

Article 6 (3) Appropriate Assessment Screening Report

Living Streets Dún
Laoghaire.





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Prepared By: **MKO
Tuam Road
Galway
Ireland
H91 VW84**



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1. INTRODUCTION

1.1 Background

MKO has been appointed to provide the information necessary to allow the competent authority to conduct an Article 6(3) Screening for Appropriate Assessment for proposed road upgrade works in Dun Laoghaire, Co. Dublin.

Screening for Appropriate Assessment is required under Council Directive 92/43/EEC on the conservation of natural habitats and of wild fauna and flora (the Habitats Directive). Where it cannot be excluded that a project or plan, either alone or in combination with other projects or plans, would have a significant effect on a European Site then same shall be subject to an appropriate assessment of its implications for the site in view of the site's conservation objectives. The current project is not directly connected with, or necessary for, the management of any European Site consequently the project has been subject to the Appropriate Assessment Screening process.

The assessment in this report is based on a desk study and field surveys undertaken on the 26/10/2022. It specifically assesses the potential for the proposed development to result in significant effects on European sites in the absence of any best practice, mitigation, or preventative measures.

This Appropriate Assessment Screening Report has been prepared in accordance with the European Commission's Assessment of Plans and Projects Significantly affecting Natura 2000 Sites: Methodological Guidance on the provisions of Article 6(3) and 6(4) of the Habitats Directive 92/43/EEC (EC, 2021) and Managing Natura 2000 Sites: the provisions of Article 6 of the 'Habitats' Directive 92/43/EEC (EC, 2018) as well as the Department of the Environment's Appropriate Assessment of Plans and Projects in Ireland - Guidance for Planning Authorities (DoEHLG, 2010) and the Appropriate Assessment Screening for Development Management. Office of the Planning Regulator, Dublin 7, Ireland OPR (2021).

In addition to the guidelines referenced above, the following relevant documents were also considered in the preparation of this report:

1. Council of the European Commission (1992) Council Directive 92/43/EEC of 21 May 1992 on the conservation of natural habitats and of wild fauna and flora. Official Journal of the European Communities. Series L 20, pp. 7-49.
2. EC (2007) Guidance document on Article 6(4) of the 'Habitats Directive' 92/43/EEC – Clarification of the concepts of: alternative solutions, imperative reasons of overriding public interest, compensatory measures, overall coherence. Opinion of the commission.
3. EC (2013) Interpretation Manual of European Union Habitats. Version EUR 28. European Commission.
4. EC (2020) Guidance document on wind energy developments and nature legislation

1.2 Appropriate Assessment

1.2.1 Screening for Appropriate Assessment

Screening is the process of determining whether an Appropriate Assessment is required for a plan or project. Under Part XAB of the Planning and Development Act, 2000, as amended, screening must be carried out by the Competent Authority. As per Section 177U of the Planning and Development Act, 2000, as amended 'A screening for appropriate assessment shall be carried out by the competent authority to assess, in view of best scientific knowledge, if that Land use plan or proposed development, individually or in combination with another plan or project is likely to have a significant effect on the European site'. The Competent Authority's determination as to whether an Appropriate Assessment is

required must be made on the basis of objective information and should be recorded. The Competent Authority may request information to be supplied to enable it to carry out screening.

Consultants or project proponents may provide for the competent authority, the information necessary for them to determine whether an Appropriate Assessment is required and provide advice to assist them in the Article 6(3) Appropriate Assessment Screening decision.

Where it cannot be excluded beyond reasonable scientific doubt at the Screening stage, that a proposed plan or project, individually or in combination with other plans and projects, would have a significant effect on the conservation objectives of a European site, an Appropriate Assessment is required.

Where an Appropriate Assessment is required, the Competent Authority may require the applicant to prepare a Natura Impact Statement.

The term Natura Impact Statement (NIS) is defined in legislation¹. An NIS, where required, should present the data, information, and analysis necessary to reach a definitive determination as to 1) the implications of the plan or project, alone or in combination with other plans and projects, for a European site in view of its conservation objectives, and 2) whether there will be adverse effects on the integrity of a European site. The NIS should be underpinned by best scientific knowledge, objective information and by the precautionary principle.

This Article 6(3) Appropriate Assessment Screening Report has been prepared in compliance with the provision of section 177U of the Planning & Development Act 2010 as amended.

1.3 Statement of Authority

A baseline ecological survey was undertaken on the 26/10/2022 by Rachel Minogue (B.Sc), and Kailan Mitchell (B.Sc) of MKO. An additional ecological survey of Clarinda Park was undertaken on the 25th of August 2023, by an external ecological consultant, Kevin Delahunty. This report has been prepared by Rachel Minogue (BSc). RM is an ecologist with MKO with relevant academic qualifications in Environmental Science. This report was updated on the 10/10/2023, to assess the potential for significant effects on the candidate North-West Irish Sea cSPA (004236). This report has been reviewed by Colin Murphy (B.Sc., MSc). Colin is an experienced project ecologist and has over 3 years' professional consultancy experience.

¹ As defined in Section 177T of the Planning and Development Act, 2000 as amended, an NIS means a statement, for the purposes of Article 6 of the Habitats Directive of the implications of a proposed development, on its own and in combination with other plans and projects, for a European site in view of its conservation objectives. It is required to include a report of a scientific examination of evidence and data, carried out by competent persons to identify, and classify any implications for the European site in view of its conservation objectives.

2. DESCRIPTION OF THE PROPOSED DEVELOPMENT

2.1 Site Location

The site of proposed works is located in Dún Laoghaire, Co. Dublin (Grid Reference O 24324 28493). The proposed works commence at Cumberland Street, continue to George's Street Lower, George's Street Upper, as well as Marine Avenue, Library Road, Convent Road, Sussex Street and Clarence Street. Works have also been proposed at Cross Avenue, Tivoli Road, and Clarinda Park. The total works area is 2km in length. To the north of the proposed works is Dublin Bay, Dún Laoghaire Harbour, and railway lines. To the west, and south are existing roads, and residential/ commercial buildings.

The site is accessed via the N31 and via R119.

The site location is seen in **Figure 2.1**.

2.2 Characteristics of the Proposed Development

2.2.1 Description of the project

Living Streets Dún Laoghaire is a mobility and public realm improvement project which aims to enhance the attractiveness, liveability, connectivity, and economic vibrancy of Dún Laoghaire Town. Following on from the temporary measures implemented during the summer of 2020 the proposed scheme will permanently upgrade the urban realm in Dún Laoghaire.

The principal objectives of the scheme are:

- To make walking, cycling, and public transport more convenient, enjoyable, and safer for all.
- To improve connections between bus, rail, and active travel facilities to make it easier for people to get around.
- Improve the environment by reducing traffic and related noise and air pollution and increasing planting in public spaces.
- To promote equitable travel options and urban design that creates a safe and welcoming experience for all members of society, regardless of age, gender, ability, or income.
- To enhance the economic vibrancy of Dún Laoghaire as a mixed-use town and its attractiveness as a destination by facilitating the sustainable and efficient movement of people and goods, and by creating an environment that people want to linger in.
- To promote health and well-being in the community by enabling safer active travel and enhancing the public realm for outdoor play, recreation, and social interaction

The following streets are included in the Living Streets: Dún Laoghaire scheme:

2.2.1.1 George's Street Lower from St. Michael's Hospital to De Vesce Tce/Cumberland St Junction

At present, there is a two-way street allowing traffic to travel in a north-western and south-eastern direction, linking Monkstown Road to Dún Laoghaire through Cumberland Road and George's Street Lower. The current layout has a footpath on either side of the road, a single traffic lane either way for most of the section and intermittent parking on the northern sides of the road, except outside the Dún

Laoghaire Further Education Institute where parking can be found on both sides of the road. There are no cycle lanes provided.

2.2.1.2 **George's Street Lower from Patrick's Street to Convent Lane**

At present, there is a one-way street allowing traffic to travel in a north-western direction, linking George's Street Upper to the other section of George's Street Lower. The current layout has a footpath on either side of the road and a single traffic lane. Some sections of the footpath have areas in front of restaurants and cafes that are used as outdoor dining areas. There are no cycle lanes provided.

2.2.1.3 **George's Street Upper**

At present, there is a two-way street allowing traffic to travel in a north-eastern and south-western direction, linking George's Street Lower to Summerhill Road. The current layout has a footpath on either side of the road, a single traffic lane and controlled on-street parking on the southern side of the road along sections. In addition to parking bays there is a loading bay and designated accessible parking spaces for disabled person parking permit holders. There are multiple restaurants, shops, and businesses along the street. There is also access to Dun Laoghaire Garda Station and District Court. There are no cycle lanes provided.

2.2.1.4 **Area Between Tivoli Road, George's Street Lower, Glenageary Road Lower and York Road**

At present, both one-way and two-way streets in the greater area typically have a row of parking on one side of the road, although some streets have parking on both sides, and some do not have any parking. The greater area is mostly residential, with the exception of a small number of businesses, restaurants/cafes, and schools. There are no cycle lanes provided.

2.2.1.5 **Clarinda Park**

At present, the road network around Clarinda Park is operating as a one-way system. There is parking on both sides of the road on Clarinda Park West and Clarinda Park North, and on the residential side of the road on Clarinda Park East. Within the historical boundary of the park, there is a significant amount of parking spaces (37 on the west side and 58 on the east side). The area surrounding the park is mostly residential with some businesses located in Clarinda Park North, and there are footpaths on all side of the roads except for the park side of the road on Clarinda Park North.

2.2.2 Proposed works

2.2.2.1 Street Improvements

The scheme will involve an upgrade of 1.2 km of George's St from the junction of De Vesci Terrace on Cumberland St to the junction by the People's Park. Footpaths on both sides of the road will be repaved using high quality durable granite paving, The road carriageway will be narrowed to a maximum width of 6m, and the remaining space is proposed to be used to provide wider footpaths, seating, and planting. Continuous footpaths will be provided across all side roads that will emphasise the pedestrian priority along this route. The scheme will provide high quality surfaces free of clutter and trip hazards and will remove any level differences between pedestrian areas.

Permanent in ground planting, including approximately 100 new trees will be included in the works along with areas of low-level planting. Rain gardens will also be introduced, these areas of vegetation will catch and store rainwater during times of heavy rainfall reducing the burden on water treatment facilities. A new public lighting system will also be provided.

The scheme will pedestrianise 220m of George's St Lower from the junction with Patrick's St to St Michael's Hospital, the street will remain open to servicing traffic in the morning to facilitate loading but will be fully closed to traffic outside of these hours. Two clear areas will be maintained on either side of the street and the central area of the street will feature new seating, planting, and areas for loading (as shown in the image below). Casual seating for local businesses will also be facilitated in this area. Sections of Convent Road and Sussex Street will also be pedestrianised, and these areas will see the creation of two small enclosed parklets.

Changes will be required to the parking system with 14 on street parking spaces being removed. There will be an increase in the number of designated disabled parking spaces from 9 to 14 and loading bays from 4 to 8. Increasing the number of disabled bays, paired with wider, level footpaths will increase accessibility throughout the town centre. The majority of loading bays will be hybrid loading/parking bays, meaning that outside loading hours, they can be used as regular car parking spaces. New electronic smart signage is being considered that will direct people to the various private multi storey car parks in the town and identify the number of spaces that are free.

These street improvements will make the town more accessible, welcoming, vibrant and improve its attractiveness as a destination. It will enhance the economic vibrancy of Dún Laoghaire as a mixed-use town by facilitating the sustainable and efficient movement of people and goods, and by creating an environment that people want to spend time in. It will also provide an urban design that creates a safe and welcoming experience for all members of society, regardless of age, gender, ability, or income.

2.2.2.2 Modal Filters and Quiet Neighbourhood

The provision of the three modal filters (on Tivoli Road, Cross Avenue and Clarinda Park West) will remove through traffic from the area and make it easier and safer to walk and cycle within the town. These traffic calmed routes will enhance the connectivity for pedestrians and cyclists between George's Street and its surrounding areas. These interventions will also create safer walking and cycling routes to Dominican Primary School and St Joseph's National School. Key active travel routes will also be enhanced through the provision of continuous footpaths across side roads.

Modal filters are areas of road that are closed to car traffic but remain open to pedestrian and cycle traffic. This can be as simple as placing bollards on the road but in this case, they involve the creation of three new parklets, with permanent in ground planting and new seating areas.

