

# WALKING AND CYCLING AUDIT

**Residential Development**  
**Bessboro**  
**Blackrock**  
**Cork**  
February 2022





### Document Control Sheet

<b>Client</b>	Estuary View Enterprises 2020 Ltd.
<b>Project Title</b>	Bessborough Residential Development
<b>Document Title</b>	Walking and Cycling Audit
<b>Document No.</b>	21107TT-WCA-D01
<b>Job No.</b>	21_107TT

Revision	Status	Author	Reviewed By	Approved By	Date
00	Internal Draft	S. Moriarty	K. Manley	K. Manley	04/02/2022
01	Draft Issue	S. Moriarty	K. Manley	K. Manley	07/02/2022
02	Final Issue	S. Moriarty	K. Manley	K. Manley	03/03/2022
03	Revision	S. Moriarty	K. Manley	K. Manley	15/03/2022
04	Revision	S. Moriarty	K. Manley	K. Manley	21/03/2022
05	Revision	S. Moriarty	K. Manley	K. Manley	22/03/2022
06	Revision	S. Moriarty	K. Manley	K. Manley	23/03/2022

**M.H.L. & Associates Ltd.**  
**Consulting Engineers**

Carraig Mór House,  
 10 High Street,  
 Douglas Road,  
 Cork.

Tel 021-4840214 Fax: 021-4840215

E-Mail: [info@mhl.ie](mailto:info@mhl.ie)

**February 2022**



**CONTENTS**

**1.0 INTRODUCTION ..... 3**

**2.0 PROPOSED DEVELOPMENT ..... 3**

**3.0 WALKING AND CYCLING AUDIT STRUCTURE ..... 8**

**4.0 WALKING, CYCLING ASSESSMENT AND REVIEW.....12**

**5.0 SUMMARY .....14**

**6.0 APPENDICES .....18**

## 1.0 INTRODUCTION

### 1.1 INTRODUCTION

- 1.1.1 MHL Consulting Engineers has been instructed by Estuary View Ent 2020 Ltd. to prepare a Walking and Cycling Audit in accordance with DMURS Advice Note 4 in support of a planning application for a proposed residential development located in Bessborough, Blackrock, Cork.
- 1.1.2 The proposed development comprises two planning applications to An Bord Pleanála and includes two distinct phases, namely 'The Meadows' (Phase 1) and 'The Farm' (Phase 2). The development consists of a mixed-use strategic housing development of 420 no. build to sell residential units with two creches, a café, tenant amenities, landscaping, pedestrian/cycleway infrastructure and associated site development works at Bessborough, Ballinure, Blackrock, Cork.
- 1.1.3 Based on discussions with the local authority regarding the Traffic and Transport Assessment, a single Walking and Cycling audit was prepared for both phases of development to ensure a consistent reporting approach comprising both phases. Both development phases share the proposed pedestrian footbridge and the wider pedestrian/cycle network and thus a single audit was deemed appropriate.
- 1.1.4 A site visit was undertaken on Wednesday 19<sup>th</sup> January 2022 and at the time of the survey the weather was dry, and the ground conditions were dry. This audit will assess how pedestrians, cyclists and other vulnerable road users including the mobility impaired, push chair users and wheelchair users will navigate from the proposed development along perceived desire lines within the proximity of the development by using existing and proposed infrastructure.
- 1.1.5 The assessment was carried out on four different routes which are deemed to be desire lines to/from local amenities for residents within the development. The assessed routes are provided in **Appendix A**.

## 2.0 PROPOSED DEVELOPMENT

### 2.1 Site Description

- 2.1.1 The proposed development comprises two planning applications to An Bord Pleanála and includes two distinct phases, namely 'The Meadows' (Phase 1) and 'The Farm' (Phase 2).
- 2.1.2 Phase 1 'The Meadows' provides for the construction of 280 no. residential apartment units with supporting tenant amenity facilities, café, crèche, and all ancillary site development works. The proposed development includes 280 no. apartments to be provided as follows: Block A (6 no. studio apartments, 14 no. 1-bedroom, 34 no. 2-bedroom & 1 no. 3-bedroom over 1-6 storeys), Block B (37 no. 1-bedroom & 49 no. 2-bedroom over 6-10 storeys), Block C (31 no. 1-bedroom, 36 no. 2-bedroom & 6 no. 3-bedroom over 5-9 storeys) and Block D (30 no. 1-bedroom, 31 no. 2-bedroom & 5 no. 3-bedroom over 6-7 storeys).
- 2.1.3 Phase 2 'The Farm' provides for the demolition of 10 no. existing agricultural buildings /sheds and log cabin residential structure and the construction of a residential development of 140 no. residential apartment units over 2 no. retained and repurposed farmyard buildings (A & B) with single storey extension and 3 no. new blocks of 3-5 storeys in height, with supporting resident amenity facilities, crèche, and all ancillary site development works. The proposed development includes 140 no. apartments to be provided as follows: Block C (9 no. 1-bedroom and 25 no. 2-bedroom over 3 storeys), Block D (34 no. 1-bedroom & 24 no. 2-bedroom over 3-4 storeys), Block E (27 no. 1-bedroom, 20 no. 2-bedroom & 1 no. 3-bedroom over 4-5 storeys). It is proposed to use retained Block A and Block B for resident amenities which include home workspace, library, lounge and function space. Upgrade works to the existing pedestrian crossing along the Bessborough access road in close proximity to the mini-roundabout are included within Phase 2, reference **Figure 2.1.2** in this report and Shipsey





Figure 2.1.2 Layout of phase 2 ‘The Farm’

**2.2 Forecast Trip Attraction – Sustainable Transport (Walking, Cycling and Public Transport)**

2.2.1 This section describes the current level of modal shift (the use of sustainable modes of travel) based on available data and compares these to national targets.

Means of Travel	Work	School or College	Total
On foot	276	305	581
Bicycle	54	20	74
Bus, minibus or coach	185	143	328
Train, DART or LUAS	6	0	6
Motorcycle or scooter	12	2	14
Car driver	1,212	32	1,244
Car passenger	111	546	657
Van	73	0	73
Other (incl. lorry)	2	0	2
Work mainly at or from home	33	0	33
Not stated	86	52	138
<b>Total</b>	<b>2,050</b>	<b>1,100</b>	<b>3,150</b>

**Table 2.2.1: 2016 Modal Shift by means of travel to work, school or college. (Electoral Division of Mahon B)**

- 2.2.2 The 2016 Census online SAP data was used to assess current modal shift patterns in the Mahon area, specifically the electoral division of Mahon B which encompasses the site. 32% of people in this area said they were commuting on foot, bike or using public transport.
- 2.2.3 The electoral divisions of 'Mahon A', 'Mahon C', and 'Browningstown' were also analysed to ascertain their existing modal shift, ref. **Table 2.2.2**, **Table 2.2.3**, and **Table 2.2.4** respectively. **Table 2.2.5** provides a summary of the analysis results and indicates an average modal shift of 23% for the surrounding area. This figure more closely represents the anticipated modal shift of the proposed development due to the greater percentage of residential land use in these electoral divisions over 'Mahon B'.

PDF   Excel   Print			
Population aged 5 years and over by means of travel to work, school or college			
Means of Travel	Work	School or College	Total
On foot	158	194	352
Bicycle	68	17	85
Bus, minibus or coach	161	168	329
Train, DART or LUAS	2	1	3
Motorcycle or scooter	12	1	13
Car driver	1,395	50	1,445
Car passenger	107	650	757
Van	77	2	79
Other (incl. lorry)	8	0	8
Work mainly at or from home	47	3	50
Not stated	33	24	57
Total	2,068	1,110	3,178

**Table 2.2.2: 2016 Modal Shift by means of travel to work, school or college. (Electoral Division of Mahon A)**

PDF   Excel   Print			
Population aged 5 years and over by means of travel to work, school or college			
Means of Travel	Work	School or College	Total
On foot	70	132	202
Bicycle	50	18	68
Bus, minibus or coach	76	86	162
Train, DART or LUAS	2	2	4
Motorcycle or scooter	8	6	14
Car driver	924	63	987
Car passenger	69	331	400
Van	42	3	45
Other (incl. lorry)	4	0	4
Work mainly at or from home	45	3	48
Not stated	28	9	37
Total	1,318	653	1,971

**Table 2.2.3: 2016 Modal Shift by means of travel to work, school or college. (Electoral Division of Mahon C)**

Means of Travel	Work	School or College	Total
On foot	24	71	95
Bicycle	16	5	21
Bus, minibus or coach	8	16	24
Train, DART or LUAS	0	0	0
Motorcycle or scooter	3	0	3
Car driver	286	17	303
Car passenger	16	133	149
Van	19	1	20
Other (incl. lorry)	2	1	3
Work mainly at or from home	15	0	15
Not stated	6	2	8
<b>Total</b>	<b>395</b>	<b>246</b>	<b>641</b>

**Table 2.2.4: 2016 Modal Shift by means of travel to work, school or college. (Electoral Division of Browningstown)**

Electoral Division	No. Commuters	No. Sustainable Commuters	Modal Split %
<i>Mahon B</i>	3117	989	<b>32</b>
Mahon A	3128	769	<b>25</b>
Mahon C	1923	436	<b>23</b>
Browningstown	626	140	<b>22</b>

**Table 2.2.5: Summary of Modal Split for adjacent Electoral Divisions**

- 2.2.4 Road improvement works completed as a part of the Skehard Road Improvement Scheme should lead to continued progress of the Mahon Modal Shift towards national targets of 45%. Improved pedestrian and cyclist facilities in addition to the extension of bus lane facilities will have the effect of reducing journey times and encouraging an increase in use.
- 2.2.5 A modal shift of 40% (implying an anticipated increase in public transport or active travel in the immediate area of 17%) for future year models is deemed to be reasonable. This modal shift increase was applied to the completed development.
- 2.2.6 **Table 2.2.6** is the proposed trip attraction development phases 1 & 2 on the assumption that on average each unit consists of 2.7 persons.

