

Appropriate Assessment Screening Report

for proposed
universally accessible entrance
at
Killiney Hill

in accordance with the requirements of
Article 6(3) of the EU Habitats Directive

for: **Dún Laoghaire–Rathdown County Council**



by: **CAAS Ltd.**
1st Floor
24-26 Ormond Quay Upper
D07 DAV9



AUGUST 2021

Document Control

	Author/Reviewer	Date
Prepared by	Karen Dylan Shevlin	Various dates to 18 August 2021
Reviewed by	Andrew Torsney	12 August 2021
	Paul Fingleton	19 August 2021
Status of this version	Issued as final, subject to any client comments	

Table of Contents

1. Introduction	1
1.1. Background.....	1
1.2. Report Structure.....	1
1.3. Legislative Context	1
1.4. Overview of the Habitats Directive and Appropriate Assessment Process	2
1.5. Approach	3
1.6. Author Details.....	4
2. Description of the proposed development	5
2.1. Overview of the proposed development	5
2.2. Details of proposal.....	5
3. Screening for Appropriate Assessment	9
3.1. Introduction.....	9
3.2. Identification of relevant European sites	10
3.3. Assessment criteria	12
3.3.1. Is the development necessary to the management of European sites?	12
3.3.2. Elements of the proposed development with potential to give rise to effects	12
3.3.3. Identification of potential effects and screening of sites	12
3.4. Characterising potential significant effects.....	13
3.4.1. Types of potential Effects	14
3.5. Other plans and projects	22
4. Conclusion	29

1. Introduction

1.1. Background

CAAS Ltd. has been appointed by Dún Laoghaire-Rathdown County Council to prepare this Appropriate Assessment (AA) Screening Report (also known as *Stage One* AA) to support AA procedures to determine whether or not a Natura Impact Statement (NIS) (*Stage Two* AA) is required for the proposed universally accessible entrance at Killiney Hill, Killiney Hill Road, Killiney, Co. Dublin (the proposed development), in accordance with the requirements of Article 6(3) of Council Directive 92/43/EEC on the Conservation of Natural Habitats and of Wild Fauna and Flora (as amended) (hereafter referred to as the “Habitats Directive”).

1.2. Report Structure

This report sets out the legislative context for the assessment process with reference to relevant guidelines and highlight the experience and qualifications of the author. It then details the proposed project and the works associated with this which are then interrogated to identify any possible effects which may be ecologically relevant. Following this, the metrics for the assessment of ‘significance’ of these effects are explained and applied to each of the European sites identified to be ecologically connected to the proposed project area. This assessment is undertaken in view of the conservation objectives and known sensitivities of the qualifying interests and special conservation interests for each European site. Other plans and projects are then considered to identify any likely in combination effects which may result in significant adverse effects to European sites.

1.3. Legislative Context

The Habitats Directive provides legal protection for habitats and species of European importance. The overall aim of the Habitats Directive is to maintain or restore the “favourable conservation status” of habitats and species of European Community Interest. These habitats and species are listed in the Habitats and Birds Directives (Habitats Directive as above and Directive 2009/147/EC on the conservation of wild birds) with Special Areas of Conservation (SACs) and Special Protection Areas (SPAs) designated to afford protection to the most vulnerable of them. These two designations are collectively known as European sites. Articles 6(3) and 6(4) of the Habitats Directive set out the decision-making tests for plans and projects likely to affect such sites. Article 6(3) establishes the requirement for AA. These requirements are implemented in the Republic of Ireland by the European Communities (Birds and Natural Habitats) Regulations 2011 (as amended) and the Planning and Development Act 2000 (as amended).

Article 6(3) of the Habitats Directive States:

‘Any plan or project not directly connected with or necessary to the management of the site but likely to have a significant effect thereon, either individually or in combination with other plans or projects, shall be subject to appropriate assessment of its implications for the site in view of the site’s conservation objectives. In the light of the conclusions of the assessment of the implications for the site and subject to the provisions of paragraph 4, the competent national authorities shall agree to the plan or project only after having ascertained that it will not adversely affect the integrity of the site concerned and, if appropriate, after having obtained the opinion of the general public’.

The AA process relates to the protection of species listed in Annex I and Annex II of the Habitats Directive which form the Natura 2000 network (Article 3(1)). Species breeding and resting places of species listed in Annex IV of the Habitats Directive are nationally protected in Ireland as per Articles 15 and 16 of the Habitats Directive. The species listed in Annex IV do not form part of the Natura 2000 network as they are not mentioned in Article 3(1) of the Directive which defines the Natura 2000 network.

Article 3(1) of the Habitats Directive States:

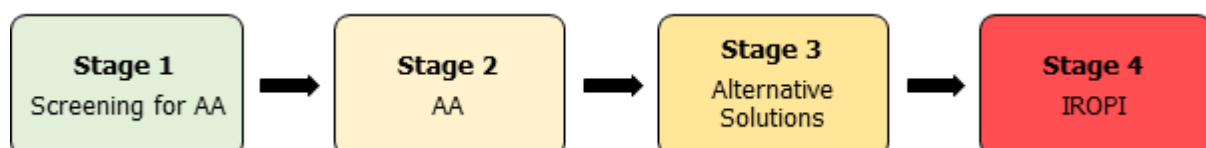
‘A coherent European ecological network of special areas of conservation shall be set up under the title Natura 2000. This network, composed of sites hosting the natural habitat types listed in Annex I and habitats of the species listed in Annex II, shall enable the natural habitat types and the species’ habitats concerned to be maintained or, where appropriate, restored at a favourable conservation status in their natural range’.

AA is an assessment of the likely significant effects arising from a plan or project, either individually or in combination with other plans or projects, to assess if the plan or project will adversely affect the integrity of the European site concerned including implications in view of the European site’s conservation objectives. These sites consist of SACs and SPAs and provide for the protection and long-term survival of Europe’s most valuable and threatened species and habitats. The AA process is concluded by the relevant competent authority in the formation of a determination in accordance with article 6(3) of the Habitats Directive.

1.4. Overview of the Habitats Directive and Appropriate Assessment Process

The Habitats Directive itself promotes a hierarchy of avoidance, mitigation and compensatory measures. This approach aims to avoid any effects on European sites by identifying possible effects early in the plan or project making process and avoiding such effects. Second, the approach involves the application of mitigation measures, if necessary, during the AA process to the point where no adverse impacts on the site(s) remain. If potential significant effects on the integrity of European sites remain, and no further practicable mitigation is possible, the approach requires the consideration of alternative solutions. If no alternative solutions are identified and the plan or project is required for imperative reasons of overriding public interest, then compensation measures are required for any remaining adverse effects.

There are four main stages in the AA process:



Stage One: Screening

The process that identifies the likely impacts upon a European site of a project or plan, either alone or in combination with other projects or plans and considers whether these impacts are likely to be significant.

Stage Two: Appropriate Assessment

The consideration of the impact on the integrity of the European site of the project or plan, either alone or in combination with other projects or plans, with respect to the site's structure and function and its conservation objectives. Additionally, where there are adverse effects mitigation measures are required to avoid or minimise potential effects. The details of these mitigation measures are then assessed in the context of the ecological integrity of the plan/project characteristics to ensure no significant adverse effects on European sites. If this assessment process shows there are no residual significant effect, then the process may end at this stage, stage two, of the AA process which are formalised in Natura Impact Statements (NIS) reports which support the overall AA process. However, if the likelihood of significant impacts remains, then the process must proceed to Stage Three.

Stage Three: Assessment of Alternative Solutions

The process that examines alternative ways of achieving the objectives of the project or plan that avoids adverse impacts on the integrity of the European site.

Stage Four: Assessment where no alternative solutions exist and where adverse impacts remain

An assessment of compensatory measures where, in the light of an assessment of imperative reasons of overriding public interest (IROPI), it is deemed that the project or plan should proceed.

1.5. Approach

This AA screening is based on best scientific knowledge and has utilised ecological and hydrological expertise. In addition, a detailed online review of published scientific literature and 'grey' literature was conducted. This included a detailed review of the National Parks and Wildlife Website including mapping and available reports for relevant sites and in particular sensitive qualifying interests/special conservation interests described and their conservation objectives. The EPA Envision map viewer (www.epa.ie) and available reports were also reviewed, as was the NPWS (2019) publication "The Status of Protected EU Habitats and Species in Ireland".