A mobility study was undertaken to assess the impacts of the traffic management changes, all destinations will still be reachable by car (except for those located within the pedestrianised zone), although some trips would take slightly longer, (2-4 mins) after the modal filters are in place. The modal

filters will improve the environment by significantly reducing traffic and related noise and air pollution, including removal of all HGV through trips, and will create three new parklets with new planting and seating in public spaces.

2.2.2.3 Park Improvements

As part of this scheme a major upgrade is proposed to Clarinda Park. The car parking that is currently located in the park is proposed to be removed (loss of 66 spaces) and replaced with green areas, this would increase the size of the park and return it to its historical boundaries. Biodiversity will be increased using pollinator friendly planting and the creation of separate areas dedicated to providing high quality woodland and meadow habitat, new semi-mature native trees will also be planted throughout the park. New seating, artwork, and recreational amenities such as an outdoor gym, rebound wall and picnic area are also proposed for the park.

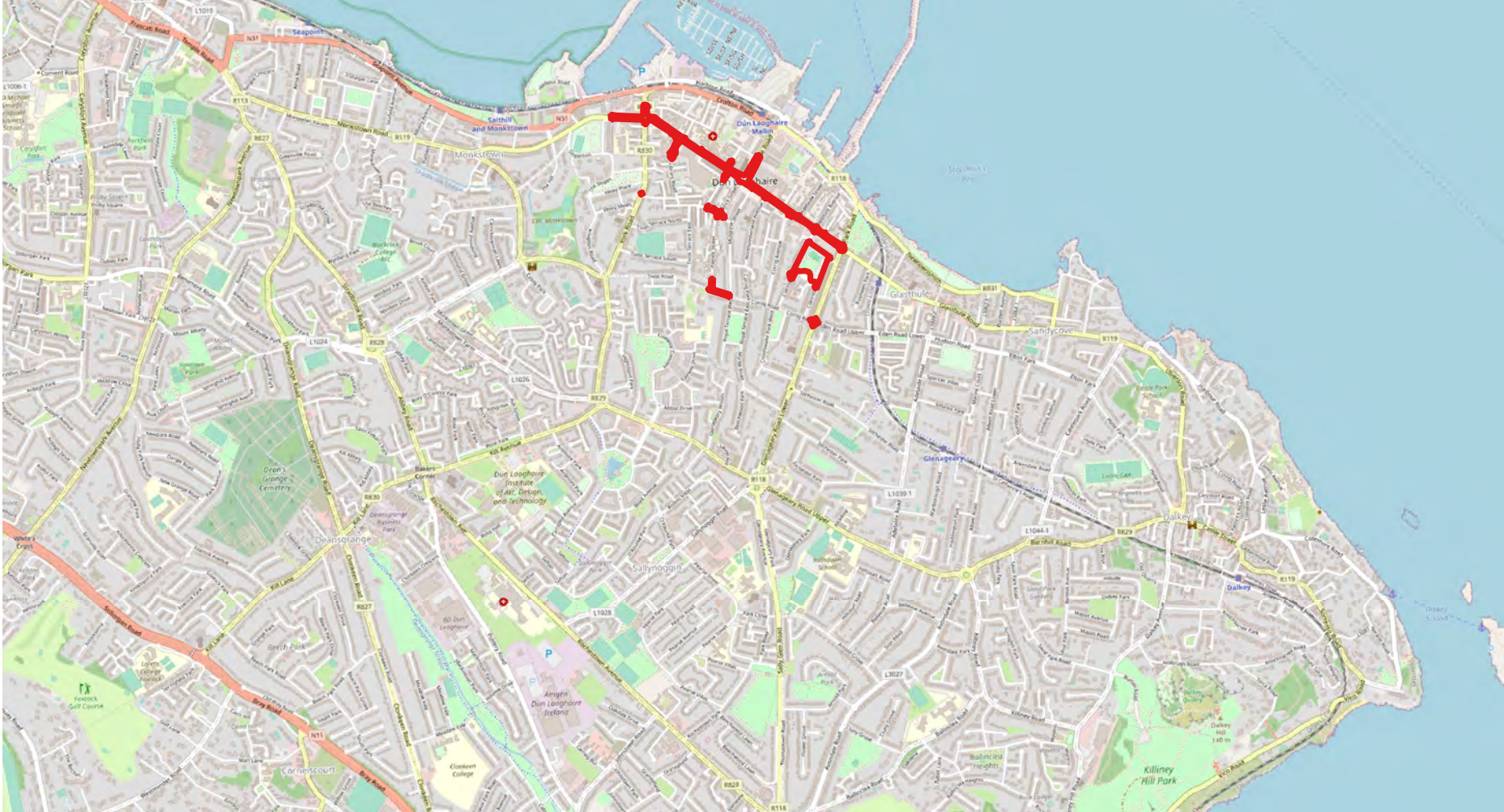
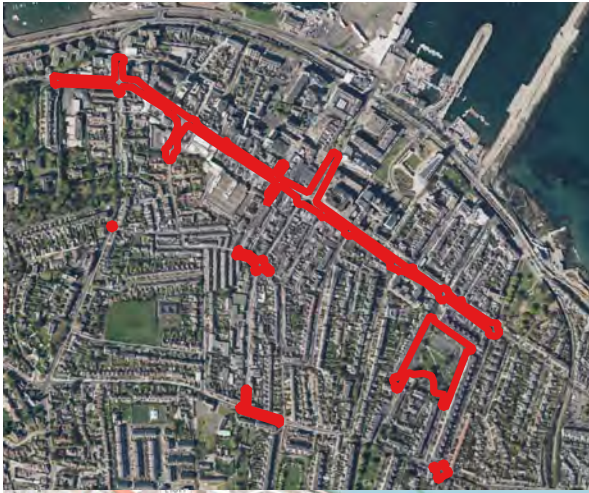
2.2.2.4 Road Safety

This scheme also involves some additional road safety measures. The junction of Glenageary Road Lower and Corrig Road will be upgraded, this will remove street clutter from locations where the footpaths are narrow, reduce the length of pedestrian crossings and provide more footpath space for pedestrians waiting to cross the road. A new signalised pedestrian crossing is also proposed on York Road at Northcote Avenue to allow pedestrians to safely cross the road here, this will also serve as a traffic calming measure.


2.2.3 Surface Water Drainage

2.2.3.1 Stormwater drainage

The impermeable area associated with the existing scenario will be reduced in the proposed scenario. As such, there is no requirement to upgrade the existing drainage network or outfalls within the scheme extents. Existing road gullies will be decommissioned where they are no longer aligned with kerbs. New gullies and connections will be required in areas where the alignment has changed. Sustainable Urban Drainage Systems (SUDs) will be used where possible to improve treatment and attenuation of surface water, prior to entering the existing drainage network. The use of tree pits and urban raingardens are proposed that will catch and store rainwater.



Map Legend

 Site Boundary



Drawing Title

Site Location

Project Title

Living Streets, Dun Laoghaire.

Drawn By
RM

Checked By
CM

Project No.
220948

Drawing No.
Figure 2.1

Scale
1:27,565

Date
06/09/2023



MKO
Planning
and
Environmental
Consultants
Tuam Road, Galway
Ireland, H91 VV88
+353 (0) 91 735611
email: info@mkofireland.ie
Website: ww.mkofireland.ie

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2.2.4 Description of the Baseline Ecological Environment

Habitats within the footprint of the proposed development were classified as **Buildings and Artificial Surfaces (BL3)** (Plate 2.1), **Flower Beds and Boarders (BC4)** (Plate 2.2), **Ornamental/ Non-native Shrub (WS3)** (Plate 2.3), **Hedgerows (WL1)** (Plate 2.4), and **Treelines (WL2)** (Plate 2.5), and **Amenity Grassland (Improved) (GA2)**.

Residential buildings, public buildings (churches, shops etc), associated tarred areas for access (roads and footpaths) and car parking, tennis courts, and concrete walls have been classified as **Buildings and Artificial Surfaces (BL3)**. This was the most dominant habitat type within the proposed development site.

Flower Beds and Boarders (BC4) are present along Upper Georges's street. The dominant species planted within the flower beds include Broad- Leaved Lavender (*Lavandula latifolia medik*), and Daisy (*Bellis perennis*) (Plate 2.2).

Ornamental/ Non-native Shrub (WS3) is present in the central area of Dun Laoghaire, in front of the church within the amenity area. A singular Pedunculate Oak (*Quercus robur*) is present within the shrub. Other species recorded include Cranesbill (*Geranium sylvaticum*), Daisy (*Bellis perennis*), Purpletop Vervain (*Verbena bonariensis*), Cape Honeyflower (*Melianthus major*), and Rose Campion (*Silene coronaria*) (Plate 2.3).

Hedgerows (WL1) are present within private residential gardens, bordered from the footpaths by fences (Plate 2.4). Species identified include Common Boxweed (*Buxus sempervirens*), Lavender (*Lavandula spp*), Fuchsia (*Fuchsia spp*) and Ivy (*Hedera spp*). The hedgerows present within the proposed development site are extensively managed via cutting, so are all homogenous in appearance and relatively poor in biodiversity terms.

A **Treeline (WL2)** composed of Laurel (*Laurus nobilis*) is present in the east section of Upper George's St. A treeline of Silver Birch (*Betula pendula*) is present in the west section of Upper George's St. A treeline of Sycamore (*Acer pseudoplatanus*) is present in the centre of George's St to the east. A treeline of White Beam (*Sorbus aria*) is present in the centre of George's St, to the side of the church. Individual tree species identified within the proposed works area include Plane (*Platanus spp*), and Broadleaf Lime (*Tilia platyphyllos*) (See plate 2.5). Treelines were recorded around the perimeter of Clarinda Park. The eastern perimeter treeline is composed of species including Sycamore (*Acer pseudoplatanus*), Oak (*Quercus robur*), Common lime (*Tilia cordata*), the western perimeter is composed of Sycamore (*Acer pseudoplatanus*), Horse chestnut (*Aesculus hippocastanum*), and Ash (*Fraxinus excelsior*). To the northern corner of the park Common lime (*Tilia cordata*), and Cherry Blossom (*Prunus spp*) trees were recorded, but do not form a full treeline. To the southern perimeter of the park, outside of the site boundary in private lands is a mature Sycamore (*Acer pseudoplatanus*) treeline. For full details on the treeline habitat in Clarinda Park refer to **Appendix I**.

Amenity Grassland (Improved) (GA2) was recorded within Clarinda Park, dominated by species of Perennial ryegrass (*Lolium perenne*). Other species recorded include Broadleaf plantain (*Plantago major*), Ribwort plantain (*Plantago lanceolata*), Common ragwort (*Jacobaea vulgaris*), Meadow buttercup (*Ranunculus acris*), Dock (*Rumex hydrolapathum*), White clover (*Trifolium repens*), and Dandelion (*Taraxacum vulgaria*). Further, immature trees including Sycamore (*Acer pseudoplatanus*) Oak (*Quercus robur*), Rowan (*Sorbus aucuparia*), Deodar Cedar (*Cedrus deodara*) and Fir (*Abies spp*) were recorded throughout this grassland area. For full details on the grassland habitat in Clarinda Park refer to **Appendix I**

No watercourses were identified within the proposed development area. The nearest water course is Dublin Bay coastal waterbody which is 380m from the site. No faunal species or evidence of faunal species associated with any European Designated sites were recorded within the proposed development site. No habitats listed under Annex I of the EU Habitats Directive were identified within the site



boundary. None of the habitats within the Proposed Development site provide supporting habitat for any QI/SCI species associated with nearby European Site.



Plate 2-1 Buildings and Artificial Surfaces (BL3) in Dun Laoghaire Village



Plate 2-2 Flower Bed and Borders (BC4) composed mainly of Broad- Leaved Lavender (*Lavandula latifolia medik*)



Plate 2-3 Ornamental/ non-native shrub (WS3). Species include a singular Pedunculata Oak (*Quercus robur*), Cranesbill (*Geranium sylvaticum*), Daisy (*Bellis perennis*), Purpletop Vervain (*Verbena bonariensis*), Cape Honeyflower (*Melianthus major*), and Rose Campion (*Silene coronaria*).



Plate 2-4 Hedgerows (WL1) present within private residential gardens, separated from the footpath via fencing. Species identified include Common Boxweed (*Buxus sempervirens*), Lavender (*Lavandula spp*), Fuchsia (*Fuchsia spp*) and Ivy (*Hedera spp*).



