered include the 'do nothing' scenario, which given the community need as outlined above and

the potential for continued congestion and potential for gridlock in the context of increasing population and economic activity is neither viable nor appropriate. The full range of public transport options have been considered, bus rapid transport, light rail, metro heavy rail demand management and technological alternatives. The Transport Strategy for the Greater Dublin Area 2022-2042 recognises that a comprehensive bus network based on enhanced level of service and greater on-street priority is central to the delivery of a successful public transport system for the region. The passenger numbers to be accommodated are of a sufficient scale to require additional bus infrastructure, while improvements to the existing DART line and capacity expansion of the Luas Green line are also necessary to service this and the wider area, with all elements functioning together in a complimentary manner to provide a high level of service while minimising environmental and other impacts. As acknowledged in the GDA transport strategy, due to the urban nature and travel demands of the area all of these sustainable public transport solutions will be required to be improved as no single piece of infrastructure on its own can enhance the level of service and infrastructure to appropriate levels to provide a viable and attractive alternative to the private car, thereby relieving congestion and reducing emissions.

- 11.4.3. Route alternatives have also been considered in detail and assessed against a full range of environmental receptors and criteria, such as soils and geology, flora and fauna, potential archaeological, architectural, and cultural heritage impacts and impacts to roadside amenity such as existing trees. Other constraints relating to these routes such as land availability and the extent of third-party lands to be acquired were also considered and the route selections reduced and modified accordingly. Submissions have raised concerns in relation to specific route selection alternatives such as the need for the Nutley Lane and Pembroke Road sections of the Proposed Scheme, and I have considered these matters fully in section 8.5 above.
- 11.4.4. I note that throughout the public engagement and design process in relation to the Proposed Scheme that the applicant has considered and reviewed a large number of design and route alternatives (Section 3.3 of the submitted EIAR on ABP-313509-22) refers. Furthermore, I note that the design of the Scheme has insofar as is possible

minimised impacts on individual landowners, and in particular has sought to avoid impacts on smaller property owners such as private dwellings and gardens. Where land take requirements are necessary the EIAR shows that a number of alternatives were considered and reviewed before the final route was selected.

- 11.4.5. Accordingly, having regard to the information provided by the applicant in relation to alternatives and the design approach adopted, and the submissions lodged, I am satisfied that a significant number and wide range of options have been considered in detail before arriving at the design of the Proposed Scheme and establishing its CPO requirements. The applicant has engaged on a detailed consultation process, and where issues have been raised in relation to alternatives, these have been assessed and considered. Furthermore, I am satisfied that the process undertaken by the applicant presents a robust assessment of all relevant alternative options (including those raised by the public through consultation) having regard to environmental considerations and the Project Objectives, which I consider to be reasonable and appropriate.
- 11.4.6. On the basis of the above I am satisfied that the Proposed Scheme chosen is the one which best meets the stated scheme objectives including reducing congestion and improving public transport services and reliability. I also accept that the consideration of options within the selected route corridor and the strategy for key infrastructure provisions was a rigorous process, which had regard to environmental considerations. I therefore generally concur with the reasons for choosing the preferred alternatives as presented in the Proposed Scheme that will be facilitated by the CPO. I am, therefore, satisfied that any alternative means of meeting the community need have been considered and are not demonstrably preferable to that set out in the application and CPO documentation.

11.5. Development Plan Compliance

11.5.1. BusConnects is identified as being a key transport infrastructure project that has been specifically identified and is supported at all levels within the relevant planning policy context as set out previously in Section 4 of this report above. The consistent message set out at all policy levels in the hierarchy from EU, national, regional through to the relevant Development Plans is that there must be a transition to a low carbon and climate resilient society and that active and sustainable transport solutions must be encouraged to reduce congestion and emissions while fostering sustainable growth. The main objectives of the Proposed Scheme include the following:

- To enhance the capacity and potential of the public transport system by improving bus speeds, reliability, and punctuality through the provision of bus lanes and other measure to provide priority bus movements over general traffic.
- To enhance the potential for cycling by providing safe infrastructure for cycling, segregated from general traffic wherever practicable.
- To support the delivery of an efficient, low carbon and climate resilient public transport service, which supports the achievement of Ireland's emission reduction targets;
- To enable compact growth, regeneration opportunities and more effective use of land in Dublin, for present and future generations, through the provision of safe and efficient sustainable transport networks.
- 11.5.2. The proposed Belfield / Blackrock to City Centre Core Bus Corridor runs through the functional area of two planning authorities, Dublin City Council and Dun Laoghaire Rathdown County Council. The development plan policy context for both areas are set out in Sections 4.15 (Dun Laoghaire Rathdown County Council Development Plan 2022-2028) and 4.16 (Dublin City Development Plan 2022-2028) of this report above.
- 11.5.3. The Dublin City Development Plan specifically identifies BusConnects as a key sustainable transport project which is supported by Dublin City Council. In this regard SMT 22 of the Dublin City Plan states *"It is the Policy of Dublin City Council to support the expeditious delivery of key sustainable transport projects so as to provide an integrated public transport network with efficient interchange between transport modes, serving the existing and future needs of the city and region and to support the integration of existing public transport infrastructure with other transport modes. In particular the following projects subject to environmental requirements and appropriate planning consents being obtained: Dart +, Metrolink from Charlemount to*

Swords, <u>BusConnects Core Bus Corridor Projects</u>, Delivery of Luas to Finglas, Progress and developer of Luas to Poolbeg and Lucan."

- 11.5.4. The Dun Laoghaire Rathdown County Development Plan 2022 2028 also provides wide ranging support for the BusConnects programme, with that part of the Proposed Scheme within the functional area of Dun Laoghaire Rathdown being designated as "Core Bus Corridor Blackrock to Merrion" in the development plan mapping. Furthermore, policy objective T3 relating to the delivery of enabling transport infrastructure states "It is a policy Objective to support the delivery of enabling transport infrastructure so as to allow development take place in accordance with the Core Strategy of this Plan and the settlement strategy of the RSES. (Consistent with RPO 4.40, 10.2, 10.3, 10.11, 10.16 of the RSES)". The Plan goes on to identify BusConnects as such enabling transport infrastructure.
- 11.5.5. The Proposed Scheme also runs through the functional area of the Blackrock Local Area Plan 2015-2025, which designates the route as a "Proposed Quality Bus Corridor/Bus Priority Route" and promotes the principals of sustainable travel both to/from and within the Blackrock area. Accordingly I consider the Proposed Scheme to accord with the provisions of the Blackrock Local Area Plan.
- 11.5.6. Having regard to the above, I am satisfied that the Proposed Scheme is justified and in accordance with the overriding policy position set out within the Dublin City Development Plan 2022-2028, the Dun Laoghaire Rathdown Development Plan 2022-2028 as well as the national and regional policy documents set out in section 4 of this report above. In reaching this conclusion I also note that BusConnects is a key action under the major public transport infrastructure programme to deliver abatement in transport emissions, as outlined in CAP23.

11.6. Proportionality of Land Take

11.6.1. Overall, I consider that the land to be acquired permanently for the operation of the proposed scheme, and temporarily for the construction phase, as well as the associated acquisition/interference with various rights, is modest and proportionate to the works, and is required in the context of meeting an identified community need. The land take ensures that as far as practically possible, geometric design standards to facilitate bus lanes, cycle paths, pedestrian movement and general traffic

movement are adhered to, and that such land take is commensurate with the requirements to implement the project to a sufficient design standard. I also note, as pointed out previously, that where necessary preferred infrastructure widths have been reduced to minimise the scale of land take requirements.

11.7. Third Party Submissions/Objections on the CPO.

11.7.1. There were 23 no. third party submissions lodged in the initial public consultation phase in relation to the CPO process. The submissions and issues raised have all been summarised individually previously in Section 5.4 of this report. The submissions were circulated to the applicant (the NTA) who submitted a response to the issues raised (the responses to each individual submission are also summarised in Section 5.4 of this report). The NTA responses were forwarded to the various parties by the Board and further commentary was invited, twelve further submissions were made, which are also summarised in section 5.4.

11.7.2. Common issues raised in Objections

- 11.7.3. The submissions raised several common issues including the following:
 - The need for additional liaison and detail from the applicant to increase clarity of proposals,
 - Access to properties, and utilities and services,
 - The final detailing of the Proposed Scheme should tie in, and be consistent with, established planting and finishes,
 - CPO land take being excessive,
 - Concerns in relation to car parking,
 - Inappropriate impact on Protected Structures and their setting,
 - Devaluation of property, and
 - Proposed Scheme not taking account of permitted or proposed updated junction arrangements.

11.7.3.1. Liaison and Clarity

I am satisfied on the basis of the details on the application documentation, and mitigation measures set out within the CEMP that the applicant has, and continues to engage with property owners along the route of the Proposed Scheme. The application documentation contains the detail of the proposed works and the deposit maps outline the areas of lands involved in the CPO. Some third parties raise concerns that the extent of land take lacks clarity and more detailed mapping should be provided, however, I am satisfied that the deposit maps are of sufficient standard for clarity and the application documentation provides sufficient detail in relation to the nature of the Proposed Works. I also note that landowners involved in the CPO process have been properly notified and the CPO has been advertised in accordance with requirements. Furthermore, I note the commitments set out within the documentation for liaison and engagement with property owners in terms of the works that are proposed and in relation to engagement as to the nature of any set back boundary replacement and timing/scheduling of any works.

11.7.3.2. Access to Properties and Services

A linear project of the nature proposed, running through urban and suburban areas along the frontages of a large number of properties with a wide range of uses, will cause a degree of inconvenience and disruption at those properties throughout the construction phase. This is unavoidable, however, I and satisfied having reviewed the application documentation including EIAR, CEMP, and their associated mitigation measures and construction phasing programme, in combination with the commitments set out to engage fully with property owners and occupiers that impacts during the construction phase will be minimised. The documentation includes commitments to ensure that access and egress to properties will be maintained throughout the construction phase and that local arrangements will be made in this regard through engagement.

I note that the applicants have provided details of all existing services in the vicinity of works. The application documentation also provides for appropriate precautions will be taken to ensure that damage to utilities and services will not arise and states that all works will be carried out in accordance with best practices and the requirements of the relevant utility companies. Furthermore, I note that engagement has been carried out with the utility companies and where diversions or modifications

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to networks are required they will be planned and managed with full engagement of property owners to ensure impacts are minimised and prior notice put in place.

Finally in relation to utilities I note that the provision of lighting throughout the scheme will be in accordance with the plans and details submitted and lighting will comply with relevant standards and aim to minimise the effects of obtrusive light at night while reducing the visual impact of light stands etc. during the day.

11.7.3.3. Finishes and Landscaping

The Proposed Scheme includes the provision of significant public realm improvements as well as proposing to carry out landscaping along the site boundaries including where the scheme interacts with private properties along the route. The application documentation provides for the reinstatement of property frontage (including boundary walls/railings/hedgerow, gates, railings driveways, footpaths and landscaping) on a like for like basis (except where specific measures are set out therein e.g. the replacement boundary wall along the EPGSC frontage, or landscaping proposed along the frontage of the Blackrock Clinic). The detail of each specific property reinstatement, boundary finishes and accommodation works is to be prepared in consultation with the landowners as part of the overall compensation process in the event of the confirmation of the CPO. I am satisfied that the landscaping and finishes set out are appropriate and that the final detail of each frontage intervention will be set following additional consultation.

11.7.3.4. Extent of land take

Several of the submissions lodged raise concerns that the extent of CPO lands within certain individual properties is excessive. I have considered this matter in detail and, as set out previously above, I am satisfied that the Proposed Scheme has been designed to minimise the extent of land take required to facilitate the works required to improve public transport, cycling and pedestrian infrastructure throughout the route. It has been established that the provision of segregated cycle tracks are not only appropriate but that they represent the safest and best level of service for cyclists, furthermore dedicated bus lanes represent the optimal solution to ensure bus priority. Infrastructure widths have been minimised (within suitable standards) at locations to minimise the land take requirements, and while I note come

submissions/objections have included revised design proposals for their frontage (for example the objection by Blackrock Clinic) or questioned the justification for the Proposed Scheme (such as the objection by the Elm Park Golf and Sports Club who have queried the justification of the works along Nutley Lane) I consider that the design of the Proposed Scheme is appropriate.

In this regard I also note that the objection by Lamtos Unlimited Co. in relation to Merrion House and adjacent lands makes specific reference to the provision of a bus stop and two-way cycle track along their frontage. The location and design of bus stops has been discussed previously above at 8.6.2 and I consider that the proposed stop in the vicinity of Merrion House to be appropriate to the needs of the area. In relation to the two-way cycle track I am satisfied that this is required at this location as the east coast trail intersects with the Proposed Scheme at this location and the track is needed to avoid users of the cycle trail having to cross the road and/or continue onto Blackrock Park, while preserving junction capacity.

I have considered all submissions in relation to the extent of the land take within the CPO and I am satisfied of the community need for the Proposed Scheme and that the design adopted represents the optimal means of providing for this community need. There in only one location at which I consider that a junction design amendment to the Proposed Scheme or the CPO is necessitated - the public lands at Herbert Park (adjacent to Ballsbridge Terrace) as discussed previously above in Sections 8.6.36, and 9.11.12.1 of my report above. At this location I consider that it is appropriate for the junction to be redesigned to retain the Herbert Park railings in place and preserve existing trees. Should the Board concur with this amendment the CPO should be altered as the lands at this location (Ref. No. 1010(1).1h from the deposit maps – permanent land take Dublin City Council listed as the owner/reputed owner, and 'CE' private rights to be acquired from the ESB) will not be necessary to facilitate construction and accordingly I recommend that the CPO be amended to omit this holding.

11.7.3.5. Car Parking

Loss of car parking has been raised as both a general issue in relation to the loss of car parking along the Proposed Scheme, and as an impact on individual properties. The issue of general parking along the route of the Proposed Scheme has been discussed previously in this report above (Section 8.6.24 refers) where I conclude that the loss of car parking along the route is not of such significance or adverse impact to merit any changes, omission or refusal of the Proposed Scheme given the overall wider benefits arising in terms of improved bus, walking, and cycling infrastructure in terms of people movement and emissions reductions.

In terms of on-site parking provisions on directly impacted properties I note that neither the Proposed Scheme nor CPO will result in any private dwelling that can currently accommodate on-site parking losing that facility. Submissions/objections which raise this as a potential issue include those referencing no.'s 153, 155 and 157 Merrion Road. While I note that during the construction phase disruption and inconvenience will arise at these properties due to both the permanent and temporary land take involved, once construction works are complete these properties will retain the ability to accommodate car parking on their driveways.

The submission by Blackrock Clinic has also raised the issue of car parking and the loss of spaces from their on-site car park that will arise from the Proposed Scheme and its associated land take requirements in the CPO. I have considered this matter in full in section 8.7 of my report above. I consider that the extent of land take at this location to be appropriate and while there will be disruption and impact along the site frontage of the Clinic both during construction and operational phases, I consider that these are not significant when balanced against the overall benefits arising from the scheme in terms of the infrastructure improvements being provided for sustainable modes of transport in response to an identified community need.

11.7.3.6. Impact on Protected/Heritage Structures

I have considered in detail the potential for impact on protected structures and elements of heritage value at 8.8 and 9.11 of my report above. In this regard I note that submissions to the CPO have been made in relation to the Clayton Hotel, Ballsbridge, (former Masonic Lodge), No.'s 153 (RPS), 155 and 157 Merrion Road, Blackrock College (Entrance gate is on RPS), and the works proposed in the curtilage of no.'s 1-11 Pembroke Terrace. I consider that the design of the Proposed Scheme has given proper and detailed consideration to all interactions with heritage elements (including protected structures) that will arise and that all required mitigation measures and precautions in relation to works near, or in the vicinity of, protected structures or features of heritage value have been provided for and accommodated. The CEMP and EIAR provide details of appropriate mitigation measures that will be applied in the event of implementation of the Proposed Scheme.

