ENVIRONMENTAL IMPACT ASSESSMENT REPORT

NON TECHNICAL SUMMARY

Concorde Industrial Estate, Naas Road, Dublin 12

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In Association with:
Reddy Architecture and Urbanism; IAC, Openfield Ecological Services; Modelworks Media; Barrett Mahony Consulting Engineers; AWN Consulting, Stephen Diamond Landscape Architects

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1.0 INTRODUCTION

This Environmental Impact Assessment Report (EIAR) has been prepared in support of a planning application for a mixed use "Build to Rent" residential and commercial development at the former Concorde industrial Estate, Naas Road, Dublin 12.

This document is a summary of the information contained in the EIAR. For detailed information and key mitigation and remedial measures please consult the full EIAR document.

2.0 PURPOSE OF THE EIAR

The objective of this EIAR is to identify and predict the likely environmental impacts of the proposed development; to describe the means and extent by which they can be reduced or ameliorated; to interpret and communicate information about the likely impacts; and to provide an input into the decision making and planning process.

The EIAR is the primary element of the Environmental Impact Assessment (EIA) process and is recognised as a key mechanism in promoting sustainable development, identifying environmental issues, and in ensuring that such issues are properly addressed within the capacity of the planning system.

3.0 REQUIREMENTS FOR AN EIAR

Projects needing environmental impact assessment are listed in Schedule 5 of the Planning and Development Regulations 2001.

Schedule 5 of the Planning & Development Regulations 2001 cites the size thresholds over which certain types of development require an EIAR to be prepared as part of the planning application process.

The proposed development falls within the project class 10(b)(iv) 'Urban Development', though the site is well below the mandatory size threshold for this type of project. However, given the nature and extent of development proposed, in pre application discussions with the Planning Authority (Dublin City Council) it was agreed that in this instance an EIAR was warranted. It was considered the opinion of the Planning Authority that whilst a sub-threshold development, it may have significant effects on the environment due to its height in particular. In this context the EIAR has been prepared.

The following components are addressed in the EIAR:

- Introduction and Methodology,
- Project Description and Alternatives Examined,
- Population and Human Health,
- Archaeology, Architecture and Cultural Heritage,
- Biodiversity (including flora and fauna),
- Land and Soils,
- Water,
- Air Quality and Climate
- Noise and Vibration,
- Material Assets Traffic and Transport & Utilities,
- Material Assets Waste;
- Interactions Between Environmental Factors,
- Mitigation and Monitoring Measures,
- Interactions;
- Risk Management;

It is necessary to examine each of these sections of the environment with respect to the impacts that the proposed development may have on them.

In addition to the information contained in the EIAR a number of other standalone reports assessing environmental impacts are submitted with the planning application documentation. These documents have been considered in the preparation of the EIAR. These include:

- Traffic Report and Mobility Management Plan;
- Waste Management Statement for Construction and Operational Phases;
- Construction Management Plan;
- Engineering Services Report;
- Demolition Method Statement;
- Flood Risk Assessment;
- Sustainability and energy efficiency report;
- AA Screening.

4.0 PROJECT DESCRIPTION AND ALTERNATIVES EXAMINED

The subject site is c. 1.8 hectares and is located on the southern side of the Naas Road, Dublin 12. The site is a brownfield site formerly used as a car sales showroom.

The site is well served by public transport including the Luas Red Line and Dublin Bus.

The existing building on site comprise of former industrial type units which comprise of the majority of the site. The site is entirely covered by buildings and hard standing with a single tree line to the rear of the site adjoining lands to the south.

A number of services adjoin and intersect the site including a 38KV Pylon which runs through the south eastern corner of the site, a 110KV Pylon which adjoins the site to the west and a trunk sewer pipe which runs along the northern and eastern boundary of the site.

The site is bound to the north by the Naas Road, and the Luas Line, to the south by greenfield lands and a hard standing car park, to the east by industrial / warehouse buildings and a residential development under construction and to the west by an electrical pylon and an industrial building.