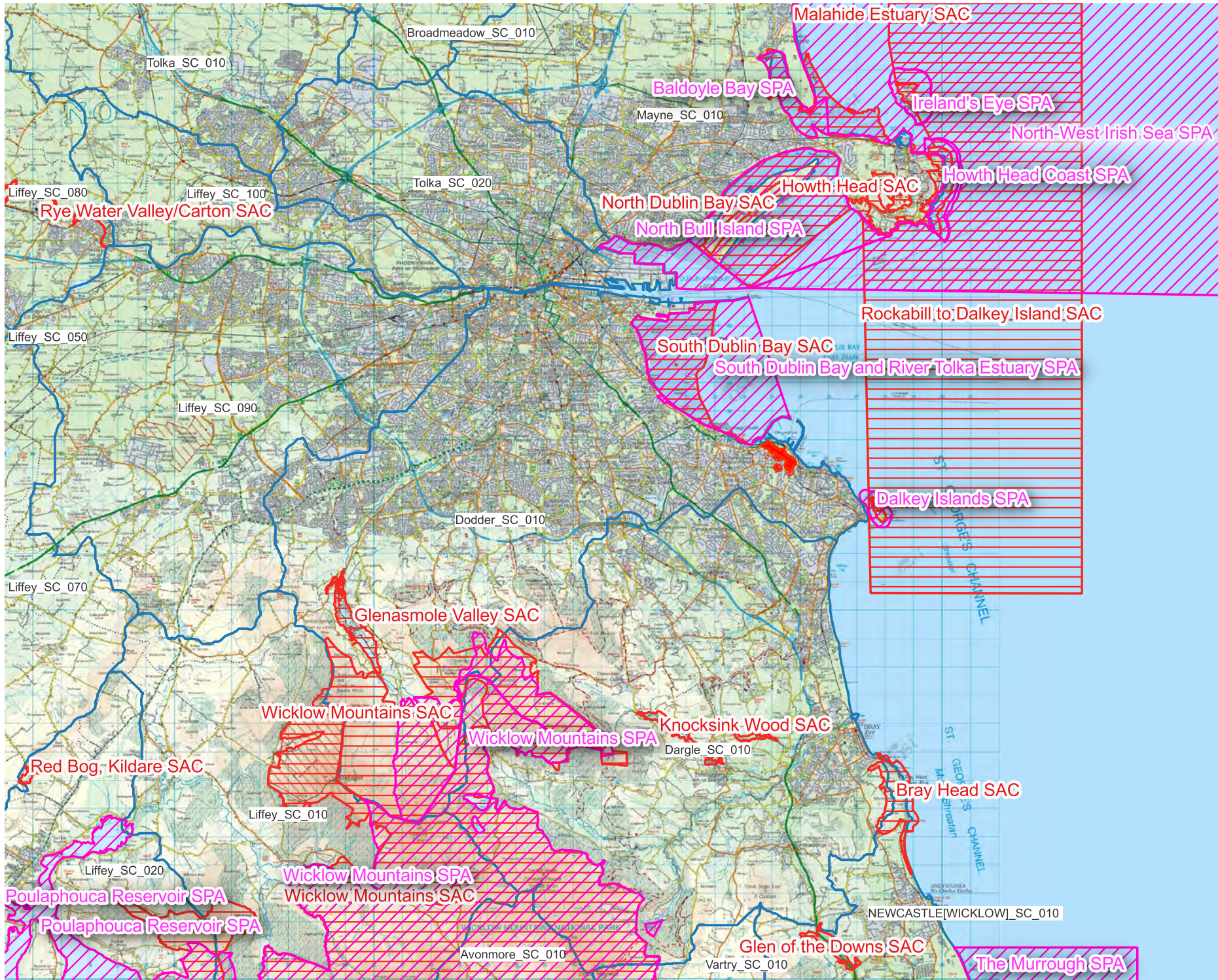
Plate 2-5 TreeLine (WL2) of White Beam (Sorbus aria) located to the side of the church.

3. IDENTIFICATION OF RELEVANT EUROPEAN SITES

3.1 Identification of the European Sites within the Likely Zone of Impact


The following methodology was used to establish which European Sites are within the Likely Zone of Impact of the proposed development:

- Initially the most up to date GIS spatial datasets for European designated sites and water catchments were downloaded from the NPWS website (www.npws.ie) and the EPA website (www.epa.ie) on the 24/11/2022.
- All European Sites that could potentially be affected were identified using a source-pathway - receptor model. To provide context for the assessment, European Sites surrounding the development site are shown on Figure 3.1. Information on these sites according to the site-specific conservation objectives is provided in Table 3.1. Sites that were further away from the proposed development were also considered and no complete source-pathway-receptor chain for significant effect was identified for any other European Site.
- The catchment mapping was used to establish or discount potential hydrological connectivity between the site of the proposed development and any European Sites. The hydrological catchments are also shown in Figure 3.1.
- In relation to Special Protection Areas, in the absence of any specific European or Irish guidance in relation to such sites, the Scottish Natural Heritage (SNH) Guidance, '*Assessing Connectivity with Special Protection Areas (SPA)*' (2016) was consulted. This document provides guidance in relation to the identification of connectivity between proposed development and Special Protection Areas. The guidance takes into consideration the distances species may travel beyond the boundary of their SPAs and provides information on dispersal and foraging ranges of bird species which are frequently encountered when considering plans and projects.
- Table 3.1 provides details of all relevant European Sites as identified in the preceding steps and assesses the potential for likely significant effects on each.
- The assessment considers any likely direct or indirect impacts of the proposed development, both alone and in combination with other plans and projects, on European Sites by virtue of criteria including the following: size and scale, land-take, distance from the European Site or key features of the site, resource requirements, emissions, excavation requirements, transportation requirements and duration of construction, operation and decommissioning were considered in this assessment.
- The site synopses and conservation objectives of these sites, as per the NPWS website (www.npws.ie), were consulted and reviewed at the time of preparing this report (24/11/2022)
- The potential for the proposed development to result in cumulative impacts on any European Sites in combination with other plans and projects was considered in the assessment that is presented in Table 3.1. Plans and projects considered include those in Sections 3.2.1 and 3.2.2 of this report.



Map Legend

- Site Boundary
- Special Area of Conservation (SAC)
- Special Protection Area (SPA)
- EPA Hydrological Subcatchments



MKO
Planning and Environmental Consultants

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Drawing Title European Designated Sites Within the Likely Zone of Influence	
Project Title Living Streets, Dun Laoghaire.	
Drawn By RM	Checked By CM
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Scale 1:174,033	Date 10/10/2023
 <p>MKO Planning and Environmental Consultants Tuam Road, Galway Ireland, H91 VWS8 +353 (0) 91 735511 email: info@mkofireland.ie Website: ww.mkofireland.ie</p>	

Table 3.1 Identification of Designated sites within the Likely Zone of Impact

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
South Dublin Bay SAC [000210] Distance: 600m	<ul style="list-style-type: none"> ➤ [1140] Mudflats and sandflats not covered by seawater at low tide. ➤ [1210] Annual vegetation of drift lines ➤ [1310] Salicornia and other annuals colonising mud and sand. ➤ [2110] Embryonic shifting dunes 	Detailed conservation objectives for this site, (Version 1, 22 August 2013), were reviewed as part of the assessment and are available at www.npws.ie	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SAC.</p> <p>The proposed works area is located 600m southwest of South Dublin Bay SAC. The works are separated from the SAC by existing residential, road and dart line developments.</p> <p>As such, due to the small nature and scale of the proposed works, and the buffering distance of 600m from the works area to this SAC, there is no potential for significant indirect effects during the construction of the proposed works on this designated European site.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment</p>
Rockabill to Dalkey Island SAC [003000] Distance: 2.6km	<ul style="list-style-type: none"> ➤ 1170] Reefs ➤ [1351] Harbour porpoise <i>Phocoena phocoena</i> 	Detailed conservation objectives for this site, (Version 1, 07 May 2013), were reviewed as part of the assessment and are available at www.npws.ie	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SAC.</p> <p>The proposed works area is located approximately 2.6km southwest of Rockabill to Dalkey SAC. The works are</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
			<p>separated from the SAC by existing residential, road and dart line developments, and 2.6km of open waters in Dublin Bay.</p> <p>As such, due to the small nature and scale of the proposed works, and the buffering distance of 2.6km from the works area to this SAC, there is no potential for significant indirect effects during the construction of the proposed works on this designated European site.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment.</p>
<p>North Dublin Bay SAC [000206]</p> <p>Distance: 5.6km</p>	<ul style="list-style-type: none"> ➤ [1140] Mudflats and sandflats not covered by seawater at low tide. ➤ [1210] Annual vegetation of drift lines ➤ [1310] Salicornia and other annuals colonising mud and sand. ➤ [1330] Atlantic salt meadows (<i>Glauco-Puccinellietalia maritima</i>) 	<p>Detailed conservation objectives for this site, (Version 1, 06 November 2013), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SAC.</p> <p>The proposed works area is located approximately 5.6km south of North Dublin Bay SAC. The works are separated from the SAC by existing residential, road and dart line developments, and 5.6km of open waters in Dublin Bay.</p> <p>As such, due to the small nature and scale of the proposed works, and the buffering distance of 5.6km from the works area to this SAC, there is no potential for significant indirect</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
	<ul style="list-style-type: none"> > [1395] Petalwort <i>Petalophyllum ralfsii</i> > [1410] Mediterranean salt meadows (<i>Juncetalia maritimi</i>) > [2110] Embryonic shifting dunes > [2120] Shifting dunes along the shoreline with <i>Ammophila arenaria</i> (white dunes) > [2130] Fixed coastal dunes with herbaceous vegetation (grey dunes) * > [2190] Humid dune slacks 		<p>effects during the construction of the proposed works on this designated European site.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment</p>
<p>Howth Head SAC [000202]</p> <p>Distance: 8.3km</p>	<ul style="list-style-type: none"> > [1230] Vegetated Sea cliffs of the Atlantic and Baltic coasts > [4030] European dry heaths 	<p>Detailed conservation objectives for this site, (Version 1, 06 December 2016), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SAC.</p> <p>The proposed works area is located 8.3km southwest of this SAC. Due to the to the small nature and scale of the proposed works, the terrestrial nature of the QI habitats, and the buffering distance of 8.3km from the proposed works area to this SAC, there is no potential for significant indirect effects during the construction of the proposed works on this designated European site.</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
			<p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment.</p>
<p>Ballyman Glen SAC [000713]</p> <p>Distance: 9.4km</p>	<ul style="list-style-type: none"> ➤ [7220] Petrifying springs with tufa formation (<i>Cratoneurion</i>)* ➤ [7230] Alkaline fens 	<p>Detailed conservation objectives for this site, (Version 1, 17 July 2019), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SAC.</p> <p>The proposed works are located 9.4 km north of this SAC. There are no hydrological linkages between the proposed works area and this SAC. As such, due to the buffering distance of 9.4km from the proposed works and this SAC, and the absence of a complete source-pathway-receptor chain, there is no potential for significant indirect effects during the construction of the proposed works on this designated European site.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment.</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
Knocksink Wood SAC [000725] Distance: 9.9km	<ul style="list-style-type: none"> ➤ 7220] Petrifying springs with tufa formation (<i>Cratoneurion</i>)* ➤ [91A0] Old sessile oak woods with Ilex and Blechnum in the British Isles ➤ [91E0] Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i> (<i>Alno-Padion</i>, <i>Alnion incanae</i>, <i>Salicion albae</i>)* 	Detailed conservation objectives for this site, (Version 1, 13 December 2021), were reviewed as part of the assessment and are available at www.npws.ie	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SAC.</p> <p>The proposed works area is located 9.9km northeast of this SAC. There are no hydrological linkages between the proposed works area and this SAC. As such, due to the buffering distance of 9.9km from the proposed works and this SAC, and the absence of a complete source-pathway-receptor chain, there is no potential for significant indirect effects during the construction of the proposed works on this designated European site.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment.</p>
Bray Head SAC [000714] Distance:10.7km	<ul style="list-style-type: none"> ➤ [1230] Vegetated Sea cliffs of the Atlantic and Baltic coasts ➤ [4030] European dry heaths 	Detailed conservation objectives for this site, (Version 1, 11 April 2017), were reviewed as part of the assessment and are available at www.npws.ie	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SAC.</p> <p>The proposed works area is located 10.7km northwest of this SAC. Due to the to the small nature and scale of the proposed works, the terrestrial nature of the QI habitats, and the buffering distance of 10.7km from the proposed works area to this SAC, there is no potential for significant indirect</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
			<p>effects during the construction of the proposed works on this designated European site.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment.</p>
<p>Wicklow Mountains SAC [002122]</p> <p>Distance: 11km</p>	<ul style="list-style-type: none"> ➤ [1355] Otter <i>Lutra lutra</i> ➤ [3110] Oligotrophic waters containing very few minerals of sandy plains (<i>Littorelletalia uniflorae</i>) ➤ [3130] Oligotrophic to mesotrophic standing waters with vegetation of the <i>Littorelletea uniflorae</i> and/or <i>Isoeto-Nanojuncetea</i> ➤ [3160] Natural dystrophic lakes and ponds ➤ [4010] Northern Atlantic wet heaths with <i>Erica tetralix</i> ➤ [4030] European dry heaths ➤ [4060] Alpine and Boreal heaths 	<p>Detailed conservation objectives for this site, (Version 1, 31 July 2017), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SAC.</p> <p>The proposed works are located 11km northeast of this SAC. There are no hydrological linkages between the proposed works area and this SAC. As such, due to the buffering distance of 11km from the proposed works and this SAC, and the absence of a complete source-pathway-receptor chain, there is no potential for significant indirect effects during the construction of the proposed works on this designated European site.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment.</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
	<ul style="list-style-type: none"> ➤ [6130] Calaminarian grasslands of the <i>Violetalia calaminariae</i> ➤ [6230] Species-rich <i>Nardus</i> grasslands, on siliceous substrates in mountain areas (and submountain areas, in Continental Europe) * ➤ [7130] Blanket bogs (* if active bog) ➤ [8110] Siliceous scree of the montane to snow levels (<i>Androsacetalia alpinae</i> and <i>Galeopsietalia ladani</i>) ➤ [8210] Calcareous rocky slopes with chasmophytic vegetation ➤ [8220] Siliceous rocky slopes with chasmophytic vegetation ➤ [91A0] Old sessile oak woods with <i>Ilex</i> and <i>Blechnum</i> in the British Isles 		