Daily Development Trip Attraction	
Mode of Travel	Proposed Trip Attraction
Bus	166
Walking	207
Cycling	69
<b>Total</b>	<b>442</b>

**Table 2.2.6 – Forecasted Trip Attraction**

### 3.0 WALKING AND CYCLING AUDIT STRUCTURE

#### 3.1 METHODOLOGY

- 3.1.1 The Walking and Cycling Audit is a way to assess the quality of the walking and cycling environment.
- 3.1.2 This audit comprises the following stages:
1. Definition of the Study Area;
  2. On-Street Evaluation; and
  3. Display and Review of Outputs.
- 3.1.3 The study area can be sub-divided and assessed on different aspects of each route. Mainly, any footpath, shared surface or footway along the perceived route. In addition, as any designated or undesignated crossing in which pedestrians or cyclists interact with a trafficked roadway.
- 3.1.4 This audit shall specifically consider key routes to commercial/leisure/school areas within the vicinity of the site. Although links and crossings shall not be assessed individually, all of the criteria shall be taken account of as part of the routes.

#### 3.2 ASSESSMENT PARAMETERS

- 3.2.1 The assessment was carried out on the basis of pedestrian and cyclists in mind and the following parameters were taken into account when assessing each route individually.
- I. Directness
  - II. Road Safety
  - III. Personal Security
  - IV. Quality of Environment
  - V. Legibility
  - VI. Rest Points

#### 3.3 AUDIT ROUTES

- 3.3.1 The assessment was carried out on four different routes which are deemed to be desire lines to/from local amenities for residents within the development. The assessed routes are provided in **Figure 3.3.1** and **Appendix A** at the end of this report.
- 3.3.2 The chosen routes were:
- Route 1: Mahon Point Shopping Centre
  - Route 2: Aldi, Mater Private Hospital, Mahon Retail Park
  - Route 3: Mahon Industrial Estate
  - Route 4: Scally's Supervalu, Abtran

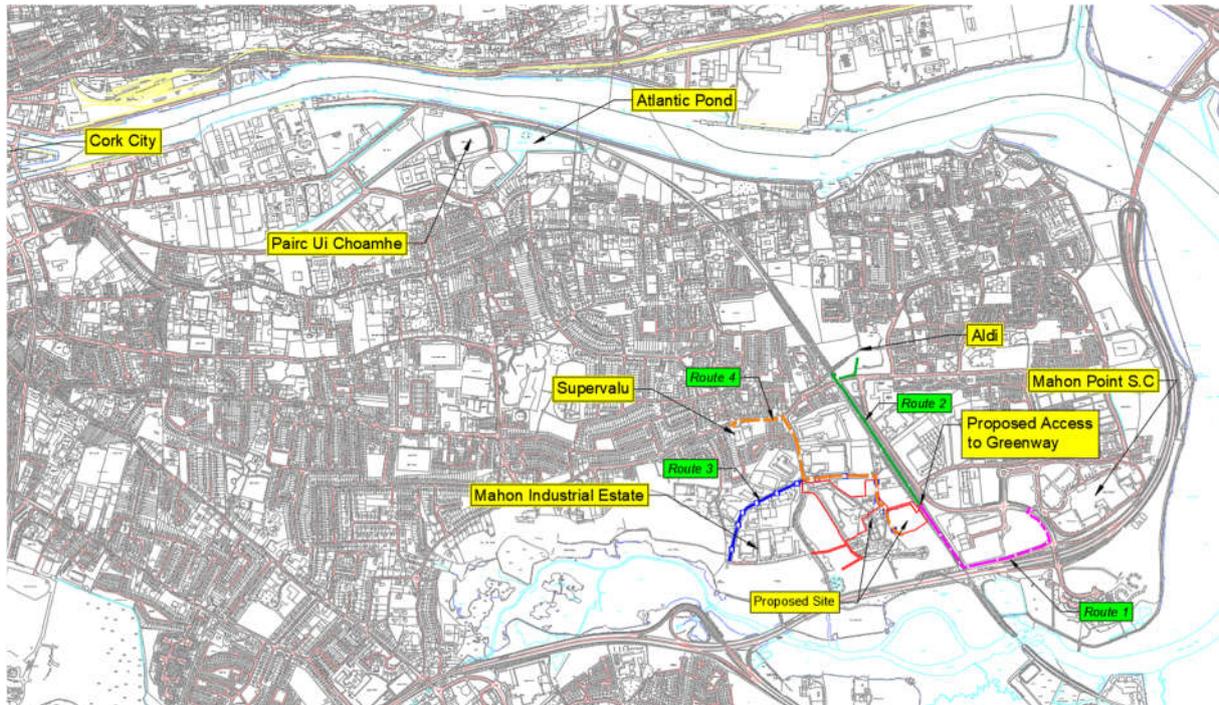


Figure 3.3.1 Route Locations

### 3.4 ROUTE 1: MAHON POINT SHOPPING CENTRE

- 3.4.1 Access from the proposed development to the Mahon Point Shopping Centre will be provided for by a new pedestrian/cycle bridge above the greenway linking to the footpath network and to the greenway itself via the existing ramp. For the purposes of this audit, the audit team gained access to the greenway from the development grounds via a gap in the boundary fencing to the south of the development site.
- 3.4.2 The proposed pedestrian/cycle bridge design is in compliance with Part M and will include appropriate lighting to grant a safe and secure route for users onto the existing footpath network. The proposed bridge width of 3.15m is appropriate to allow simultaneous use by both pedestrians and cyclists. The proposed design allows for good forward visibility for users accessing the bridge from both directions. Cyclists travelling across the bridge from the development side will be required to slow down in order to turn onto the existing greenway ramp which will encourage safe travelling speeds across the bridge. Similarly, cyclists entering the bridge from the ramp side will be required to slow down to access the bridge from the ramp further encouraging safe cycling speeds. The bridge design proposes a minimum height clearance of 5.13m to the surface of the greenway and a width clearance of 7.1m. These clearances ensure the bridge structure will not have a safety impact on the existing greenway below.
- 3.4.3 Route 1 continues on the Passage West Greenway proceeding initially to the south before heading east towards the R852 via a linked pathway. This pathway then connects to the local footpath network adjoining the R852 which includes a signalised crossing. Access to the Mahon Point Shopping Centre grounds is then provided via a ramp.
- 3.4.4 The greenway is a shared walking/cycling route extending from Marina Park to Rochestown. The greenway experiences a high volume of users, both walking and cycling, and is an important transport corridor for local communities.
- 3.4.5 The pathway extending between the greenway and the R852 runs parallel to the north of the South Ring Road.

- 3.4.6 The route is serviced at the Mahon Point stop by the 215 & 215A bus services. The bus stop is ideally located in close proximity to the ramped access to the Mahon Point Shopping Centre.
- 3.4.7 Access to the shopping centre itself is completed via a designated zebra crossing connecting the ramped access to the footpath network within the shopping centre grounds.
- 3.4.8 Public Lighting is located along the Passage West Greenway providing a high-quality walking/cycling route at all times.
- 3.4.9 No dedicated pathway lighting is provided for the link pathway between the greenway and the R852 footpath network.
- 3.4.10 Mahon Point Shopping Centre is home to several large retail chains and presents a popular desire line for residents.

### **3.5 ROUTE 2: ALDI, MATER PRIVATE HOSPITAL, MAHON RETAIL PARK**

- 3.5.1 Route 2 also utilises the proposed pedestrian/cycle bridge before continuing onto the Passage West Greenway and proceeding north from the development. Links to the greenway along to the course of Route 2 enable access to the Mater Private Hospital/Mahon Retail Park and separately to Aldi further north.
- 3.5.2. Link access from the greenway to the Mater Private Hospital/ Mahon Retail Park is located approximately 10m north of the proposed greenway link to the development. Signalised crossings at the Link Rd./St. Michaels Drive junction provide a safe walking/cycling route for residents to the hospital.
- 3.5.3 The section of R852 between the greenway link and the Mahon Retail Park encompasses dedicated cycle lanes and footpaths on both sides of the road.
- 3.5.4 Link access from the greenway to Aldi is located approximately 800m from the proposed link access to the development. The connected footpath network on Skehard Rd./Blackrock Ave. and a signalised pedestrian crossing on Blackrock Ave. complete the route from the greenway to Aldi.
- 3.5.5 Safe walking/cycling passage to the Central Statistics Office is provided for at the R852/Skehard Rd. signalised junction via designated crossings.
- 3.5.6 The Blackrock Hall Primary Care Centre and Phelans Pharmacy are located in the same building as Aldi and present additional desire lines for residents. Covered bicycle racks are provided for at the entrances to both the Primary Care Centre and Aldi.
- 3.5.7. The route is well served by the Skehard Lawn bus stop providing access to the 202, 215, 215A, and 219 bus services. The bus stop is situated on Skehard Rd. approximately 65m to the west of the greenway link.
- 3.5.8 Mahon Retail Park is home to several large retail chains and is a popular desire line to residents from the development.
- 3.5.9 Public Lighting is located along the Passage West Greenway, the R852, and Skehard Rd. providing high-quality walking/cycling routes at all times.