11.7.3.7. Devaluation of Property

11.7.4. I consider that the Proposed Scheme will reduce congestion and sensitively improve the public realm and it will, in my opinion, contribute to and enhance the amenities of the areas in which it is situated, furthermore the improvements in transportation infrastructure will make the area more attractive. Accordingly I consider that the Proposed Scheme will in fact strengthen property values throughout the area. While I note that land take will have impacts on some individual properties, I note that this has been kept to a minimum and land acquisition has only been used as necessary. I am satisfied that the mitigation measures and design proposed will ensure significant adverse impacts on property values will not arise.

11.7.5. Incorporation of permitted and/or proposed junctions

Some submissions (including those by Latmos Unlimited and Blackrock Clinic) have raised concern that the Proposed Scheme has not considered consented or proposed updated junction or access arrangements. I have discussed this matter at section 8.6.46 above and note that the NTA does not have control over the timing of the implementation of any future proposed or consented projects along this route. I am satisfied that the Proposed Scheme can incorporate any updated junction arrangements should and as they arise in the context of any future or recently consented permissions. I consider that the Proposed Scheme will not prejudice any future development proposals along its route as it will in fact improve accessibility and upgrade bus infrastructure throughout, and due to the nature of its works it is capable of integrating with alternative access proposals/locations as necessary.

11.7.6. Individual Objections

- 11.7.7. Further to the above some objections have been made to the CPO which merit further discussion, these are discussed further below:
- 11.7.7.1. Elm Park Golf and Sports Club (EPGSC)

EPGSC has made an objection to the CPO specifically in relation to the land take requirements the scheme has along its frontage with Nutley Lane, the impacts on the club's facilities, loss of mature trees, the potential for the creation of traffic hazard, and ecological concerns. Permanent (1,333.6m²) and temporary (1,049.7m²) land take is required from the club as well as the permanent acquisition and temporary restriction of certain private rights to facilitate the provision of the required infrastructure at this location. I have considered the justification for the Proposed Scheme on Nutley Lane at 8.5.2 above (which includes the consideration of design alternatives for this link), and have found that it is appropriate to provide improved bus priority and cycling infrastructure at this location, furthermore, I consider that the extent and design of the Proposed Scheme is appropriate. I am satisfied that the design adopted has minimised land take requirements insofar as practicable while still delivering the overall objectives and minimising impacts. Section 8.5.2.7 above includes my consideration of the impacts on EPGSC, while sections 8.10, 9.8 and 10 of my report above has reviewed all potential ecological and biodiversity impacts arising, I have also considered the loss of mature trees and the impacts on visual amenities. In relation to the loss of mature trees I note that the Proposed Scheme provides for the planting of additional street trees elsewhere within the project and that the replacement wall at EPGSC will have climbing vegetation and be backplanted with hedgerow to ensure both the privacy and established amenity of the golf course. There will be disturbance during the construction phase, however, this will be managed as set out in the CEMP, and EIAR to ensure impacts will be minimised. I note and acknowledge that impacts will arise at the EPGSC, however, the overall design of the scheme will ensure the privacy of the club following construction, and the impacts must be balanced against the wider needs and benefit of creating sustainable transport infrastructure at this location.

11.7.7.2. Blackrock Clinic

In their objection Blackrock Clinic ('the Clinic') have raised concerns in relation to maintaining access and ensuring utility connectivity throughout construction as well as the direct impact that the CPO will have on their property through the permanent and temporary acquisition of lands. The clinic also notes that the Proposed Scheme will result in the loss of on-site car parking, mature trees and does not take account

of their recently consented revised access arrangements. These issues have been considered previously above at Section 8.7.5 of this report, which concludes by stating that the Proposed Scheme is appropriate at this location and that while impacts will arise on the Blackrock Clinic, I am satisfied that the design and construction measures provided for will mitigate against significant construction and operational impacts. In relation to the consideration of the CPO, I have concluded that there is a definitive community need for the works and that the project design and route is appropriate at this location, and therefore any impacts on individual properties must be balanced against the overall benefits arising from the Proposed Scheme.

11.7.7.3. Wappinger Food Corporation Ltd.

This objection was received in relation to Roly's Bistro (no. 7 Ballsbridge Terrace) and the pergola structure located on its gable end on lands owned by Dublin City Council. The Bistro has extended its floorspace to the side onto these lands and the objection submitted is seeking an amendment to the Proposed Scheme at this location to retain the heritage fencing and tree line as is. I note the concerns raised and have discussed this matter previously in my report in Section 8.6.36. I consider at this location that the preservation of trees, maintenance of heritage railings, and protecting the streetscape character would merit a change to the Proposed Scheme by redesigning the junction, so that the existing boundaries and trees are maintained. I am therefore recommending that the CPO be amended to omit the relevant DCC lands.

11.7.7.4. Residential Submissions

There have been a number of objections to the CPO from residential properties, including No.'s 153, 155 and 157 Merrion Road, No. 118 Stillorgan Road, Elm Court Apartments, some owners of properties in 1-11 Pembroke Road, Westfield/Castledawson Residential development, 31-33 Merrion Road, and a resident of Elmpark Green. The majority of issues raised have been dealt with previously above in terms of maintaining access and boundary treatments.

In relation to the objections arising from 1-11 Pembroke Road impacts and assessment are discussed in Section 8.8.6 to 8.8.8 and 11.8.3.6. I consider that the

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Proposed Works at this location are justified and appropriate and furthermore that they will not cause significant adverse effect or impact on these protected structures.

Similarly No.'s 153, 155 and 157 Merrion Road have been discussed previously above at 8.6.41, 8.8.12, 9.5.7.3, 9.5.7.4 and 9.11.12.3. I note that of these three Merrion Road properties only no. 153 is on the RPS. I consider that the design of the proposed scheme has minimised insofar as practicable the impact on these properties, and that appropriate reinstatement of the front boundaries will occur while retaining car parking spaces. Construction impacts and inconvenience will arise, however, as set out previously above I consider that the overall impacts will be minimised through the stated mitigation measures, and any such impacts must be balanced against the overall community benefits arising.

I note the objections raised by Elm Court Apartments, Westfield/Castledawson residential development, 31-33 Merrion Road and a resident of Elmpark Green. I consider that these properties will not be significantly impacted by the Proposed Scheme nor the associated CPO, and that the consideration of landscaping, frontage reinstatement, utilities management and ensuring access/egress throughout the construction phase as set out above are relevant in relation to these objections.

The CPO involves the temporary acquisition of lands and restriction/interference of private rights at 118 Stillorgan Road in order to close an existing direct private vehicular access point onto the Stillorgan Road / Nutley Lane junction. I consider that these works are justified and necessary in order to ensure pedestrian, cyclist and traffic safety as well as ensuring the efficiency of operations at this junction. I also note that this property will retain another access directly onto Nutley Lane. I note that there will be impacts on the property, however, when balanced against the overall benefits arising from the Proposed Scheme in terms of improved sustainable transport infrastructure I consider that the works are appropriate.

11.8. CPO Conclusion

11.8.1. I am satisfied that: the process and procedures undertaken by the National Transport Authority have been fair and reasonable, that the National Transport Authority has demonstrated the need for the lands, with the exception of Plot 1010(1).1h as set out above, and that all the other lands being acquired are both necessary and suitable to facilitate the provision the Belfield / Blackrock to City Centre Core Bus Corridor Scheme Compulsory Purchase Order 2022.

- 11.8.2. Having regard to the constitutional and convention protection afforded to property rights, I consider that the permanent and temporary acquisition of lands, restriction / interference with public rights of way, acquisition of private rights, restriction / interference with private rights, and temporary restriction / interference with private rights, and temporary restriction / interference with private rights, and temporary restriction / interference with private rights, as set out in the compulsory purchase order and on the deposited maps pursues, and is rationally connected to, a legitimate objective in the public interest, namely the development of the Belfield / Blackrock to City Centre Core Bus Corridor Scheme.
- 11.8.3. I am also satisfied that the acquiring authority has demonstrated that the means chosen to achieve that objective impair the property rights of affected landowners as little as possible; in this respect, I have considered alternative means of achieving the objective referred to in submissions to the Board, and am satisfied that the acquiring authority has established that none of the alternatives are such as to render the means chosen and the CPO made by the acquiring authority unreasonable or disproportionate.
- 11.8.4. The effects of the CPO on the rights of affected landowners are proportionate to the objective being pursued. I am further satisfied that the proposed permanent and temporary acquisition of lands, restriction / interference with public rights of way, acquisition of private rights, restriction / interference with private rights, and temporary restriction / interference with private rights would be consistent with the policies and objectives of the Dublin City Development Plan 2028, and Dun Laoghaire Rathdown County Development Plan 2022 2028, both of which documents support the provision and role out of the BusConnects Core Bus Corridor Schemes. Accordingly, I am satisfied that that the confirmation of the CPO is clearly justified by the exigencies of the common good.

12.0 **Recommendation**

12.1.1. I recommend that the application under Section 51(2) of the Roads Act, 1993 (as amended) for the Belfield / Blackrock to City Centre Core Bus Corridor should be

approved for the reasons and considerations as set out in Schedule 1 and consequently that the CPO is **confirmed** subject to amendment (Schedule 2).

Schedule 1

Reasons and Considerations

In coming to its decision, the Board had regard to the following:

a) EU legislation including in particular:

- The relevant provisions of EU Directive 2014/52/EU amending Directive 2011/92/EU (EIA Directive) on the assessment of the effects of certain public and private projects on the environment,
- Directive 92/43/EEC (Habitats Directive) and Directive 79/409/EEC as amended by 2009/147/EC (Birds Directives) which set out the requirements for Conservation of Natural Habitats and of Wild Fauna and Flora throughout the European Union.

b) National Policy and Guidance including in particular:

- Project Ireland 2040 encompassing the National Planning Framework and the National Development Plan.
- Climate Action Plan, 2023
- The Design Manual for Urban Roads and Streets, 2019.
- Department of Transport National Sustainable Mobility Policy, April 2022.

c) Regional Policy including in particular:

- The Transport Strategy for the Greater Dublin Area 2022-2042.
- Eastern & Midlands Regional Spatial & Economic Strategy, 2019-2031.

d) Local Planning Policy including in particular:

- The Dublin City Development Plan 2022-2028
- The Dun Laoghaire Rathdown County Development Plan 2022-2028
- The Dublin City Biodiversity Action Plan, 2021 2025

- The Dun Laoghaire Rathdown County Biodiversity Action Plan 2021 2025.
- Blackrock Local Area Plan 2015 2025

e) Other relevant guidance documents.

f) The following matters:

- the nature, scale and design of the proposed works as set out in the application for approval and the pattern of development in the vicinity,
- the documentation and submissions of the National Transport Authority (applicant), including the environmental impact assessment report and associated documentation submitted with the application, and the range of mitigation and monitoring measures proposed,
- the submissions and observations made to An Bord Pleanála in connection with the application,
- the likely consequences for the environment and the proper planning and sustainable development of the area in which it is proposed to carry out the proposed development and the likely significant effects of the proposed development on European sites, and
- the report and recommendation of the inspector, including the examination, analysis and evaluation undertaken in relation to appropriate assessment and environmental impact assessment.

Proper Planning and Sustainable Development

It is considered that the proposed development would accord with European, national, regional and local planning and that it is acceptable in respect of its likely effects on the environment and its likely consequences for the proper planning and sustainable development of the area.

Appropriate Assessment

The Board agreed with and adopted the screening assessment and conclusion carried out in the inspector's report that the North Dublin Bay SAC, South Dublin Bay

SAC, Howth Head SAC, Rockabill to Dalkey Island SAC, Lambay Island SAC, Wicklow Mountains SAC, Howth Head Coast SPA, North Bull Island SPA, South Dublin Bay and River Tolka Estuary SPA, Baldoyle Bay SPA, Dalkey Islands SPA, Malahide Estuary SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA, the North West Irish Sea cSPA, and the Murrough SPA. are the European sites for which there is a likelihood of significant effects.

12.1.2. The Board considered the Natura Impact Statement and all other relevant submissions and carried out an appropriate assessment of the implications of the proposal for the North Dublin Bay SAC, South Dublin Bay SAC, Howth Head SAC, Rockabill to Dalkey Island SAC, Lambay Island SAC, Wicklow Mountains SAC, Howth Head Coast SPA, North Bull Island SPA, South Dublin Bay and River Tolka Estuary SPA, Baldoyle Bay SPA, Dalkey Islands SPA, Malahide Estuary SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA, the North West Irish Sea cSPA, and the Murrough SPA., in view of the Sites' Conservation Objectives. The Board considered that the information before it was adequate to allow the carrying out of an appropriate assessment.

In completing the assessment, the Board considered, in particular, the likely direct and indirect impacts arising from the proposal both individually or in combination with other plans or projects, specifically upon the North Dublin Bay SAC, South Dublin Bay SAC, Howth Head SAC, Rockabill to Dalkey Island SAC, Lambay Island SAC, Wicklow Mountains SAC, Howth Head Coast SPA, North Bull Island SPA, South Dublin Bay and River Tolka Estuary SPA, Baldoyle Bay SPA, Dalkey Islands SPA, Malahide Estuary SPA, Rogerstown Estuary SPA, Skerries Islands SPA, Rockabill SPA, Ireland's Eye SPA, Lambay Island SPA, the North West Irish Sea cSPA, and the Murrough SPA.

- i. Mitigation measures which are included as part of the current proposal,
- ii. Conservation Objective for these European Sites, and
- iii. Views of prescribed bodies in this regard.

In completing the appropriate assessment, the Board accepted and adopted the appropriate assessment carried out in the Inspector's report in respect of the potential

effects of the proposed development on the integrity of the aforementioned European Sites, having regard to the sites' conservation objectives.

In overall conclusion, the Board was satisfied that the proposed development, by itself or in combination with other plans or projects, would not adversely affect the integrity of the European Sites, in view of the sites' conservation objectives.

Environment Impact Assessment

The Board completed an environmental impact assessment of the proposed development, taking into account:

- the nature, scale, location, and extent of the proposed development;
- the Environmental Impact Assessment Report and associated documentation submitted with the application;
- the submissions received during the course of the application;
- the Inspector's report;

The Board considered that the Environmental Impact Assessment Report, supported by the documentation submitted by the applicant, adequately considers alternatives to the proposed development and identifies and describes adequately the direct, indirect, secondary and cumulative effects of the proposed development on the environment. The Board agreed with the examination, set out in the Inspector's report, of the information contained in the Environmental Impact Assessment Report and associated documentation submitted by the applicant and submissions made in the course of the planning application.

Reasoned Conclusion of the Significant Effects

The Board considered that the Environmental Impact Assessment Report, supported by the documentation submitted by the applicant during the course of the application, provided information which is reasonable and sufficient to allow the Board to reach a reasoned conclusion on the significant effects of the proposed development on the environment, taking into account current knowledge and methods of assessment. The Board is satisfied that the information contained in the Environmental Impact Assessment Report is up to date and complies with the provisions of EU Directive 2014/52/EU amending Directive 2011/92/EU. The Board considered that the main significant direct and indirect effects of the proposed development on the environment are those arising from the impacts listed below.

- Positive long-term impacts on population and human health through facilitation of improved pedestrian and cyclist safety, faster and more reliable bus services, reduced traffic congestion, improved air quality and noise reduction, improved road/ street safety, more social interaction and positive accessibility and amenity impacts for community areas.
- Negative short-term impacts on population and human health from the construction phase in terms of access restrictions, noise, vibration, dust, contaminated material, traffic and visual impact. This will be adequately mitigated through compliance with the CEMP and measures outlined in the Land, Soils, Water, Air and Climate and Material Assets sections of the EIAR.
- Negative impacts on population and human health arising from land take (both permanent and temporary) required to facilitate the Proposed Scheme, from various individual residential, educational, services, and commercial properties. Where properties are directly affected the boundaries will be replaced on a like-for-like basis and access will be maintained throughout the construction process.
- Negative Impacts on Townscape and Landscape arising from construction activities (which will be temporary in nature) as well as longer term impacts on streetscape from the removal of a significant number of street trees.
 While these will be replaced where and as possible throughout the Proposed Scheme the loss of mature street trees will be a long-term negative impact.
- Positive Impacts on Townscape and Landscape arising from the provision of improved public realm and pedestrian facilities throughout the proposed scheme.
- Negative impacts on Architectural Cultural Heritage which will range in significance from the lower-level impacts associated with the provision of new signage and cantilevered signal poles in the vicinity of Protected Structures, to higher-level impacts arising from direct impacts arising from the need to alter protected structures and their boundaries that occur directly along the

route including properties whose boundaries will be set back (and sites reduced in size).