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
Baldoyle Bay SAC [000199] Distance: 11km	<ul style="list-style-type: none"> ➤ [1140] Mudflats and sandflats not covered by seawater at low tide. ➤ [1310] Salicornia and other annuals colonizing mud and sand. ➤ [1330] Atlantic salt meadows (<i>Glauco-Puccinellietalia maritima</i>) ➤ [1410] Mediterranean salt meadows (<i>Juncetalia maritimi</i>) 	Detailed conservation objectives for this site, (Version 1, 19 November 2012), were reviewed as part of the assessment and are available at www.npws.ie	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SAC.</p> <p>The proposed works area is located approximately 11km southwest to Baldoyle Bay SAC. The works are separated from the SAC by existing residential, road and dart line developments, and 11km of open waters in Dublin Bay.</p> <p>As such, due to the small nature and scale of the proposed works, and the buffering distance of 11km from the works area to this SAC, there is no potential for significant indirect effects during the construction of the proposed works on this designated European site.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment.</p>
Ireland's Eye SAC [002193] Distance:12.8km	<ul style="list-style-type: none"> ➤ [1220] Perennial vegetation of stony banks ➤ [1230] Vegetated Sea cliffs of the Atlantic and Baltic coasts 	Detailed conservation objectives for this site, (Version 1, 27 January 2017), were reviewed as part of the assessment and are available at www.npws.ie	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SAC.</p> <p>The proposed works area is located 12.8km southwest of this SAC. Due to the to the small nature and scale of the proposed works, the terrestrial nature of the QI habitats, and</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
			<p>the buffering distance of 12.8km from the proposed works area to this SAC, there is no potential for significant indirect effects during the construction of the proposed works on this designated European site.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment.</p>
Special Protection Area (SPA)			
<p>South Dublin Bay and River Tolka Estuary SPA [004024]</p> <p>Distance: 0.3km</p>	<ul style="list-style-type: none"> ➤ [A046] Light-bellied Brent Goose <i>Branta bernicla hrota</i> ➤ [A130] Oystercatcher <i>Haematopus ostralegus</i> ➤ [A137] Ringed Plover <i>Charadrius hiaticula</i> ➤ [A141] Grey Plover <i>Pluvialis squatarola</i> ➤ [A143] Knot <i>Calidris canutus</i> ➤ [A144] Sanderling <i>Calidris alba</i> ➤ [A149] Dunlin <i>Calidris alpina alpina</i> 	<p>Detailed conservation objectives for this site, (Version 1, 09 March 2015), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SPA.</p> <p>The Dunlin (<i>Calidris alpina alpina</i>) has a core range of 500m (SNH 2016). This SPA is located 0.3km from the proposed works site, as such is within the core foraging range for this SCI species.</p> <p>However, there is no suitable foraging or roosting habitat for the listed SCI species within the boundary of the proposed works. Further, due to the existing urban environment of the proposed works area, and the buffering distance of 0.3km, there is no potential for ex situ disturbance or displacement</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
	<ul style="list-style-type: none"> > [A157] Bar-tailed Godwit <i>Limosa lapponica</i> > [A162] Redshank <i>Tringa tetanus</i> > [A179] Black-headed Gull <i>Chroicocephalus ridibundus</i> > [A192] Roseate Tern <i>Sterna dougallii</i> > [A193] Common Tern <i>Sterna hirundo</i> > [A194] Arctic Tern <i>Sterna paradisaea</i> > [A999] Wetlands 		<p>related impacts on these SCI species during the construction and operation of the proposed works.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment</p>
<p>Dalkey Islands SPA [004172]</p> <p>Distance: 2.6km</p>	<ul style="list-style-type: none"> > [A192] Roseate Tern <i>Sterna dougallii</i> > [A193] Common Tern <i>Sterna hirundo</i> > [A194] Arctic Tern <i>Sterna paradisaea</i> 	<p>Detailed conservation objectives for this site, (Version 1, 12 October 2022), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SPA.</p> <p>There is no suitable foraging or roosting habitat for the listed SCI species within the boundary of the proposed works. Further, due to the existing urban environment of the proposed works area, and the buffering distance of 2.6km, there is no potential for ex situ disturbance or displacement related impacts on these SCI species during the construction and operation of the proposed works.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation,</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
			individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment
<p>North-west Irish Sea cSPA [004236]</p> <p>Distance: 5.5km</p>	<ul style="list-style-type: none"> ➤ [A001] Red-throated Diver <i>Gavia stellata</i> ➤ [A003] Great Northern Diver <i>Gavia immer</i> ➤ [A009] Fulmar <i>Fulmarus glacialis</i> ➤ [A013] Manx Shearwater <i>Puffinus puffinus</i> ➤ [A017] Cormorant <i>Phalacrocorax carbo</i> ➤ [A018] Shag <i>Phalacrocorax aristotelis</i> ➤ [A065] Common Scoter <i>Melanitta nigra</i> ➤ [A179] Black-headed Gull <i>Chroicocephalus ridibundus</i> ➤ [A182] Common Gull <i>Larus canus</i> ➤ [A183] Lesser Black-backed Gull <i>Larus fuscus</i> ➤ [A184] Herring Gull <i>Larus argentatus</i> 	<p>Detailed conservation objectives for this site, (Version 1, 19 September 2023), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SPA.</p> <p>The Red-throated Diver (<i>Gavia stellata</i>) has a core foraging range of generally less than 8km (SNH 2016). This SPA is located 5.5km north of the proposed works site, as such is within the core foraging range for this SCI species.</p> <p>However, there is no suitable foraging or roosting habitat for the listed SCI species within the boundary of the proposed works. Further, due to the existing urban environment of the proposed works area, and the buffering distance of approx 5.5km, there is no potential for ex situ disturbance or displacement related impacts on these SCI species during the construction and operation of the proposed works.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
	<ul style="list-style-type: none"> > [A187] Great Black-backed Gull <i>Larus marinus</i> > [A188] Kittiwake <i>Rissa tridactyla</i> > [A192] Roseate Tern <i>Sterna dougallii</i> > [A193] Common Tern <i>Sterna hirundo</i> > [A194] Arctic Tern <i>Sterna paradisaea</i> > [A195] Little Tern <i>Sterna albifrons</i> > [A199] Guillemot <i>Uria aalge</i> > [A200] Razorbill <i>Alca torda</i> > [A204] Puffin <i>Fratercula arctica</i> > [A862] Little Gull <i>Hydrocoloeus minutus</i> 		
<p>North Bull Island SPA [004006]</p> <p>Distance: 5.6km</p>	<ul style="list-style-type: none"> > [A046] Light-bellied Brent Goose <i>Branta bernicla hrota</i> > [A048] Shelduck <i>Tadorna tadorna</i> > [A052] Teal <i>Anas crecca</i> > [A054] Pintail <i>Anas acuta</i> > [A056] Shoveler <i>Anas clypeata</i> 	<p>Detailed conservation objectives for this site, (Version 1, 09 March 2015), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SPA.</p> <p>This SPA is outside the maximum core range of 3km for the Dunlin (<i>Calidris alpina alpina</i>), and 2km for the Curlew (<i>Numenius arquata</i>) (SNH 2016).</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
	<ul style="list-style-type: none"> > [A130] Oystercatcher <i>Haematopus ostralegus</i> > [A140] Golden Plover <i>Pluvialis apricaria</i> > [A141] Grey Plover <i>Pluvialis squatarola</i> > [A143] Knot <i>Calidris canutus</i> > [A144] Sanderling <i>Calidris alba</i> > [A149] Dunlin <i>Calidris alpina alpina</i> > [A156] Black-tailed Godwit <i>Limosa limosa</i> > [A157] Bar-tailed Godwit <i>Limosa lapponica</i> > [A160] Curlew <i>Numenius arquata</i> > [A162] Redshank <i>Tringa totanus</i> > [A169] Turnstone <i>Arenaria interpres</i> > [A179] Black-headed Gull <i>Chroicocephalus ridibundus</i> > [A999] Wetlands 		<p>However, there is no suitable foraging or roosting habitat for the listed SCI species within the boundary of the proposed works. Further, due to the existing urban environment of the proposed works area, and the buffering distance of 5.6km, there is no potential for ex situ disturbance or displacement related impacts on these SCI species during the construction and operation of the proposed works.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment.</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
<p>Howth Head Coast SPA [004113]</p> <p>Distance: 9.3km</p>	<ul style="list-style-type: none"> ➤ [A188] Kittiwake <i>Rissa tridactyla</i> 	<p>Detailed conservation objectives for this site, (Version 1, 12 October 2022), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SPA.</p> <p>There is no suitable foraging or roosting habitat for the listed SCI species within the boundary of the proposed works. Further, due to the existing urban environment of the proposed works area, and the buffering distance of 9.3km, there is no potential for ex situ disturbance or displacement related impacts on these SCI species during the construction and operation of the proposed works.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment</p>
<p>Baldoyle Bay SPA [004016]</p> <p>Distance: 11km</p>	<ul style="list-style-type: none"> ➤ [A046] Brent Goose <i>Branta bernicla hrota</i> ➤ [A048] Shelduck <i>Tadorna tadorna</i> ➤ [A137] Ringed Plover <i>Charadrius hiaticula</i> ➤ [A140] Golden Plover <i>Pluvialis apricaria</i> 	<p>Detailed conservation objectives for this site, (Version 1, 27 February 2013), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SPA.</p> <p>The Golden Plover (<i>Pluvialis apricaria</i>) has a maximum range of 11km (SNH 2026). This SAC is located 11km from the proposed works site, as such is within the maximum range for this SCI species.</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
	<ul style="list-style-type: none"> ➤ [A141] Grey Plover <i>Pluvialis squatarola</i> ➤ [A157] Bar-tailed Godwit <i>Limosa lapponica</i> ➤ [A999] Wetlands 		<p>However, there is no suitable foraging or roosting habitat for the listed SCI species within the boundary of the proposed works. Further, due to the existing urban environment of the proposed works area, and the buffering distance of 11km, there is no potential for ex situ disturbance or displacement related impacts on these SCI species during the construction and operation of the proposed works.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment</p>
<p>Wicklow Mountains SPA [004040]</p> <p>Distance: 11.4km</p>	<ul style="list-style-type: none"> ➤ [A098] Merlin <i>Falco columbarius</i> ➤ [A103] Peregrine <i>Falco peregrinus</i> 	<p>Detailed conservation objectives for this site, (Version 1, 12 October 2022), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SPA.</p> <p>The proposed works are outside the core range of 5km for the Merlin (<i>Falco columbarius</i>) However, the Peregrine (<i>Falco peregrinus</i>) has been recorded to have a maximum range of 18k in Britain (SNH 2016). The SPA is located 11.4km from the proposed works site, as such is within the maximum range recorded for this SCI species.</p> <p>However, there is no suitable foraging or roosting habitat for the listed SCI species within the boundary of the proposed</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
			<p>works. Further, due to the existing urban environment of the proposed works area, and the buffering distance of 11.4km, there is no potential for ex situ disturbance or displacement related impacts on these SCI species during the construction and operation of the proposed works.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment</p>
<p>Ireland's Eye SPA [004117]</p> <p>Distance :12.4km</p>	<ul style="list-style-type: none"> > [A017] Cormorant <i>Phalacrocorax carbo</i> > [A184] Herring Gull <i>Larus argentatus</i> > [A188] Kittiwake <i>Rissa tridactyla</i> > [A199] Guillemot <i>Uria aalge</i> > [A200] Razorbill <i>Alca torda</i> 	<p>Detailed conservation objectives for this site, (Version 1, 12 October 2022), were reviewed as part of the assessment and are available at www.npws.ie</p>	<p>There is no potential for direct effects as the proposed works area is located entirely outside the boundary of this SPA.</p> <p>There is no suitable foraging or roosting habitat for the listed SCI species within the boundary of the proposed works. Further, due to the existing urban environment of the proposed works area, and the buffering distance of 13.1km, there is no potential for ex situ disturbance or displacement related impacts on these SCI species during the construction and operation of the proposed works.</p> <p>No pathway for significant effect on this European Site was identified, when considered in the absence of any mitigation, individually or cumulatively with other plans or projects and</p>