The ecological desktop study that has been completed for the AA screening of the proposed project, comprised the following elements:

- Identification of European sites within 15km¹ of the subject lands;
- Identification of European sites within 15km of the site with identification of potential pathways to specific sites (if relevant) greater than 15km from the subject lands;
- Review of the NPWS site synopses and conservation objectives for European sites within 15km and for which potential pathways from the proposed site have been identified; and
- Examination of available information on protected species.

Source-Pathway Receptor Model

Ecological impact assessment of potential effects on European sites is conducted following a

¹ While the actual zone of impact is likely to be much smaller, the default 15km zone extent has been applied on a precautionary basis

standard source-pathway-receptor model, where, in order for an effect to be established all three elements of this mechanism must be in place. The absence or removal of one of the elements of the mechanism is sufficient to conclude that a potential effect is not of any relevance or significance.

- Source(s) – e.g., pollutant run-off from proposed development;
- Pathway(s) – e.g., groundwater connecting to nearby qualifying wetland habitats; and,
- Receptor(s) – qualifying aquatic habitats and species of European sites.

In the context of this report, a receptor is an ecological feature that is known to be utilised by the qualifying interests or special conservation interests of a European site. A source is any identifiable element of the proposed universally accessible entrance that is known to interact with ecological processes. A pathway is any connection or link between the source and the receptor.

This report provides information on whether direct, indirect and cumulative adverse effects could arise from the proposed development.

Guidance

The AA screening has been prepared taking into account legislation including the aforementioned legislation and guidance including the following:

- *Appropriate Assessment of Plans and Projects in Ireland*. Guidance for Planning Authorities, Department of the Environment, Heritage and Local Government, 2009;
- *Commission Notice: Managing Natura 2000 sites - The provisions of Article 6 of the 'Habitats' Directive 92/43/EEC*, European Commission, 2018;
- *Assessment of plans and projects significantly affecting Natura 2000 sites: Methodological guidance on the provisions of Article 6(3) and (4) of the Habitats Directive 92/43/EEC*, European Commission Environment DG, 2002; and
- *Managing Natura 2000 sites: The Provisions of Article 6 of the Habitats Directive 92/43/EEC*, European Commission, 2000.
- *Practice Note PN01: Appropriate Assessment Screening for Development Management*. Office of the Planning Regulator, 2021.

1.6. Author Details

Karen Dylan Shevlin is an Ecologist with over 7 years' experience working in multiple capacities in ecology in Ireland and international research organisations, and holds a MSc degree in Biodiversity and Conservation from Trinity College Dublin (2013). Karen has undertaken stage 2 AAs, NISs, and EIARs for a number of large and local development projects ranging from smaller facilities upgrades projects, to major wind turbine sites. Karen has significant skills in leading ecological surveys of bats, birds, insects, habitats and mammals and data analysis, mapping and compiling reports. Karen is also a specialist in ecological theory and the impacts/effects that altering natural dynamics may have on the surrounding environment. This combination of skills and knowledge provides the backbone of the assessment process, and ensure that all of the baseline and detailed data gathered in the field is interpreted in a manner that is grounded in best scientific knowledge.

2. Description of the proposed development

2.1. Overview of the proposed development

The site is located along the western boundary to Killiney Hill Park, adjacent to Killiney Hill Road. The entrance is approximately 1.4km south of Dalkey Village, on the west boundary of Killiney Hill, and is the primary entrance to access the park tearooms and associated facilities (see Figure 2.1 and Figure 2.2 for site location). The entrance is known locally as the Victorian or Tearooms entrance. The total area of the proposed development is 0.096ha.

The aim of the project is to create a universally accessible entrance. Although the topography of the park does not allow universal access throughout, the proposed project will enable universal access to the tearooms and the seating area and toilet facilities associated with it. The proposed project will also enhance the overall appearance of the existing entrance, improve on movement circulation and define a legible and structured arrival space. Terraced planters will flank the entrance, preventing unauthorised vehicle parking and framing the original gates.

2.2. Details of proposal

The project consists of:

- A 2m wide footpath will link the park arrival area to the proposed entrance. A bespoke guardrail positioned along the Killiney Hill Road will provide a protective barrier between the pedestrian and vehicular movement.
- A reconstituted stone gateway structure will mark the entrance to the universal accessible path and ambulant accessible steps.
- Minor earth form manipulation of the sloped embankment to accept the proposed steps and accessible path. The embankment will be planted with suitable native / pollinator friendly species.
- The upper seating space associated with the Tearooms will be resurfaced and additional seating introduced.
- The installation of cycle racks will provide for short stay cycle parking and help prevent unauthorised parking within the pedestrian arrival space.
- A planting scheme will supplement the existing native woodland environment and create interest with selected specimen species.

The universally accessible entrance will be constructed south of and adjacent to the Victorian entrance. This new entrance will be contemporary in design and off-set from the original entrance to avoid detracting from the historic setting (see Figure 2.3 for the site plan).

The general upgrade works will include new paving and kerbs, seating, public lighting, soft landscaping, cycle parking, fabrication & installation of new entrance gateway, construction of steps and accessible pathway and minor earth works (Figure 2.3).