- Adverse impacts on **biodiversity** from the proposed removal of habitat. Vegetation removal within the Proposed Scheme involves the permanent removal of 329 no. street trees and 1,040m of hedgerow. Mitigation is designed into the Proposed Scheme as it also includes the provision of 349 trees and 558m of hedgerow. It is recommended that 11 no proposed trees along Fitzwilliam Street Lower be omitted from the scheme (in the interests of maintaining architectural heritage/integrity) and that the junction at Herbert Park and Merrion Road be redesigned to allow the protection of six additional trees and the established rail/boundary). The new planting will provide new nesting habitat for birds and the landscaping proposed will reduce the significance of habitat loss. Trees with potential roosting habitats for bats will not be removed and pre-construction surveys will ensure significant impacts on Bats do not arise. Similarly, pre-construction surveys for other fauna and invasive species within works areas will ensure that impacts will not arise as results will inform further mitigation measures. The Proposed Scheme does include works within designated sites, where such works are proposed the habitats involved are not sensitive and the integrity and reasons for the ecological protection of these sites will not be adversely impacted. Suitable mitigation is also incorporated within the CEMP in relation to invasive species. Impacts on biodiversity will therefore not be significant.
- Negative impacts on Water could arise as a result of accidental spillages of chemicals, hydrocarbons or other contaminants entering watercourses, the sea or groundwater via piling activities during the construction phase of the development. These impacts will be mitigated by measures outlined within the application and can therefore be ruled out.
- Potential adverse impacts on land, soils, geology and hydrogeology from loss or damage of topsoil, excavation of potentially contaminated ground and contamination of parts of an aquifer could arise during the construction phase. These impacts will be adequately mitigated through the implementation of the various environmental measures and best practice set out in the CEMP and therefore impacts will not be significant.

- Potential negative impacts on water quality could arise during construction due to runoff from the works areas containing fine sediments, or accidental spillages/ leakages of contaminants and direct disruption to the local drainage networks. The application documentation (EIAR and associated CEMP) contains a comprehensive suite of mitigation measures which are adequate and will protect water quality and ensure that significant adverse impacts will not arise.
- There is potential for impacts to **air quality** to arise from dust during construction works. These will be minimised with implementation of the appropriate mitigation measures set out within the EIAR and CEMP which will minimise dust emissions arising. During the operational phase there will be localised impacts on air quality at certain locations arising from re-distributed traffic patterns, and in particular along the Grand Canal in terms of NOx concentrations, this impact is considered to be negative, slight, and longterm.
- There is potential for noise disturbance to arise during the construction phase, works will generally be carried out in daytime hours causing no significant effects and mitigation measures will be applied in relation to works areas proximate to sensitive properties. Where works are required to be carried out at night-time and weekends (to avoid significant traffic impacts) liaison will be held with affected property owners and appropriate mitigation applied as practicable. Furthermore, significant noise abatement and controls are provided for within the CEMP to minimise noise arising from construction activities. During the operational phase the use of the transport corridor will remain consistent with its established use and overall impacts will be negligible, having particular regard to the changes (technological improvements) to the bus fleet and with the reduction in car numbers facilitated by the improved sustainable transport infrastructure being provided in the Proposed Scheme. Accordingly, significant impacts from noise can be ruled out during all phases of the Proposed Scheme.
- Potential for positive long-term impacts on climate through removal of the equivalent of approximately 3,000 and 3,300 car trips per weekday from the road network in 2028 and 2043 respectively (these numbers increase with

increased uptake in residual bus capacity) and associated reduction in CO_2 / GHG emissions.

- Positive impacts on traffic and transport by maximising the capacity of the Proposed Scheme to move more people by sustainable modes, whilst also providing for general traffic movements and activities.
- Short-term negative impacts on traffic and transport arising from the construction phase and the need to adequately divert and control traffic movements in and around works areas. Such impacts will be mitigated through the implementation of the traffic and transportation plan and CEMP.
- Potential adverse impacts on cultural heritage due to construction works
 potentially impacting on underlying archaeology and other cultural or heritage
 features such as monuments. Mitigation measures including archaeological
 monitoring and provision for protection / recording / monitoring underlying
 archaeology and heritage features in the vicinity of works.
- Potential adverse impacts on Architectural Heritage could arise from the Proposed Scheme due to the direct construction interventions on lands within the curtilage of protected structures or to protected structures themselves or where infrastructure is proposed within the wider setting of Protected Structures. Where works are proposed to protected structures, these are necessary to secure the overall wider beneficial impacts of the Proposed Scheme and these interventions have been designed to have minimum impact. Where boundaries are to be altered/set back to facilitate the Proposed Scheme the existing boundary materials are to be removed and reused/repurposed in an appropriate manner and using sensitive methodologies. Similarly, where heritage gateway features and/or Protected Structures are to be reorientated, relocated or altered I am satisfied that the methodologies and supervision set out are appropriate and will ensure impacts are not significantly adverse.

Having regard to the above, the Board is satisfied that the proposed development would not have any unacceptable direct or indirect effects on the environment. The Board is satisfied that the reasoned conclusion is up to date at the time of making the decision and that the information contained in the EIAR complies with the provisions of Article 3, 5 and Annex (IV) of EU Directive 2014/52/EU.

Conditions

1.	The proposed development shall be carried out and completed in
	accordance with the plans and particulars lodged with the application, except
	as may otherwise be required in order to comply with the following
	conditions. Where such conditions require details to be agreed with a
	planning authority, the developer shall agree such details in writing with the
	relevant planning authority prior to commencement of development and the
	proposed development shall be carried out in accordance with the agreed
	particulars.
	Reason: In the interest of clarity and the proper planning and sustainable
	development of the area and to ensure the protection of the environment.
2.	The mitigation, environmental commitments and monitoring measures
	identified in the plans and particulars relating to the proposed development,
	including those set out in the submitted Natura Impact Statement,
	Environmental Impact Assessment Report, Construction and
	Environmental Management Plan and Surface Water Management Plan
	shall be implemented in full or as may be required in order to comply with
	the following conditions. Prior to the commencement of development,
	details of a time schedule for implementation of mitigation measures and
	associated monitoring shall be prepared by submitted to the planning
	authorities for written agreement.
	Reason: In the interest of protecting the environment, the protection of
	European Sites and in the interest of public health.
3.	Prior to the commencement of development at each section of the proposed
	works, pre-construction surveys shall be carried out to determine the
	presence of protected mammal, bird or bat species.
	Reason: In the interest of environmental protection
4.	The proposed development shall be amended as follows:

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- (a) The bus shelter and street trees proposed on Fitzwilliam Street Lower shall be omitted.
- (b) Scaled elevations of proposed bus shelters to be provided throughout the route to be submitted for the written agreement of the relevant Planning Authority. Bus shelters on Baggot Street Lower and Baggot Street Upper shall not have advertisement panels included.
- (c) The Herbert Park/Pembroke Road/Shelbourne Road shall be redesigned/realigned to retain the trees, railing boundary and amenity space at the gable of no. 7 Ballsbridge Terrace. Should this redesign require transplant of the existing mature tree within current traffic island at Herbert Park, methodology and details for this are to be agreed in advance with the Planning Authority and implemented.
- (d) A free-standing heritage information panel is to be designed and provided in the vicinity of the relocated Bloomfield Gate explaining its background, relocation and history.
- (e) The concrete benches identified as CBC1415BTH087, -088 and -089 in the application documentation are to be removed, stored and incorporated into the new boundary treatment in the vicinity of their current location.
- (f) The buffer zone between the loading bays and cycle track on the northern side of Baggot Street Upper are to be extended from 750mm to 850mm.
- (g) A yellow box is to be provided on the inbound lane at the Willow Park entrance gates to facilitate traffic turning movement requirements.Revised drawings showing compliance with these requirements shall be submitted to the relevant planning authority for written agreement prior to the commencement of development, and the works carried out in accordance with the revised agreed details.

Reason: In the interests of proper planning and sustainable development cyclist safety, conservation of the visual amenities and character of the area, biodiversity, preservation of conservation streetscape and convenience.

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5.	Proposed kerb height differentials between footpaths, cycle tracks and bus lanes shall be retained in perpetuity.
	Reason: In the interest of maintaining the proper functionality of the scheme.
6.	The construction compound shall be established outside of the wintering bird
	season (October to March).
	Reason: In the interest of wildlife and biodiversity protection.
7.	The developer shall monitor queuing time / delays at each works location
	and record traffic flows on the local road network at locations to be agreed
	with the Local Authority. Such monitoring information shall be provided in a
	report to the Local Authority on a weekly basis.
	Reason: In the interest of orderly development.
8.	Prior to the commencement of development, the developer, and/or any agent
	acting on its behalf, shall prepare in consultation with the relevant statutory
	agencies, an updated Construction Environmental Management Plan
	(CEMP), incorporating all mitigation measures indicated in the Natura Impact
	Statement and Environmental Impact Assessment Report and a
	demonstration of proposals to adhere to best practice and protocols. This
	plan shall provide details of intended construction practice for the
	development, including hours of working, noise management measures,
	surface water management proposals, the management of construction
	traffic and off-site disposal of construction waste.
	Reason: In the interest of protecting the environment, the landscape,
	European Sites, and sensitive receptors and in the interest of public health.
9.	The construction of the development shall be managed in accordance with
	the updated Construction and Environmental Management Plan, which
	shall be agreed in writing with the relevant planning authorities. This plan
	shall provide details of intended construction practices for the development,
	including:
	(a) Location of the site and materials compound(s) including area(s)
	identified for the storage of construction refuse;

	(b) Location of areas for construction site offices and staff facilities	;
	(c) Details of lighting, site security fencing and hoardings;	
	 (d) Details of the timing and routing of construction traffic to and fr construction site; 	om the
	 (e) Measures to prevent the spillage or deposit of clay, rubble or o debris on the public road network; 	ther
	(f) Alternative arrangements to be put in place for pedestrians, cy and vehicles in the case of the closure of any public road or for during the course of site development works;	
	 (g) Details of appropriate mitigation measures for noise, dust and vibration, and monitoring of such levels; 	
	(h) Containment of all construction-related fuel and oil within speci constructed bunds to ensure that fuel spillages are fully contain	•
	 Off-site disposal of construction/demolition waste and details o is proposed to manage excavated soil; 	f how it
	(j) Means to ensure that surface water run-off is controlled such the silt or other pollutants enter local surface water sewers or drain	
	(k) Consultation with the respective Regional Waste Management Planning Office regarding development of the final plans.	
	A record of daily checks that the works are being undertaken in acc with the Construction Management Plan shall be kept for inspection planning authority.	
	Reason: In the interest of amenities, public health and safety.	
10.	The developer and/or any agent acting on its behalf shall ensure the plant and machinery used during the works should be thoroughly cl and washed before delivery to the site to prevent the spread of haz invasive species and pathogens.	eaned
	Reason: To ensure the protection of the local environment and Eur sites.	opean

11.	Water supply and drainage arrangements, including the attenuation and
	disposal of surface water, shall comply with the requirements of the relevant
	planning authority for such works in respect of both the construction and
	operation phases of the proposed development.
	Reason: In the interest of environmental protection and public health.
12.	A suitably qualified ecologist shall be retained by the developer to oversee
	the site set up and construction of the proposed development and
	implementation of mitigation measures relating to ecology set out in Natura
	Impact Statement and Environmental Impact Assessment Report. The
	ecologist shall be present during site construction works. Prior to
	commencement of works on any section of the proposed scheme, an
	ecological report of the proposed scheduling, monitoring and relevant
	mitigation of the site works shall be prepared by the appointed ecologist
	and agreed in writing with the relevant planning authority.
	Reason: In the interest of nature conservation and the protection of
	terrestrial and aquatic biodiversity.
13.	Prior to the removal/replacement of trees, hedging and planting which is to
	be altered the NTA shall agree with the relevant landowner the species, size
	and location of all replacement vegetation. The NTA shall also employ the
	services of an appropriately qualitied arboriculturist and Landscape
	Architect for the full duration of the proposed works to ensure landscaping
	and tree works are implemented appropriately.
	Reason: In the interest of visual and residential amenity.
14.	(a) Trees to be felled shall be examined prior to felling and demolition to
	determine the presence of bat roosts. Any clearance works shall be in
	accordance with the TII Guidelines for the Treatment of Bats during the
	construction of National Road Schemes. Only trees indicated for removal
	in the submitted Arboricultural Impact Assessment are to be removed
	subject to the provisions of these conditions.
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	(b) No ground clearance shall be undertaken and no vegetation shall be
	cleared during the bird breeding season, unless otherwise agreed with
	the relevant planning authority.
	(c) Tree protection measures for all existing trees shall be put in place prior
	to the commencement of development or phases of development.
	(d) All details of soft landscaping as well as tree planting species and
	maturity shall be submitted for the agreement of the relevant Local
	Authority prior to the commencement of development to include post-
	construction monitoring, maintenance and replacement if/as necessary.
	(e) Post-construction management, monitoring and replacement (if
	necessary) of climbing vegetation on the proposed new concrete wall
	along Nutley Lane at the frontage of the Elm Park Golf and Sports Club
	shall be put in place for a period of 5 years post construction. In the event
	of failure of the climbing vegetation on this wall a revised planting scheme
	is to be agreed with the Planning Authority and implemented.
	Reason: In the interest of wildlife and biodiversity protection and orderly
	development.
15.	Details of all signage shall be submitted to the Local Authority prior to the
	commencement of development to be held on record.
	Reason: In the interest of orderly development
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16.	Reason: In the interest of orderly development
16.	Reason: In the interest of orderly development Prior to the commencement of development, the developer and/or any agent
16.	Reason: In the interest of orderly development Prior to the commencement of development, the developer and/or any agent acting on its behalf shall submit an Invasive Species Management Plan to
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	Reason: In the interest of environmental protection and public health.
18.	In accordance with the EIAR, all works to Protected Structures, and
	structures of cultural heritage interest shall be monitored and recorded by
	an Architectural Conservation Specialist. Construction methodologies, and
	re-instatement method statements shall be submitted to the relevant Local
	Authority for written agreement prior to the commencement of works on any
	relevant section of the scheme. The Architectural Conservation Specialist
	shall ensure that adequate protection of the retained and historic fabric
	during the proposed works and across all preparatory and construction
	phases. Discovery of new architectural heritage shall be made known to
	the Conservation Section of Dublin City Council as soon as is practicably
	possible.
	Reason: In the interest of environmental protection
19.	The developer shall facilitate the preservation, recording and protection of
	archaeological materials or features that may exist within the site. In this
	regard, the developer shall –
	(a) employ a suitably qualified archaeologist who shall monitor all site
	investigations and other excavation works, and
	(b) provide arrangements, acceptable to the planning authority, for the
	recording and for the removal of any archaeological material which the
	authority considers appropriate to remove. In default of agreement on any
	of these requirements, the matter shall be referred to An Bord Pleanála for
	determination.
	(c) All archaeological pre-construction investigations and monitoring shall
	be carried out in accordance with the details specified within the EIAR
	submitted with the application.
	Reason: In order to conserve the archaeological heritage of the site and to
	secure the preservation and protection of any remains that may exist within
	the site
20.	(a) All lighting shall be operated in such a manner as to prevent light overspill
	to areas outside of compounds and works areas.

(b) Prior to the commencement of development, the applicant shall submit a detailed lighting plan to be held by the planning authority. The plan shall include the type, duration, colour of light and direction of all external lighting to be installed within the site compounds of the development site.
 Reason: In the interests of clarity, and of visual and residential amenity and protection of local biodiversity.