European Sites and distance from proposed development	Qualify Interests/Special Conservation Interests for which the European site has been designated (Sourced from NPWS online Conservation Objectives, www.npws.ie on the 24/11/2022	Conservation Objectives	Identification of Source-Pathway-Receptor chain and Likely Zone of Impact Determination
Special Areas of Conservation (SAC)			
			the site is not within the Likely Zone of Impact and is not considered further in this Screening assessment

3.2 Likely Cumulative Impact of the Proposed Works on European Sites, in-combination with other plans and projects

A search and review in relation to plans and projects that may have the potential to result in cumulative and/or in-combination impacts on the ecology of the site was conducted. This assessment focuses on the potential for cumulative in-combination effects on the existing habitats where potential for significant effects was identified. This included a review of online Planning Registers, development plans and other available information and served to identify past and future plans and projects, their activities and their predicted environmental effects.

3.2.1 Projects

The potential for the Proposed Development to contribute to a cumulative effect on Designated Sites was considered. The National Planning Application Web Viewer was consulted on the 22.11.2022. Additional projects identified in the surrounding area in the last 5 years include:

- ABP-304249-19: A planning permission for a strategic housing development on a 0.2768-hectare site at the Old School House, Eblana Avenue, Dún Laoghaire, Co. Dublin. The development will consist of the demolition all existing buildings on site and the construction of a par-four to part-six storey over part-basement/ part-lower ground floor Build-to-Rent shared living residential development comprising 208 number single occupancy bed spaces. Grant permission for provided for the planning application.
- ABP 306949: Demolition of existing dwelling and other structures, conversion of Dalguise House to 2 no. houses, construction of 298 no. residential units (22 no. houses, 276 no. apartments), creche and associated site works. Grant permissions with conditions provided for the planning application on 25/08/2020.
- D18A/1196: Permission for a single storey extension of 21 sqm to provide three ambulant treatment bays to the rear of the Emergency Department. The application received a grant permission decision in February 2019.
- BusConnects Network Redesign: The National Transport Authority published the new Dublin Area Bus Network in September 2020. The implementation of the new network will take place on a phased basis over a number of years, the first phase of the new BusConnects network for Dublin was launched in June 2021. The NTA has decided to introduce the new network on a phased basis. The implementation will take place over a number of years commencing in 2021 with 11 phases and will be subject to Government funding.
- Living Streets: Blackrock – This scheme is a public realm improvement project which aims to enhance the attractiveness, liveability, connectivity, and economic vibrancy of Blackrock District Centre. The proposed scheme will upgrade the urban realm in Blackrock Village with new hard and soft landscaping, planting, and street furniture it will also enhance the pedestrian and cycle infrastructure in the village.
- Living Streets: Coastal Mobility Route - This scheme aims to provide safer and more attractive infrastructure for pedestrians and cyclists and enhance the public realm to provide for better quality of life in public spaces along the Coastal Mobility Route in Dún Laoghaire. The length of the entire scheme is 4.5km which extends between the Newton Avenue and Sandycove Avenue. This project has been presented and noted at the Area Committee meeting.
- PC/H/03/22 Proposed Housing Development 27 Patrick Street, Dún Laoghaire, Co. Dublin. Three storey apartment development comprising three 1-bed units and one 2 -bed unit, bicycle parking and bin storage. In response to public consultation, in accordance with Part 8 of the Planning and Development Regulations 2001, as amended, this Part 8 is not proceeding.
- 2022 Greater Dublin Area Cycle Network: The GDA was adopted as part of the GDA Transport Strategy 2022-2042. The counties covered by this plan includes Dublin City

Council (DCC), South Dublin County Council (SDCC), Dun Laoghaire Rathdown County Council (DLRCC), Fingal County Council (FCC), Meath County Council (MCC), Kildare County Council (KCC) and Wicklow County Council (WCC). The Cycle Network Plan identified and determined in a consistent, clear and logical manner, the following cycle networks within the GDA: The Urban Cycle Network at the Primary, Secondary and Feeder level, The Inter-Urban Cycle Network, linking the relevant sections of the Urban Network and including the elements of the National Cycle Network within the GDA. The Inter-Urban Network also includes linkages to key transport locations outside of urban areas such as airports and ports and the Green Route Network that are cycle routes developed predominately for tourist, recreational and leisure purposes. The Cycle Network Plan is consistent across county boundaries in the GDA, such that there is continuity of route networks across these administrative boundaries.

The recently completed projects that are relevant to this scheme are listed below:

- Coastal Mobility Interventions from Newtown Avenue to Sandycove: This scheme involved implementation of coastal mobility interventions aimed at promoting and facilitating walking and cycling along the strategic coastal transport corridor in the County. It developed a 3.6km section of temporary, segregated two-way cycleway from Newtown Avenue in Blackrock to Sandycove and the Forty Foot bathing area through the reallocation of road space and introduced a one-way system for vehicles on Seapoint Avenue, Queen's Road, Windsor Terrace, and Marine Parade. It was constructed in the summer of 2020 and has been in place since then. An AA screening was also carried out and concluded that the scheme was not foreseen to give rise to any significant adverse effects on any designated European sites, alone or in combination with other plans or projects. This evaluation was made in view of the conservation objectives of the habitats or species for which these sites were designated. Consequently, a Stage Two AA (NIS) was not required.
- Blackrock Village temporary scheme, this project was constructed in the summer of 2020. It changed Main St to be one-way for general traffic, introduced a contra-flow cycle lane and created spaces for outdoor furniture and planting. The scheme was built using temporary materials such as bolt down rubber kerbs and timber planter boxes. An AA screening was carried out and concluded that the scheme was not foreseen to give rise to any significant adverse effects on any designated European sites, alone or in combination with other plans or projects. This evaluation was made in view of the conservation objectives of the habitats or species for which these sites were designated. Consequently, a Stage Two AA (NIS) was not required.

No pathway or mechanism for the proposed development to result in any significant effect on any European Site was identified when considered on its own during the assessment process and therefore there is no potential for it to contribute to any such effects when considered in-combination with any other development.

3.2.2

Plans

The following plans have been reviewed and taken into consideration as part of this assessment:

- > Dun Laoghaire- Rathdown County Development Plan 2022-2028.
- > Dún Laoghaire- Rathdown County Biodiversity Action Plan 2021-2025.
- > Blackrock Local Area Plan 2015-2025
- > Dublin City Development Plan 2022-2028.
- > National Biodiversity Action Plan 2017-2021.

The review focused on policies and objectives that relate to Natura 2000 sites and natural heritage. Policies and objectives relating to sustainable land use were also reviewed.

Table 3-2 Review of Relevant Policies and Objectives

Land Use and Spatial Plans	Key Policies/Issues/Objectives Directly Related to European Sites in The Zone of Influence	Assessment of Potential Impact on European Sites
Dún Laoghaire- Rathdown County Development Plan 2022-2028		
	<p>Policy Objective GIB18: Protection of Natural Heritage and the Environment: It is a Policy Objective to protect and conserve the environment including, in particular, the natural heritage of the County and to conserve and manage Nationally and Internationally important and EU designated sites - such as Special Protection Areas (SPAs), Special Areas of Conservations (SACs), proposed Natural Heritage Areas (pNHAs) and Ramsar sites (wetlands) - as well as non-designated areas of high nature conservation value known as locally important areas which also serve as ‘Stepping Stones’ for the purposes of Article 10 of the Habitats Directive.</p> <p>Policy Objective GIB19: Habitats Directive: It is a Policy Objective to ensure the protection of natural heritage and biodiversity, including European Sites that form part of the Natura 2000 network, in accordance with relevant EU Environmental Directives and applicable National Legislation, Policies, Plans and Guidelines</p> <p>Policy Objective GIB21: Designated Sites: It is a Policy Objective to protect and preserve areas designated as proposed Natural Heritage Areas, Special Areas of Conservation, and Special Protection Areas. It is Council policy to promote the maintenance and as appropriate, delivery of ‘favourable’ conservation status of habitats and species within these areas.</p> <p>Policy Objective GIB23: County Wide Ecological Network: It is a Policy Objective to protect the Ecological Network which will be integrated into the updated Green Infrastructure Strategy and will align with the DLR County Biodiversity Action Plan. Creating this network throughout the County will also improve the ecological coherence of the Natura 2000 network in accordance with Article 10 of the Habitats Directive. The network will also include non- designated sites.</p> <p>Policy Objective EI6: Sustainable Drainage Systems: It is a Policy Objective to ensure that all development proposals incorporate Sustainable Drainage Systems (SuDS).</p>	<p>The plan was comprehensively reviewed, with particular reference to Policies and Objectives that relate to the Natura 2000 network and other natural heritage interests. No potential for cumulative impacts when considered in conjunction with the current proposal were identified.</p> <p>There will be no impact on any European Designated Sites as a result of the proposed works.</p>
Dún Laoghaire- Rathdown County Biodiversity Action Plan 2021-2025.		
	<p>Objective 3: Conserve and restore Biodiversity and ecosystems and support ecosystem services in DLR, including coastal and marine.</p> <p>Action 1.7: Identify important biodiversity areas most vulnerable to climate change, including terrestrial, watercourses, coastal and marine areas, and establish measures and projects that assist protection of vulnerable areas.</p> <p>Action 2.7: Produce guidance on net gains for biodiversity¹⁰, including guidance for strategies, planning, mitigation measures, and investment in green infrastructure.</p>	<p>The plan was comprehensively reviewed, with particular reference to Policies and Objectives that relate to the Natura 2000 network and other natural heritage interests. No potential for cumulative impacts when considered in conjunction with the current proposal were identified.</p> <p>There will be no impact on any European Designated Sites as a result of the proposed works.</p>