### **3.5 ROUTE 3: MAHON INDUSTRIAL ESTATE**

- 3.5.1 Route 3 begins on the access road to the development and heads west towards Bessboro Rd. via the mini roundabout. The access road linking the development to the mini-roundabout is signposted as a 30 kph speed zone.
- 3.5.2 The access road encompasses 2m wide footpaths on both sides for the majority of its length.
- 3.5.3 The footpath is limited to one side of the access road for an approximate 30m section starting to the north of the Bessboro Day Care Centre and ending at the new Crawford Gate development. A designated zebra crossing is located north of the entrance to the Bessboro Day Care Centre providing a safe crossing location for pedestrians.
- 3.5.4 Further along the access road, another designated zebra crossing provides safe movement for pedestrians crossing prior to the mini roundabout.
- 3.5.5 The Bessboro Rd. heading west from the mini roundabout to the Mahon Industrial Estate encompasses footpaths on both sides of the road.
- 3.5.6 Cyclists would share the road surface with vehicles for the length of the route.
- 3.5.7 The Mahon Industrial Estate is home to numerous commercial and industrial establishments presenting potential employment opportunities for residents of the development.

### **3.6 ROUTE 4: SCALLY'S SUPERVALU, ABTRAN**

- 3.6.1 Similar to Route 3, Route 4 starts on the access road linking the Bessboro Rd. mini roundabout to the development. The route heads north at the mini roundabout towards the T-junction with Skehard Rd. before turning left towards Scally's Supervalu. Abtran is located to the east of Bessboro Rd. prior to the junction with Skehard Rd.
- 3.6.2 Bessboro Rd. encompasses footpaths on both sides of the road for the length between the mini roundabout and the junction with Skehard Rd.
- 3.6.3 Skehard Rd. is subject to future planned upgrading by Cork City Council. At the time of this audit, Skehard Rd. encompasses footpaths on both sides with the southern footpath being shared walking/cycling for the section between the Bessboro Rd. junction and Scally's Supervalu.
- 3.6.4 The route is served by the 202, 215, 215A, and 219 bus services at the Clontarf Estate bus stop on Skehard Rd. Pedestrians can access the bus stop via the designated crossing at the Skehard Rd./ Bessboro Rd. signalised junction.
- 3.6.5 Abtran is a major employer in the local area and a potential desire line for residents.
- 3.6.5 In addition to Aldi, Scally's Supervalu presents a primary desire line for residents purchasing household groceries.

## 4.0 WALKING, CYCLING ASSESSMENT AND REVIEW

4.0.1 Assessment observation locations and images can be found in **Appendix B**.

### 4.1 ROUTE 1: MAHON POINT SHOPPING CENTRE

4.1.1 The desire lines for this route are good with safety, security and quality of environment very good for most of the route.

- I. Shared pedestrian/cycling surface is adequately wide throughout.
- II. There is a bus stop and pedestrian crossing point along R852.
- III. The route is well lit and provides a safe and improved quality of environment for vulnerable road users.

#### 4.1.2 Audit Issues

4.2.2.1 Section of asphalt missing on link pathway connecting greenway to R852. (**Figure: Route 1 - Image 1**).

4.2.2.2 Section of asphalt settled creating a hazard for cyclists and vulnerable road users. (**Figure: Route 1 - Image 2**).

### 4.2 ROUTE 2: ALDI, MATER PRIVATE HOSPITAL, MAHON RETAIL PARK

4.2.1 The desire line for this route from the development is good with personal safety, security and quality of environment very good for most of the route.

- I. Shared pedestrian/cycling surface is adequately wide throughout.
- II. Footpaths are standard width throughout.
- III. There are regular bus stops and pedestrian crossing points.
- IV. Designated cycle lanes on R852.
- V. The route is well lit and provides a safe and improved quality of environment for vulnerable road users.

#### 4.2.2 Audit Issues

4.2.2.1 Some uneven asphalt on greenway representing a tripping hazard for users. (**Figure: Route 2 - Image 1**).

4.2.2.2 Greenway tunnel under Skehard Rd. does not contain any public lighting. (**Figure: Route 2 - Image 2**).

### 4.3 ROUTE 3: MAHON INDUSTRIAL ESTATE

4.3.1 The desire line for this route from the development is good for the majority of its length with footpaths of standard width along the development access road and Bessboro Rd. A number of private entrances adjoining the route are missing tactile paving and/or dropped kerbing resulting in reduced safety for vulnerable road users.

- I. The majority of the route is well lit with public lighting.
- II. Designated crossing points are available where appropriate along the development access road.

#### **4.3.2 Audit Issues**

- 4.3.2.1 Uneven footpath along development access road (**Figure: Route 3 - Image 1**).
- 4.3.2.2 Vegetation overgrown over footpath on west side of pedestrian crossing resulting in reduced footpath width (**Figure: Route 3 - Image 2**).
- 4.3.2.3 No tactile paving at entrance to Sacred Heart Convent (**Figure: Route 3 - Image 3**).
- 4.3.2.4 Cracked footpath on section west of Sacred Heart Convent entrance (**Figure: Route 3 - Image 4**).
- 4.3.2.5 No tactile paving or dropped kerbing at private entrance (**Figure: Route 3 - Image 5**).
- 4.3.2.6 No tactile paving or dropped kerbing alongside palisade fencing (**Figure: Route 3 - Image 6**).
- 4.3.2.7 Uneven footpath around tactile paving for development access road crossing (**Figure: Route 3 - Image 7**).
- 4.3.2.8 Narrowing of footpath on northern side of pedestrian crossing (**Figure: Route 3 - Image 8**).
- 4.3.2.9 Light post installed centre of footpath (**Figure: Route 3 – Image 9**).
- 4.3.2.10 No designated pedestrian crossing at mini roundabout to cross Bessboro Rd. and proceed west (**Figure: Route 3 – Image 10**).
- 4.3.2.11 Several instances of uneven footpath along Bessboro Rd. (**Figure: Route 3 – Image 11 & 12**).
- 4.3.2.12 Tactile paving and dropped kerbing missing at entrance alongside palisade fencing. (**Figure: Route 3 – Image 13**).
- 4.3.2.13 Tactile paving and dropped kerbing missing at entrance to commercial enterprise (**Figure: Route 3 – Image 14**).
- 4.3.2.14 Tactile paving and dropped kerbing missing at entrance to industrial enterprise (**Figure: Route 3 – Image 15**).
- 4.3.2.15 Tactile paving missing at entrance to Riverview Business Park (**Figure: Route 3 – Image 16**).
- 4.3.2.16 Tactile paving and dropped kerbing missing at entrance to industrial enterprise (**Figure: Route 3 – Image 17**).
- 4.3.2.17 Tactile paving and dropped kerbing missing at entrance to Oak House (**Figure: Route 3 – Image 18**).
- 4.3.2.18 Tactile paving missing at entrance and exit to childcare facility (**Figure: Route 3 – Image 19 & 20**).
- 4.3.2.19 Tactile paving and dropped kerbing missing at entrance to industrial enterprise (**Figure: Route 3 – Image 21**).

#### **4.4 ROUTE 4: SCALLY'S SUPERVALU, ABTRAN**

- 4.4.1 The desire line for this route from the development is good for the majority of its length with footpaths of standard width along the development access road, Bessboro Rd. and Skehard Rd. A number of private entrances adjoining the route are missing tactile paving and/or

dropped kerbing resulting in reduced safety for vulnerable road users. Future planned upgrading of Skehard Rd. will improve cycling/pedestrian facilities along the route.

- I. The majority of the route is well lit with public lighting.
- II. Designated crossing points are available where appropriate along the development access road and at the Bessboro Rd./ Skehard Rd. junction.

#### **4.4.2 Audit Issues**

- 4.4.2.1 Signpost installed in footpath reducing available pedestrian width (**Figure: Route 4 - Image 1**).
- 4.4.2.2 No dropped kerbing or tactile paving at entrance north of Bessboro Rd. mini roundabout (**Figure: Route 4 - Image 2**).
- 4.4.2.3 No tactile paving or dropped kerbing at entrance to former Railway Tile site (**Figure: Route 4 - Image 3**).
- 4.4.2.4 No tactile paving or dropped kerbing at entrance to RCI (**Figure: Route 4 - Image 4**).
- 4.4.2.5 No tactile paving at entrance to Abtran (**Figure: Route 4 - Image 5**).
- 4.4.2.6 No tactile paving at entrance to St. Michaels Credit Union (**Figure: Route 4 - Image 6**).
- 4.4.2.7 Cycling lane provided to the south of Bessboro Rd./ Skehard Rd. junction stops suddenly with no given notice (**Figure: Route 4 - Image 7**).
- 4.4.2.8 Several posts present in cycling lane restricting movement (**Figure: Route 4 - Image 7 & 8**).
- 4.4.2.9 Cycling lane surface in poor condition (**Figure: Route 4 - Image 9**).
- 4.4.2.10 No tactile paving provided at private entrance located on Skehard Rd. approximately 40m east of Scally's Supervalu car park (**Figure: Route 4 - Image 10**).