The subject site is located in an emerging area for high density residential and commercial development with high quality public transport services. The location of the subject site is identified for re-generation as set out in the Naas Road LAP and has the potential to provide for significant residential and commercial development in this part of the city.
The proposed development comprises of the demolition of the existing single storey industrial building (8,660 sq.m.) on the site and the construction of a “Build to Rent! Residential and commercial development on lands at Concorde Industrial Estate (1.88ha), Naas Road, Dublin 12.

The proposed development comprises of 492 no. residential units comprising of 104 no. studios, 136 no. 1 beds and 252 no. 2 beds. The proposed development includes the provision of communal residential facilities such as concierge, resident lounge, shared winter gardens, shared work space, meeting rooms, events spaces and external residential courtyards and all associated resident support facilities to accompany the “Build to Rent” development.

The development also includes the provision of 3,347 sq.m. commercial uses comprising of retail, café, restaurant, medical centre, car showroom, and creche. The proposed development also accommodates 200 no. car parking spaces at basement level and 43 no. at surface level, 276 no. cycle parking spaces at basement level and 236 no. cycle spaces at surface level with a further 60 no. surface level visitor spaces, plant rooms, refuse storage, public open space, landscaping, SUDS drainage, and all associated site development works necessary to facilitate the development.

Alternatives Examined

The presentation and consideration of various alternatives investigated by the project design team is an important requirement of the EIAR process. The Examination of Alternatives had particular regard to:

- alternative designs; and
- alternative processes.

Alternative Designs

Alternative design and layouts for the subject lands were considered over approximately a 12 month period up to the finalisation of the scheme. A number of different design options were considered for the site. In addition, the proposals for the subject site were the subject of detailed discussions with the Planning Authority prior to the principles of the finalised scheme being agreed.

The scheme as presented to ABP addressed the following concerns raised in the last pre application meeting with Dublin City Council.

- Increase in the percentage area of the commercial floor area
- Reconfiguration of internal communal space for residents
- Relocation of bin store area to the north of the site
- Increased level of detail on the quantum and provisions of the communal and public open space area
- Increased detail on the boundary treatments on the site
- Breakdown of residential service facilities and amenity areas
- Increase in dual aspect ratios
- Revised design to the north facing units
- Details of the proposed materials refined in response to the overall context of the development

The relevant environmental issues and potential effects which informed this consideration primarily related to biodiversity, water, human health and landscape and visual impact.

A key consideration is the requirement to demonstrate to the Planning Authority that the proposed development is consistent with objectives for the site set out in the LAP and that the design of the development is of exemplar quality.

Alternative Processes

The EIA Guidelines state that within each design solution there can be a number of different options as to how the processes or activities of the development can be carried out. These can include management of emissions, residues, traffic and the use of natural resources. A key consideration in the various options which were considered, as discussed above, was the overall land use mix and layout of the development resulting in potential impact on human health and the presence of underground services resulting in impacts on the water supply in the area. Where relevant, alternative processes are considered in each Chapter of the EIAR.

5.0 POPULATION AND HUMAN HEALTH

Human Beings comprise an important aspect of the environment to be considered. Any significant impact on the status of humans, which may be potentially caused by a development proposal, must therefore be comprehensively addressed as part of the Environmental Impact Assessment.

The construction phase of the proposed development is likely to result in a positive net improvement in economic activity and residential development in the area of the proposed development site particularly in the construction sector and in associated and secondary building services industries.

The proposed “Build to Rent” Residential and commercial development will result in a construction period of approximately 24 months. Thus, the construction phase is likely to significantly enhance economic activity in the construction sector. It is anticipated that a substantial number of jobs will be created directly on site. The construction of this development would also support job creation in building supply companies as well as have a positive impact for local businesses associated with the increase in spending on goods and services in the area.

The construction phase will also have secondary and indirect 'spin-off' impacts on ancillary support services in the area of the site, such as retail services, together with wider benefits in the aggregate extraction (quarry) sector, building supply services, professional and technical professions etc. These beneficial impacts on economic activity will be largely temporary but will contribute to the overall future viability of the construction sector and related services and professions over the phased construction period.