Land Use and Spatial Plans	Key Policies/Issues/Objectives Directly Related to European Sites in The Zone of Influence	Assessment of Potential Impact on European Sites
<p>Action 2.8: Develop guidance related to Biodiversity, Ecosystem Services and Planning, to help those involved in Planning to ensure that development within the County protects and enhances our valuable biodiversity.</p> <p>Action 2.9: Develop best practice guidance for Biodiversity and Greenway Developments to reduce the impacts of greenways on existing biodiversity and for the protection of existing biodiversity, enhancement of biodiversity and for biodiversity gains.</p> <p>Action 3.4: Identify opportunities where ecosystems can be restored and enhanced, including terrestrial, river, coastal and marine ecosystems.</p> <p>Action 3.5: Develop and implement appropriate re-wilding projects in DLR and extend our local biodiversity areas within DLR.</p> <p>Action 3.7: Carry out ecological surveys and assessment of our habitats, including hedgerows, rivers and streams, to provide information regarding areas that require restoration in order to deliver Nature Recovery and Restoration and expansion of our Ecological Network.</p> <p>Action 3.11 Continue the Red Squirrel Project and extend project to Fernhill.</p> <p>Action 3.13: Protect and enhance Booterstown Marsh, an important, unique coastal area within DLR and an EU Natura 2000 site.</p> <p>Action 5.13 Work with our colleagues across our own organisation in DLRCC and collaborate on biodiversity projects, including Nature-based Solution projects.</p>		
<p>Blackrock Local Area Plan 2015-2025</p>		
<p>POLICY BK02- Natural Heritage and Conservation: It is Council Policy to protect, conserve and enhance the natural heritage and environment within and adjacent to Blackrock whilst optimizing these natural assets in the promotion of Blackrock as a heritage and visitor destination.</p> <p>Objective NHC1: It is an objective of the Council to ensure the protection and preservation of the ecological integrity of the designated SPA, cSAC and pNHA within and abutting the Blackrock LAP boundary in the consideration and implementation of development proposals within the Plan area. Any relevant development proposals shall be subject to Appropriate Assessment Screening in accordance with the requirements of the European Communities (Birds & Natural Habitats) Regulations 2011 (SI.477 of 2011).</p>		<p>The plan was comprehensively reviewed, with particular reference to Policies and Objectives that relate to the Natura 2000 network and other natural heritage interests. No potential for cumulative impacts when considered in conjunction with the current proposal were identified.</p> <p>There will be no impact on any European Designated Sites as a result of the proposed works.</p>

Land Use and Spatial Plans	Key Policies/Issues/Objectives Directly Related to European Sites in The Zone of Influence	Assessment of Potential Impact on European Sites
	<p>Objective NHC3: It is an objective of the Council to have regard to the EU guidance document ‘The Implementation of the Birds and Habitats Directive in Estuaries and Coastal Zones’ (EU 2011) when assessing development in or near coastal areas which is likely to have significant effects on the integrity of any designated sites, coastal and marine fauna, flora, and amenities.</p> <p>Objective NHC7: It is an objective of the Council to support the National Parks and Wildlife Service (NPWS) in the maintenance and, as appropriate, the achievement of favourable conservation status of Natura 2000 sites and their associated habitats and species to which the European Communities (Birds & Natural Habitats) Regulations 2011 (SI.477 of 2011) exchange of wild species.</p> <p>Objective NHC9: It is an objective of the Council to protect the natural character and ecological value of rivers and streams within the Local Area Plan boundary. In that regard the Council shall ensure, that in the event of lighting being proposed along a watercourse corridor, that an Ecological Impact Assessment (and where necessary an Appropriate Assessment) including bat and otter surveys, shall be conducted. All water courses shall be maintained in their open natural state in order to prevent habitat loss, preserve biological diversity and aid in pollution detection.</p> <p>Objective EI12: It is an objective of the Council that all proposed flood protection or alleviation works will comply with the requirements of Article 6 of the EU Habitats Directive to ensure there are no likely significant effects on the integrity, defined by the structure and function, of any Natura 2000 sites and that the requirements of Article 6 of the EU Habitats Directive are met.</p> <p>Objective SF1- Seafront: It is an objective of the Council to improve access to and recreational amenity facilities at the seafront at Blackrock, in accordance with Objective PR1 and PR2 Section 3.6 Public Realm Strategy. Any development proposals shall take into account and provide for the possible future construction of the S2S project and shall be subject to Appropriate Assessment Screening in accordance with the requirements of the European Communities (Birds & Natural Habitats) Regulations 2011 (SI.477 of 2011) to ensure the protection and preservation of all designated SPAs, SACs, and pNHAs of Dublin Bay and the surrounding area.</p>	
<p>Dublin City Council Development Plan 2022-2028</p>		
	<p>Policy G19- European Union Natura 2000 Sites: To conserve, manage, protect, and restore the favourable conservation condition of all qualifying interest/special conservation interests of all European sites designated, or proposed to be designated, under the EU Birds and Habitats Directives, as Special Areas of Conservation (SACs) and Special Protection Areas (SPAs) (European / Natura 2000 sites).</p>	<p>The plan was comprehensively reviewed, with particular reference to Policies and Objectives that relate to the Natura 2000 network and other natural heritage interests. No potential for cumulative impacts when considered in conjunction with the current proposal were identified.</p>

Land Use and Spatial Plans	Key Policies/Issues/Objectives Directly Related to European Sites in The Zone of Influence	Assessment of Potential Impact on European Sites
	<p>Policy G113- Areas of Ecological Importance for Protected Species: To ensure the protection, conservation, and enhancement of all areas of ecological importance for protected species, and especially those listed in the EU Birds and Habitats Directives, including those identified as supporting the favourable conservation condition of any European sites, in accordance with development standards set out in this plan.</p>	<p>There will be no impact on any European Designated Sites as a result of the proposed works.</p>
<p>National Biodiversity Action Plan 2017-2021</p>		
	<p>Target 6.1: Natura 2000 network designated and under effective conservation management by 2020.</p> <p>Target 6.2 - Sufficiency, coherence, connectivity, and resilience of the protected areas network substantially enhanced by 2020.</p>	<p>The plan was comprehensively reviewed, with particular reference to Policies and Objectives that relate to the Natura 2000 network and other natural heritage interests. No potential for cumulative impacts when considered in conjunction with the current proposal were identified.</p> <p>There will be no impact on any European Designated Sites as a result of the proposed works.</p>

4. ARTICLE 6(3) APPROPRIATE ASSESSMENT SCREENING STATEMENT AND CONCLUSIONS

The findings of this Screening Assessment are presented following the European Commission's Assessment of Plans and Projects Significantly affecting Natura 2000 Sites: Methodological Guidance on the provisions of Article 6(3) and 6(4) of the Habitats Directive 92/43/EEC (EC, 2021) and Managing Natura 2000 Sites: the provisions of Article 6 of the 'Habitats' Directive 92/43/EEC (EC, 2018) as well as the Department of the Environment's Appropriate Assessment of Plans and Projects in Ireland - Guidance for Planning Authorities (DoEHLG, 2010).

4.1 Data Collected to Carry Out Assessment

In preparation of the report, the following sources were used to gather information:

- Review of NPWS Site Synopses, Conservation Objectives for the European Sites.
- Review of 2019, 2013 and 2007 EU Habitats Directive (Article 17) Reports.
- Review of online web-mappers: National Parks and Wildlife Service (NPWS), Teagasc, EPA, Water Framework Directive (WFD), Geological Survey of Ireland (GSI), Inland Fisheries Ireland (IFI), Irish Wetland Bird Survey I-WeBS & Geohive online Environmental Sensitivity Mapping tool.
- Review of specially requested records from the NPWS Rare and Protected Species Database for the hectads which overlap with the study area.
- Review of Bird Atlases: (Sharrock, 1976; Lack, 1986; Gibbons et al., 1993; Balmer et al., 2013).
- Review of other plans and projects within the area.
- Site Survey carried out on the 26/10/2022.

4.2 Concluding Statement

It can be excluded beyond reasonable scientific doubt, in view of best scientific knowledge, on the basis of objective information and in light of the conservation objectives of the relevant European sites, that the proposed development, individually or in combination with other plans and projects, in the absence of mitigation, would not be likely to have a significant effect on any of the European Sites designated under the Habitats Directive and Birds Directive.

As a result, an Appropriate Assessment is not required, and a Natura Impact Statement shall not be prepared in respect of the proposed development.

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APPENDIX 1

**CLARINDA PARK: EXISTING
ENVIRONMENT TECHNICAL
NOTE**



Kevin Delahunty, Ecological Consultant
9th September 2023

CLARINDA PARK ECOLOGICAL WALKOVER AND BAT SURVEY

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1. Introduction

Barry Transportation intends to develop and enhance Clarinda Park in Dún Laoghaire, Co. Dublin (Grid reference: O 24630 28117) on behalf of Dún Laoghaire-Rathdown County Council. The reclamation of the carparks on both the east and western perimeter of the park is planned as part of the park enhancements including a reduction in noise pollution and traffic calming. An ecological walkover, tree roost inspection, bat emergence survey and bat activity survey were completed in the park on the 25th of August 2023.

The surveys were completed by Kevin Delahunty (bat specialist). All nine resident species of bat in the republic of Ireland are of 'Favourable' conservation status (National Parks and Wildlife Service, 2013) however, all are protected under current European and National legislation. Some of the trees within the park could potentially be impacted by the works.

This report details the findings of a desk study into previous records from the National Biodiversity Data Centre and Bat Conservation Ireland's database of bat roosts and activity records. The results of an ecological walkover, tree inspection for bat roosting potential and bat emergence and activity surveys are also detailed.

2. Methodology

An ecological walkover of the park was conducted during daylight hours. The park's habitats were recorded along with plant and tree species.

Bats utilise woodland areas, treelines and hedgerows as commuting and foraging grounds and some Irish bat species such as the Myotis species need areas of limited light to successfully commute through the landscape. Therefore, developments in areas such as parklands may adversely affect bats in a number of ways such as vegetation removal for pathways which may become potential barriers of lighting or lamps that bats are unwilling to cross. Bat roosts may be disturbed or lost completely during tree removal. On top of these direct impacts, tree and hedgerow removal as well as an increase in lighting in an area can have an effect on invertebrate prey species and foraging grounds.

Therefore, it is vital to develop a full understanding of bat activity at development sites to identify any zones of conflict and minimize impacts on protected species through mitigation. Guidelines followed during onsite surveys include:

- Collins, J. (ed.) (2016) Bat Surveys for Professional Ecologists. Good Practise Guidelines (3rd edn). The Bat Conservation trust, London
- Kelleher, C. & Marnell, F. (2006) Bat Mitigation Guidelines for Ireland. Irish Wildlife Manuals, No. 25. National Parks and Wildlife Service, Department of Environment, Heritage and Local Government, Dublin, Ireland.

The guidelines recommend roosting preferences, survey types and timings and foraging habitat preferences as well as species-specific considerations. Each survey method has its own specific merit in observing and identifying bat species, their level of activity and their use of the landscape. Bat activity surveys need to be conducted during the spring and summer months, when bats are most active (Figure 1). Hibernation occurs during the winter months. Roosting sites and commuting or foraging habitats can be divided into four categories, depending on their suitability (Table 1).

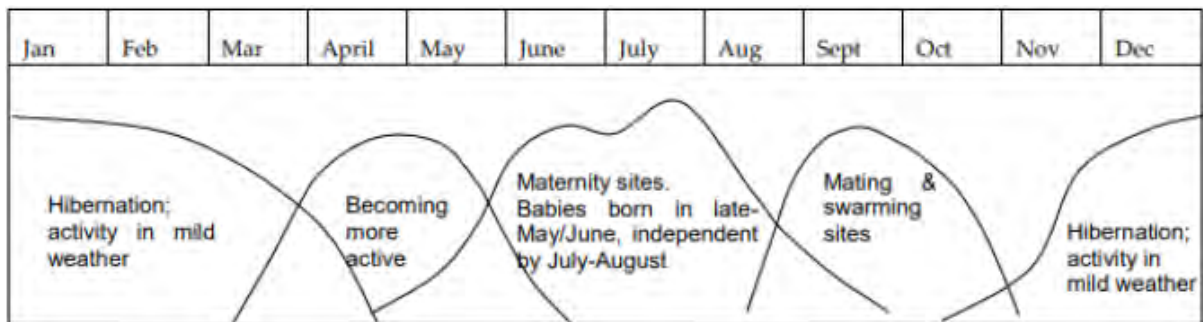


Figure 1: The bat year (NPWS Bat Mitigation Guidelines for Ireland, 2006)

Table 1: Guidelines for assessing the potential suitability of proposed project sites for bats, based on the presence of habitat features within the landscape

Suitability	Description	
	Roosting Habitats	Commuting and Foraging Habitats
Negligible	Habitats on site unlikely to be used by roosting bats.	Habitats on site unlikely to be used by foraging or commuting bats.
Low	A habitat or structure with one of more potential roosting sites that could be utilised by opportunistic bats. These potential roosting sites are not sufficient (space, protection, suitable surrounding habitat etc.) for a large number of bats to use on a regular basis (unsuitable for maternity or hibernation roosts).	Gappy hedgerows and treelines and other habitats that could be used by a small number of commuting or foraging bats. Habitats not very well connected to the surrounding landscape.
Moderate	A habitat or structure with one of more potential roosting sites that could be utilised by bats due to their size, shape, protection and the surrounding landscape. These roosts are unlikely to support a roost of high conservation status.	Habitat is connected to the wider landscape through continuous treelines, hedgerows and other habitats and can be used by bats for commuting and foraging (e.g.: mature hedgerows, mature treelines, woodland, water bodies such as rivers and streams).
High	A habitat or structure with one of more potential roosting sites that could be utilised by bats that is clearly suitable for use by a large number of bats on a regular basis due to their size, shape, protection and surrounding habitat.	Continuous, high-quality habitat that is well connected to the wider landscape that is likely to be used regularly by commuting and foraging bats such as river valleys and streams (especially tree lined watercourses) broadleaved woodlands, hedgerows, lines of trees and woodland edge. Site is close to and connected to known roosts.