Schedule 2 – Compulsory Purchase Order

Decision

Confirm the Compulsory Purchase Order with the modification that plot reference 1010(1).1h (permanent acquisition) and 'CE' (private rights to be acquired) as set out in the deposit maps and relevant schedules be omitted, based on the reasons and considerations set out below:

Reasons and Consideration

Having considered the objections made to the Compulsory Purchase Order, and not withdrawn, the report and recommendation of the Inspector, the purpose for which the lands are to be acquired as set out in the Compulsory Purchase Order, and having regard to the following:

- (a) The substandard infrastructure provided for along the existing route.
- (b) The strategic nature of the scheme in the context of reducing carbon emissions and climate change.
- (c) The community need, and public interest served and overall benefits, including benefits to a range of road users to be achieved from use of the acquired lands,
- (d) The proportionate design response to the identified need,
- (e) The policies and objectives of the Dublin City Development Plan 2022-2028 and the Dun Laoghaire County Development Plan 2022-2028,
- (f) The submissions made to the Board and
- (g) The report and recommendation of the Inspector.

It is considered that, the acquisition by the NTA of the lands in question, and the restriction of public rights of way, and acquisition of private rights of way, on a temporary and permanent basis as set out in the compulsory purchase order and on the deposited maps, are necessary for the purpose stated, and that the objections cannot be sustained having regard to the said necessity.

I confirm that the report represents my professional planning assessment, judgement and opinion on the matter assigned to me and that no person has influenced or sought to influence, directly or indirectly, the exercise of my professional judgement in an improper or inappropriate way.

Jimmy Green

Senior Planning Inspector 30th November 2023

13.0 Appendix 1 – Summary Of Objections to Proposed Scheme

13.1.1. Ailesbury Road Resident's Association

- Generally support the Bus Connects Project.
- Concerned that the removal of the left-hand filter lane from Ailesbury Rd. onto Merrion Road will have negative impacts on traffic and safety.
- Restricted access from Ailesbury Road to Shrewsbury Road exacerbates the problem with all traffic having to access Merrion Road via Ailesbury Road during morning peak, submission seeks for this existing restriction to be reconsidered.

13.1.2. Aviva Life & Pensions Ireland DAC

- Suggest amendments that would improve access to the Blackrock Village Centre (owned by the observer) and the Frascati Shopping Centre, i.e. requests consideration of reversing the current one-way through Blackrock village, and maintaining storage capacity at junction of Frascati Road and Rockhill by keeping left and right turning lanes.
- Concerns that the Proposed Scheme will have a severe impact on the business activity of the Blackrock Village Centre (and Frascati Centre), arising from restricted access due to alterations to the access junction arrangements (reducing car capacity on junctions), delays from nuisance during construction (based on past experience)
- Requests detailed construction and traffic management programme to be shared and agreed.

13.1.3. J.W. Bailey

 Residents of St. Mary's Road wish to support the objection of the Pembroke Road Association to the Proposed Scheme.

13.1.4. Blackrock Clinic (/Blackrock Health)

This submission has been discussed, summarised, and reviewed in Section
 5.4.3 of the Report above.

13.1.5. Michael Bowles

- Objects to the Proposed Scheme, as it will have a significant adverse impact on the commercial operators along Baggot Street Upper, due to removal of parking spaces.
- Is the Proposed Scheme required/justified in the context of increased working from home and reduction in the need for travel to the city centre.

13.1.6. Patrick Bowles

• Raises the same issues as Michael Bowles above.

13.1.7. David Bradley and Marie-Therese Cooney

- Concerned regarding the potential impacts arising on their home in Nutley Lane from the scheme.
- The provision of a bi-directional cycle lane on a single side of the road outside their dwelling places an unfair additional risk of liability and raises traffic and safety concerns for the access/egress to their home.
- Increased traffic volumes will increase noise, pollution, disruption, and traffic at their home which is located near a junction. Suggests an alternative reducing the car lane to one direction.
- States its inappropriate to turn longstanding communities into thoroughfares/transport corridors to facilitate long distance transit to the city centre, loss of trees will have an adverse impact. Additional mitigation in terms of incorporating green spaces, parks and playgrounds should be provided to affected communities.

13.1.7.1. D. Bradley and M.T. Cooney Response to NTAs Comments on submission

The third parties responded to the NTAs comments in relation to the Proposed Scheme as follows:

 There remains huge safety concern for both the residents and cyclists with the imposition of a bi-directional cycle lane outside their home, due to conflicts with cyclist traffic for access to home.

- The Proposed Scheme will give rise to increased traffic congestion on Nutley Lane and other alternatives would be better than the NTAs 'preferred option'.
- Despite assurances otherwise, the Proposed Scheme will completely alter the character of Nutley Lane to the determent of amenities and quality of life.
- They continue their strong objection to the scheme on grounds of safety and the availability of better options.

13.1.8. Hilda and Brian P. Brereton

- Object to the Proposed Scheme as it will cause extra pollution, noise and loss of amenities.
- Proposed Scheme would create further traffic congestion and adversely affect the Nutley Lane community.
- Cycle lanes appear to be on paths which is inappropriate, cyclists should share the carriageway with motorists.
- Is the Proposed Scheme justified in the context of increased working from home, is too costly and not necessary. It is wrong to impose these works in an area they are not needed.
- Plan is too radical and not required, homeowners will not be able to access their properties, there are already sufficient bus corridors on Merrion Road and N11.

13.1.9. David Brophy

- Nutley Lane amendments are not justified or necessary, the new 4-lane highway will be too large for this lane and impact the community and amenity of the area. Shorter bus filter lanes at either side of Nutley Lane would achieve the same with less impact.
- Removal of the southern footpath will put too much pressure on the footpath on the other side which is already inadequate.
- Loss of significant amount of mature hedging and trees along Nutley Lane will adversely affect amenities and replacement wall will be visually inappropriate.

- Removal of parking from Nutley Lane will drive hospital visitors to park in residential areas in the vicinity.
- Traffic management report is missing incorporating dart traffic, maternity hospital traffic and cumulative construction activities from these projects.
- Dual cycleway was initially on opposite side of Nutley Lane (on RTE side) after crossing the road to the southwest of Elm Park entrance. The current proposal continues the dual cycle path along the southern side of the road impacting additional residential properties. There was no reason to change from this initial proposal and no detail or consultation was carried out in relation to why the change was made.

13.1.10. Liam and Mary Byrne and Others

- Objecting to bus corridor on Nutley Lane as it is already well served with bus corridors, and the Dart line is proximate to Merrion Road. There is no need to connect the Stillorgan and Merrion Roads, area is already well-served with bus corridors.
- The proposal represents overdevelopment of this residential road which has been designed to its maximum capacity.
- The proposal would have an adverse impact on residential amenity and give rise to inappropriate volumes of traffic.
- The removal of parking on Nutley Lane is inappropriate given limited parking at Vincent's hospital and doesn't take into consideration the new maternity hospital.
- Access into and out of residential properties will be hazardous.
- Loss of trees and mature hedgerow will have a significant adverse impact.
- The proposal will have an inappropriate impact on the Elm Park golf and sports club, resulting in a loss and degradation of facilities.

13.1.11. **Patrick Byrne**

 Objects to the Ballsbridge section of the Proposed Scheme and in particular how it crosses the Dodder Greenway. An alternative design moving the proposed toucan crossing to the top of Beatty Avenue is suggested as pedestrian desire lines will lead to continued ad-hoc and dangerous pedestrian movements over the bridge for walking along the Dodder.

- The movement of an existing accessible car parking space from in front of the life pharmacy to a location further east will impact on customers with mobility issues attending the pharmacy. Furthermore, the design does not provide a solution for change in levels outside the pharmacy building.
- Also requests that as services are to be amended that a local well be provided to facilitate tidy towns watering of plants.

13.1.12.John and Emma Clavert

- Object to the Nutley Lane portion of the Proposed Scheme as making this lane into four traffic lanes is inappropriate, result in an increase in traffic, additional fumes, will present safety issues for students and is not necessary.
- There is no justification of the need to join the N11 and Merrion Road Bus Corridors, these routes are already in place and functioning well.

13.1.13. Maurice Cavanagh

- Objects to the portion of the Proposed Scheme that affects Upper Baggot Street and Pembroke Road.
- The Proposed Scheme will spoil the historic atmosphere of Pembroke Road which is at the heart of Georgian Dublin and is a strong tourist attraction. It is also a residential street unsuitable for increased heavy bus traffic which would give rise to safety concerns for cyclists and pedestrians as well as health hazards from fumes.
- Baggot Street (MacCartney) bridge is old and narrow and will always represent a choke point and hazard for pedestrians.
- Additional bus traffic would adversely affect the village atmosphere and amenities of the Upper Baggot Street area.
- The Proposed Scheme does not provide sufficient pedestrian crossing points on Pembroke Road, nor does it consider the frequent events at the Aviva Stadium.

- Justification for the scheme is not clear in terms of the need for this amount of buses given the increased numbers now working from home, and it is not clear that journey times will be decreased.
- Loss of carparking along Pembroke Road is inappropriate and will affect residents who rely on it.
- Better alternative would be to use Mount Street Lower and Northumberland Road.

13.1.14. Breda Collins

- Concerned about the impact the Proposed Scheme will have on Nutley Lane and the immediate environs, by dividing the community.
- The loss of 56 no. car parking spaces on Nutley Lane will have adverse impact and push parking onto adjacent even more minor residential streets.
- Can/Should the Proposed Scheme be carried out in the absence of an overall traffic management plan for the area including additional developments in the vicinity such as proposed residential and hospital developments.
- Appropriate Assessment relies on dated reports in relation to the Booterstown Marsh, doesn't consider Brent Geese have been sighted on the Elm Park Golf Course and Nutley River.
- The Proposed Scheme creates too many conflict points for residents existing/entering houses, construction works will have an adverse impact on amenities and property, will adversely affect property values, impact on ambulance movements.
- There is no proof that the Proposed Scheme will take any cars off the road and the additional facilities are not justified given the increase in working from home.
- The late switch of the cycling track from the RTE side of Nutley Lane was carried out without public consultation and is inappropriate as it impacts on additional residential properties.
- No justifiable need to connect Stillorgan and Merrion road high-capacity transport corridors, a previous shuttle bus from UCD to Sydney Parade Dart Station was abandoned due to lack of demand, bus turning will slow down traffic on the Stillorgan Road.

• GDA Transport Strategy did not set out any proposals on Nutley Lane.

13.1.15. Anthony Comaskey and Sushil Sharma

- The Proposed Scheme will be detrimental to the social and economic fabric of communities along Pembroke Road and Baggot Street due to negative impact on the economy of local business through the loss of parking and loading bays.
- The local community will lose the ability to park proximate to local shops and services and this will decimate local communities and overall create a negative impact on the heritage and culture of these neighbourhoods.

13.1.16.Patricia Conroy

- Objects to the Proposed Scheme due to the adverse impact it would have on the Baggot Street area.
- Loss of car parking will have an adverse impact on businesses, and community.
- The Proposed Scheme is not justified due to the reduced need for public transport arising from the increase in working from home.

13.1.17.Declan Corcoran

- Objects to the fundamental thinking behind the project as it will transform Nutley Lane into an eight-lane highway.
- Population of UCD should be transported via driverless trams as this will enhance the Nutley Lane environment, reduce noise levels and improve safety.

13.1.18.Colette Cotter

 Objects to the closure of, authorised vehicles only access to, the left turn slip road from Frascati Park/Georges Avenue (south) onto Frascati Road. This will create traffic issues and inappropriate pressure on smaller roads in the area. This access can be maintained as local access to Frascati Rd. will be controlled by the pedestrian crossing lights.

13.1.19. Anthony Coughlan

- Objects to the proposed use of Pembroke Road as a main BusConnects corridor as any data used to choose the route is pre-covid and now obsolete.
- Adjacent Leeson Street and Morehampton road run parallel and already have bus and cycling infrastructure, there is no need for more.
- The proposal to provide cycle lanes on Pembroke Road between the footpath and parked cars is a hazard.
- Reduction in car parking on east side of Pembroke Road is an inconvenience and not appropriate, furthermore it is inappropriate to have no pedestrian crossing for over 500m of Pembroke Road.
- It is inappropriate to compulsory purchase railings, fell trees and alter the attendant grounds of the Pembroke Road terrace at the Waterloo Road junction.

13.1.20. Cllr. Marie Baker

- Inappropriate to change the name of the project at the application stage. This
 route was previously referred to as Blackrock to Merrion. Frescati Road is
 constantly misnamed as Frascati Road.
- Cul-de-sac arrangement on Georges Avenue restricting access to the lefthand turn lane to authorised vehicles only is not appropriate as it did not form part of the public consultation and will cause conflicting traffic movements and vehicles will now have to perform a U-turn which will affect locals.
- Delivery vehicles accessing residences at this location will not be able to carry out U-turn manoeuvres to avoid the traffic control.
- Procedural issues raised include the application being hard to find on the ABP website and one of the site notices appears hidden/erected in wrong place, and the observation fee is too high.
- The existing arrangements at this junction should be allowed to stay in place as is. When traffic is stopped at the pedestrian lights local traffic can filter onto Frescati Road without any impact on movements. Requests that the cul-desac/authorised vehicle only access proposals at Georges Avenue be omitted from scheme.

13.1.21. Dalata Group PLC.

This submission has been discussed, summarised, and reviewed in Section
 5.4.7 of the Report above.

13.1.22. **James Deane**

- Objects to the Haddington Road and Upper Baggot Street portion of the Proposed Scheme.
- Observer operates a garage and states that the Proposed Scheme will have a profound and unnecessary impact on small businesses in and around Baggot Street, particularly when there is a more than adequate DART service. Using an alternative route along Northumberland Road would be better as it would not affect local businesses and the local population/community so significantly.
- Removing parking and loading facilities and placing them on Wellington and Waterloo Roads and Eastmoreland place is inappropriate introducing more commercial vehicles to residential areas.
- Scheme will ruin the Victorian and Georgian streetscape that is in place.

13.1.23. Marion Dee

- Objects to the changes to Nutley Lane set out in the Proposed Scheme.
- Proposal will create a traffic hazard, provision of 4 lanes outside their residential driveway will impede ability to reverse into her driveway and dangerous to reverse out. Loss of car parking on street will affect visitors and lead to isolation due to lack of visitor spaces.
- Inappropriate to remove mature trees.
- Proposal will have an adverse impact on property values.
- Provision of wall opposite property will create an adverse visual impact.
- Proposed Scheme will lead to inappropriate pressure for cars on surrounding lanes and streets.
- Need for a proper traffic management plan taking into account all existing and proposed development in the vicinity of proposed works.
- Is the Proposed Scheme justified with increased numbers working from home.
- Any new road surface should have a "quiet street" treatment.

13.1.24. Mark and Mary Dinneen

- Object to the Proposed Scheme insofar as it relates to Pembroke Road and Upper Baggot Street as it will have a significant detrimental impact on the business (John Taylor Menswear) as well as the other local businesses that make up this vibrant retail area of the City. The Proposed Scheme will remove the ability of car-borne customers to stop on most of Upper Baggot Street and the proposed bus gate and priority signal on Pembroke Road is inappropriate.
- An appropriate solution or better alternative would be to provide the route via Northumberland Road and Mount Street Bridge which is better able to accommodate the increased traffic.
- The project is not justified in a post-covid environment where most buses will not be filled due to increased use of hybrid working conditions.

13.1.24.1. Response to NTAs Comments on submission

The third-party response to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

 Do not agree with the Boards position regarding an Oral Hearing, as it is prejudicial and contrary to the principle set out in the Aarhus convention.

13.1.25. John Dorman and Others

- Object to the proposed alterations to the historic railings and gates at No.'s 1-11 Pembroke Road and to the use of the front gardens as a temporary storage and construction compound as part of the Proposed Scheme.
- These are protected structures, and the application documentation does not include adequate details of: description of the works affecting the protected structures, architectural heritage assessment, drawings of the existing or proposed railings, plinths and gates. Furthermore, no declarations in relation to the proposed works have been provided, therefore the Board have not been provided with adequate information in relation to the relevant works, generic terms like "match the existing" or "like for like" do not provide sufficient required detail in relation to works in the vicinity of protected structures and their attendant grounds and curtilages.