## **5.0 SUMMARY**

### **5.1 Summary**

- 5.1.1 Following the completion of the proposed pedestrian footbridge at the east of the development boundary, residents will have access to the Passage West Greenway which will provide good connectivity from the development to Mahon Point Shopping Centre with a high level of personal security and safety.
- 5.1.2 Aldi is easily accessed from the development via the proposed pedestrian link. The greenway and diverging links provide vulnerable roads users with direct and secure access to several destinations in the area.
- 5.1.3 Mahon Industrial Estate is decently connected to the development for the majority of the route with footpaths and public lighting providing good personal security. However, the discontinuity of footpath along the Bessborough Access Rd. between the mini-roundabout and the

pedestrian access combined with a lack of dropped kerbing and tactile paving along both the access road and Bessboro Rd. provides difficulties for vulnerable users.

- 5.1.4 Scally's Supervalu is perceived to be a popular desire line for residents and is well connected to the development with public lighting and wide footpaths for the majority of the route. Several entrance junctions lack tactile paving and dropped kerbing providing difficulty for vulnerable users. The surface of the cycle lane along Skehard Rd. is in poor condition and contains poles which obstruct users. The cycle lane issues should be resolved in the future planned Skehard Rd. upgrading.

### Summary Table

Route	Item	Mitigation	Reason/ Proposal
Route 1 (Image 1)	Pathway surface in poor condition	Yes	Repair section of asphalt pathway to ensure users have a continuity of pavement. This will minimise risk of falling over uneven surface.
Route 1 (Image 2)	Pathway in poor condition.	Yes	Repair dropped section of pathway. This will minimise risk of tripping for users.
Route 2 (Image 1)	Uneven section of pathway	Yes	Repair pathway section to minimise tripping risks to users.
Route 2 (Image 2)	Lack of public lighting in tunnel	Yes	Add public lighting to tunnel under Skehard Rd. to enhance personal security of users.
Route 3 (Image 1)	Uneven footpath	Yes	Repair section of footpath to remove tripping hazard for users.
Route 3 (Image 2)	Overgrowth over footpath	Yes	Trim back vegetation to maintain width of footpath.
Route 3 (Image 3)	Lack of tactile paving	Yes	Tactile paving should be provided at both sides of entrance junction.
Route 3 (Image 4)	Footpath in poor condition	Yes	Repair damaged section of footpath to minimise risk of tripping for users.
Route 3 (Image 5)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided at both sides of the junction.
Route 3 (Image 6)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided on both sides of the junction
Route 3 (Image 7)	Uneven footpath around tactile paving.	Yes	Repair section of footpath around tactile paving to increase road safety of vulnerable users.
Route 3 (Image 8)	Narrowing of footpath	Yes	Widen section of footpath to maintain width.
Route 3 (Image 9)	Lighting column installed in footpath	Yes	Relocate lighting column to ensure pedestrians have a clear and unobstructed path.
Route 3 (Image 10)	No pedestrian crossing at mini roundabout	Yes	Construct designated pedestrian crossing to cross Bessboro Rd. close

			to mini roundabout to improve road safety of users.
Route 3 (Image 11 & 12)	Uneven footpath along Bessboro Rd.	Yes	Repair footpath to minimise risk of tripping to users.
Route 3 (Image 13)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided on both sides of the junction
Route 3 (Image 14)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided on both sides of the junction
Route 3 (Image 15)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided on both sides of the junction
Route 3 (Image 16)	Lack of tactile paving	Yes	Tactile paving should be provided on both sides of the junction
Route 3 (Image 17)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided on both sides of the junction
Route 3 (Image 18)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided on both sides of the junction
Route 3 (Image 19 & 20)	Lack of tactile paving	Yes	Tactile paving should be provided on both sides of each junction
Route 3 (Image 21)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided on both sides of the junction
Route 4 (Image 1)	Signpost installed in footpath	Yes	Relocate signpost to ensure pedestrians have a clear and unobstructed path.
Route 4 (Image 2)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided on both sides of the junction
Route 4 (Image 3)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided on both sides of the junction
Route 4 (Image 4)	Lack of tactile paving and dropped kerbing	Yes	Tactile paving and dropped kerbing should be provided on both sides of the junction
Route 4 (Image 5)	Lack of tactile paving	Yes	Tactile paving should be provided on both sides of the junction
Route 4 (Image 6)	Lack of tactile paving	Yes	Tactile paving should be provided on both sides of the junction

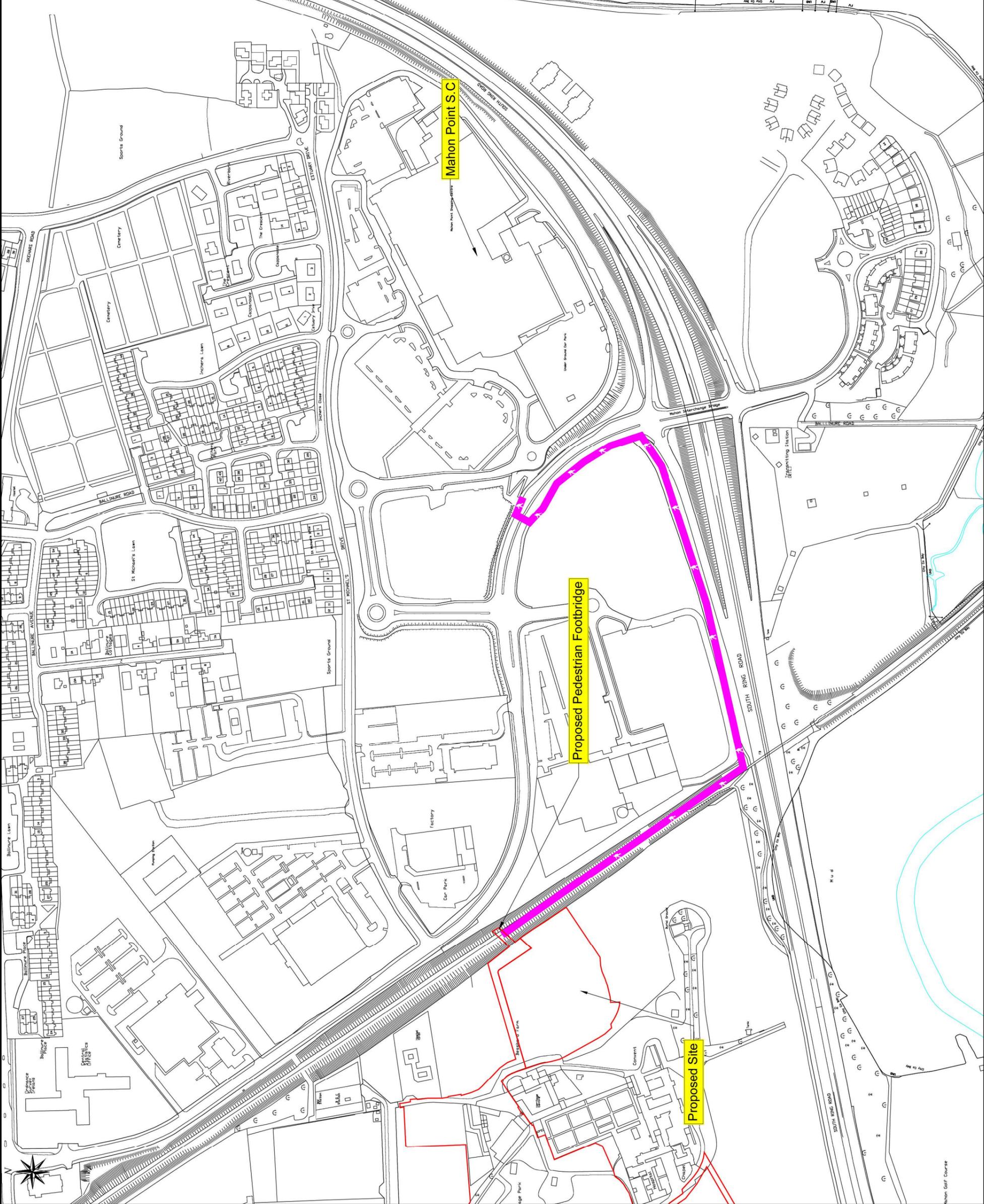
Route 4 (Image 7)	Sudden stop of cycle lane with no notice to users	Yes	Road signage to be provided to cyclists ensuring safe transfer to shared surface
Route 4 (Image 7 & 8)	Various poles present in cycle lane	Yes	Relocate poles to ensure cyclists have a clear and unobstructed path.
Route 4 (Image 9)	Cycle lane surface in poor condition	Yes	Repair cycle lane surface to minimise risk of sliding or falling.
Route 4 (Image 10)	Lack of tactile paving	Yes	Tactile paving should be provided on both sides of the junction

## 6.0 APPENDICES

### Appendix A – Desire Lines

**NOTES:**

All dimensions in metres.  
Do not scale from drawing.  
For any discrepancies found please consult with design office.  
This drawing should be read in conjunction with all contract drawings, documents and specifications.