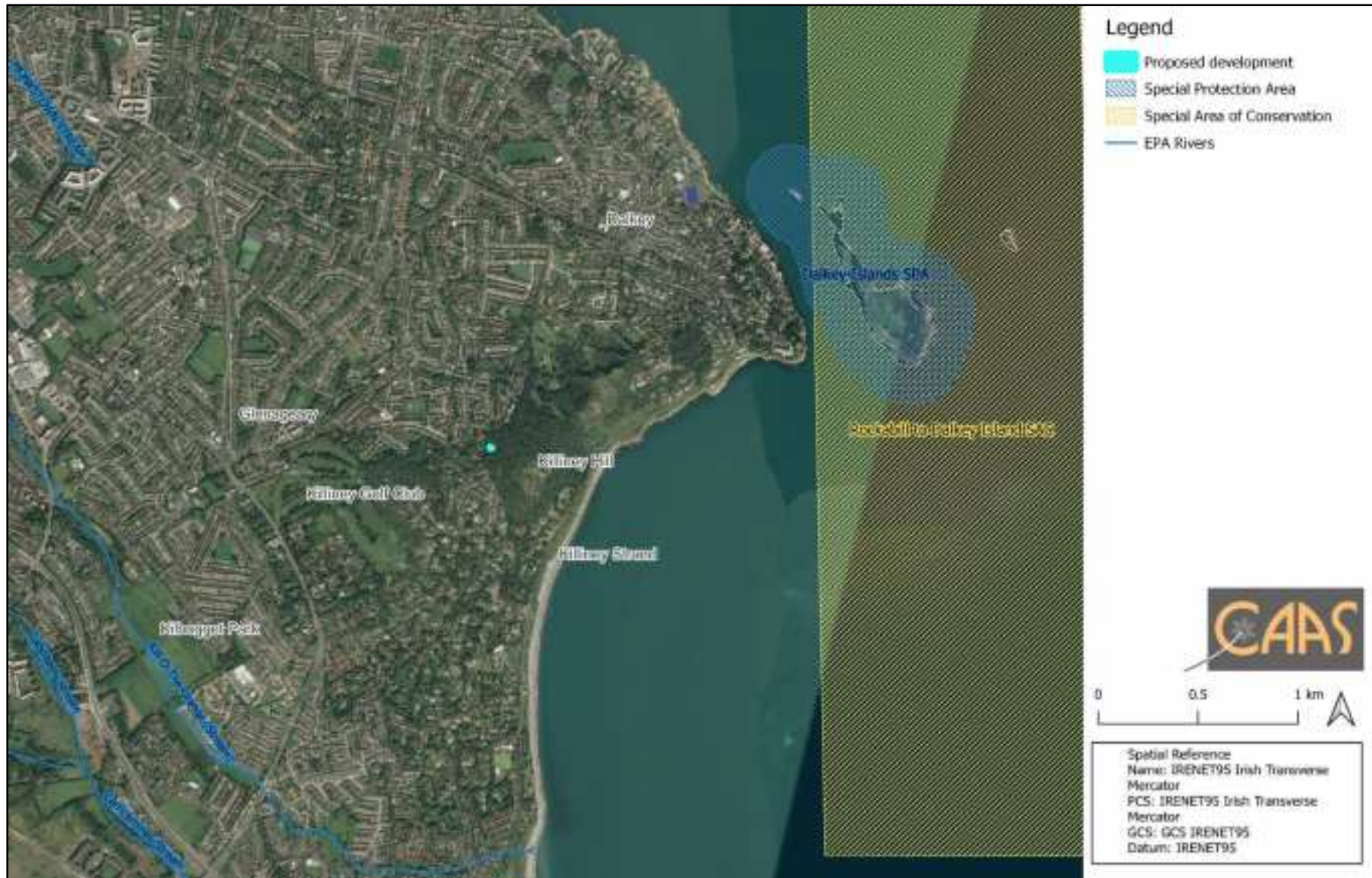


Figure 2.1 Location map

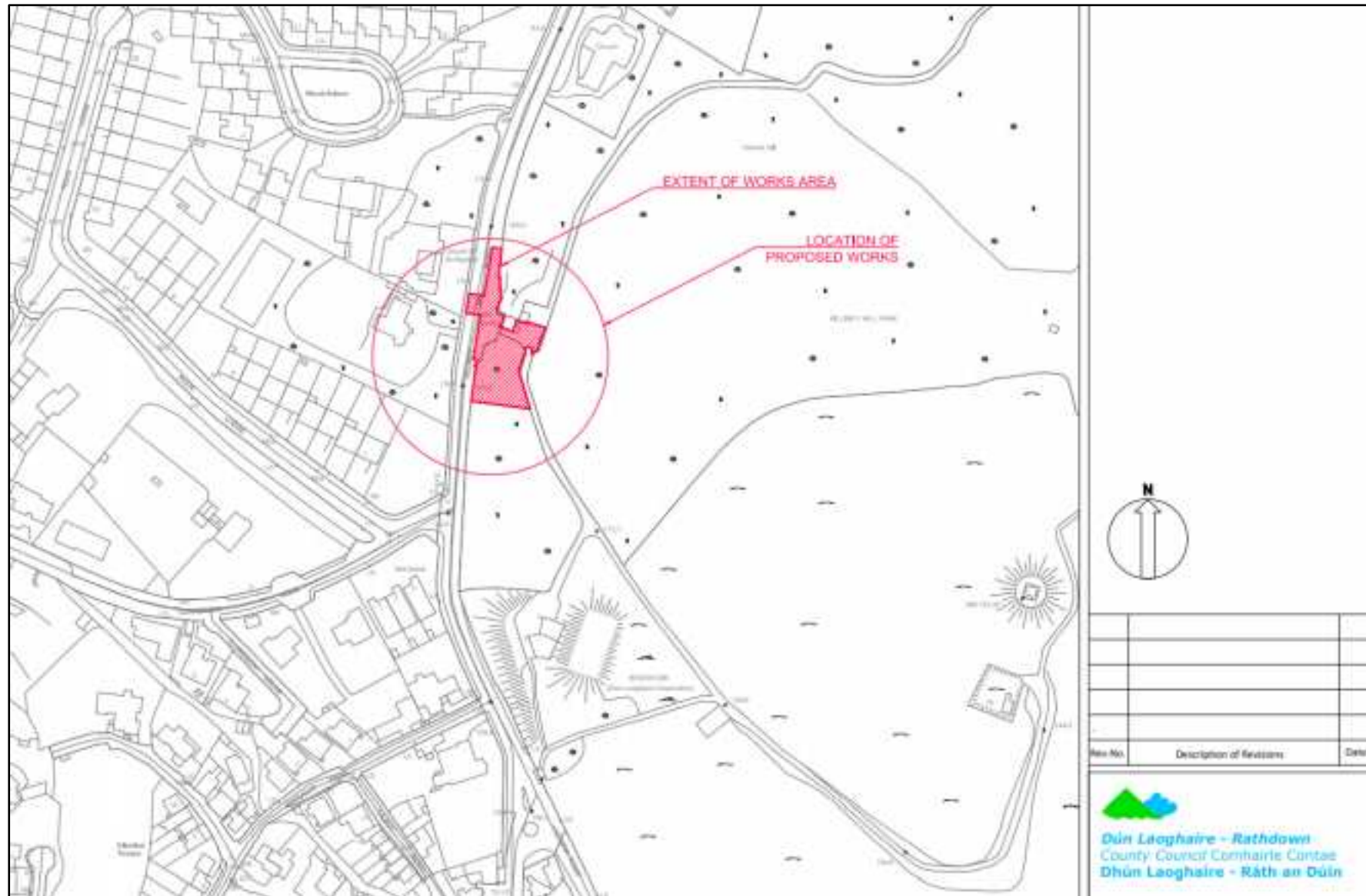


Figure 2.2 Extent of works area

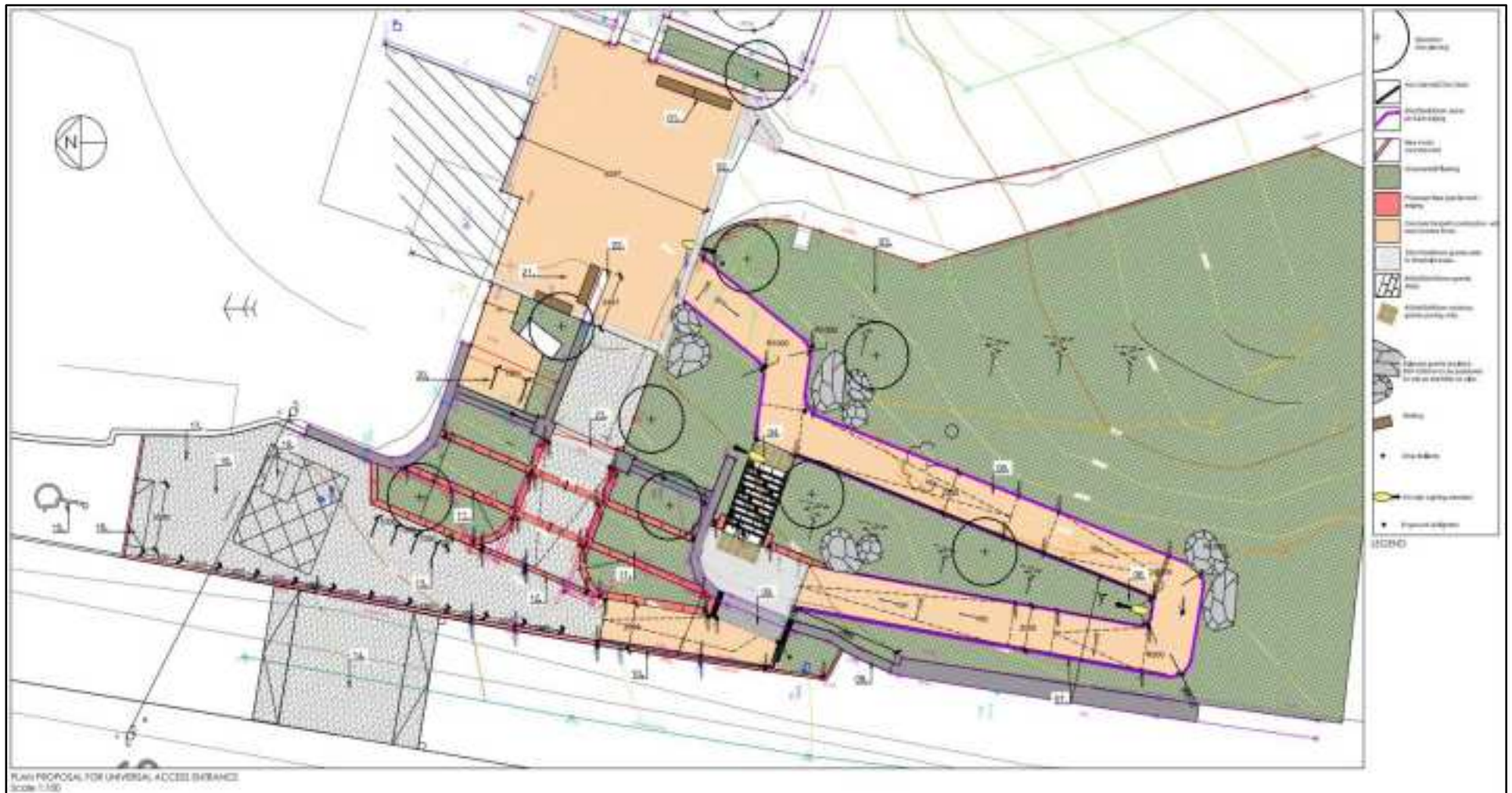


Figure 2.3 Site plan²

²Dún Laoghaire-Rathdown County Council drawing ref.: DLR-KH-2445-003

3. Screening for Appropriate Assessment

3.1. Introduction

This stage of the process identifies any likely significant effects on European sites from the project, either alone or in combination with other projects or plans. A series of questions are asked in order to determine:

- Whether a plan or project can be excluded from AA requirements because it is directly connected with or necessary to the management of a European site.
- Whether the project will have a potentially significant effect on a European site, either alone or in combination with other projects or plans, in view of the site's conservation objectives or if residual uncertainty exists regarding potential impacts.