(Note: adapted from Collins 2016)

2.1 Desktop Survey

A desktop review of the area surrounding the proposed development was undertaken through the evaluation of relevant literature. Records of bat species within the vicinity of the proposed development site were investigated through a review of Bat Conservation Ireland's National Bat database and the National Biodiversity Data Centre's bat records and maps.

The proposed development site and surrounding areas that were deemed likely to be of interest for bats were noted from mapping before being assessed on the ground. Habitats on site were assessed for the favourability for bats including for potential roosts and for foraging areas.

2.2 Visual Tree Inspection and Bat Detector Survey

Potential bat roosting areas were assessed during daylight hours through visual inspection of the trees within the site boundary. The presence of roosts is often shown by:

- Grease staining at the entrance of roost
- Presence of bat droppings under roost entrance or streaking beneath holes, cracks or crevices where bats are roosting
- Hollow trees, or tree containing cracks, holes or cervices in the bark
- Peeling, loose bark on some tree species as well as flaking bark on some conifer species.
- Lower clutter level – with greater access to branches and tree trunks
- Connection with the surrounding landscape and connection to other roosting locations
- Droppings and uneaten remains of prey such as moth or butterfly wings.

An emergence survey was conducted at area thought most suitable for a bat roost along the southern treeline of the park. This survey took place 15 minutes before sunset and for two hours (20:17-22:17).

The emergence survey was followed by an activity transect with covered the entire perimeter of the park, along the carparks, around the tennis courts and along the paths that cut though the grassland area. The bat emergence survey and activity transect were conducted using a handheld heterodyne/frequency division 'Batbox Duet' bat detector and an Echo Meter Touch 2 bat detector and iPad for visual identification as well as audible.

2.3 Survey Constraints

There were no climatic or seasonal constraints in regard to bat survey as it was undertaken within the active bat season. The surveys were undertaken during optimal conditions. Locating and identifying tree roosts can be difficult in August when foliage is still dense making the bat signs difficult to spot.

2.4 National and international legislation relating to bats in Ireland

All Irish bats are protected under the Wildlife Act (1976) and Wildlife Amended Act (2000). The EC Directive on The Conservation of Natural Habitats and of Wild Fauna and Flora (Habitats Directive 1992) protects bats, and their habitats. All Irish bats are listed in Annex IV of the Habitats Directive with the Lesser Horseshoe Bat (*Rhinolophus hipposideros*) being further listed in Annex II. Ireland has also ratified two international conventions, which protect bats as well as other fauna. The Convention on the Conservation of European Wildlife and Natural Habitats (Bern Convention 1982), which, in relation to bats, exists to conserve all species and their habitats. The Convention on the Conservation of Migratory Species of Wild Animals (Bonn Convention 1979, enacted 1983) was instigated to protect migrant species across all European boundaries.

Under current Irish legislation, it is an offence to destroy or disturb a known bat roost. To do so requires a derogation licence which has to be obtained from the National Parks and Wildlife Services **before** works commence.

3. Existing Environment

The proposed development site is located at Clarinda Park in Dún Laoghaire, Co. Dublin (Grid reference: O 24630 28117). The site is surrounded by one-way roads and includes tennis courts to the north and two cars parks, one to the west and one to the east. The areas within the planning application boundary consists mainly of improved amenity grassland (GA2), artificial surfaces (BL3) with some treelines (WL2) around the perimeter of the car parks. A thicker treeline also makes up the southern edge of the park although the majority of these trees are on private land with just a single horse chestnut tree located within the site boundary. No Annex I habitats are located within the park.

3.1 Designated sites of conservation interest

The site is not contained within, or directly adjacent to, any National or European protected sites. Natural Heritage Areas (NHA) are legally protected from damage from the date on which they are formally proposed for designation under the Wildlife (Amendment) Act 2000. The Dalkey Coastal Zone and Killiney Hill NHA (Site Code: 001206) is located approximately 390 m to the north of the park. The South Dublin NHA and Special Area of Conservation (SAC) (Site Code: 000210) are located approximately 1.5 km to the north west. The South Dublin Bay and

River Tolka Special Area of Protection (SPA) (Site Code: 004024) is also located 1.5 km to the north west of the proposed development site. Rockabill to Dalkey Island SAC (Site Code: 003000) is located approximately 2.8 km to the east of the site.

3.2 Habitats

Three habitat types based on Fossitt (2000) were identified on-site, as shown in Figure 2.

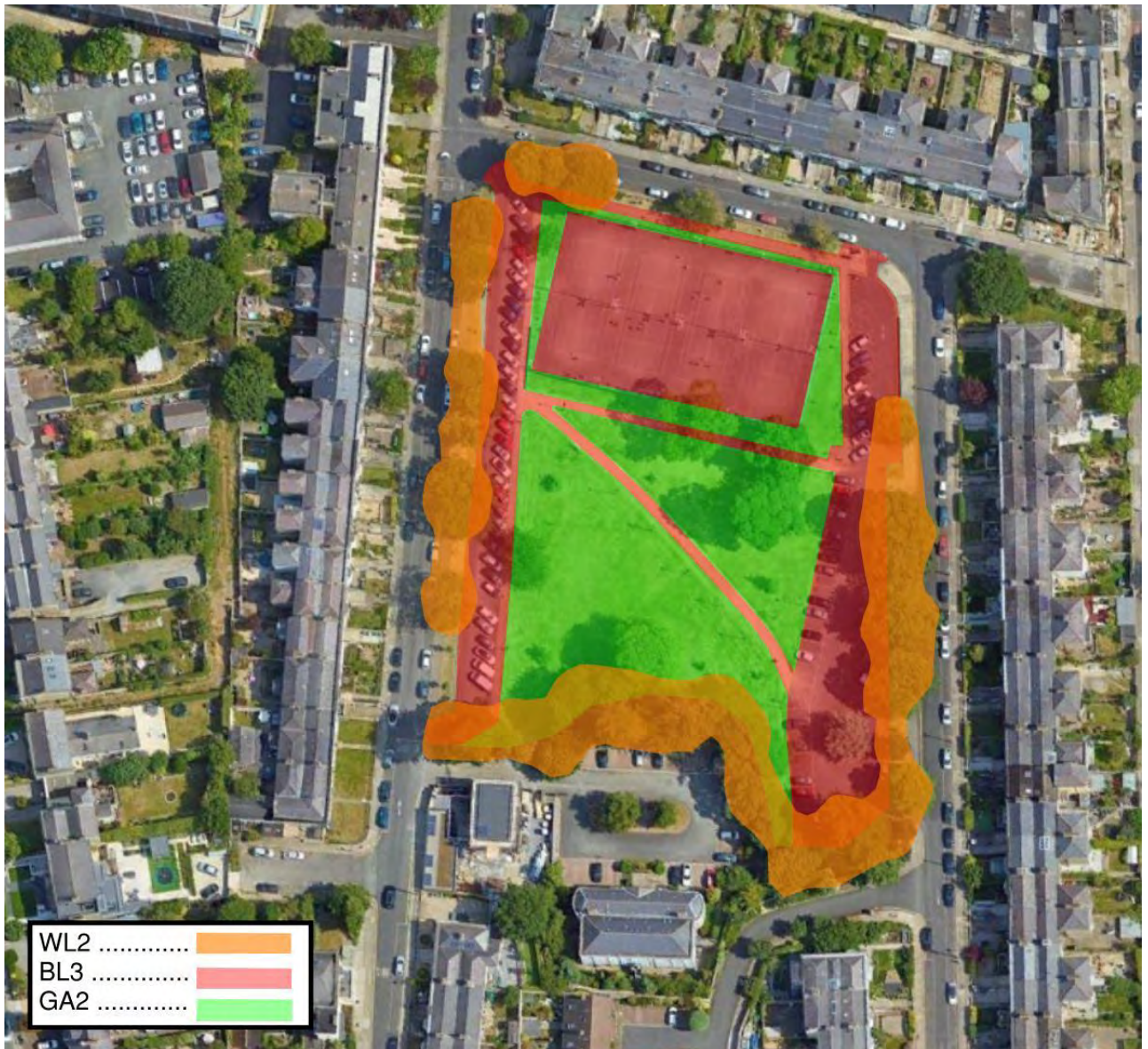


Figure 2: The different habitats found in Clarinda Park, Dún Laoghaire, Co. Dublin

These habitats were as follows:

- Improved Amenity Grassland (GA2) (Plate 1 and Plate 2)

The proposed development site is mainly composed of a grassland area and artificial surfaces. The dominant species of the grassland is perennial ryegrass (*Lolium perenne*). The grassland also contains species such as broadleaf plantain (*Plantago major*), ribwort plantain (*Plantago lanceolata*), common ragwort (*Jacobaea vulgaris*), meadow buttercup (*Ranunculus acris*) dock (*Rumex hydrolapathum*), white clover (*Trifolium repens*) and dandelion (*Taraxacum vulgaria*). The grassland is heavily utilised by humans including for sports and other recreational activities. There are some immature trees throughout the grassland, in particular sycamore (*Acer pseudoplatanus*), oak (*Quercus robur*), rowan (*Sorbus aucuparia*) and deodar cedar trees (*Cedrus deodara*) and an immature fir tree (*Abies sp.*). Cherry blossom (*Prunus sp.*) is also found in the grassland. There are two mature sycamore tree and a mature ash (*Fraxinus excelsior*) tree to the southeast of the tennis courts and one mature horse chestnut (*Aesculus hippocastanum*) tree by the treeline to the south of the park perimeter. This habitat is evaluated as being of local importance (lower value).



Plate 1: (Improved) amenity grassland from southwest corner aiming northeast.



Plate 2: (Improved) amenity grassland from west car park looking east.

- Artificial Surfaces (BL3)

Along with the grassland, artificial surfaces feature heavily in the site (Plates 3, 4, 5 and 6). The northern section of the park features four tennis courts approximately 59 m x 35 m. Two paths also cut from west to east and west to south east through the park. There is a car park on the eastern side and western side of the park. A path runs around the north, east and west of the tennis courts (Plate 7). Both car parks run the full length of the park. There is a blue atlas cedar (*Cedrus atlantica glauca*) in the southern section of the east carpark.



Plate 3: West carpark with treeline along western perimeter – looking north.



Plate 4: Tennis courts to the north of the park



Plate 5: Paths across the grassland from west looking east.



Plate 6: East carpark – looking north.



Plate 7: Path north of tennis courts with grass verge and treeline.

- Treelines (WL2)

The treelines around the perimeter of the park contain gaps between the canopy although there are some areas of closed canopy (Plate 8 and Plate 9). The southern perimeter of the site has the densest treeline primarily of mature sycamore; however, these trees are on private land behind a fenced wall (Plate 11). One mature horse chestnut tree is adjacent to this treeline and is located within the park boundary (Plate 10) – on the improved amenity grassland. The eastern perimeter has a treeline around the carpark of primarily mature sycamore with immature oak, ash and common lime (*Tilia cordata*). The treeline of the western perimeter is also composed primarily of sycamore along with ash and horse chestnut. A number of common lime trees and one cherry blossom are located in the north west corner but the northern perimeter does not have a full treeline. This habitat is evaluated as being of local importance (moderate value).



Plate 8: Treeline on western perimeter



Plate 9: Treeline on eastern perimeter



Plate 10: South treeline out of park boundary with single mature horse chestnut inside park.



Plate 11: Eastern section of the southern treeline outside of park boundary (used extensively by foraging Common Pipistrelle (*Pipistrellus pipistrellus*))

4. Results

4.1 Desk Study

Clarinda Park is located at grid reference O 24630 28117 (53.288937, -6.1316154). A review of existing invasive species records from the National Invasive Species Database collated by the National Biodiversity Data Centre showed no invasive species have been recorded within the 1 km square in which the park is located in (O2428). A review of existing bat records from the Bat Conservation Ireland database indicated that there are no known bat roosts located within, or directly adjacent to the park. There are two records of bat activity within the 1 KM square O2428 – Leisler’s Bat (*Nyctalus leisleri*) and Common Pipistrelle (*Pipistrellus pipistrellus*). The database does hold a number of records of bats from the 10 km square in which the site is located (O22). These include records of bat activity and bat roosts (Table 2).