Rev	By	Date	Description

**Drawing Status:** PLANNING  
NOT CERTIFIED FOR CONSTRUCTION

**Project Title:** Bessborough Residential Development

**Drawing Title:** Walking/Cycling Audit  
Route 1 - Mahon Point S.C

**Client:** Estuary View Enterprises 2020 Ltd.

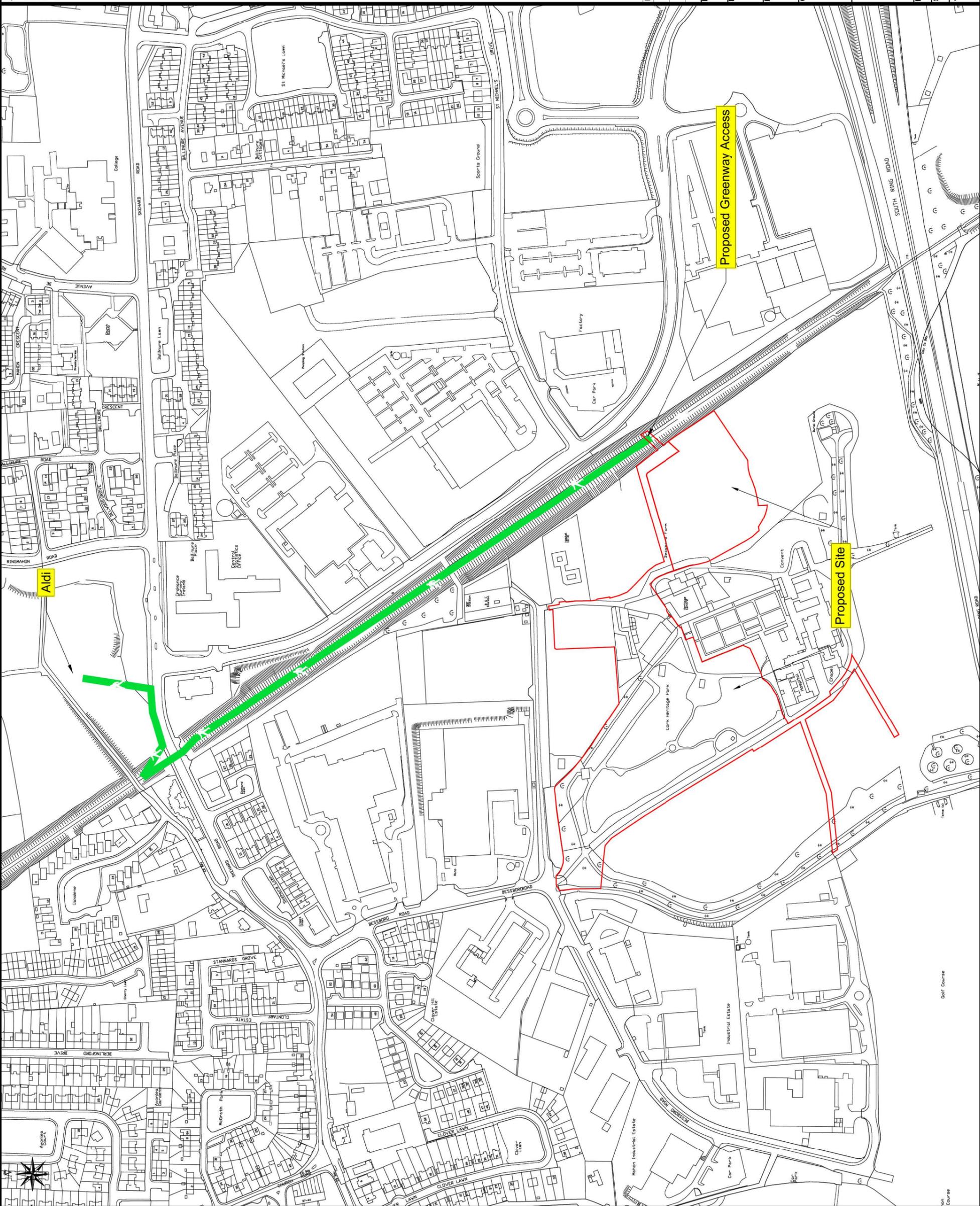
<b>Designed:</b> SM	<b>Drawn:</b> SM	<b>Checked:</b> KM
<b>Scale:</b> 1:2000 @ A1	<b>Date:</b> March 2022	<b>Job No:</b> 21107TT-WCA-P01
1:4000 @ A3		<b>Revision:</b> 00

**M.H.L. & Associates Ltd. Consulting Engineers**  
Castle Mtr House,  
10 High Street,  
Douglas Road,  
Cork

Tel: 021-4840214  
Fax: 021-4840215  
E-Mail: info@mhl.ie

**NOTES:**

All dimensions in metres.  
Do not scale from drawing.  
For any discrepancies found please consult with design office.  
This drawing should be read in conjunction with all contract drawings, documents and specifications.



Rev	By	Date	Description

**Drawing Status:** PLANNING  
NOT CERTIFIED FOR CONSTRUCTION

**Project Title:** Bessborough Residential Development

**Drawing Title:** Walking/Cycling Audit  
Route 2 - Aldi

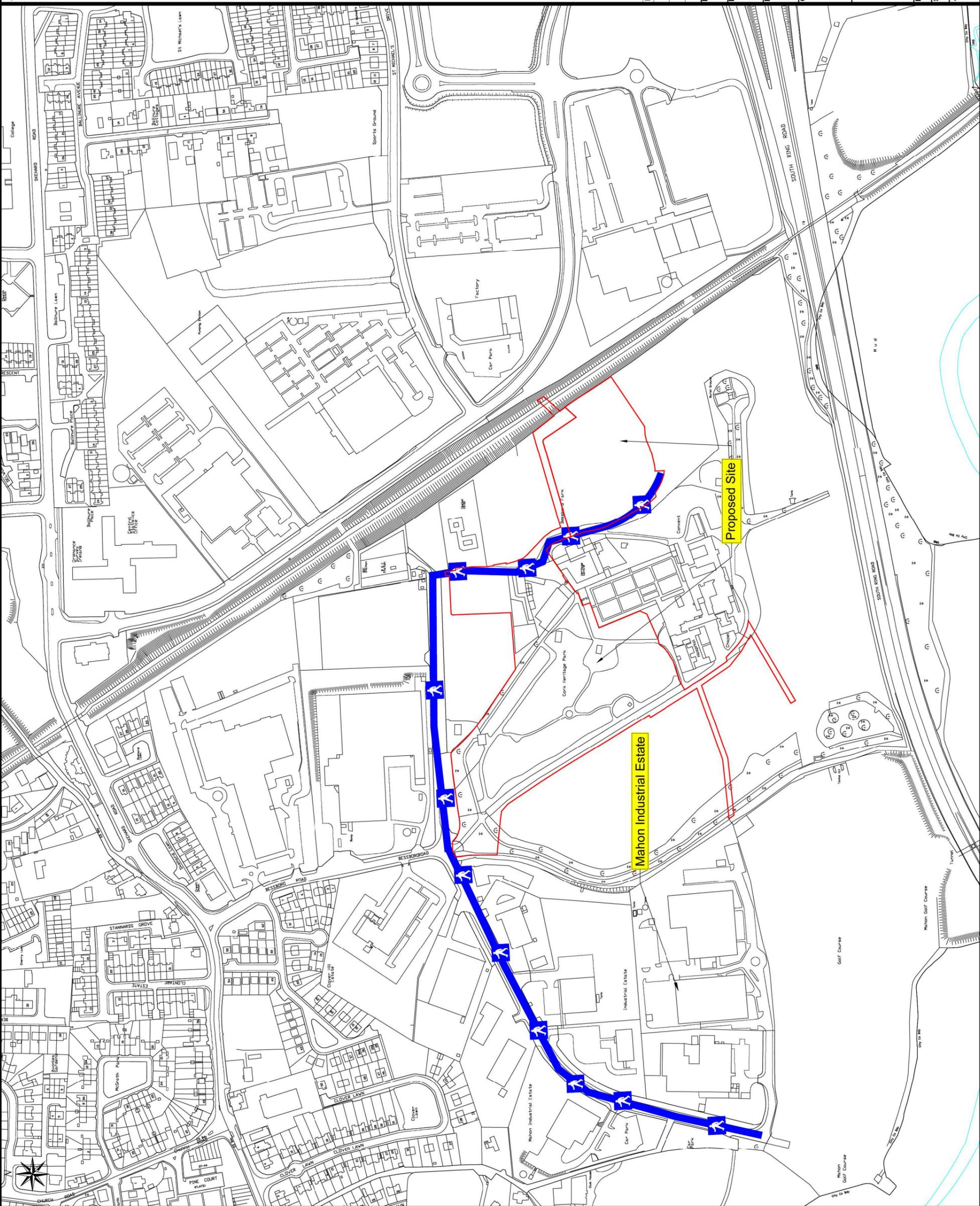
**Client:** Estuary View Enterprises 2020 Ltd.