An important element of the AA process is the identification of the “conservation objectives”, “Qualifying Interests” (QIs) and/or “Special Conservation Interests” (SCIs) of European sites requiring assessment. QIs are the habitat features and species listed in Annexes I and II of the Habitats Directive for which each European site has been designated and afforded protection. SCIs are wetland habitats and bird species listed within Annexes I and II of the Birds Directive. It is also vital that the threats to the ecological / environmental conditions that are required to support QIs and SCIs are considered as part of the assessment.

Site-Specific Conservation Objectives (SSCOs) have been designed to define favourable conservation status for a particular habitat or species at that site. According to the European Commission interpretation document ‘Managing Natura 2000 sites: The provisions of Article 6 of the Habitats Directive 92/43/EEC’, paragraph 4.6(3):

“The integrity of a site involves its ecological functions. The decision as to whether it is adversely affected should focus on and be limited to the site’s conservation objectives.”

Favourable conservation status of a habitat is achieved when:

- Its natural range, and area it covers within that range, are stable or increasing;
- The specific structure and functions which are necessary for its long-term maintenance exist and are likely to continue to exist for the foreseeable future; and
- The conservation status of its typical species is favourable.

The favourable conservation status of a species is achieved when:

- Population dynamics data on the species concerned indicate that it is maintaining itself on a long-term basis as a viable component of its natural habitats;
- The natural range of the species is neither being reduced nor is likely to be reduced for the foreseeable future; and
- There is, and will probably continue to be, a sufficiently large habitat to maintain its populations on a long-term basis of the Appropriate Assessment where they were deemed relevant to the European sites and their QIs/SCIs.

3.2. Identification of relevant European sites

This section of the screening process describes the European sites which exist within the Zone of Influence (ZOI) of the site. The Department of the Environment, Heritage and Local Government (2009) Guidance on AA recommends a 15km zone to be considered. On a precautionary basis this radius has been adopted for this AA. A review of all sites within the ZOI has identified that in the absence of significant hydrological links, the characteristics of the proposed development will not impose effects beyond 15km. Sites beyond 15km which are designated for vagile species are identified to use isolated resources across the landscape; therefore, potential effects to such species at this scale are not identified to be significant due to the broad home range available to these species and the availability of alternate resources.

European sites that occur within 15km of the proposed development are listed in Table 1 and illustrated in the Figure below. Details on the specific QIs and SCIs of each European site are also identified in Appendix I as well as site-specific threats and vulnerabilities of each of the sites.

In order to determine the potential effects of the proposal, information on the qualifying features, known vulnerabilities and threats to site integrity pertaining to any potentially affected European sites has been reviewed. Background information on threats to individual sites and vulnerability of habitats and species that was used during this assessment included the following:

- Ireland's Article 17 Report to the European Commission "*Status of EU Protected Habitats and Species in Ireland*" (NPWS, 2019);
- Site Synopses³; and
- NATURA 2000 Standard Data Forms⁴.

The assessment takes consideration of the SSCOs of each of the sites within the ZOI. Since the conservation objectives for the European sites focus on maintaining the favourable conservation condition of the QIs/SCIs of each site, the screening process has concentrated on assessing the potential effects of the proposed development against the QIs/SCIs of each site. The conservation objectives for each site have been consulted throughout the assessment process.

³ NPWS (2019); NPWS Database of protected site data and associated documents for each European site; available at <https://www.npws.ie/protected-sites>: last accessed 27th July 2021

⁴ NPWS (2019); NPWS Database of protected site data and associated documents for each European site; available at <https://www.npws.ie/protected-sites>: last accessed 27th July 2021

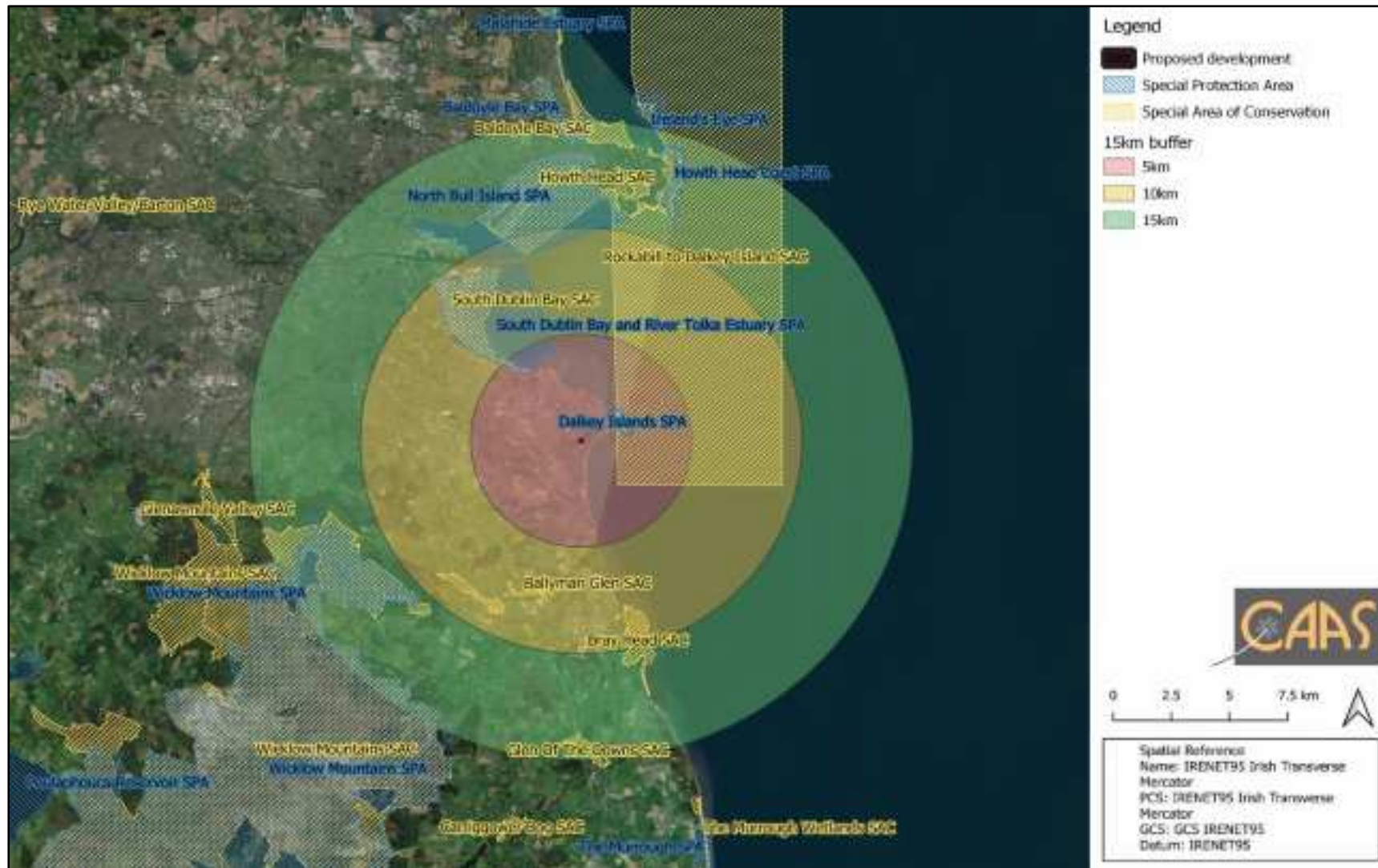


Figure 3.1 European sites within 15km of the proposed development boundary⁵

⁵ Source: NPWS (datasets downloaded 27th July 2021)

3.3. Assessment criteria

3.3.1. Is the development necessary to the management of European sites?

Under the Habitats Directive, projects that are directly connected with or necessary to the management of a European site do not require AA. For this exception to apply, management is required to be interpreted narrowly as nature conservation management in the sense of Article 6(1) of the Habitats Directive. This refers to specific measures to address the ecological requirements of annexed habitats and species (and their habitats) present on a site(s). The relationship should be shown to be direct and not a by-product of the project, even if this might result in positive or beneficial effects for a site(s).