The construction phase of the project may have some short-term negative impacts on local businesses/residents during the construction phase. Such impacts are likely to be associated with construction traffic, possible nuisances associated with construction activity and noise impact. Mitigation of these potential impacts through construction management (such as methods employed, hours of operation) is an established approach. Such impacts will be short term and in the longer term, the completed scheme will have long-term beneficial impacts for local businesses, residents and the wider community. The construction methods employed and the hours of construction proposed will be designed to minimise potential impacts. These issues and appropriate mitigation measures are addressed in Chapter 13 of the EIAR, in the Construction Management Report, Demolition Method Statement and the Waste Management Statement which accompany the application.

In the longer term, the completed scheme will have long-term beneficial impacts for local businesses, residents and the wider community. Overall, the proposed development will result in the construction of new, high quality "Build to Rent" residential scheme with over 3,000 sq.m. commercial uses including retail, café, restaurants, medical centre, car show room, creche and shared work space. These new uses will have a significant positive impact on economic activity in the area. It is estimated that the development will support on average, of at least 150 workers.

The provision of additional office based employment floorspace as part of the proposed development, is consistent with the provisions of the Dublin City Development Plan 2016-2022 and the Naas Road LAP and will have a positive impact in terms of the existing economic activity in the wider study area.

The proposed development will provide for much needed residential accommodation in an area close to the city centre and well served by public transport. The proposed development will significant increase the residential provision in the area providing for 492 no. residential units. In addition, the increase in population as a result of the development will enhance the overall activity and vitality of the area as a residential location and will contribute to the existing and proposed commercial uses in the area.

The construction phase of the proposed development is unlikely to have any significant impact on social patterns within the surrounding area. Some temporary additional local populations may arise out of construction activity. However, these impacts are imperceptible, temporary in nature and therefore not considered significant.

6.0 ARCHAEOLOGY ARCHITECTURE AND CULTURAL HERITAGE

ARCHAEOLOGY

Irish Archaeological Consultancy Ltd has prepared this assessment on behalf of John Spain Associates, to study the impact, if any, on the archaeological and cultural heritage resource of the proposed redevelopment at Concorde Industrial Estate, Naas Rd, Dublin 12. The assessment was undertaken by Faith Bailey and Ross Waters of IAC Ltd.

The proposed development is occupied by modern structures and car parking associated with the Concorde Industrial Estate. It is located in the townland and Parish of Drimnagh and Barony of Uppercross, to the south of the Naas Road.

There are no RMP sites, RPS or NIAH structures, or demesne landscapes located within the proposed development area or its immediate vicinity. The closest recorded monument consists of the site of a bridge (RMP DU018-034), located c. 170m to the north. Of the five protected structures within the study area, the closest is Nalsetra House (RPS 5793) situated c. 125m to the northeast. Lansdowne House (NIAH 50080437) is the closest NIAH structure located c. 115m to the northeast.

Given the level of development that has taken place within the proposed development area, it is highly likely that any previously unknown archaeological deposits which may have been located within the site have since been removed. No potential negative impacts upon the archaeological resource are predicted as a result of the development going ahead.

Due to the highly developed nature of the study area, no potential negative impacts upon the architectural heritage or cultural heritage resource are predicted as a result of the development going ahead.

No mitigation measures will be required with regards to the archaeological, architectural and cultural heritage resource.

7.0 BIODIVERSITY (INCLUDING FLORA AND FAUNA)

A review of the biodiversity of the site was carried out by OPENFIELD Ecological Services and this included a study of existing information from the area and a site survey. A site survey was carried out in January 2019. January is outside the optimal season for general habitat survey and for surveying breeding birds but is within the optimal period for large mammals (particularly Badgers).

It was found that the site is not within or adjacent to any area that is designated for nature conservation at a national or international level. There are no plants recorded from the site that are listed as rare or of conservation value. There are no habitats that are examples of those listed on Annex I of the Habitats Directive. There are no plants listed as an alien invasive species as per Schedule 3 of SI No. 477 of 2011. The site is entirely composed of artificial surfaces and areas of hard standing. A hedgerow boundary to the south is entirely composed of non-native horticultural shrubs. There was no evidence of Badgers using the site while the buildings are of low suitability for roosting Bats.