**M.H.L. & Associates Ltd.**  
Consulting Engineers  
Carrigrohane House,  
10 High Street,  
Douglas Road,  
Cork

**Designed:** SM  
**Scale:** 1:2000 @ A1  
1:4000 @ A3  
**Drawn:** SM  
**Checked:** KM  
**Date:** March 2022  
**Job No:** 21107TT  
**Drawing No:** 21107TT-WCA-P02  
**Revision:** 00

**NOTES:**

All dimensions in metres.  
Do not scale from drawing.  
For any discrepancies found please consult with design office.  
This drawing should be read in conjunction with all contract drawings, documents and specifications.



Rev	By	Date	Description

**Drawing Status:** PLANNING  
NOT CERTIFIED FOR CONSTRUCTION

**Project Title:** Bessborough Residential Development

**Drawing Title:** Walking/Cycling Audit  
Route 3 - Mahon Industrial Estate

**Client:** Estuary View Enterprises 2020 Ltd.

<b>Designed:</b> SM	<b>Drawn:</b> SM	<b>Checked:</b> KM
<b>Scale:</b> 1:2000 @ A1 1:4000 @ A3	<b>Date:</b> March 2022	<b>Revision:</b> 00
<b>Job No:</b> 21107TT	<b>Drawing No:</b> 21107TT-WCA-P03	

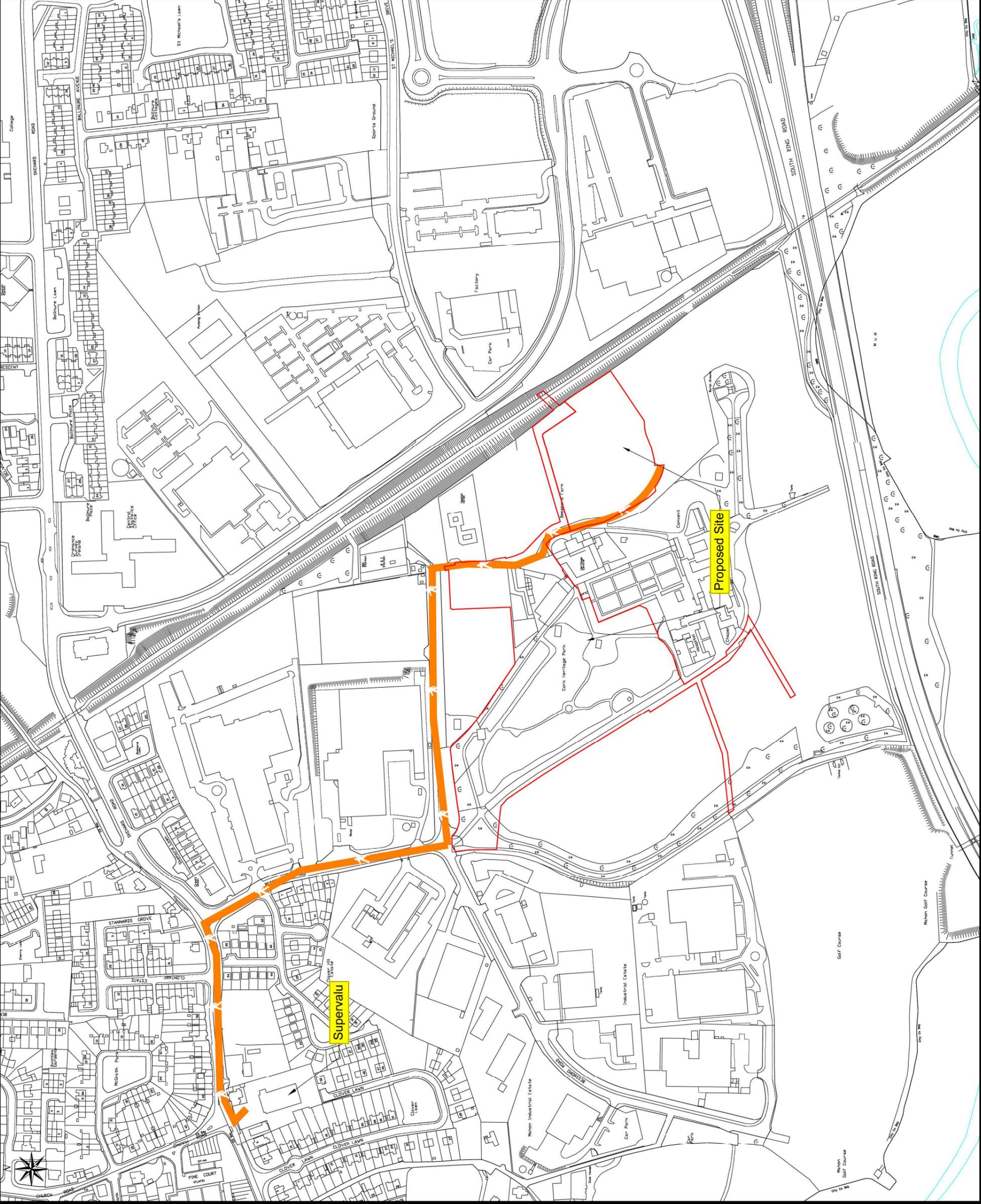


**M.H.L. & Associates Ltd.**  
**Consulting Engineers**  
Carrigrohane House,  
10 High Street,  
Douglas Road,  
Cork

Tel: 021-4840214  
Fax: 021-4840215  
E-Mail: info@mhl.ie

**NOTES:**

All dimensions in metres.  
Do not scale from drawing.  
For any discrepancies found please consult with design office.  
This drawing should be read in conjunction with all contract drawings, documents and specifications.