The primary purpose of the proposed development is not the nature conservation management of the sites, but generally to provide for a universally accessible entrance to the Killiney Hill Park, tearooms, and associated facilities. Therefore, the proposed development would not be considered by the Habitats Directive to be directly connected with or necessary to the management of European designated sites.

3.3.2. Elements of the proposed development with potential to give rise to effects

This screening assessment process identifies whether the changes brought about by the proposal are likely to cause any direct, indirect or secondary effects (either alone or in combination with other plans or projects) on the European sites. During this assessment a number of factors have been taken into account including the sites' conservation objectives and known threats. The overall aim of the assessment is to attempt to predict the consequences that can be reasonably foreseen by implementation of the proposed development.

For the purposes of this assessment the proposed development is identified to have potential construction phase effects only. The operational phase will be consistent with the existing site use and condition. The construction phase elements of the project introduce potential sources for effects to ecological processes such as:

- Disturbance effects through noise;
- Earthworks (removal of vegetation etc.);
- Dust; and
- Surface water run-off.

The construction phase will be temporary and small in scale. The construction phase effects identified are considered in the context of European sites identified in this assessment, their sensitivities and conservation objectives (Figure 3.1 and Table 3.1).

3.3.3. Identification of potential effects and screening of sites

This section documents the final stage of the screening process. It has used the information collected on the sensitivity of each European site and describes any potential effects on European sites resulting from the proposed development. This assumes the absence of any controls, conditions, or mitigation measures. In determining the potential for effects, a number of factors have been taken into account. Firstly, the sensitivity and reported threats to European sites. Secondly, the individual elements of the proposed development and the potential effects they may

cause on the sites were considered. The elements of the proposed development with potential to affect the integrity of European sites are presented in Table 3.1.

Sites are screened out based on one or a combination of the following criteria:

- where it can be shown that there are no significant pathways such as hydrological links between activities of the proposed development and a site;
- where a site is located at such a distance from proposed development area that effects are not foreseen; and
- where known threats or vulnerabilities of a site cannot be linked to potential impacts that may arise from the proposed development.

3.4. Characterising potential significant effects

This section of the report explains the metrics used when assessing if the potential effects (previously identified) will have significant implications for European sites. The following parameters are described when characterising impacts (following guidance from the Chartered Institute of Ecology and Environmental Management, Environmental Protection Agency and National Roads Authority):

- **Direct and Indirect Impacts** - An impact can be caused either as a direct or as an indirect consequence of a Plan/Project.
- **Magnitude** - Magnitude measures the size of an impact, which is described as high, medium, low, very low or negligible.
- **Extent** - The area over that the impact occurs – this should be predicted in a quantified manner.
- **Duration** - The time that the effect is expected to last prior to recovery or replacement of the resource or feature.
 - Temporary: Up to 1 Year;
 - Short Term: The effects would take 1-7 years to be mitigated;
 - Medium Term: The effects would take 7-15 years to be mitigated;
 - Long Term: The effects would take 15-60 years to be mitigated; and
 - Permanent: The effects would take 60+ years to be mitigated.
- **Likelihood** – The probability of the effect occurring taking into account all available information.
 - Certain/Near Certain: >95% chance of occurring as predicted;
 - Probable: 50-95% chance as occurring as predicted;
 - Unlikely: 5-50% chance as occurring as predicted; and
 - Extremely Unlikely: <5% chance as occurring as predicted.

The Chartered Institute of Ecology and Environmental Management (CIEEM) guidelines for ecological impact assessment (2016) define: an ecologically significant impact as an impact (negative or positive) on the integrity of a defined site or ecosystem and/or the conservation status of habitats or species within a given geographic area; and the integrity of a site as the coherence of its ecological structure and function, across its whole area, which enables it to sustain the habitat, complex of habitats and/or the levels of populations of the species for which it was classified.

The Habitats Directive requires the focus of the assessment at this stage to be on the integrity of the site as indicated by its Conservation Objectives. It is an aim of NPWS to draw up conservation management plans for all areas designated for nature conservation. These plans will, among other things, set clear objectives for the conservation of the features of interest within a site.

SSCOs have been prepared for a number of European sites. These detailed SSCO's aim to define favourable conservation condition for the qualifying habitats and species at that site by setting targets for appropriate attributes which define the character habitat. The maintenance of the favourable condition for these habitats and species at the site level will contribute to the overall maintenance of favourable conservation status of those habitats and species at a national level.

Favourable conservation status of a species can be described as being achieved when: *'population data on the species concerned indicate that it is maintaining itself, and the natural range of the species is neither being reduced or likely to be reduced for the foreseeable future, and there is, and will probably continue to be, a sufficiently large habitat to maintain its populations on a long-term basis.'*

Favourable conservation status of a habitat can be described as being achieved when: *'its natural range, and area it covers within that range, is stable or increasing, and the ecological factors that are necessary for its long-term maintenance exist and are likely to continue to exist for the foreseeable future, and the conservation status of its typical species is favourable'*.

A Generic Conservation Objective for a SAC is provided below:

- To maintain or restore the favourable conservation condition of the Annex I habitat(s) and/or the Annex II species for which the SAC has been selected.

A Generic Conservation Objective for a SPA is provided below:

- To maintain or restore the favourable conservation condition of the bird species listed as Special Conservation Interests for this SPA.

3.4.1. Types of potential Effects

EC guidance⁶ outlines the types of effects that may affect European sites. These include effects from the following activities:

- Land take
- Resource requirements (drinking water abstraction etc.)
- Emissions (disposal to land, water or air)
- Excavation requirements
- Transportation requirements
- Duration of construction, operation, decommissioning

The 2001 European Commission AA guidance outlines the following potential changes that may occur at a designated site, which may result in effects on the integrity and function of that site:

⁶ Assessment of plans and projects significantly affecting Natura 2000 sites: Methodological guidance on the provisions of Article 6(3) and (4) of the Habitats Directive 92/43/EEC, European Commission Environment DG, 2001

- Reduction of habitat area
- Disturbance to key species
- Habitat or species fragmentation
- Reduction in species density
- Changes in key indicators of conservation value (water quality etc.)
- Climate change

The elements detailed above were considered with specific reference to each of the European sites identified below.

Loss/reduction of habitat area

There are no European sites present within the boundary of the proposed development, and the closest European site is 1.62 km away. Similarly, there were no Annex I habitats or supporting habitat for Annex II species identified on site. Therefore, there will be no effects posed to European sites in this respect.

Habitat or species fragmentation

The proposed project is to alter the structural layout and accessibility of a park entrance. The existing environment is mostly hard surface, with some minor horticultural planting with no Annex I habitats or supporting habitat for Annex II species identified on site. The proposed development itself temporary and small scale. There is no surface hydrological connection from the proposed development area to any European sites. There will be no alteration to drainage networks on site as a result of the proposed project. Thus, considering the absence of potential pathways for effects, it is deemed that there are no sources for potential significant adverse effects with regards to fragmentation of any European sites. Therefore, there will be no effects posed to European sites in this respect.

Disturbance to key species

None of the species and/or habitats identified in Table 3.1 were recorded on site. The nearest European site is 1.62 km away from the proposed site. There could be some minor disturbance effects to birds from noise as a result of the proposed development. However, considering the small scale of the proposed works; in keeping with the surrounding built environment, and the temporary duration of the proposed project's construction phase, this potential disturbance will not cause significant adverse effects to the SCI species of SPAs as a result of the proposed development.