The proposed development will result in no negative effects to semi-natural habitats or features of biodiversity value. Good site management practices will ensure that pollution to water courses does not occur during the construction phase. Surface water will be attenuated using sustainable urban drainage systems (SUDS). Additional landscaping will provide some new habitat in time. With the suggested mitigation in place, the ecological impacts by this proposed development will be neutral. There are no impacts that could affect any area designated for nature conservation.

8.0 LAND AND SOILS

An appropriate assessment for the proposed redevelopment of the subject lands and associated works pertaining to existing soils, geology & hydrogeological environment was carried out using data collected from a detailed desk study and intrusive specific site investigation and monitoring works. The investigations included on site intrusive testing consisting of borehole, trial pits and in-situ sampling. These works provided information on the existing ground conditions within the subject lands and yielded information which, in turn aided in the geotechnical design of the proposed structure.

The predicted impacts of the proposed development with regard to the land and soil environment have been assessed for the construction and operational phases.

Construction Phase

It is anticipated that the development site works and excavation proposals will not be deep enough to impact the underlying bedrock geology during the construction phase. It is therefore considered that the greatest impact from construction will arise from the extensive stripping and wide scale excavation of soils and sub-soils to prepare and construct the basement.

With the implementation of the mitigation measures as set out within this report, there will be minimal short term impact to the soil and geology in and surrounding the site. No long-term impact is expected as a result of the construction phase.

Operational Please

The day-to-day activities of the completed development would be unlikely to have any direct impact on the groundwater environment. Minor impacts may include increased infiltration and therefore slightly increased recharge volumes entering the groundwater. This is directly related to the creation of permeable development areas which, pending their arrangement will reduce run-off volumes and increase infiltration potential. The risk of spills or leaks of fuels and oils from residential vehicles may impact if the surface water system is not designed to address this.

The impacts on soils and geology arising from the operational phase will be temporary and very minor.

No significant long-term impact on the soil resulting from the proposed operational phase of the development is predicted. Once the development is completed, risks to the land and soils will be from pollutants deriving from the use of the dwellings and/or from contaminated surface water run-off.

9.0 WATER

Barrett Mahony Consulting Engineers have carried out an assessment of the potential impact of the proposed development on the water environment. Namely; surface water, foul water and water supply. . The assessment has resulted in a series of mitigation measures which are to be employed during the construction and operational phases of the development to minimize the impact on the water environment.

Surface Water

Construction Phase

Provided the proposed mitigation measures are implemented, the impact of the proposed development during the construction phase will be minimal and temporary

Operational Phase

There are currently no SUDS measures in place on site. There will be an impact on the surface water in the area due to the new development. However, the surface water system will ensure the impact from the operational phase on surface water will be minimal and constitute a significant improvement from existing conditions with elimination of surface water runoff to the combined sewer and a significant reduction in overall surface water run-off from the site.

Foul Water Drainage

Construction Phase

Provided that the proposed mitigation or measures are implemented, the impact of the proposed development during the construction stage will be of a temporary nature and will be minimised

Operational Phase

The development will result in an increase in the waste water discharged from the site to the public sewer system.

Irish water have confirmed that the foul water system has the capacity for the proposed development. With the elimination of stormwater discharge to the combined network, this will significantly reduce peak discharge rates from the site, a significant benefit to the public network. The potential impact from the operational phase of the development is therefore likely to be minimal.

Water Supply

Construction Phase

Provided that the proposed mitigation measures are implemented, there will be no appreciable impact of the proposed development during the construction stage on the water supply in the area.

Operational Phase

The new development will have an increase in the water supply demand. Irish Water have confirmed that the current water supply system has capacity to service the proposed development. The potential impact from the operational phase of the development is therefore likely to be minimal.

10.0 AIR QUALITY AND CLIMATE

AWN Consulting Limited has been commissioned to conduct an assessment of the likely impact on air quality and climate associated with the proposed development at the former Concorde Industrial Estate, Dublin 12.