Rev	By	Date	Description

**Drawing Status:** PLANNING  
NOT CERTIFIED FOR CONSTRUCTION

**Project Title:** Bessborough Residential Development

**Drawing Title:** Walking/Cycling Audit  
Route 4 - Supervalu

**Client:** Estuary View Enterprises 2020 Ltd.



**M.H.L. & Associates Ltd.**  
**Consulting Engineers**  
Carrigrohane House,  
10 High Street,  
Douglas Road,  
Cork

Tel: 021-4840214  
Fax: 021-4840215  
E-Mail: info@mhl.ie

**Designed:** SM

**Drawn:** SM

**Checked:** KM

**Scale:** 1:2000 @ A1  
1:4000 @ A3

**Date:** March 2022

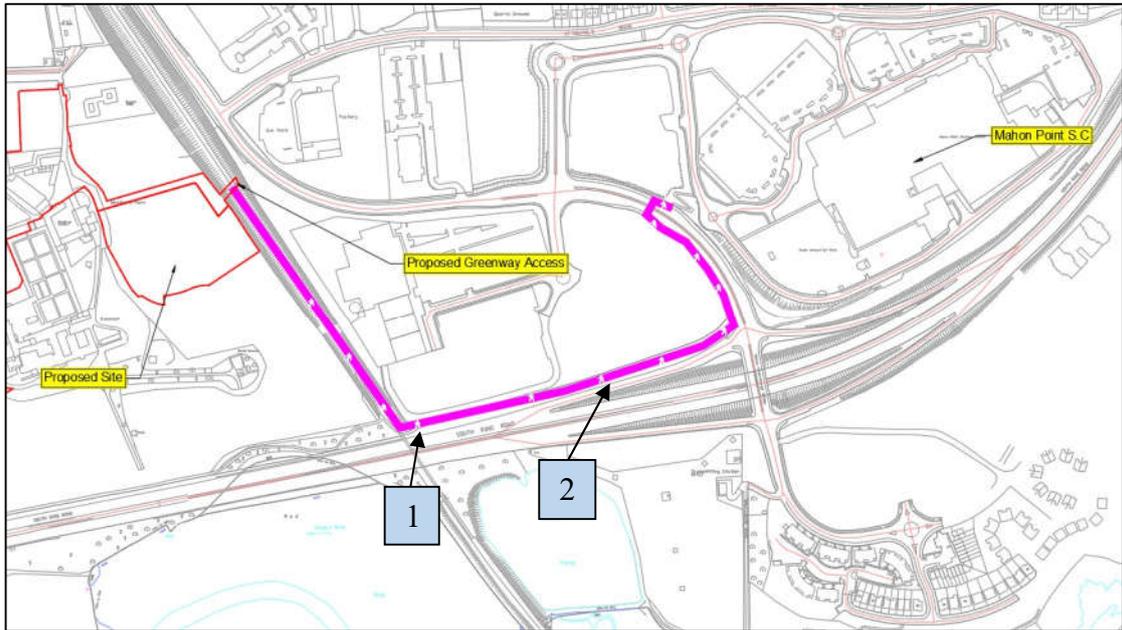
**Job No:** 21107TT

**Drawing No:** 21107TT-WCA-P04

**Revision:** 00

## **Appendix B – Route Assessment**

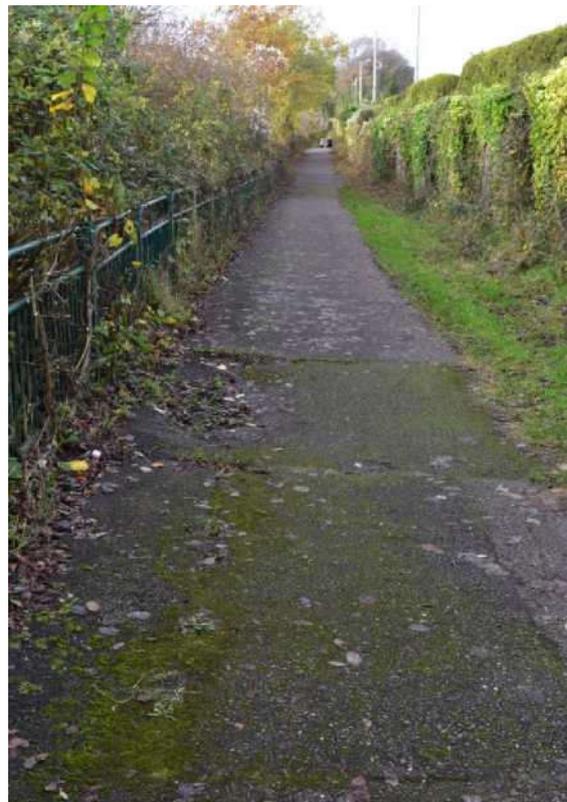
**ROUTE 1**



**Figure: Route 1 - Image Assignment**

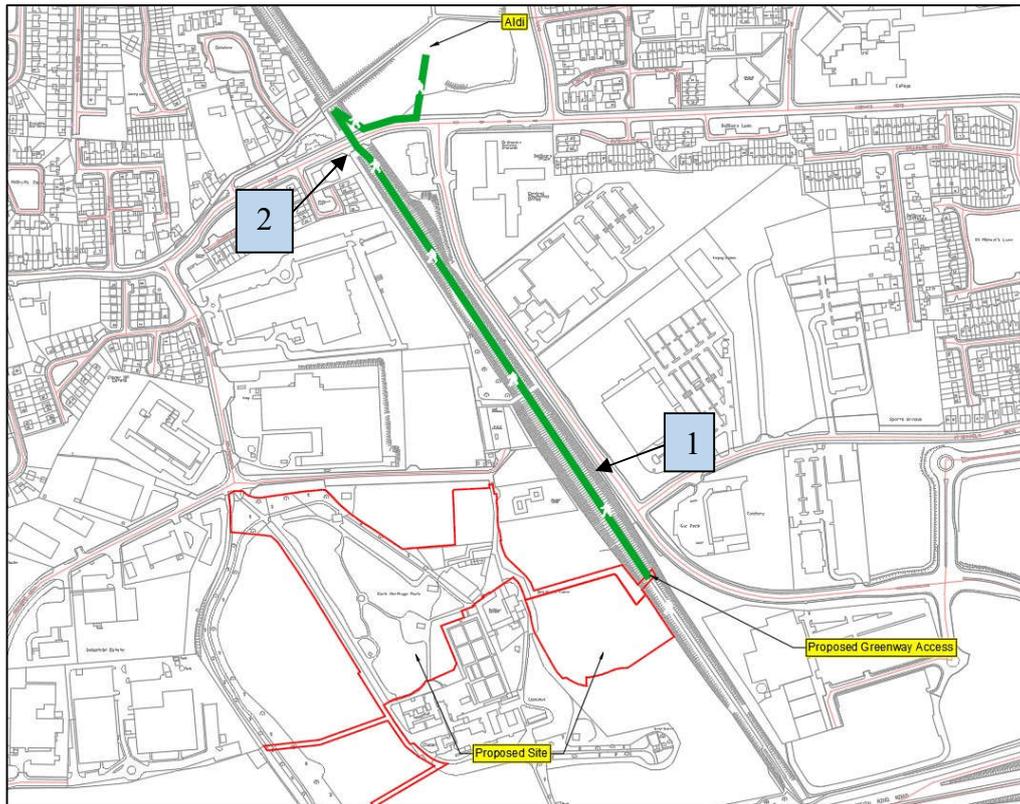


**Figure: Route 1 - Image 1**



**Figure: Route 1 - Image 2**

**ROUTE 2.**



**Figure: Route 2 - Image Assignment**

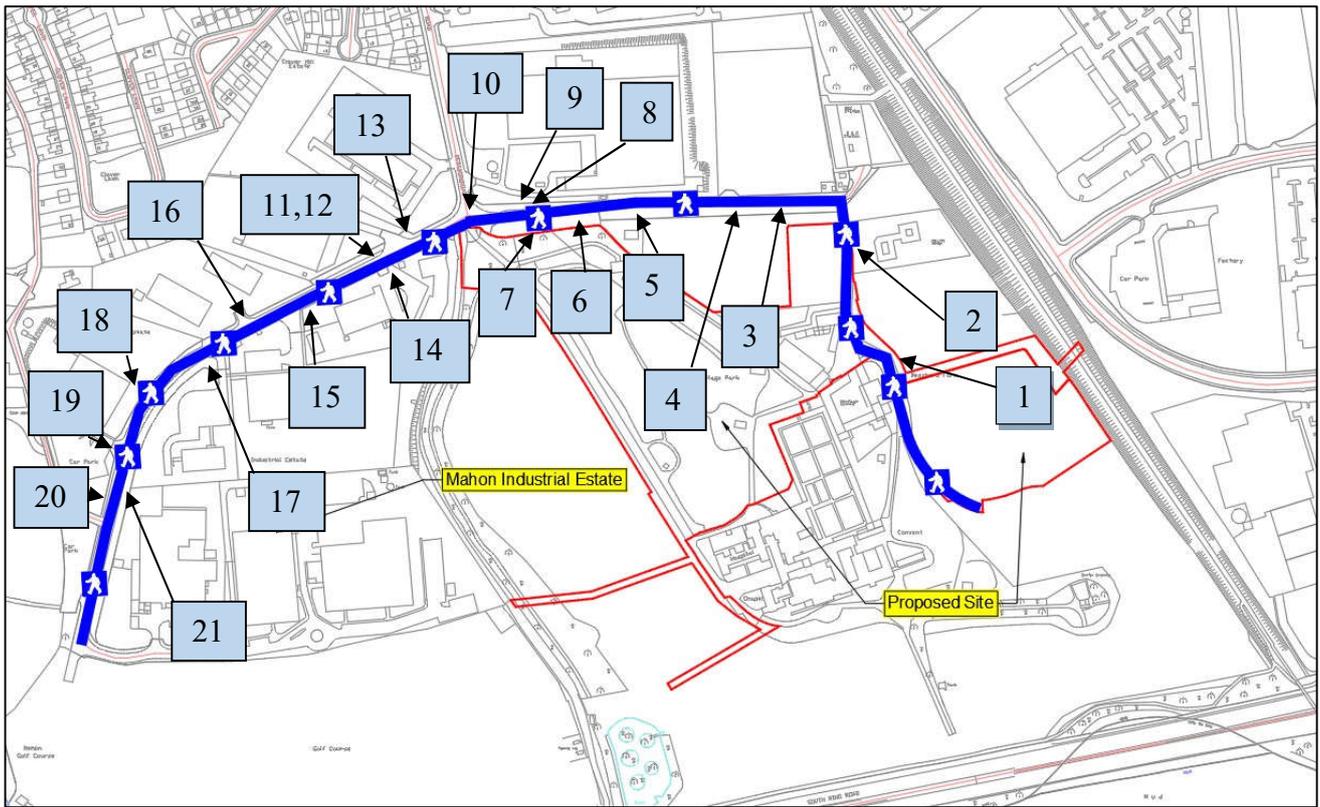


**Figure: Route 2 - Image 1**



**Figure: Route 2 - Image 2**

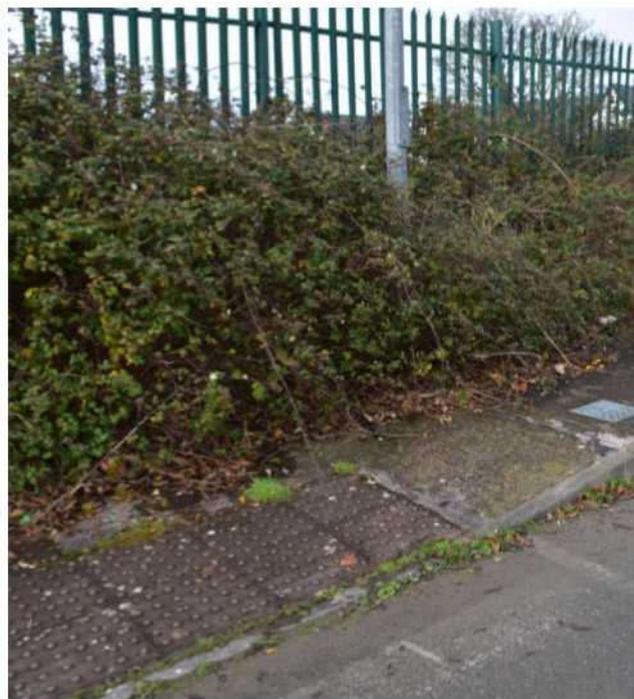