Reduction in species density

There are no ecological corridors between the site and any European site. Similarly, there are no habitats identified on site of any ecological significance. As there is no supporting habitat and/or connectivity between the proposed development and any European site, there will be no reduction in species density of any of the QI or SCI species of European sites.

Changes of indicators of conservation value

The site is 1.62 km from the closest European site. There is no surface hydrological connection from the proposed development area to any European sites. There will not no alteration to drainage networks to carry out the proposed project. Thus, there are no effects to hydrology identified as a result of the proposed development. Therefore, considering the temporary time frame and small

scale of the proposed works, it is deemed that there are no sources for effects with pathways that will affect any conservation indicators related to European sites.

Climate change

The proposed development will not result in any additional greenhouse gas emissions as a result of the operational phase. The construction phase will have minor increased temporary emissions. However, given the small scale and temporary time frame of the development, these are determined to be negligible. Therefore, there are no effects predicted arising from climate change to the degree that it would affect the QIs or SCIs of the European site considered as a result of the proposed development.

Table 3.1 Screening assessment of the potential effects arising from the proposed development

Site Code	Site Name	Distance	Qualifying Feature	Potential Effects	Pathway for Significant Effects	Potential for In-Combination Effects
003000	Rockabill to Dalkey Island SAC	1.62	Harbour porpoise (<i>Phocoena phocoena</i>) [1351], Reefs [1170]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SAC. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
004172	Dalkey Islands SPA	1.75	Roseate tern (<i>Sterna dougallii</i>) [A192], Arctic tern (<i>Sterna paradisaea</i>) [A194], Common tern (<i>Sterna hirundo</i>) [A193]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SPA. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
004024	South Dublin Bay and River Tolka Estuary SPA	3.98	Redshank (<i>Tringa totanus</i>) [A162], Sanderling (<i>Calidris alba</i>) [A144], Common tern (<i>Sterna hirundo</i>) [A193], Roseate Tern (<i>Sterna dougallii</i>) [A192], Ringed Plover (<i>Charadrius hiaticula</i>) [A137], Wetland and Waterbirds [A999], Oystercatcher (<i>Haematopus ostralegus</i>) [A130], Bar-tailed Godwit (<i>Limosa lapponica</i>) [A157], Black-headed Gull (<i>Chroicocephalus ridibundus</i>) [A179], Arctic tern (<i>Sterna paradisaea</i>) [A194], Light-bellied Brent Goose (<i>Branta bernicla hrota</i>) [A046], Dunlin (<i>Calidris alpina</i>) [A149], Knot (<i>Calidris canutus</i>) [A143], Grey Plover (<i>Pluvialis squatarola</i>) [A141]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SPA. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
000210	South Dublin Bay SAC	4.09	Mudflats and sandflats not covered by seawater at low tide [1140], Annual vegetation of drift lines [1210], Embryonic shifting dunes [2110],	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area.	No	No

			Salicornia and other annuals colonising mud and sand [1310]	There are no pathways for effects from the site to the SAC. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.		
000713	Ballyman Glen SAC	7.3	Petrifying springs with tufa formation (<i>Cratoneurion</i>) [7220], Alkaline fens [7230]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SAC.	No	No
000714	Bray Head SAC	7.97	European dry heaths [4030], Vegetated sea cliffs of the Atlantic and Baltic Coasts [1230]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SAC. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
000725	Knocksink Wood SAC	8.38	Petrifying springs with tufa formation (<i>Cratoneurion</i>) [7220], Old sessile oak woods with Ilex and Blechnum in the British Isles [91A0], Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i> (<i>Alno-Padion</i> , <i>Alnion incanae</i> , <i>Salicion albae</i>) [91E0]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SAC. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
004006	North Bull Island SPA	9	Dunlin (<i>Calidris alpina</i>) [A149], Shelduck (<i>Tadorna tadorna</i>) [A048], Black-tailed Godwit (<i>Limosa limosa</i>) [A156], Oystercatcher (<i>Haematopus ostralegus</i>) [A130], Wetland and Waterbirds [A999], Sanderling (<i>Calidris alba</i>) [A144], Curlew (<i>Numenius arquata</i>) [A160], Shoveler (<i>Anas clypeata</i>) [A056], Light-bellied Brent Goose (<i>Branta bernicla hrota</i>) [A046], Knot (<i>Calidris canutus</i>) [A143], Bar-tailed Godwit (<i>Limosa lapponica</i>) [A157], Teal (<i>Anas crecca</i>) [A052], Black-headed Gull (<i>Chroicocephalus ridibundus</i>) [A179], Grey Plover (<i>Pluvialis squatarola</i>) [A141], Turnstone (<i>Arenaria interpres</i>) [A169], Redshank (<i>Tringa totanus</i>)	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SPA. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No

			[A162], Pintail (<i>Anas acuta</i>) [A054], Golden Plover (<i>Pluvialis apricaria</i>) [A140]			
000206	North Dublin Bay SAC	9.04	Mudflats and sandflats not covered by seawater at low tide [1140], Salicornia and other annuals colonising mud and sand [1310], Humid dunes slacks [2190], Mediterranean salt meadows (<i>Juncetalia maritimi</i>) [1410], Annual vegetation of drift lines [1210], Fixed coastal dunes with herbaceous vegetation - grey dunes [2130], Atlantic salt meadows (<i>Glauco-Puccinellietalia maritima</i>) [1330], Shifting dunes along the shoreline with <i>Ammophila arenaria</i> - white dunes [2120], Embryonic shifting dunes [2110], Petalwort (<i>Petalophyllum ralfsii</i>) [1395]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SAC. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
002122	Wicklow Mountains SAC	10.37	European dry heaths [4030], Siliceous rocky slopes with chasmophytic vegetation [8220], Otter (<i>Lutra lutra</i>) [1355], Old sessile oak woods with Ilex and Blechnum in the British Isles [91A0], Calaminarian grasslands of the <i>Violetalia calaminariae</i> [6130], Northern Atlantic wet heaths with <i>Erica tetralix</i> [4010], Siliceous scree of the montane to snow levels (<i>Androsacetalia alpinae</i> and <i>Galeopsietalia ladani</i>) [8110], Calcareous rocky slopes with chasmophytic vegetation [8210], Oligotrophic waters containing very few minerals of sandy plains (<i>Littorelletalia uniflorae</i>) [3110], Natural dystrophic lakes and ponds [3160], Blanket bogs * if active bog [7130], Species-rich <i>Nardus</i> grasslands, on siliceous substrates in mountain areas - and submountain areas in Continental Europe [6230], Alpine and Boreal heaths [4060]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SAC. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
004040	Wicklow Mountains SPA	10.47	Peregrine falcon (<i>Falco peregrinus</i>) [A103], Merlin (<i>Falco columbarius</i>) [A098]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SPA. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary.	No	No

				Therefore, there are no effects to any European site identified.		
000202	Howth Head SAC	10.69	Vegetated sea cliffs of the Atlantic and Baltic Coasts [1230], European dry heaths [4030]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SAC. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
004113	Howth Head Coast SPA	11.13	Kittiwake (<i>Rissa tridactyla</i>) [A188]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SPA. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
000719	Glen of the Downs SAC	13.69	Old sessile oak woods with Ilex and Blechnum in the British Isles [91A0]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SAC. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
000199	Baldoyle Bay SAC	13.91	Salicornia and other annuals colonising mud and sand [1310], Mediterranean salt meadows (<i>Juncetalia maritimi</i>) [1410], Mudflats and sandflats not covered by seawater at low tide [1140], Atlantic salt meadows (<i>Glaucopuccinellietalia maritima</i>) [1330]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SAC. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No
004016	Baldoyle Bay SPA	13.94	Ringed Plover (<i>Charadrius hiaticula</i>) [A137], Golden Plover (<i>Pluvialis apricaria</i>) [A140], Wetland and Waterbirds [A999], Shelduck (<i>Tadorna tadorna</i>) [A048], Grey Plover (<i>Pluvialis squatarola</i>) [A141], Bar-tailed Godwit (<i>Limosa</i>	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SPA. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale	No	No

			<i>lapponica</i>) [A157], Light-bellied Brent Goose (<i>Branta bernicla hrota</i>) [A046]	temporary. Therefore, there are no effects to any European site identified.		
004117	Ireland's Eye SPA	14.76	Guillemot (<i>Uria aalge</i>) [A199], Razorbill (<i>Alca torda</i>) [A200], Cormorant (<i>Phalacrocorax carbo</i>) [A017], Kittiwake (<i>Rissa tridactyla</i>) [A188], Herring Gull (<i>Larus argentatus</i>) [A184]	There are no Annex I habitats or supporting habitats for Annex II species within the proposed development area. There are no pathways for effects from the site to the SPA. Furthermore, the operational phase is consistent with the existing land use and the construction phase will be small scale temporary. Therefore, there are no effects to any European site identified.	No	No

3.5. Other plans and projects

Article 6(3) of the Habitats Directive requires an assessment of a plan or project to consider other plans or projects that might, in combination with the plan or project, have the potential to adversely affect European sites.