In terms of the existing air quality environment, baseline data and data available from similar environments indicates that levels of nitrogen dioxide, carbon monoxide, particulate matter less than 10 microns and less than 2.5 microns and benzene are generally well below the National and European Union (EU) ambient air quality standards.

Impacts to air quality and climate can occur during both the construction and operational phases of the proposed development. With regard to the construction stage the greatest potential for air quality impacts is from fugitive dust emissions impacting nearby sensitive receptors. Impacts to climate can occur as a result of vehicle and machinery emissions. In terms of the operational stage air quality and climate impacts will predominantly occur as a result of the change in traffic flows or congestion in the local areas associated with the proposed development.

Any potential dust impacts can be mitigated through the use of best practice and minimisation measures which are outlined in this report. Therefore, dust impacts will be short-term and imperceptible at all nearby sensitive receptors. It is not predicted that significant impacts to climate will occur during the construction stage due to the relatively small scale of the development and the low volume of vehicles and machinery predicted.

The local air quality modelling assessment concluded that levels of traffic-derived air pollutants resulting from the development will not exceed the ambient air quality standards either with or without the proposed development in place. Using the assessment criteria outlined in Transport Infrastructure Ireland's guidance document 'Guidelines for the Treatment of Air Quality During the Planning and Construction of National Road Schemes' the impact of the development in terms of PM10, PM2.5, CO, NO2 and benzene is long-term and imperceptible. The proposed development is not predicted to significantly impact climate during the operational stage. Increases in traffic derived levels of NOX, VOCs and CO2 have been assessed against Ireland's obligations under the EU Targets and emissions ceilings set out by Directive (EU) 2016/2284 "On the Reduction of National Emissions of Certain Atmospheric Pollutants and Amending Directive 2003/35/EC and Repealing Directive 2001/81/EC". Impacts to climate are deemed imperceptible and long-term with regard to NOX, VOCs and CO2 emissions.

As the National and EU standards for air quality are based on the protection of human health, and concentrations of pollutants for both the construction and operational stages of the proposed development are predicted to be significantly below these standards, the impact to human health is predicted to be imperceptible and not significant in the short and long term.

No significant impacts to either air quality or climate are predicted during the construction or operational phases of the proposed development.

11.0 NOISE AND VIBRATION

The existing noise climate has been surveyed during both daytime and night-time periods and has been found to be typical of a urban area. Prevailing noise levels are primarily due to local road traffic movements with some contribution from Luas operations.

The potential noise & vibration impact on the nearest noise sensitive locations were assessed for the short-term construction phase and the longer term impact of the operational phase once the scheme is in operation.

Subject to good working practice during the construction phase and not exceeding any limits proposed within the EIS, it is anticipated that noise and vibration will not cause any significant impact or noise and vibration nuisance. During the operational phase, the key potential noise sources including increased in road traffic and mechanical plant noise emissions have been assessed and commented upon. The assessment has indicated that subject to the implementation of the mitigation measures proposed within the EIS, none of these will increase the existing noise climate sufficiently so as to be likely to cause a disturbance. Noise levels during the operation of the proposed scheme is predicted to nominally remain unchanged when compared to the existing scenario and are all within the recommended noise criterion for day and night-time periods.

In line with current best practice a detailed inward noise impact assessment on the proposed residential units within the development has also been completed. Based on the recommended Dublin City Council guidance, i.e. Professional Guidance on Planning & Noise (ProPG), the assessment outlines measures that have be incorporated into the design, including glazing sound insulation requirements, provision and location of amenity areas etc. that assist in the provision of an appropriate level of amenity in terms of noise.

12.0 MATERIAL ASSETS TRAFFIC AND TRANSPORT & UTILITIES

Material Assets considers physical resources in the environment which may be of human or natural origin. The objective of the assessment is to ensure that these assets are used in a sustainable manner, so that they will be available for future generations, after the development of the proposed development.

Economic assets of a natural origin include the assimilative capacity of air, water, landscape; together with non-renewable resources such as minerals and soils and renewable resources such as biodiversity.