**ROUTE 3.**



**Figure: Route 3 - Image Assignment**



**Figure: Route 2 - Image 1**



**Figure: Route 2 - Image 2**



**Figure: Route 3 - Image 3**



**Figure: Route 3 - Image 4**



**Figure: Route 3 - Image 5**



**Figure: Route 3 - Image 6**



Figure: Route 3 - Image 7

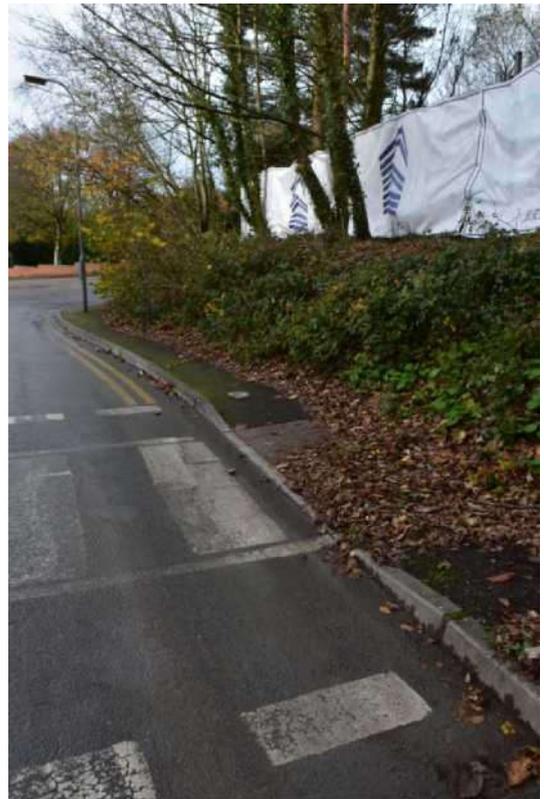


Figure: Route 3 - Image 8



Figure: Route 3 - Image 9



Figure: Route 3 - Image 10



Figure: Route 3 - Image 11

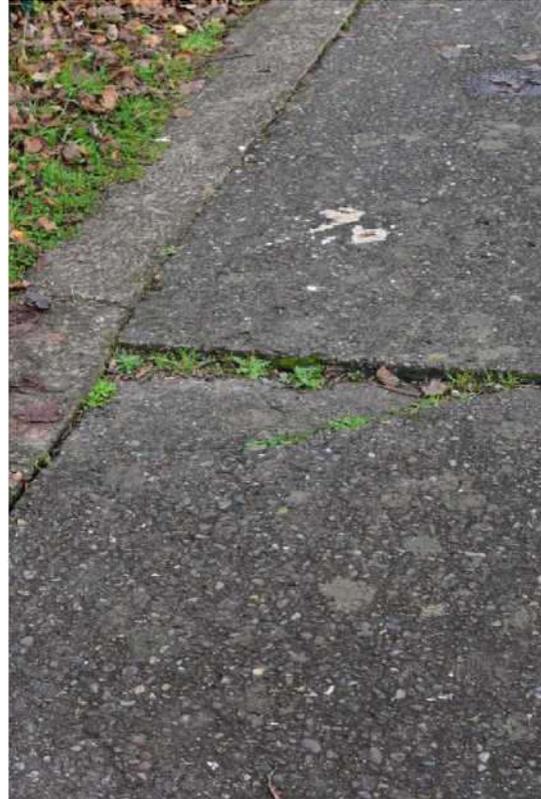


Figure: Route 3 - Image 12



Figure: Route 3 - Image 13



Figure: Route 3 - Image 14



Figure: Route 3 - Image 15

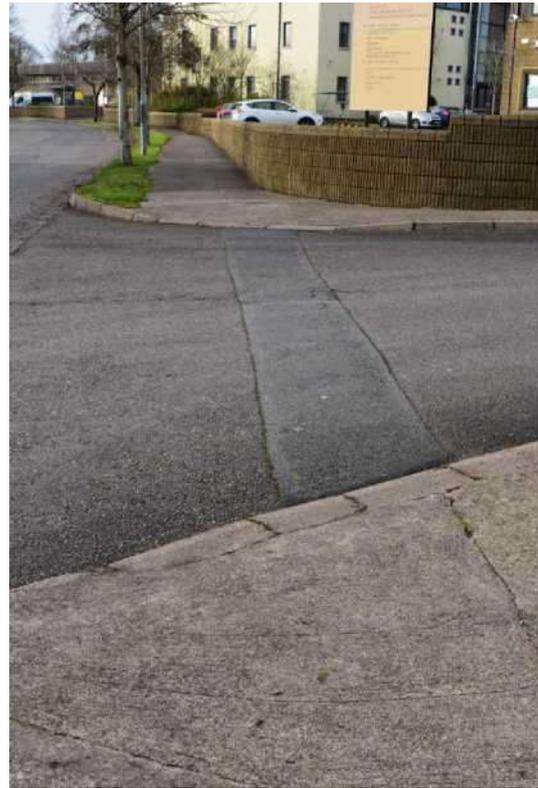


Figure: Route 3 - Image 16



Figure: Route 3 - Image 17

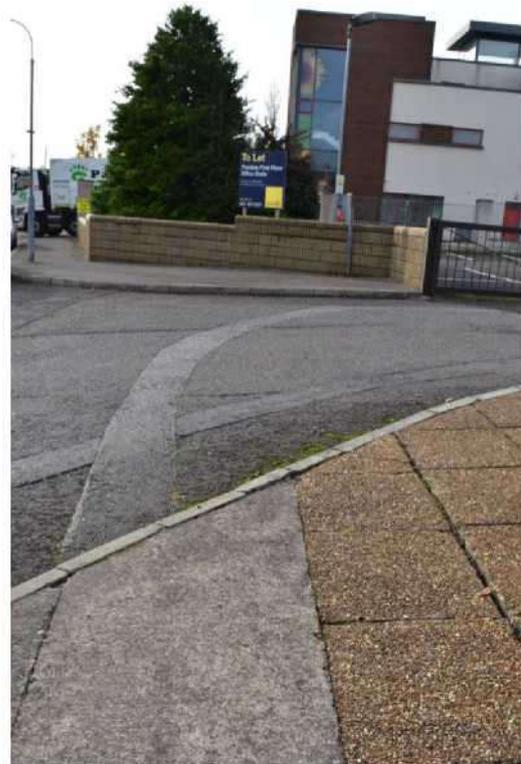


Figure: Route 3 - Image 18



Figure: Route 3 - Image 19



Figure: Route 3 - Image 20



Figure: Route 3 - Image 21





Figure: Route 4 - Image 3



Figure: Route 4 - Image 4



Figure: Route 4 - Image 5

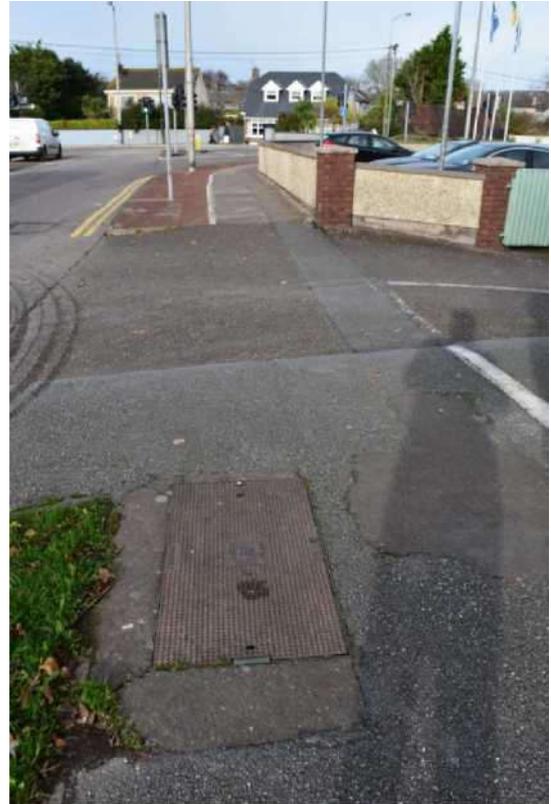


Figure: Route 4 - Image 6



Figure: Route 4 - Image 7



Figure: Route 4 - Image 8



Figure: Route 4 - Image 9

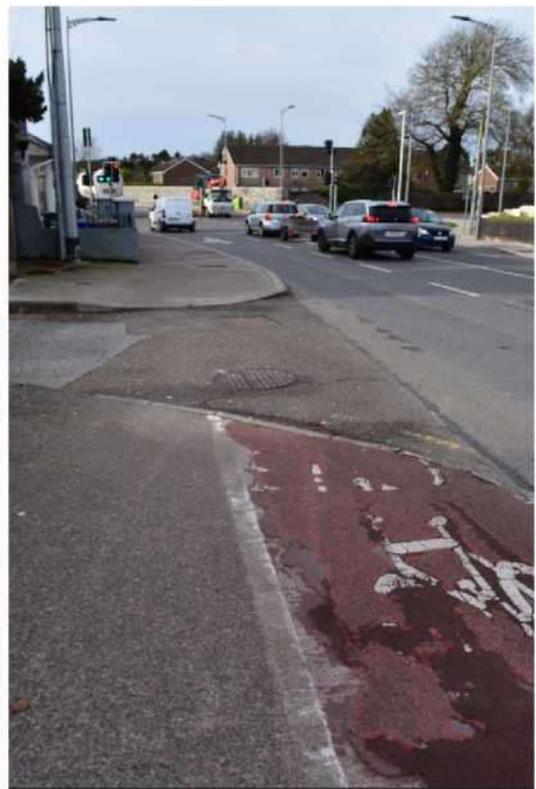


Figure: Route 4 - Image 10