- The removal and alteration of boundary features will adversely affect the character by altering scale and visual characteristics, and works will have an adverse impact on the parkland setting of these structures and their mature trees.
- Reference is made to sections 11.5.1 (Curtilage of a Protected Structure), 16.2.2.4 (Development Standards, Boundary Walls and Railings) of the Dublin City Council Development Plan.

13.1.25.1. Response to NTAs Comments on submission

The third-party response (sent in by J. McKeon) to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

 Do not agree with the Boards position regarding an Oral Hearing, as it is prejudicial and contrary to the principle set out in the Aarhus convention.

13.1.26. Stephen Doyle

 Objects to the Proposed Scheme as it will have an extremely damaging and destructive impact on the commercial viability of the premises of his Pension and Insurance Management company on Pembroke Road.

13.1.27. Dublin Commuter Coalition

- Supports the Proposed Scheme, however a lack of enforcement is a serious concern. There is a need for inclusion of enforcement cameras. Of particular concern is the right turning lane from Ballsbridge onto the Shelbourne rd., which is being removed, this turn should be either reinstated or enforcement cameras provided as it will be a conflict area.
- Requests that the Proposed Scheme adopt Dutch or Cyclops junctions in lieu of what is proposed as the current proposals are unsafe with an increased risk of left-turning drivers hitting cyclists.
- Concerns are raised in relation to two-stage pedestrian crossings (which delay pedestrian crossings) and missing pedestrian crossings. In this regard eight specific junctions are listed Temple Hill/Monkstown Rd., Temple Rd./Newton Ave., Frascati Rd./Temple Rd., Frascati Rd./George's Ave., Rock Rd./Booterstown Ave., Strand Rd (Missing Crossing), Fitzwilliam St.

Lwr./Mount St. Upper, and Nutley lane/Stillorgan Rd. A pedestrian crossing is also requested on Fitzwilliam Street at Fitzwilliam Lane.

- Shared pedestrian and cyclist space is inappropriate (Elgin Rd., Booterstown Station, Nutley Lane referenced) need segregation at all junctions.
- Bus stop islands are too narrow, placing cyclists in conflict with bus passengers getting on and off.
- Request that an additional bus stop at the interface with the orbital route on the eastern arm of the Temple Hill- Monkstown Road Junction (i.e., Monkstown Rd.)
- It is not clear what stops will serve the O Inner Orbital route at Wilton Terrace/Herbert place off Baggot Street Lower, in this regard three options are proposed to provide bus stops on Herbert Place and/or Wilton terrace to allow interchange between the B spine and O Inner orbital route.
- Queries why parking is being provided at Merrion gates, seems superfluous as there is no parking there at present and doesn't appear to have a need could be a hazard.
- Recommend making Nutley Lane one-way for general traffic to facilitate twoway bus, cycle and footpaths on both sides. Current proposal is inadequate for pedestrians.
- Cycle lane treatment at minor junctions is inappropriate, frequently cycle lanes are narrowed unnecessarily when crossing lessor roads, it should curve inwards but retain width with pedestrians.
- It is also recommended that yellow boxes be expanded so that they cover the entirety of the road area up to the signal point (Strand Road at Merrion Gates and Rock Road at Phoenix Terrace are cited as examples of this).

13.1.28. **Dublin Cycling Campaign**

- Generally supportive of the scheme but state it needs modification.
- Request an oral hearing in relation to junction design.
- Modifications requested for the scheme:
 - Increase the width of cycle tracks (on major lengths of rock road) widening to 2 – 2.25m would facilitate passing and non-commuting cyclists.

- Applicant should revisit the designs where cycling, wheeling and pedestrian users are in shared spaces – particularly Toucan Crossings as this is not appropriate (E.g. Emmet Sq./Blackrock Clinic; Nutley Avenue, Ballsbridge village centre etc.).
- Review is required of right-turn movements for cyclists at all major junctions, some locations are not catered for (e.g., Northbound on Stradbrook Road to Monkstown Avenue). Toucan crossings provide a low-level of service where they are relied upon.
- Right hand turns from general traffic into minor roads should be removed to avoid conflict with cycling traffic (E.g. Ben Iveagh Park).
- Provide green buffers between cycle lanes and buses where possible (e.g., Temple Road).
- "Yield" road markings where cycle lanes end on side-arms are contrary to NIFTI hierarchy.
- Requests that the extent of the application boundaries be increased to provide wider benefits e.g., extending cycle lanes on Mount Merrion Ave., connecting to Blackrock village via Carrysfort Ave. and Rock Hill Rd., to the Coastal Mobility Route at Newtown Ave.as well as Shelbourne Rd.
- The Proposed Scheme needs to provide for use of enforcement cameras or some other form of enforcement or else no benefits will accrue.
- Dublin Junction design creates conflicts, preference should be for Dutch style junctions or cyclops junctions to prevent danger from left turning traffic and avoiding cycle/pedestrian conflict. The Board must require a re-think of junction design.
- Connection to the Coastal Mobility Route at Newtown Avenue should be provided.
- Cyclist along St. Vincent's Park entrance should be protected from left turning traffic, a redesign of this junction is requested.
- Cycling proposal along Nutley Lane is inadequate on this busy cycle route, applicant should consider a one way for general traffic and std. cycle routes on each side of the road.

- Toucan Crossing at Ballsbridge and northbound contraflow section of cycle lane will create cycle conflicts with pedestrians.
- Fully supports the bus gate at Baggot Street.

13.1.29.Geraldine Dunne

- Objects to the proposed bus corridor on Baggot Street as it would have an adverse impact on commercial deliveries, reduce the amount of parking and loading bays available, present difficulties to pedestrians and vulnerable road users, restrictions on Haddington Road will lead to harmful congestion, Baggot Street bridge is not suitable to accommodate busses, no justification for the increase in buses, altering the footpaths will further damage the ability of businesses to operate and people to access the area, and cutting off car access from Ballsbridge will cripple business community on Baggot Street.
- A better alternative would be to provide the corridor along Northumberland Road and Mount Street.

13.1.30. Elm Court Management DAC

This submission has been discussed, summarised, and reviewed in Section
 5.4.9 of the Report above.

13.1.31. Elm Park Golf and Sports Club

 This submission has been discussed, summarised, and reviewed in Section 5.4.10 of the Report above.

13.1.32.Elm Park Green Development (Elm Real Estate Investments)

This submission has been discussed, summarised, and reviewed in Section
 5.4.11 of the Report above.

13.1.33.Caroline Farrell

This submission has been discussed, summarised, and reviewed in Section
 5.4.12 of the Report above.

13.1.34.Geraldine and David Frame

- Objects to the Proposed Scheme along Nutley Lane, as it will impact children going to school, the environment, and St. Vincent's hospital staff.
- Nutley Lane has ensured much disruption over recent years with hospital construction. Additional dust, noise, and tree removal is not conducive to a healthy or safe lifestyle.
- A one-way system could be considered as an alternative to reduce impacts.

13.1.35.Veronica Freeman

This submission has been discussed, summarised and reviewed in Section
 5.4.13 of the Report above.

13.1.36.Conor Gallagher

- Objects to the Proposed Scheme as it impacts on the commercial heart of the Pembroke Neighbourhood (Pembroke Street and Baggot Street Upper).
- Removal of car parking will affect businesses, and buses will by-pass area.
- Using the Northumberland Rd./Mount St. alternative would have a lessor community impact and limited impact on existing commercial operations.

13.1.37. Kieran Gilmartin and Sterrin O'Shea

- Generally supportive of the Proposed Scheme but requests clarification on a number of points.
- It is critical that the existing park wall and pillars are maintained on the corner of Phoenix Park terrace to preserve the building line and entrance piers at the corner of the terrace.
- There is limited parking in place along Phoenix Park terrace and confirmation is requested that the recently provided communal car parking bay along the frontage of No.'s 1-6 is not proposed to be reduced.
- Confirmation is requested that the right-hand turn onto Phoenix Terrace off the Rock Road travelling from Blackrock will be retained was part of the Proposed Scheme.
- Requests that low planting be provided on the traffic island between Blackrock
 Park and Castledawson.

13.1.37.1. Response to NTAs Comments on submission

The third-party response to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

- Requests further detail of the proposed corner junction between the new and existing wall at Blackrock Park.
- Clarifies that the parking at Phoenix terrace is not unmetered as stated in the NTA submission but is in fact metered, and requests confirmation that parking will not be altered.
- Notes the clarification provided that right-turns into Phoenix terrace off the Rock Road will be maintained and a grassed area/greenery will be provided in the median.

13.1.38.Patrick Halpenny

- Objects to the proposed works along Nutley Lane, but supportive of better public transport.
- There is no justification for joining the Stillorgan and Merrion Corridors and therefore no need to carry out the significant works that are proposed along the lane.
- The Proposed Scheme will not alleviate traffic needing to access the hospital(s), school or RTE.
- The removal of trees along this route is not appropriate.

13.1.39. **Aidan Harte**

- BusConnects will destroy Upper Baggot Street.
- The Newton Plan is a better alternative for improving Dublin Traffic.

13.1.40.Bronagh Harte

- Objects to the overall Proposed Scheme as it is out-of-date and inappropriate.
- The Newton Plan is a better alternative for improving Dublin Traffic.
- Public consultation was not carried out in good faith.
- 13.1.40.1. B. Harte Response to NTAs Comments on submission

 Makes a further submission on behalf of the Baggot Street Traders and is opposed to this matter being decided in the absence of an Oral Hearing as it is against the Aarhaus convention.

13.1.41. Brendan Heneghan

- Accepts the principal of the Proposed Scheme and requests Oral Hearing.
- Concerns raised that the relevant Aarhus Convention and related guidance requirements have not been met, including; each party shall provide for early public participation, the public engagement carried out during the Covid Lockdown period did not accord with the guidelines set out in the Convention as set out in their Kazakhstan advice of July 1st, 2020.
- The proposal to cut off Elgin Road at the US embassy is inappropriate, and that combined with the bus gate on Pembroke Road will have an adverse impact on residents and businesses in the area. Concern is raised that the local residents are not aware of these amendments to the roads and access at this location and that the full implications have not been considered.
- The alternative route to the city centre via Northumberland Road and Lower Mount Street should be used, in lieu of the northern portion of the Proposed Scheme.
- There is no justification for the Nutley Lane works as the route of the 39A already provides direct access to the City Centre using appropriate infrastructure from Belfield for students who are the key driver for this link.
- Documentation modelling shows that there will be significant extra traffic on a number of local streets/roads, and it is not clear whether the modelling presented is combined with other BusConnects projects such as the Bray (Stillorgan Road) corridor.
- The application documentation does not provide the hours of operation for the proposed bus gate on Pembroke Road, this should be stated in the interests of clarity.
- There are 20 bus stops proposed to be moved. The intention to move bus stops should be clearly stated and specific notices erected to ensure the public is informed.

- 13.1.41.1. B. Heneghan Response to NTAs Comments on submission
 - Submission received 30th of June, Mr. Heneghan had requested additional time to review the response document in the interests of fairness, however, this was not granted.
 - There were no concessions from the applicant and therefore no specific issues raised on the NTA comments.
 - States that it is not credible that the applicant did not accept any of the points from any of the submissions as meriting an alteration to the Proposed Scheme.
 - Is of the opinion that any additional points/justification introduced by the applicant in response to submissions should be disregarded by the Board at this stage.
 - There remains no justification for the Nutley Lane element of the corridor as no such link is provided for in the Transport Strategy for the Greater Dublin Area, and questions the assertion from the NTA that there is significant demand identified for travel between UCD and Ballsbridge as while there are two bus routes here, one runs three times a day and the other approximately once every hour.
 - Considers the Nutley Lane residents make a strong case in terms of the potential for environmental damage that will be caused to their area through loss of trees, general degradation, and pollution. There seems to be a stronger case for Nutley Lane to provide three vehicular lanes and cycling facilities.
 - Does not agree the Proposed Scheme will improve residents' quality of life and amenity of the areas (Nutley Lane and Pembroke Road).
 - Is concerned about the relocation of bus stops, and notes the submission of DLRCC in this regard. The submission is also concerned that notices were not placed on bus-stops to be removed/relocated.
 - Bus gate opening hours should be restricted to AM and PM peak hours only.

13.1.42. Brigid Hoey

- Object to the significant adverse impact the Proposed Scheme will have on commercial operations on Upper Baggot Street arising from removal of loading bays, on-street parking, proposal to stop traffic from turning right onto Upper Baggot Street from Mespil, alterations to footpaths, cutting off car access from and increasing buses along Pembroke Road.
- Buses are running empty so no justification for the proposed works.
- There is a better alternative available via Northumberland Road which would avoid the Georgian streetscape and not impact Baggot Street.
- Baggot Street bridge not suitable for the volumes of traffic proposed as it is humped, while Mount St. bridge is better suited for the alternate route.

13.1.43.Daniel J Hoey

- Objects to the Proposed Scheme on Baggot Street, due to the adverse impact on commercial businesses, for broadly the same reasons outlined previously

 loss of loading bays, car parking, and redesign of footpaths.
- Baggot Street Bridge not appropriate for increased bus traffic.
- Adverse impact on Georgian and Victorian Streetscapes.
- Better alternative available via Northumberland Avenue.
- No need for cycle lanes along Haddington Road when they are already in place along canals.
- Restricting Haddington Rd. to one lane will lead to harmful congestion.

13.1.44.Eamonn Hoey

- Supports the submissions by Pembroke Road Association and Baggot Street traders.
- It's inappropriate to treat Baggot Street like an arterial route it is a centre for community services, people want to visit the area not transit it.
- Alternative Northumberland route is preferrable as it is already an arterial route, and using that corridor would not affect the Baggot Street community.
- Baggot Street bridge is a narrow single arch bridge not suitable to accommodate the Proposed Scheme or its increased bus traffic.
- Applicants have not adhered to the Aarhus convention requirements and have sought to keep residents and businesses on the route in the dark.

- The Proposed Scheme will have an adverse impact on the flora and fauna of the Grand Canal and its associated amenities.
- Removal of on-street parking and loading bays from Baggot Street is inappropriate, as are traffic restrictions (at Mespil Road, Waterloo Road, St. Marys Road, Pembroke Road) which will adversely impact businesses.
- The Proposed Scheme will adversely affect visual amenities.
- Pre-Covid data used for justifying the Proposed Scheme is out of date in the modern context. The Proposed Scheme is a duplication of services as the DART already serves the relevant areas.

13.1.44.1. E. Hoey Response to NTAs Comments on submission

Mr. Hoey responds to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

- Objects strongly to the decision to not have an Oral Hearing on the Bus Corridor. The timescale allowed for response is unfair and insufficient.
- The modelling used is all out of date as Covid has permanently changed the office commuting landscape.
- The NTA admit that should the Proposed Scheme not go ahead that there would be no negative consequences on Upper Baggot Street, and their assertion that 6 months of construction works at this location as being 'minor' is outrageous.
- The Proposed Scheme will cause permanent damage to the businesses and residential community of Upper Baggot Street.

13.1.45. Hilary and Rosemary Hough

- Supportive of the overall scheme, have concerns in relation to the Nutley Lane portion of the corridor, and have recommendations for improvements.
- Removal of c.80 mature trees and 2 hedgerows on Nutley Lane and their replacement with a concrete wall with climbing vegetation is inappropriate – some form of natural blockwork would be better suited.
- The chosen option (NL2) ranks least well of all the options as it requires the removal of the largest number of trees and does the greatest damage to the

natural environment as it proposes four, rather than three, lanes to accommodate two-way normal traffic. There are a number of alternative options for three vehicle lanes within the discussed alternatives (i.e., options NL3 and NL4), that would be preferrable, but were discounted by the applicants as they were considered to reduce bus journey time reliability, and impact adjoining residential areas/streets).