Table 2: Adjudged status of Irish bat species within the 10 km square O22 which contains Clarinda Park

Common Name	Scientific Name	10 km Radius	Known Roost	Source
Leisler’s Bat	<i>Nyctalus leisleri</i>	Present	0 known	BCI Database
Soprano Pipistrelle	<i>Pipistrellus pygmaeus</i>	Present	0 known	BCI Database
Common Pipistrelle	<i>Pipistrellus pipistrellus</i>	Present	0 known	BCI Database
Nathusius’ Pipistrelle	<i>Pipistrellus nathusii</i>	Potential	0 known	BCI Database
Brown Long-Eared Bat	<i>Plecotus auritus</i>	Present	1 known	BCI Database
Daubenton’s Bat	<i>Myotis daubentonii</i>	Present	0 known	BCI Database
Natterer’s Bat	<i>Myotis nattereri</i>	Present	0 known	BCI Database
Whiskered Bat	<i>Myotis mystacinus</i>	Potential	0 known	BCI Database
Lesser Horseshoe Bat	<i>Rhinolophus hipposideros</i>	Absent	0 known	BCI Database

4.2 Field Study

The ecological walkover of Clarinda Park found no invasive species or Annex I habitats within the proposed site boundary. A tree survey along with bat emergence and activity surveys were undertaken on 25th of August 2023.

4.2.1 Tree survey

The trees along the perimeter of the park (mainly sycamore, ash and common lime) and the five mature trees within the grassland area (sycamore, ash and horse chestnut) were assessed for their potential to support roosting bats. Some holes, crevices and cracks within the trees were noted as having some potential but no other indicators of roosting bats (such as staining or droppings) (Plate 12-15). A number of the cracks and openings into the trees has spider webbing over the entrance. Ivy cover was not prevalent on the trees around the perimeter of the park or the trees in the grassland. The cover offered by the trees along the perimeter allow them to be used as a commuting corridor for some species. However, lighting along the road and along the paths through the parks indicated that only the more common bat species, such as the Common and Soprano Pipistrelles might use the park for commuting or foraging. The treeline to the south of the park, which is located outside of the park perimeter with the exception of the horse chestnut tree, offered a darker area for potential foraging bats.



Plate 12: A hole in a sycamore tree branch – a potential entrance point for roosting bats



Plate 13: A hole in a sycamore tree branch – a potential entrance point for roosting bats



Plate 14: A hole in an ash tree trunk – a potential roosting site roosting bats

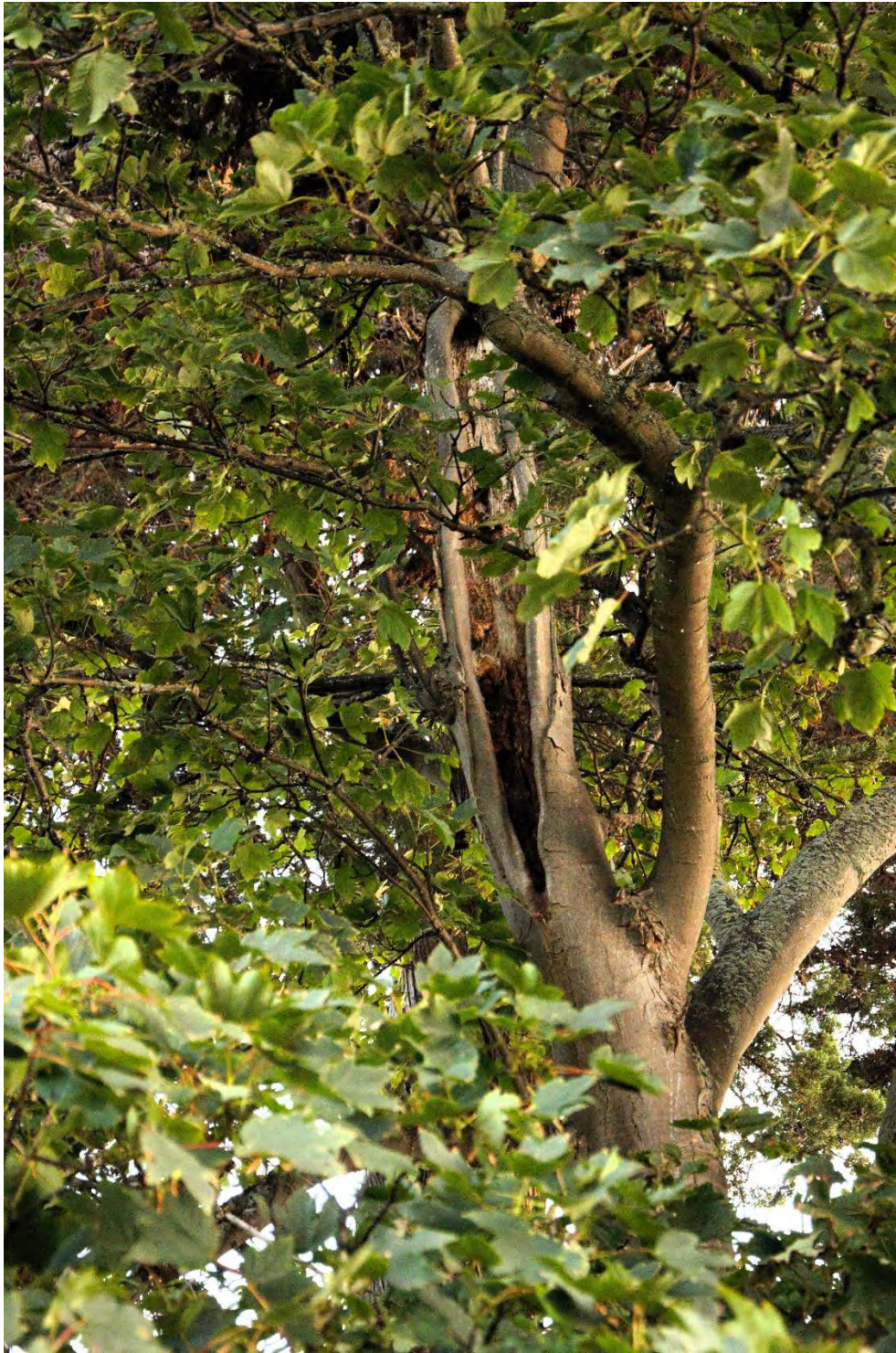


Plate 15: A crack in a sycamore tree trunk – a potential entrance point for roosting bats

4.2.2 Emergence Survey

The positioning for the emergence survey was located close to the horse chestnut tree in the southern section of the park with viewpoints of trees along the southern perimeter. The weather was ideal for bats with dry and calm conditions and a temperature of 17°C at the start of the survey (dropping to 15°C by the end of the survey). The survey was conducted between 20:17 and 22:17. The park is well lit at night – with white lights along the roads, white lamps lighting the pathways through the park, floodlights at the tennis courts and white lights on the grounds of Clarinda Park House to the south of the park.

No active roost was recorded during the survey. Two commuting and foraging species were recorded during the survey. A Leisler's Bat was first recorded at 20:39, commuting over the park. The Common Pipistrelle was recorded foraging along the treeline to the south of the park. The first bat was recorded at 21:00 and at least three bats continued to forage in this area for the rest of the survey. The bats were observed foraging along the southern treeline and moving over the grassland area to the four trees at the south eastern section of the tennis courts before moving back to the treeline again (Plate 16). A Leisler's Bat was also recorded foraging over the trees at the southern perimeter. The Pipistrelle bats did not appear to mind flying through the lamp light in the park. Pipistrelles bats often forage near street lights were flying insects have been attracted towards the light.

4.2.3 Activity Survey

The bat activity survey commenced directly after the emergence survey at 22:20 (Figure 3). Common Pipistrelle bats were recorded again foraging along the treeline to the south of the park and between this treeline and the trees at the south eastern point of the tennis courts. No other bats were recorded around the perimeter of the park, carparks or around the tennis courts.



Plate 16: Foraging area of Common Pipistrelle (noted during emergence survey and activity survey) located mainly between the treeline at the south of the park and the four mature trees at the south east corner of the tennis courts.



Figure 3: Bat activity transect undertaken on the 25th August 2023.

5. Description of Likely Significant Impacts

Bat species located within the proposed development site will potentially be affected during the construction phase of the project. It is unlikely that any bat roost will be significantly affected during works. It is likely that the foraging area will be impacted during the construction phase. Although no confirmed bat roost was recorded during the tree and bat survey of the park, the location is confirmed as an important foraging habitat for the bats, in particular, the Common Pipistrelle, which relies on the prey insects found along the mature treeline to the south of the park.

The proposed development to enhance Clarinda Park does not require a derogation licence from the National Parks and Wildlife Service. However, there are a number of potential impacts to foraging bats and mitigation measures are listed below.

5.1 Potential Impacts

The proposed development of Clarinda Park through removal of the car parks and enhancement of habitats for biodiversity is likely to have a positive effect on the wildlife using the location, including the bat species that use the park as a foraging area. However, there are a number of potential impacts that could affect bats during the construction phase. Tree removal will directly affect bats through a loss of commuting and foraging habitats and loss of potential tree roosts and resting places. Lighting during the construction phase and new lighting put into the park after construction has the potential to block or alter commuting and foraging routes used by bats in the park. Without appropriate mitigation measures in place this could have a significant impact on the foraging grounds of the bats using the park, in particular, the Common Pipistrelle. The fragmentation of established flight paths may permanently or temporarily alter or deter bats from using the commuting corridor and gaining access to foraging habitats (Entwistle, *et al*, 2001). Fragmentation of foraging habitats could also lead to a reduction of prey species abundance (i.e. reduced insect abundance due to loss of suitable habitat), reducing the amount of prey available for bats in an area causing them to travel further in search of food (Hallmann, *et al*, 2017).

6. Mitigation Measures

All Irish bats are listed on Annex IV of the EU Habitats Directive, with Lesser Horseshoe Bats also being listed under Annex II. Therefore, all species are protected under the Birds and

Habitats Regulations. Breeding and roosting sites are also protected under the Wildlife Acts and it is an offence under that legislation to intentionally disturb, injure or kill bats.

6.1 Retention of trees and enhancement proposals

Where possible, the mature trees within the park boundary should be left intact. They will continue to act as commuting and foraging corridors for the bat species using the park. Enhancement measures of tree planting along the perimeter of the park will reduce the gaps between the surrounding canopy. The vast majority of the foraging was recorded along the treeline to the south of the park – outside the proposed development boundary. These trees will not be impacted by the proposed works. This treeline will be enhanced by a proposed woodland area in the south of the park, which should increase biodiversity within the park, including insect prey species for the bats to feed on and nesting areas for birds. A planned pollinator area with a ‘no mow’ regime that transitions the woodland to the grassland will also attract in more insect prey as well as benefit other local wildlife. If any seeding of this pollinator area is planned, seed should be requested from the local biodiversity officer from Dún Laoghaire-Rathdown County Council (Anne Murray).

6.2 Timing of works, lighting and noise

In order to reduce any direct impacts on bats, works should commence and be completed during the winter months when bats are in hibernation. Any works being completed during the summer months must stop at sunset. Where lighting is essential (Health and Safety purposes only), the overspill of light will be minimised through directional lighting (i.e. aimed directly onto the works and not the wider landscape) so as to leave some unilluminated areas in which bats can still commute. This will be done through the use of cowls, lighting hoods, or louvres fitted to the rear of luminaries, and/or shields to direct light in a downwards and inwards fashion to intended areas only.

On completion of works, the newly created woodland should not be illuminated in any way and instead remain a dark habitat suitable for foraging and roosting bats.

Anthropogenic noise affects bats in a number of ways, namely; noise avoidance, a reduction of echolocation effectiveness, and/or reduced attention (Lou, *et al*, 2014). Where construction is taking place in close proximity to a commuting corridor or foraging area, works

will cease before sunset so that construction noise will be reduced to ensure normal usage of the park by bats.

7. Residual Impact

Once the outlined mitigation measures are in place, there should be no lasting negative impacts on bats or other wildlife in the area. The planned enhancements to the park for biodiversity should see an increase in wildlife including nesting birds and foraging and roosting bats.

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