As part of this assessment each plan or project is considered within a radius of the red line boundary of the proposed area as defined by the ecologist. The distance of this radius works from a standard 200m, but can be extended if the ecologist deems it necessary depending on whether certain characteristics are present, such as:

- Direct or indirect connectivity to a European site;
- In close proximity to a European site;
- The proposal is of a substantial scale relative to the conditions and/or current works taking place in the surrounding landscape.

These factors are considered particular to each proposal for each particular location and specification. Considering the characteristics of the proposed development with respect to the scale and nature of the works, the 200m search for in-combination effects was deemed to be sufficient

Plans of relevance in the context of this proposal include:

- Dún Laoghaire-Rathdown County Development Plan 2016-2022
- Dún Laoghaire-Rathdown Tourism Strategy & Marketing Plan 2017–2022

Considering that the proposed development has a small-scale temporary construction phase and the operational phase is consistent with the existing land use, it is not foreseen that proposed development will have any significant in-combination effects with the above plans.

Projects of relevance to this development:

To identify projects for consideration for the in-combination effects section, the National Planning and Housing development database was used⁷. A review of all planning applications within the identified zone was conducted focusing on all application within the past 5 years⁸, and are presented in Table 3.2.

All local applications within the last five years were found to be small to medium in scale, with short term or temporary construction phases. These projects utilise existing site resources and are in keeping with current site conditions (urban environment). Some of the developments were alterations to existing structure or retention applications. Therefore, there are no significant in-combination effects identified that could result in significant adverse effects to the integrity of European sites.

⁷ Accessed at: <https://data-housinggovie.opendata.arcgis.com/datasets/planning-application-sites-2010-onwards>, on 27th July 2021.

⁸ Planning applications have a standard lifespan of 5 years as per Section 40 (3)(b) of the Planning & Development Act 2000, as amended; therefore, these are viewed to be the 'live' applications, all other projects are considered as part of the site context

Table 3.2 Local planning applications within the receiving environment of the proposed development⁹

Project Code	Status	Overview	Project Area (sq m)	Possible significant effects from plan or project	Is there a risk of in-combination effects	Possible Significant in-combination effects
D20A/0148	Grant Permission	Permission for development. The development will consist of amendments to the permitted scheme (Ref: D19A/0054) to 1) delete the permitted 2-bedroom penthouse on the 2nd floor; 2) add one 2 bedroom and one 3-bedroom apartments in place of the deleted penthouse on the 2nd floor; 3) add the omitted 2nd floor penthouse back in on the 3rd floor.	8,458	This is a medium-scale project with a temporary construction phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment. The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no in combination effects identified.	No	No
D19A/0054	Grant Permission	Permission for the construction of 14 apartments in a single block of 4 storeys with north-west and south-east facing balconies over semi basement car parking with all attendant site works.	8,391	This is a medium-scale project with a temporary construction phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment. The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no in combination effects identified.	No	No
D19B/0256	Grant Permission	Permission for demolition of existing lounge to the rear of the dwelling and in its place construction of a new ground floor extension, new windows to the side of	1,862	This is a small-scale project with a temporary construction	No	No

⁹ Arranged by descending site area

Project Code	Status	Overview	Project Area (sq m)	Possible significant effects from plan or project	Is there a risk of in-combination effects	Possible Significant in-combination effects
		dwelling including internal amendments, proposed new glass covered terrace and alterations to existing garage consists of new door to the front, new windows to the side and all associated site works.		<p>phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment.</p> <p>The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no in combination effects identified.</p>		
D17B/0271	Grant Permission	Permission is sought for the following: (a) Demolition and removal of existing rear conservatory and a portion of the side extension to the dwelling. (b) Construction of new flat roofed extension to the rear of the dwelling and a two storey pitched roof extension to the side of the dwelling. (c) Existing roof to shed to side of the dwelling to be removed and replaced with a new flat roof. (d) New flat roofed canopy over the existing front door. (e) Two velux style roof-lights and solar thermal panel to be provided to the south facing roof section. Two velux type rooflights to be provided to the north facing roof section. (f) Erection of bin storage shed and associated landscaping works to front garden area of dwelling.	1,403	<p>This is a small-scale project with a temporary construction phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment.</p> <p>The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no in combination effects identified.</p>	No	No
D18A/0886	Grant Permission	Permission is sought for the following: (a) Demolition and removal of existing rear conservatory and a portion of the side extension to the dwelling. (b) Construction of new flat roofed extension to the rear of the dwelling and a two storey pitched roof extension to the side of the dwelling. (c) Existing roof to shed to side of the dwelling to be removed and replaced with a new flat roof. (d) New flat roofed canopy over the existing front door. (e) Two velux style roof-lights and solar thermal panel to be provided to the south facing roof section. Two velux type rooflights to be provided to the north facing roof section. (f) Erection of bin storage shed and associated landscaping works to front garden area of	1,253	<p>This is a small-scale project with a temporary construction phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment.</p> <p>The proposed project is over 1.5km from the nearest SAC</p>	No	No

Project Code	Status	Overview	Project Area (sq m)	Possible significant effects from plan or project	Is there a risk of in-combination effects	Possible Significant in-combination effects
		dwelling.		with no ecological pathways for effects, therefore there are no in combination effects identified.		
D16A/0425	Grant Permission	Permission for construction of a new single storey extension to the rear, existing ground floor to be replaced with pitched roof, new roof lights, amendments to all elevations, internal alterations, proposed raising of rear garden boundary wall, proposed new pedestrian gate, proposed new garden shed and all associated site works.	1,180	This is a small-scale project with a temporary construction phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment. The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no in combination effects identified.	No	No
D19B/0148	Grant Permission	Permission for an attic conversion by way of a replacement roof with raised pitch, provision of a gable window to rear and velux windows to the side and dormer roof addition to existing stairwell.	957	This is a small-scale project with a temporary construction phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment. The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no in combination effects identified.	No	No
D20B/0274	Grant Permission	Permission for development, the proposed development will consist of demolition of existing rear boiler house including chimney and existing shed. It is	943	This is a small-scale project with a temporary construction	No	No

Project Code	Status	Overview	Project Area (sq m)	Possible significant effects from plan or project	Is there a risk of in-combination effects	Possible Significant in-combination effects
		proposed to be replaced with a single flat roof extension (granny flat) with roof light . Internal renovations to existing house including a removal of internal wall and roof light with the insertion of a new roof light in the existing flat roof. Changes to rear and side external elevations and all associated site works.		phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment. The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no in combination effects identified.		
D18A/0808	Grant Permission For Retention	Retention Permission for the following changes from the previously approved scheme (DLRCC Reg. Ref. No. D15A/0535 and An Bord Pleanála Reg. Ref. No. 246029) at an end of terrace two-storey three-bedroom single dwelling; (i) raising the height of the parapet to the side block (north) by approx. 760mm; (ii) raising the heights of the parapets to the stairs block and to the side blocks (south) by approx. 1080mm and 375mm respectively; (iii) omission of the sloped parapets to the rear of the main block at first floor level, and replacement of same with flat parapets and the consequent raising of the flat roof and eaves level to the rear of the main block roof by approx. 465mm; (iv) raising the flat roof and eaves levels of the side block (north) to the rear by approx. 335mm; (v) provision of one additional bathroom window to the rear elevation at first floor level; (vi) changes to the window sizes and locations to the side elevation (north) at first floor level, including making the bedroom window larger; (vii) minor changes to some other window sizes and locations to the front, side (north) and rear elevations; (viii) changing the two rooflights from flat rooflights to sloped rooflights on upstands and minor changes to the relative locations of same, one to the ground floor rear roof; and one to the first floor roof above the stairs and landing; (ix) minor change to the front garden boundary location by moving same out by approx. 2m at the southern end to utilise the full extent of the site.	855	This is a small-scale project with a temporary construction phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment. The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no in combination effects identified.	No	No
D20A/0735	Grant Permission	Permission for formation of new pedestrian gate access from rear garden onto Glenalua Road; all ancillary works.	854	This is a small-scale project with a temporary construction phase, and the operation phase will have localised effects that	No	No