- More appropriate alternatives would be a three-carriageway option such as:
 - Dedicated Bus Lane Stillorgan Road to Merrion Road.
 - Dedicated Car Lane Stillorgan Road to Merrion Road.
 - Shared Lane Bus/Car Merrion Road to Stillorgan Road with bus priority signalling.
 - A 2-way cycle lane.

13.1.45.1. H. & R. Hough Response to NTAs Comments on submission

The third party's response to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

- The NTA did not take into account any of the submissions made by residents in relation to the Proposed Scheme and did not provide any amendments.
- Option NL2 (for Nutley Lane) ranks least-well in environmental terms due to removal of hedgerow and trees. The issue arises from the provision of a fourlane cross-section on Nutley Lane, which is to facilitate dedicated private vehicle lanes.
- Advocates for the use of option NL3 on Nutley Lane, which provides two carriageway lanes only between Nutley Lane and St. Vincent's Hospital with bus priority to be maintained through this section with the provision of a Bus Gate on the northern side of the Nutley Lane junction.
- The NTA in their submission did not specifically refer to option NL 3 but states the reasons for rejection of options NL4, NL5 and NL7.

13.1.46.Liam Kavanagh

 Supportive of the scheme in general but objects to the Nutley Lane portion of the Proposed Scheme.

- The proposal will divide the Nutley Lane community in two, adversely affect the character of the area, result in a significant loss of mature trees, create conflict points for residents entering/egressing their properties, side roads and other premises, and construction impacts.
- The need for the works at this location have not been justified, UCD is already connected to the City Centre along the Stillorgan Road and post-lockdown there is a larger portion of the public working from home. Furthermore, the Greater Dublin Transport Strategy did not include any proposals for Nutley Lane.
- The loss of carparking on Nutley Lane will push parking into adjoining residential areas/roads, there is a need for an overall traffic plan for the Nutley Lane area.
- The Proposed Scheme does nothing to improve the stacking and traffic ques at St. Vincent's Hospital entrance during peak times.
- Concerns are raised that the AA report relies heavily on a dated report for data on the Booterstown Marsh, and environmental impacts on the Golf Course have not been adequately considered.
- Proposal will have an adverse impact on property valuations.
- The change in the cycle lane to the opposite side of Nutley Lane to RTE was a late significant change that was not subject to public consultation.

13.1.47.Andrew Keavney

- Objects to the Proposed Scheme as it will make it impossible to run his longestablished business - wine merchants at Pembroke Road. The public will not be able to access the office and deliveries will be cut off as there will be no clear loading bays available.
- The proposal constitutes a very significant visual impact and established amenities will be adversely impacted from the frequency of bus services proposed.
- The destruction of the kiosk is inappropriate as is the restricted access to McCartney Bridge.
- The proposal will have an adverse impact on the historic character of the area,

- The proposal was developed on the basis of bringing workers into the city centre this justification is flawed in a post covid environment.
- Pembroke Road is the pedestrian route for access to events in the Aviva Stadium and there is a more appropriate route available via Northumberland Road.

13.1.48. **John Kelly**

- Objects to the impact of the proposal on Upper Baggot Street. The local catchment will not be able to access local goods and services due to the proposed restrictions on vehicle access from Pembroke Road, St. Mary's Road, and Mespil Road.
- Loss of trees will have a huge negative impact, the majority of which, it would seem, could be retained with minor tweaks to the overall design.
- Priority should be greening the city, enhancing local neighbourhoods, and encouraging people to live in the core, rather than providing an engineer's solution of connecting the suburbs to the centre without due consideration to the established communities en-route.

13.1.49.Margaret Kelly

- Objects to the Proposed Scheme along Nutley Lane/Road.
- Merrion road and the N11 already have successful bus lanes, the link along Nutley Lane is not justifiable in the context of the impact it will have on the local area and amenities.
- The proposal will not help the existing congestion on this route and will not provide an appropriate alternative to the need to access the hospital (and new maternity hospital) by private car. Additional carriageways for private vehicles are needed in that context.

13.1.50. Georgina Kirwan

 Objects to the impact the Proposed Scheme will have on the commercial operations and amenities of Upper Baggot Street. Loss of car parking will reduce the ability of customers to access services, and the Proposed Scheme is not justified in the context of the increasing numbers working from home.

13.1.51. Langkawi Malaysian Restaurant

- Objects to the Proposed Scheme as it will have a negative impact on the Upper Baggot Street commercial area, due to restricted access, loss of loading bays and car parking.
- The Newton Plan which advocates using Northumberland Road as an access point is proposed as a more suitable alternative with reduced impact on the established social and economic character of Baggot Street Upper.

13.1.52. Sarah and Stephen Lillis

- Object to aspects of the Proposed Scheme relating to Nutley Lane and feel that they have been ignored despite engaging in every part of the consultation process.
- Proposed Scheme will cause an immediate and enormous increase in traffic flow of buses, at present the 27X uses Nutley Lane twice daily, and the 47, nineteen times daily. The new proposals will see a bus every 3-6 minutes at peak times, and encourage private buses and taxis to use the route.
- EIAR states that left turning lane to St. Vincent's University Hospital (SVUH) off Merrion Road is to be removed but drawings show a left turn remains – which is correct, any amendments to this entrance on/off Merrion Road will push additional traffic onto Nutley Lane.
- Removal of the left turn slip lane onto the Stillorgan Road (which the majority of traffic using the lane takes) will lead to additional traffic backlog on Nutley Lane. Similarly, the Merrion Rd. junction alterations and the increased traffic will lead to further congestion on the Lane.
- The loss of approximately 80 mature trees is inappropriate.
- The conclusion that there will be "negligible" impacts on air quality with no
 material change in noise and vibration is a generalised statement based on
 the entirety of the route (the majority of which already has bus lanes) ignoring
 the absence of such on Nutley Lane, current changes to travel arising from
 working/studying/shopping from home, and a predicted scenario 21 years in
 the future which may not come to pass.
- Query the selection process for the use of Nutley Lane as it requires the removal of such a significant amount of trees and it would be possible to

provide a bus route through Booterstown avenue without expanding the road or tree removal (while still facilitating cycle lanes on Nutley Lane).

13.1.53. **Ross Little**

- Stopping traffic turning right from Mespil Road onto Upper Baggot Street will be severely detrimental to local businesses on Upper Baggot Street.
- Restricting traffic from Upper Baggot St. to Pembroke Rd. (and cutting off access from Eastmoreland Place/St. Marys Rd.) will cut a vibrant community in two, is illogical and will cripple local businesses.
- Removal of on-street parking and loading from Upper Baggot Street area will have significant adverse impacts including pushing car parking onto adjacent residential streets where there is already restricted parking.
- Inappropriate to place a bus corridor into Georgian/Victorian streetscape.
- No need for cycle lanes on Haddington Road when they are already on Canal.

13.1.54. Mary Magrath (on behalf of Brosna Educational Properties)

- The Proposed Scheme does not address the hospital access issues which will continue to be via private car, nor does it adequately consider/address the new Maternity Hospital traffic, and/or future development proposals on former RTE lands.
- Nutley lane is already congested, and the Proposed Scheme will not alleviate the existing issues.
- Increased noise, nuisance, pollution and vibration arising from the introduction of a major traffic route through the Nutley area is inappropriate both during operational and construction phases.
- The Proposed Scheme will also have an adverse impact on property values and create traffic hazards for residents, students and members of the public using this route.

13.1.55. Paul Mahon (on behalf of South Georgian Core Residents Association)

 The proposed relocated bus stop on Fitzwilliam Street Lower will create a traffic hazard and restrict sightlines for traffic turning into and out of Fitzwilliam Lane as well as be located remote from pedestrian crossings – preferrable to leave it on Baggot Street Lower where it is. Existing footpath is 1m narrower at the location of the proposed relocated bus-stop than the path where the stop is currently located.

- The narrowing of footpaths on Baggot Street Lower should be avoided as a retrograde step, this is a busy pedestrian route with increased footfall for matches and events at the Aviva Stadium.
- Introduction of bus shelters in the South Georgian Core and particularly fronting Georgian buildings is inappropriate (two are proposed Fitzwilliam Street Lower – inbound, and Baggot Street Lower – outbound) and has an adverse impact on the streetscape.
- High-frequency double decker buses are inappropriate along the Georgian Mile, current routing of such traffic along Mount Street Lower and Baggot Street is more appropriate. The EIAR did not take account of the architectural and historical significance of the Georgian Mile in comparing N2 (Mount Street) and N1 (current proposal) options.
- The Proposed Scheme is contrary to Land use zoning objective Z8 (which is applicable to Lower Fitzwilliam Street) – to protect existing architectural and civic design character with only limited expansion.
- The lack of flexibility in project design requiring all modes of transport (car, bus, and cycling) to be provided along this single corridor places too much pressure and burden on the single route selected.

13.1.56. Clare Mathews

 Nutley Lane is unable to accommodate additional bus traffic, and increased numbers of buses will represent a danger to cyclists, pedestrians and other road users. Additional buses will also pose a risk to patients accessing St. Vincent's Hospital.

13.1.57. Muiris McAuley

- The removal of loading areas and pull-in parking will have an adverse impact on commercial operations on Baggot Street Upper.
- Additional bus traffic will deter customers from driving to and through Baggot Street.

13.1.58. Brian McDermot

- Loss of trees and car parking along Nutley Lane will have an adverse impact on the amenities of the Lane itself and surrounding areas.
- No overall traffic management plan for the Nutley Lane area to incorporate the school, hospital(s) and other proposed and permitted developments.
- Not clear if there remains justification for the scheme due to the postlockdown environment and whether there is a need for the Nutley Lane link given both Merrion and Stillorgan Road's are well served by bus lanes.
- Installation of lights at all junctions will defeat the purpose of express bus routes.

13.1.59. Jack and Freeda McEvoy

- Engaged in the community forum in relation to the Nutley Lane area,
 Proposed Scheme is basically the same as that set out at the beginning of the public consultation process. Residents/public submissions concerns were not taken into consideration.
- Removal of over 80 mature trees and significant head rolls along the length of Nutley lane is inappropriate. The replacement of trees and hedgerow along Elm Park Golf Club with a concrete wall will significantly increase noise and vibration as well as carbon dioxide emissions.
- The application documents state that the chosen option for Nutley Lane is the least favourable in terms of impact on the environment.
- Cycle routes on Woodbine Road and Trimleston offer a better option for cycle connectivity to UCD, and providing additional car, bus or cycle routes for Ailesbury Road also presents a viable alternative.
- Supports the provision of a three vehicle lane option and that the NL3 and NL4 alternatives be considered as they are more appropriate to the area.

13.1.59.1. Response to NTAs Comments on submission

The third-party response to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

 The NTA has not taken their concerns on Board and the design option chosen for Nutley lane remains inappropriate and results in the loss of too many trees and hedgerow. The NL2 option is not appropriate at this location and neither is the concrete wall along the frontage of the golf course.

 Considers a 3-lane solution was not given proper consideration as this is the solution that should be used, or the alternative cycle route via Woodbine Avenue.

13.1.60. Siobhan McGee and Others (Woodbine Glemomena Residents Association & Others)

- Removal of the right turning lane off Rock Road to Trimleston Avenue (and a reduction to a single lane for traffic emerging from the Avenue) into a reduced signal phasing will mean additional waiting times for those on the Rock Road and have significant effects for residents of the Woodbine, Glenomena, Seafield and Trimleston areas. Disruption and delay will be exacerbated by the proposed placement of an inbound bus lane immediately after the junction with Trimleston Avenue on Rock Road.
- Removing the left turning lane from Nutley Lane onto the Stillorgan Road will cause significant traffic build up. The removal of the footpath to facilitate the cycle track on Nutley Lane will have a significant impact on this busy pedestrian route. The proposed changes at the Nutley-Stillorgan Road junction will also impact on residents travelling into town from this area which must use the UCD fly over.
- The proposed turning bans throughout the scheme will greatly affect how residents can use the road network.
- The mixing of pedestrian and cyclists on the various toucan crossings is hazardous particularly for children.
- The bus corridor hours of operation are not clear, if it is to be 24 hours this will result in constant traffic even outside of peak when it is not required.
- Concern is raised in relation to the review and management of mitigation measures during the construction period to protect the natural environment in particular Booterstown Marsh. Furthermore, controls are required to ensure the spread of invasive species does not arise.

- Concerns are expressed in relation to the construction compound at Booterstown car park it is unclear how the risks associated with this site and proximity to the two-way bike track and other environmentally sensitive areas will be managed, monitored and protected.
- The estimated construction duration of 24 months seems optimistic given experience with smaller proposals in the past. The scale of the project will lead to wide-ranging disruption.
- There has been no indication or clarification in relation to phasing for the Proposed Scheme.
- The proposed bus gate at Pembroke Rd will prevent traffic moving from Ballsbridge to Baggot Street and will create inappropriate pressure on adjoining streets.
- Will the Proposed Scheme result in fewer bus stops than currently in place?
- What mechanism is in place to allow residents to provide feedback in relation to issues or concerns during the construction and operation of the Proposed Scheme?
- Concerns raised in relation to archaeological, cultural and architectural heritage the submission request that the appropriate national bodies and experts consider the implications of the Proposed Scheme on heritage features.
- Request that consideration be given to retaining two lanes at the Trimleston junction onto Rock/Merrion Road and setting the bus lane back from same. It is also requested that the traffic signals at this junction allow an extended period of time for outbound traffic to proceed (either straight on or turn right) after inbound traffic along the main road have stopped on red.
- Concern is expressed in relation to the suggested removal of two historic arches on the Merrion Road and request that they remain in place.

13.1.61. Damian McGrath

 Removal of 'pull in' parking from Baggot Street will impede the ability of local businesses to operate.

- Putting cycle lanes next to footpaths will impede the ability of residents to park outside their houses and the introduction of increased bus activity will adversely impact residential amenity.
- The Proposed Scheme will irreversibly destroy the Baggot St, Pembroke, Wellington and Raglan Roads area which is a historical part of Dublin.
- There are two existing routes to the city through Donnybrook and Northumberland Rd. the scheme will destroy an existing neighbourhood and impede residents access to their dwellings.

13.1.62. Dr. Mike McKillen

- The new design for the Nutley Lane fails to provide a level of service that commuting bike users to and from UCD Belfield and the Cranford shopping centre require for a direct and coherent route.
- The cycling provisions on Nutley Lane need to be expanded to a 2m wide one-way cycle lane on both sizes of the full length of the lane and provide bicycle access to Nutley Road when travelling west-east.
- Consideration should be given to making Nutley Lane one-way to general traffic to increase modal shift and reduce land-take requirements.
- All time-plated R-/L- turn restriction plates should be altered to add "Except Cyclists", in the interests of trip coherence.
- A filtered permeability junction/chicane should be put on the left turn from Nutley Lane to Road to ensure traffic restriction is adhered to.

13.1.63.Merrion Road Residents Association

- Concerns are generally in relation to that part of the Proposed Scheme between Merrion Gates and Herbert Avenue/St. Vincent's Hospital, which is described as the historic residential heart of Merrion Village.
- It is contended that the Proposed Scheme is disproportionately destructive in terms of impact at this location, the primary impacts are listed as: road layout inbound, removal of all 4 mature trees inbound, 2 outbound, compulsory land take of front gardens of protected structures, removal of existing outbound parking, provision of a 3-car parking bays outbound at No.'s 266 and 270, proposed parking bay outbound south of Merrion Gates, removal of two bus

stops, removal of 1930s seats, dismounting and repositioning/relocation of two gate features. The submission includes a range of solutions in relation to these issues.

- The 3-way carriageway inbound (and associated priority signalling) should be continued beyond the Elm Court apartments to the nearby junction at Estate Avenue (thus negating the need to remove 3 of the 4 no. mature trees and the land take into boundaries of existing protected structures, allowing the established architectural symmetry between these and their neighbours (also protected) to remain unchanged). The provision of a 3-lane back-to-back inbound/outbound bus lane at this location would offer a similar solution.
- Parking bay on the outbound section should be re-sized to reduce the loss of mature trees on outbound side.
- Requests that the bus stop not be relocated to the south of the Merrion gates (pedestrian and traffic hazard) but instead be moved to the location of no.'s 266-270 Merrion Road subject to protection of trees, as this would be more proximate to other stops and end users.
- The three "IMCO" 'built-in' concrete seats should be retained, ideally in their original location or relocated to a suitable site with a reference to IMCO building background.
- Long-established residential communities must be accommodated to the greatest extent possible, and residents' concerns/interests regarding their environment given due regard.