This sub-section considers the key aspects relating to material assets of the proposed development site and the surrounding area, namely traffic infrastructure, electricity and gas supply.

The Material Assets chapter describes existing services to the application site and describes the predicted impacts which the development may have on these services.

13.0 MATERIAL ASSETS WASTE

AWN Consulting Ltd. carried out an assessment of the potential impacts associated with waste management during the construction and operational phases of the proposed development. The receiving environment is largely defined by Dublin City Council as the local authority responsible for setting and administering waste management activities in the area through regional and development zone specific policies and regulations.

During the demolition and construction phases, typical C&D waste materials will be generated which will be source segregated on-site into appropriate skips/containers, where practical and removed from site by suitably permitted waste contractors to authorised waste facilities. Where possible, materials will be reused on-site to minimise raw material consumption. Source segregation of waste materials will improve the re-use opportunities of recyclable materials off-site. Excavation of the basement, construction of new foundations and the installation of underground services will require the excavation of c. 17,747m^3 of soils and stones. It is anticipated that there will be no opportunities for reuse of the excavated material on site and so it will require removal from site for offsite reuse, recovery and/or disposal.

A carefully planned approach to waste management and adherence to the site-specific Construction and Demolition Waste Management Plan prepared by Barrett Mahony during the construction phase will ensure that the effect on the environment will be short-term, neutral and imperceptible.

During the operation phase, waste will be generated from the residents and commercial tenants. Two dedicated communal waste storage areas have been allocated for the residents on basement level. The waste storage areas have been appropriately sized to accommodate the estimated waste arisings. The commercial tenants will have three dedicated waste storage areas located on ground floor level. The waste storage areas have been allocated to ensure a convenient and efficient management strategy with source segregation a priority. Waste will be collected from the designated waste collection areas by permitted waste contractors and removed off-site for re-use, recycling, recovery and/or disposal.

An Operational Waste Management Plan has been prepared which provides a strategy for segregation (at source), storage and collection of wastes generated within the development during the operational phase including dry mixed recyclables, organic waste, mixed non-recyclable waste and glass as well as providing a strategy for management of waste batteries, WEEE, printer/toner cartridges, chemicals, textiles, waste cooking oil and furniture (Appendix 11.1). The plan complies with all legal requirements, waste policies and best practice guidelines and demonstrates that the required storage areas have been incorporated into the design of the development.

Provided the mitigation measures outlined in Chapter 11 are implemented and a high rate of reuse, recycling and recovery is achieved, the predicted effect of the operational phase on the environment will be long-term, neutral and imperceptible.

14.0 RISK MANAGEMENT

This Chapter of the EIAR identifies, describes and assesses the direct and indirect significant effects on the population and human health, biodiversity, land, soil, water, air quality and climate, material assets, cultural heritage and landscape deriving from the vulnerability of the project to risks of major accidents and/ or disasters that are relevant to the project concerned.

It was concluded that in compliance with the appropriate mitigation measures there are no identified incidents or examples of major accidents and / or natural disasters that present a sufficient combination of risk and consequence that would lead to significant residual impacts or environmental effects.

15.0 INTERACTIONS BETWEEN ENVIRONMENTAL FACTORS

This chapter of the EIAR deals with the likely interactions between effects predicted as a result of the proposed development. This is required by Part X of the *Planning and Development Act 2000* and Part 10, and schedules 5, 6 and 7 of the *Planning and Development Regulations 2001*.

All potential inter-relationship impacts between the various areas covered in the EIAR are listed and the key interactions and interrelationships are summarised.

16.0 SUMMARY OF MITIGATION AND MONITORING MEASURES

This chapter provides a summary of all the design, construction and operation mitigation measures proposed throughout the EIAR document for ease of reference for the consent authority and all other interested parties.

17.0 CONCLUSIONS

The proposed development represents an appropriate use of a brownfield site. It is considered that the proposed development accords with national, regional and local planning policy.

The EIAR has shown that, subject to the implementation of the mitigation measures and appropriate monitoring, there will be no long term adverse impacts on the environment as a result of the development proposal.