13.1.64. Maura Moore and Joseph O'Reilly

- Oppose the Proposed Scheme as residents of the Pembroke Road as it will have significant adverse impact on residential amenity, community, businesses and cultural heritage of, Pembroke Road and Upper Baggot Street.
- Due to modern work practices it is considered that BusConnects will be obsolete in 5 years, but the damage done to neighbourhoods will be irreversible.

- Viable and more appropriate alternative City Centre bus corridor routes are already in place (UCD-Centre, via Donnybrook, and Blackrock- Centre via Northumberland Road).
- Having cycling lanes between cars and the footpath represents a hazard, cyclists/scooter speeds will prevent people from accessing their cars and be particularly dangerous for those with children, or more vulnerable users. The volume and speed of cyclists will make it impossible for cyclists to slow down to avoid conflicts/hazards. Parking cars off the pavement will also visually impact the Georgian streetscape.

13.1.65. Dr. Padraig Moran

- Further reduction in available carriageways between Monkstown Road and Booterstown Avenue junctions will lead to greater gridlock and greater transit times, for those needing to access SVUH and airport.
- Congestion will be further exacerbated by the removal of the left turn slip at Frascati Rd. as well as the proposal to replace the slip lanes from Strand Road onto Merrion Rd., and Pembroke/Lansdowne Rd. with signalised junctions.
- The proposed route is adequately serviced by the DART line to the east and N11 to the West and it is these infrastructure routes which should be invested in.
- The use of a bus gate on Pembroke Road will have significant detrimental consequences for the neighbourhoods and businesses in the area, pushing additional volumes of traffic onto Pembroke and Baggot Lanes, or continue along Pembroke Rd., or traverse to the N11 to reach St Stephens Green, all of which are unsuited for additional volumes and are already at capacity.
- The Proposed Scheme will have a negative impact on access and the viability of businesses in the Baggot Street area.
- There will be additional traffic diverted onto minor roads arising from the Proposed Scheme which will cause significant safety issues.

13.1.66. Mary Morris (Essentials Baggot Street)

- Proposed scheme will adversely affect businesses on Baggot Street, traffic restrictions will lead to congestion.
- Baggot Street is already serviced by an appropriate number of buses and bus routes.
- Scheme will have an adverse impact on Georgian streetscape.
- Northumberland Road/ Mount Street offers a more appropriate alternative.

13.1.67. Mary Morris (Ballyfermot)

- Proposed Scheme would have a detrimental effect on deliveries to their business on Upper Baggot Street due to loss of loading bays and car parking.
- Vulnerable road users will have difficulty crossing roads.
- There's no justification for the Proposed Scheme given that it buses are running empty at the moment and Baggot Street is well served with buses.
- Northumberland Rd Mount St provide more appropriate alternative which would not impact a Georgian streetscape or Baggot Street village.
- Restricting right turning traffic from Mespil Rd. as well as reducing Haddington Rd. to one lane at the Baggot Street junction will lead to harmful congestion and impact the community and businesses.
- Baggot Street bridge is narrow and not suitable for additional bus traffic.
- Changes to the footpaths and cutting off car access from the Ballsbridge/Jurys Inn end to Baggot Street will further damage the ability of businesses to operate and people to access the area.

13.1.68. Paddy Mulligan

- The Proposed Scheme will destroy the Baggot Street area cutting off businesses from their customers, removing car-parking, and relocating loading bays to more distant locations that will create additional noise and adverse impacts on residential amenity through longer and louder loading/offloading.
- There are more viable routes available that should be invested in and investigated – Northumberland Rd./Mount Street, as well as the DART and N11/Donnybrook corridor.

 The Newton Plan for Dublin Transport provided a better solution for public transport.

13.1.69. Susan and Cyril Mulligan

- Object to the Proposed Scheme from Pembroke Road to the City Centre.
- Removal of car parking and loading bays from Upper Baggot St. and Pembroke Rd. will push demand onto Raglan Rd. and Wellington Rd. making it impossible for residents to find parking where they live.
- Removal of trees is inappropriate and will have adverse visual impact on this appearance of the tree-lined period residential road, increased bus traffic will impact protected structures and their curtilage.
- Northumberland Rd. presents a better option for access to the city centre.

13.1.69.1. Response to NTAs Comments on submission

The third-party response to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

- The Proposed Scheme will have an inappropriate impact on the protected structures and features of Pembroke Road/Baggot Street.
- Removal of trees is inappropriate and will adversely affect the character of the area.
- The loss of parking along one side of Pembroke Road will adversely affect residents and create additional congestion and pressure on adjacent streets.
- Proposed delivery and loading areas are too remote from businesses.

13.1.70. Bill and Margaret Nolan

- Objects to the Nutley Lane section of the Proposed Scheme. It is noted that using the Lane as a bus corridor is understandable, however, it will involve considerable environmental damage.
- Gifting private vehicles their own exclusive lanes where none exist at present is not appropriate, an exclusive lane from the Stillorgan Rd to SVUH is understandable, however, there is no justification for the reverse, as a mixed bus and car lane is sufficient to service buses heading towards Belfield.

- The provision of four vehicular lanes represents a doubling of traffic on Nutley lane and there has not been a Nutley Lane specific EIAR carried out (Noise, Air, pollution, Public Safety etc.). This is required as Nutley Lane is the only road where increased traffic will arise as two exclusive private car lanes are being proposed where there were none before (all shared).
- An unsightly concrete wall is being proposed along the Elm Park Golf Course following removal of trees and established hedgerow, this is highly inappropriate and has an adverse impact on the area.

13.1.71. Nutley Residents' Association

- The creation of a four lane highway along the Nutley lane will divide the Nutley Community in two, which will have a significant adverse effect on residential amenities and the character of the area.
- The loss of 56 no. car parking spaces will push demand onto adjacent residential roads causing congestion and restricted access.
- Additional developments (e.g. National Maternity Hospital, Cairn Homes Site) have not been taken into account, a traffic management plan incorporating these and the wider area needs to be carried out.
- The Proposed Scheme does nothing to alleviate existing congestion in and around the hospital entrance.
- The loss of trees and foliage is unacceptable and inappropriate.
- The Proposed Scheme creates too many conflict points for residents existing/entering houses, construction works will have an adverse impact on amenities and property, will adversely affect property values, impact on ambulance movements.
- There is no proof that the Proposed Scheme will take any cars off the road and the additional facilities are not justified given the increase in working from home.
- The late switch of the cycling track from the RTE side of Nutley Lane was carried out without public consultation and is inappropriate as it impacts on additional residential properties.
- No justifiable need to connect Stillorgan and Merrion road high-capacity transport corridors, a previous shuttle bus from UCD to Sydney Parade Dart

Station was abandoned due to lack of demand, bus turning will slow down traffic on the Stillorgan Road.

- GDA Transport Strategy did not set out any proposals on Nutley Lane.
- In the event of an Oral Hearing the Nutley Residents' Association would intend to be represented and to participate.

13.1.72. **Mark O'Byrne**

- Objection is centred on the destruction of the Baggot Street village neighbourhood area.
- The Northumberland Road Mount Street bridge access to Merrion Square is more direct and would have a lessor impact on amenities. The direct route from UCD to the city centre is via Donnybrook, Morehampton Road and Leeson Street.
- The Proposed Scheme will cut-off and restrict access to Baggot Street, adversely impacting the community and businesses.
- Supports the alternative suggestion of a pedestrian bridge across the Grand Canal from Mespil Road to Wilton Place.
- The Newton Plan and Newton Report present better alternatives to the Proposed Scheme and should be supported.

13.1.73. Elise O'Callaghan

- Can't understand why Pembroke Road was selected as a main bus corridor into the city when there are already two proximate and more significant bus/cycle routes available (Northumberland Street and Morehampton Road/Leeson Street).
- Pembroke Road bus gate will give rise to additional inappropriate traffic on adjoining residential streets.
- Justification is based on pre-Covid numbers and data, which is out of date and doesn't take account of emerging commuter and work practices.
- Objects to interference with railings, gate and granite plinths along Herbert Park Road, these amendments are acknowledged as being "Direct, Negative, Moderate and Permanent". Amendments to the curtilage of Pembroke Town Hall (RPS), the kiosk (at junction of Pembroke, Northumberland and

Lansdowne Roads) are also strongly objected to. It is inappropriate to carry out works that will have an acknowledged negative impact on the character of the locality.

- The proposed amendments to 1-11 Pembroke Rd. adversely impact the curtilage of these protected structures and the NTA should not be allowed to alter the railings, access or grounds. Furthermore, the application documentation seems to refer to only 2 trees in the communal garden when there are in fact more than 12, this calls into question the accuracy of the reporting and surveying carried out.
- Along northwest stretch of Pembroke Road the proposal to provide cycle lanes between footpaths and vehicle lanes will create unsafe conflict between pedestrian accessing/egressing cars and bicycle traffic.
- Complete lack of pedestrian crossing facilities along 1-120 Pembroke Road is unsafe and inappropriate for this residential community accessing Herbert Park or the school on Haddington Road. A pedestrian crossing is needed at the junctions of both Wellington and Raglan Rds.
- Level of proposed tree felling along Merrion Road is not appropriate.
- Turning Merrion Square into a large bus terminus is inappropriate.

13.1.74.Pierce O'Leary

- Proposed changes on Upper Baggot Street including the inclusion of a bus gate, turning bans and removal of car parking spaces will have an extremely detrimental impact on commercial units, forcing traffic onto more minor roads, customers will have to take circuitous routes and there will be no proximate on-street parking available.
- The changes will cause a number of customers to stop availing of local services.

13.1.75.John O'Malley

 Objects to Nutley Lane being developed into a four-lane highway that will divide the community.

- Immediate concerns include loss of on street parking, the loss of mature trees and hedgerow, creation of conflict points for residents access, increased noise nuisance and pollution, and adverse impact on property values.
- Additional developments have not been taken into account, a traffic management plan incorporating these and the wider area needs to be carried out and there is no evidence of the Proposed Scheme will take any cars off the road. The Proposed Scheme does nothing to alleviate existing congestion in and around the hospital entrance.
- The late change of the cycling track from the RTE side of Nutley Lane was carried out without public consultation and is inappropriate as it impacts on additional residential properties.

13.1.76. Garrett O'Neill

- Proposed Scheme will make Pembroke Road one way for cars and will divert a significant amount of traffic onto nearby residential laneways where there are narrow footpaths carriageways and required on street parking. additional traffic on these routes will negatively impact residential amenity increase noise and pollution as well as constituting a danger to pedestrians and cyclists.
- Proposed Scheme is unnecessary, it would be simpler to use the established routes in and out of the city along Northumberland Road/Merrion Rd. and Lesson Street/Morehampton Road, if necessary as a one way circular route.
- It is unsafe to position cycle lanes between car parking and footpaths due to the need for changes at intersections and other obstructions. Furthermore, parking away from the footpath leads do an impression of visual clutter to the detriment of the historic streetscape.
- Gate at 33 Pembroke Rd. must be maintained with no parking or other obstructions.

13.1.77. **James O'Shea**

- Upper Baggot Street is a shopping and community area not an arterial route.
- It is not appropriate to provide a bus corridor along Pembroke Road and Baggot St. to take a circuitous route into the City Centre, when N11/Donnybrook/Leeson St. and Ballsbridge/Mount St. are the main direct

routes. Furthermore, the Baggot Street bridge is not ideal to accommodate the volume or nature of the traffic.

- By removing parking on Upper Baggot Street the Proposed Scheme will greatly harm local businesses and the services they provide the local community.
- The traffic restrictions proposed by the introduction of the bus gate on Pembroke Road, stopping traffic from turning right off Mespil Rd, restricting the width and flow of traffic on Haddington Rd, while cutting off St. Marys Rd. and preventing traffic from Waterloo Road will isolate the community and kill the local cultural and retail centre.
- Flawed justification for the scheme as data used is pre-pandemic in relation to commuting activity.
- The introduction of such a large number of busses through the heart of Georgian Dublin would have an adverse impact on the visual amenities of the area.

13.1.78. Cornelius and Mary O'Sullivan

- Generally supportive of the scheme but have concerns in relation to the Nutley Lane proposals.
- Nutley Lane has the capacity to take 3 lanes of traffic which should be used for:
 - Dedicated bus lane Stillorgan Rd to Merrion Rd,
 - Dedicated car lane Stillorgan Rd to Merrion Rd,
 - Shared lane bus/car Merrion Rd to Stillorgan Rd.
 - A 2-way cycle lane replacing a footpath.

The four-lane road approach cannot be justified as it is primarily to facilitate cars and will result and the removal of significant numbers of trees and established hedgerow.

 The number of entrances and exits along the short 700 metre Nutley Lane will mean time savings along this corridor will be negligible even in a bus priority lane.

- The St Vincent's hospital complex is the last significant stop on the outgoing leg (city to UCD) on Nutley Lane (and first on the ingoing) so speed timing is not a critical factor on this leg and sharing the third lane is a practical solution.
- The provision of two private car dedicated lanes along Nutley Lane will give rise to growth in car usage at this location.
- It is not clear from the application documents if the ramps along Nutley Lane are to remain on the road however it is requested that they be removed.
- Should the three-lane option not be accepted it is requested that alternative landscaping and planting be provided along the concrete wall to address the public (i.e. Nutley Lane side), perhaps through the provision of indentations in the wall to accommodate the replanting of trees.
- The elimination of the footpath from the Golf Club gate to St Vincent's hospital should be reconsidered this is a very busy pedestrian route and its removal is questionable especially when there are alternative safer cycle routes through the Nutley area.

13.1.78.1. C. & M O'Sullivan Response to NTAs Comments on submission

- The route referred to as Option NL. 2 was developed by the NTA at the outset and all subsequent studies and proposals put forward by residents were deemed to perform poorly against this 'preferred option'.
- The project continues to involve an inordinate amount of destruction of the natural environment on Nutley Lane, resulting in the destruction of 300m of mature hedging, and loss of 70/80 mature trees. The replacement of the fencing along Nutley Lane with a concrete wall is highly inappropriate.
- No consideration has been given to the changing traffic flows arising from increased working from home, or the traffic and ambulances associated with the Maternity Hospital.
- The traffic controls proposed will only lead to additional congestion on Merrion Road which will que back to and affect Nutley Lane.
- Additional planting on Nutley Lane to replace that lost should be insisted upon.
- The drainage concerns raised by DCC should be taken account of.

13.1.79. Dr. Rozelle Owens

- Baggot Street does not have a traffic problem and is not congested the Proposed Scheme is going to destroy the area and sacrifice it for a bus depot. The observer is supportive of making Dublin a more accessible city however Ballsbridge as a destination in its own right and there are many businesses offering a full range of services which will be significantly adversely affected by the Proposed Scheme.
- The Proposed Scheme will have a significant adverse impact on the streetscape of Baggot Street.

13.1.79.1. Dr. Rozelle Owens Response to NTAs Comments on submission

Dr. Owens responds to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

- The Proposed Scheme will remove the village feel from Baggot Street. Lower Baggot Street is iconic and unique and to remove the trees is sacrilegious. (Inspectors note in this regard: the Proposed Scheme as submitted does not propose to remove any trees on Baggot Street Lower, while 5 no. are proposed for removal on Baggot Street Upper.)
- Bus Corridors should be placed along Northumberland Road and Donnybrook.
- The Bus corridor proposals are too focused on getting people into the city centre and they sacrifice the vibrant village centres along the route.

13.1.80. Pembroke Road Association

- Joint submission with the Upper Baggot Street Traders (who have also put in their own submission – summarised further below).
- The imposition of bus parking along the periphery of Merrion Square in the heart of Georgian Dublin is highly inappropriate.
- Pembroke Road and Baggott Street are busy with pedestrians both before and after matches and events. The Proposed Scheme would cause traffic and safety conflicts with these convivial occasions and impede pedestrian activity/permeability.

- An increasing number of residents and office workers rely on Upper Baggot Street as a destination to walk to for daily shopping and dining which is in keeping with the aspirations of the 15-minute City.
- The bridge at Lower Mount Street is a flat modern 20th century bridge which is capable of accommodating additional bus traffic and forms part of the existing Northumberland Road / Lower Mount Street bus route into the City Centre. This represents a better alternative route for the Proposed Scheme than cutting through Pembroke Road and Baggot Street.
- The direct route from Belfield into the city centre is along the dual carriage way through Donnybrook and Leeson Street. The Proposed Scheme is not justifiable in its current form as the benefits do not outweigh the costs of the scheme in terms of its impact.
- There is a need for a level wheelchair friendly walking bridge across the grand canal as the McCartney bridge is at capacity.
- Compulsory purchases of land to facilitate additional works at McCartney bridge and numbers 1-11 Pembroke Road are not appropriate as they represent intrusions onto these protected structures and features of interest. Furthermore, the removal of trees and the common front gardens of the Pembroke Road protected structures must be resisted.
- Public notices in relation to the Proposed Scheme were poorly displayed used obscure language and no clear easily legible layouts were provided. It is considered that the notices provided are out of order under the Aarhus convention.
- The removal of existing short-term parking (which is necessary for deliveries as well as customers) in the Baggot Street commercial area, is inappropriate.
- The Proposed Scheme will cause significant adverse impacts on the amenities and Georgian character of the area, the streets themselves have been designed to be attractive and contribute significantly to the character of the area. The Proposed Scheme will cause significant intrusion and alteration both from its design, construction, and operational periods (due to the significant number and frequency of buses which will be traversing the route).
- The "Newton Plan" (a submission made to the NTA in January 2022) is presented as a more appropriate alternative to the Proposed Scheme.

Northumberland Road is the optimum alternative as it is less populated, is not a commercial shopping street and won't interfere with match/event day traffic. The "Newton Plan" provides for a transport plan linking Dublin Neighbourhoods in an orbital system, and it is argued will keep buses moving, create more fluid traffic movement and be cost-effective, and proposes new route for Luas along Lower Baggot Street.

- A number of additional submissions are also included from individual members who raise issues discussed previously/listed above and also raise the following issues in relation to the Proposed Scheme:
 - $\circ~$ It will adversely affect the culture and character of the area.
 - There will be adverse impacts on businesses and community through the division of the street,
 - Adversely affect safety due to a lack of pedestrian crossings.
 - Traffic restrictions will drive more vehicular activity and parking onto more residential roads which are already under pressure.
 - Create chaos on St. Marys Road, Baggot Lane and Eastmoreland
 Place as these residential streets will become "rat-runs".
 - Be inappropriate as the data used to justify the route (i.e. demand analysis) is from pre-Covid surveys and does not consider modern working environment, nor potential implications with the Dublin Metro.
 - Result in a loss of mature trees.
 - Not be consistent with Project 2040 which seeks at least 40% of new housing to be in existing built-up areas, BusConnects is predicated on serving low density suburban housing.
 - If BusConnects is meant to be better for the environment it should not be brought into operation until the Dublin bus fleet is operating at zero emissions (2035).
 - No point in facilitating more vehicles entering the City, more of the core should be pedestrianised and walking prioritised over cycling and cars/buses.
 - Trees used in landscaping need to be similar to those being taken out, with mature with high crowns.
 - Additional light rail is a better solution.

- Better signalised co-ordination and phasing is required and timings provided for access for cars/deliveries to commercial premises.
- Restrictions will cause Pembroke Lane to become a rat-run.
- It is inappropriate to funnel increased traffic through Herbert Park which is an amenity area.
- Difficulties in accessing the Wellington/Clyde/Elgin/Pembroke Roads area will arise as these areas will be sandwiched between two bus corridors, isolating the community. Both corridors 13 and 14 cannot be justified together. There is no justification for the 14 route from the Merrion Centre to the City Centre.
- More and more of the Georgian buildings in this area are returning to residential use and the Proposed Scheme does not cater for this strengthening community.
- More pedestrian crossings should be provided on Pembroke Road.
- A one-size fits all is not appropriate and the Proposed Scheme should have trialled smaller sections and a range of options such as traffic controls and variable one-way systems, to demonstrate success before rolling out the entire project at the scale proposed.
- The submission/observation also contains a copy of the submission made by the Pembroke Road Association and the Baggot Street Traders Association to the Draft Greater Area Transport Strategy, 2022 – 2042 (DGATS) dated January 2022, and which primarily advocates for an alternative multi-modal transport solution which is referred to as the "Newton Plan" as a more appropriate alternative. The Newton Plan notes the main cause of city centre congestion is buses and in summary, argues for the following:
 - Provision of orbital LUAS providing links with intercity rail at the Adamstown hub.
 - Giving direct access to Dublin airport via rail to all mainline rail passengers including Belfast.
 - The return of the Baggot Street tram.
 - Pedestrian walkways direct from Ballsbridge to Parnell square, the addition of trams accessing St Stephens Green by adding a line from

Fatima with every second tram from Docklands looping back from Houston via Fatima and Stephens Green.

- Rail access to Dublin airport via all existing Dart lines.
- Greater efficiency in use of bus fleet by contra-flow bus lanes on the quays.
- Higher priority and safety for cyclists on the quays.
- There is no need to heavy-load all bus routes on a small number of streets which would negatively impact residents and traders alike (under current DGATS proposals the positioning of buses along Pembroke Road and Baggot Street is heavy, while Northumberland Road and Leeson Street are under-utilised).
- The "Newton Plan" represents a wide range of transport measures to improve the overall public transport for Dublin and seeks to improve pedestrian, cyclist and e-scooter safety, and was submitted in response to the DGATS public consultation period.

13.1.80.1. Response to NTAs Comments on submission

The third-party response to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

 Do not agree with the Boards position regarding an Oral Hearing, as it is prejudicial and contrary to the principle set out in the Aarhus convention.

13.1.81. **James Quinn**

- The proposed scheme will destroy the streetscape of Baggot Street, lead to business closures and ruin an established residential community.
- The established Donnybrook and Northumberland Rd. bus corridors are already in place and presents a better alternative.
- The cost of providing this development through Baggot St. does not outweigh the benefits.

13.1.81.1. James Quinn Response to NTAs Comments on submission

The third-party response to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

- The Proposed Scheme will have a detrimental effect on the Upper Baggot Street village area, adversely affect the Georgian Streetscape and destroy the current vibrant mix of commercial enterprises.
- The loss of trees is disastrous.

13.1.82. Michael J. and Helen Quinn

- Oppose the selection of the route of the Proposed Scheme through Baggot Street because the MacCartney Bridge is too narrow and not capable of accommodating the additional bus movements, bus frequencies of one every three minutes will diminish the quality and safety of pedestrian experience as well as the character and culture of Baggot Street and Pembroke Road, neither the Georgian mile nor Baggot street will be preserved or enhanced by the Proposed Scheme.
- Baggot Street retail premises rely on passing as well as local trade therefore on-street parking must be retained on both sides, 2 accessible parking bays are not sufficient.
- Loading bays adjacent to shops are necessary and pedestrian facilities and cycling stands are required.
- Supports the use of Northumberland Road and Mount Street Upper for buses due to faster journey time, less items of architectural merit to be impacted, more modern bridge capable of accommodating the traffic available, provides the opportunity to segregate buses from most pedestrian and cycling activity.
- Questions the merits of the demand analysis against which the Proposed Scheme was justified.
- The impact of the National Maternity Hospital on the proposed route should be considered.
- The temporary acquisition of land from the curtilage of existing buildings will cause irreversible damage to Georgian-era railings, gardens and public land.
- Endorses the Newton Plan and includes a copy of the submission incorporating same into the DGATS (This has is summarised above at 80).

13.1.82.1. Response to NTAs Comments on submission

The third-party response to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

- Do not agree with the Boards position regarding an Oral Hearing, as it is prejudicial and contrary to the principle set out in the Aarhus convention.
- Contains a number of letters from various businesses in Pembroke Road, Upper and Lower Baggot Street, as well as Haddington Road making the same contention.

13.1.83. Rathgar Residents Association

- Generally supportive of the improvements to Dublin's bicycle lanes and public transport network, however the price is too high to gain seconds off commuting time if heritage, trees, wildlife and streetscapes are to be threatened.
- Concerns are raised that the Proposed Scheme will have a significant residual impact on the badger, mixed broadleaf woodland and scattered trees and Parkland as well as breeding and wintering bird species.
- In the summary of operational phase impacts the EIAR states that there will be significant residual impact on the Grand Canal which is a proposed Natural Heritage Area (pNHA). The impacts include habitat degradation as a result of a likely significant effect at the local geographic scale for air quality.
- The Rathgar Residents Association believes that comprehensive underground metro is a more appropriate response, or in the shorter-term congestion charges, park and ride facilities, and more priority bus lights. The submission states that all non-invasive improvements should be made before any irreversible and detrimental changes are made to the villages and streets of Dublin.

13.1.84. Sarah Reidy

 Objects to the Baggot Street/ Pembroke Road portion of the Proposed Scheme. Detrimental effects will arise from restricting right turning traffic from Mespil Road, restricting through traffic from Pembroke Road to upper Baggot Street, and removal of on-street car parking.

- The Proposed Scheme will turn a Georgian and Victorian streetscape into a bus corridor and have detrimental visual impacts.
- Cutting off access from Eastmoreland Place/St. Mary's Road combined with the Pembroke Road bus gate will cripple local businesses and divide the community.

13.1.85. Gráinne Ross (Managing Director – Dylan Hotel)

- Supports the principle of the Proposed Scheme however its chosen route through Pembroke Road and Upper Baggot Street is wrong.
- The bus route should be redirected via Northumberland Road and Mount Street lower as this is the most direct route in the city centre and Mount St. bridge is flatter and more suitable to accommodate the traffic. This route would avoid impacts on Upper Baggot Street which is a vibrant community hub.
- The traffic restrictions imposed will impact on deliveries and accessibility to the Dylan Hotel the changes proposed will impact adversely on hotel operations.

13.1.86. Richie Smith

 Considers that the retention of trees along the route should be incorporated into the Proposed Scheme.

13.1.87. Vivienne Starr

- Concerned that the Proposed Scheme will have a significant adverse effect on retail outlets and the community from Pembroke Rd. through Baggott St. and onto Merrion Square.
- Local, proximate, access and parking is required for a number of the services available such as opticians, dentists, doctors, loss of on-street parking will have a detrimental impact on these services particularly for those with mobility issues.
- Northumberland Road represents a wiser planning and more cost effective route.

13.1.88.Sarah Staunton

- The Proposed Scheme would have a significant adverse impact on Georgian Dublin and stop any opportunity for UNESCO world heritage status.
- The Baggot Street bridge is a protected structure, Waterways Ireland has previously stated that no development work is recommended in order to preserve it's historical heritage, flora and fauna.
- It seems flawed logic to run a bus corridor parallel to an already popular well used Dart line.
- The scheme by-passes the most direct route from UCD to the city centre (i.e. via Donnybrook), which is illogical.
- The scheme will not facilitate or ease access to St. Vincent's campus of medical services as the primary form of access for patients to these facilities will remain the private car.
- The Proposed Scheme will have a significant adverse impact on businesses along Pembroke Road and Baggot Street through loss of parking as well as restricting access and turning movements for private vehicles.
- The lack of a feasible plan for additional bus depots is concerning and will lead to buses grouping and loitering at specific points along the route to the detriment of residents and businesses in the vicinity.
- The justification for the scheme is flawed as it is based on pre-Covid data.
- A deeper investigation of potential impacts on SACs would be prudent as the environmental damage is likely to be irreversible. Brent Geese regularly feed and reside in the marsh area in Booterstown, near Blackrock Park, on Sandymount Strand and in Pembroke Cricket Club. With regard to the fact of the works on the water table propose development mentions attenuation measures however it does not give further detail.

13.1.89. Seamus Tarmey

- Objects to the provision of a bus corridor on Baggot Street Pembroke Road as it will destroy the streetscape and remove many mature trees.
- There are more viable and available alternatives already on the Northumberland Road and Donnybrook, which could be used instead of destroying more of Georgian Dublin's streets.

13.1.89.1. Response to NTAs Comments on submission

Mr. Tarmey's response to the NTA's comments in relation to the Proposed Scheme can be summarised as follows.

- The Proposed Scheme will have a detrimental effect on the Upper Baggot Street village area, adversely affect the Georgian Streetscape and destroy the current vibrant mix of commercial enterprises.
- The loss of trees is disastrous.
- Contains a number of letters from various businesses in Pembroke Road, Upper and Lower Baggot Street, as well as Haddington Road making the same contention.

13.1.90. Anne-Marie Taylor

- Objects to the provision of a bus corridor along Pembroke Road in Ballsbridge because the Proposed Scheme will fundamentally change the character of the neighbourhood and is not necessary as the current bus route along Leeson Street from Belfield or the Northumberland Road route to the City Centre are already in place and could be upgraded.
- Traffic restrictions will mean car journeys will have to take circuitous routes along inappropriately sized roads and streets. The submission questions whether any downstream analysis of the environmental impact of displaced traffic from the proposed routes have been carried out.

13.1.91.Tesco Ireland Ltd.

This submission has been discussed, summarised and reviewed in Section
 5.4.22 of the Report above.

13.1.92.Barbara Tomaz

 The Proposed Scheme will have an adverse impact on the Pembroke Road and Baggot Street Upper. Additional traffic will impact on local residents and it requires the removal of many mature trees. There are more clear and better alternative connections to the City Centre from Belfield (via Donnybrook) and Blackrock/Merrion (via Northumberland Road.)

13.1.93.Hugh Tyrrell

- Generally supportive of the Proposed Scheme however, recognises improvements could be made.
- Certain locations introduce a bus lane and retention of private traffic lanes at the expense of space for pedestrians and cyclists this is not appropriate.
- A previous iteration to make Nutley Lane bus only and reroute private traffic is a better solution than widening the whole road and narrowing the pavement to accommodate two general traffic lanes (/cars).
- While kerbside bike lanes are welcomed the majority are narrow single lanes when a wider two-way system should be preferable such as the coastal mobility route in Dun Laoghaire. This would facilitate overtaking and be safer.

13.1.94. Upper Baggot Street Traders Association

- Represents approximately 80 businesses in the greater Baggot Street area and they consider that the incorrect route has been chosen. The alternative of providing a bus corridor along Northumberland Road is shorter, more direct, and presents less obstacles than within the corridor through Pembroke Road, furthermore, the bridge infrastructure (Mount Street Bridge) is more modern and can cater for the type and scale of traffic proposed.
- The Proposed Scheme will result in the removal of loading bays (there are not enough provided as it is) the loss of significant short-term parking and the loss of the ability to park a car on Baggot Street to facilitate customers medical, retail and service needs will have a significant adverse impact.
- The imposition of a bus gate will cut off Upper Baggot Street and Pembroke Road and will adversely affect traders.
- The justification for the Proposed Scheme is based on out-of-date information and data gathered pre-Covid.
- The removal of trees, railings, and the narrowing of footpaths is inappropriate.

 The submission also supports the "Newton Plan" and the submission made to DGATS, the details of which have been set out previously above.

13.1.94.1. Response to NTAs Comments on submission

The third-party response to the NTAs comments in relation to the Proposed Scheme can be summarised as follows.

 Objects to the decision to not have an Oral Hearing in relation to the Proposed Scheme, and considers that this is contrary to the provisions of the Aarhus Convention. Furthermore sufficient time was not afforded to consider the submission from the NTA.

13.1.95. Eileen Vaughan

 This submission has been discussed, summarised and reviewed in Section 5.4.23 of the Report above.

13.1.96. Wappinger Food Corporation Ltd. (C/O Denis McSweeney Solicitors)

This submission has been discussed, summarised and reviewed in Section
 5.4.24 of the Report above.