Project Code	Status	Overview	Project Area (sq m)	Possible significant effects from plan or project	Is there a risk of in-combination effects	Possible Significant in-combination effects
				<p>are in keeping with the surrounding urban built environment.</p> <p>The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no in combination effects identified.</p>		
D18A/0065	Grant Permission	<p>Permission for substantial demolition, extension and extensive remodelling of the existing house, including significant alterations to elevations to existing two storey detached dwelling and all associated site works. The development consists of: A. The demolition of existing single and two storey extensions to rear. B. The demolition of existing rear garden shed. C. Replacement of existing pitch roof over dwelling with flat roof. D. The construction of two storey extension to side and rear of existing dwelling.</p>	667	<p>This is a small-scale project with a temporary construction phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment.</p> <p>The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no in combination effects identified.</p>	No	No
D17A/0780	Grant Permission	<p>Permission is sought for the installation of a 3m high 'lamp post' style relief vent stack servicing the existing below ground natural gas pressure reduction unit with 2No removable galvanized steel bollards, all ancillary services and associated site works.</p>	241	<p>This is a small-scale project with a temporary construction phase, and the operation phase will have localised effects that are in keeping with the surrounding urban built environment.</p> <p>The proposed project is over 1.5km from the nearest SAC with no ecological pathways for effects, therefore there are no</p>	No	No

Project Code	Status	Overview	Project Area (sq m)	Possible significant effects from plan or project	Is there a risk of in-combination effects	Possible Significant in-combination effects
				in combination effects identified.		

4. Conclusion

This stage one screening for AA of the proposed universally accessible entrance at Killiney Hill, Killiney Hill Road, Killiney, Co. Dublin demonstrates that the proposed development is not likely to have significant effects on any European site.

The AA screening process has considered potential effects which may arise during the construction and operational phases as a result of the implementation of the project. Through an assessment of the pathways for effects and an evaluation of the project characteristics, taking account of the processes involved and the distance of separation from European sites, it has been evaluated that there are no likely significant adverse effects on the qualifying interests, special conservation interests or the conservation objectives of any designated European site as a result of the proposed development.

The proposed development is 1.62 km away from the closest SAC and 1.75 km away from the closest SPA. Given the nature of the proposed development; i.e., the minor scale, the lack of hydrological connection to the SAC, the localised and temporary nature of the proposed development, there are no potential significant adverse effects identified to any European sites alone or in-combination with other plans or projects.

It is concluded that the proposed development is 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 is made in view of the conservation objectives of the habitats or species for which these sites have been designated. Consequently, a Stage Two AA (NIS) is not required.

Appendix I Background information on European sites

Site Code	Site Name	Qualifying Feature	Pressures Codes	Known Threats and Pressures
000199	Baldoyle Bay SAC	Mediterranean salt meadows (<i>Juncetalia maritimi</i>) [1410], Mudflats and sandflats not covered by seawater at low tide [1140], Atlantic salt meadows (<i>Glauco-Puccinellietalia maritimae</i>) [1330], Salicornia and other annuals colonising mud and sand [1310]	G01.02, E01, G01.01.02, K03.06, F02.03.01, I01, K02.03, E03, F03.01, G02.01, J02.01.02, D01.02	Walking, horse-riding and non-motorised vehicles, urbanised areas, human habitation, non-motorized nautical sports, antagonism with domestic animals, bait digging or collection, invasive non-native species, eutrophication (natural), discharges, hunting, golf course, reclamation of land from sea, estuary or marsh, roads, motorways
000202	Howth Head SAC	European dry heaths [4030], Vegetated sea cliffs of the Atlantic and Baltic Coasts [1230]	J01.01, G01.02, I01, C01.01.01, G05.04, D01.01, C01, A04.03, E01	Burning down, walking, horse-riding and non-motorised vehicles, invasive non-native species, sand and gravel quarries, vandalism, paths, tracks, cycling tracks, mining and quarrying, abandonment of pastoral systems lack of grazing, urbanised areas, human habitation
000206	North Dublin Bay SAC	Atlantic salt meadows (<i>Glauco-Puccinellietalia maritimae</i>) [1330], Annual vegetation of drift lines [1210], Fixed coastal dunes with herbaceous vegetation - grey dunes [2130], Mudflats and sandflats not covered by seawater at low tide [1140], Petalwort (<i>Petalophyllum ralfsii</i>) [1395], Mediterranean salt meadows (<i>Juncetalia maritimi</i>) [1410], Humid dunes slacks [2190], Salicornia and other annuals colonising mud and sand [1310], Embryonic shifting dunes [2110], Shifting dunes along the shoreline with <i>Ammophila arenaria</i> - white dunes [2120]	G05.05, H01.03, A04, G02.01, E03, I01, F02.03, H01.09, G01.01, F02.03.01, G01.02, E02, J01.01, K03.06, E01	Intensive maintenance of public parks or cleaning of beaches, other point source pollution to surface water, grazing, golf course, discharges, invasive non-native species, leisure fishing, diffuse pollution to surface waters due to other sources not listed, nautical sports, bait digging or collection, walking, horse-riding and non-motorised vehicles, industrial or commercial areas, burning down, antagonism with domestic animals, urbanised areas, human habitation
000210	South Dublin Bay SAC	Salicornia and other annuals colonising mud and sand [1310], Embryonic shifting dunes [2110], Mudflats and sandflats not covered by seawater at low tide [1140], Annual vegetation of drift lines [1210]	J02.01.02, E01, D01.01, M01, E03, G01.01.02, K02.02, K02, E02, H03, D01.02, G01.02, G01.01, F02.03.01	Reclamation of land from sea, estuary or marsh, urbanised areas, human habitation, paths, tracks, cycling tracks, changes in abiotic conditions, discharges, non-motorized nautical sports, accumulation of organic material, biocenotic evolution, succession, industrial or commercial areas, marine water pollution, roads, motorways, walking, horse-riding and non-motorised vehicles, nautical sports, bait digging or collection
000713	Ballyman Glen SAC	Alkaline fens [7230], Petrifying springs with tufa formation (<i>Cratoneurion</i>) [7220]	A01, E03.01, A08, E01.01, B01, A10.01, D01.02,	Cultivation, disposal of household or recreational facility waste, fertilisation, continuous urbanisation, forest planting on open ground, removal of hedges and coppice or scrub, roads, motorways,

Site Code	Site Name	Qualifying Feature	Pressures Codes	Known Threats and Pressures
			H02.01, E01.02, A04, H01.03, C01.01	groundwater pollution by leakages from contaminated sites, discontinuous urbanisation, grazing, other point source pollution to surface water, sand and gravel extraction
000714	Bray Head SAC	European dry heaths [4030], Vegetated sea cliffs of the Atlantic and Baltic Coasts [1230]	D01.01, A10.01, K02.01, A04.02.01, K01.01, G01.03, J01.01, G05.04, E01	Paths, tracks, cycling tracks, removal of hedges and coppice or scrub, species composition change (succession), non-intensive cattle grazing, erosion, motorised vehicles, burning down, vandalism, urbanised areas, human habitation
000719	Glen of the Downs SAC	Old sessile oak woods with Ilex and Blechnum in the British Isles [91A0]	G05.04, G01.02, G05.06, G02.06, G05.07, G02.01, I01, A04, D01.02, J01.01	Vandalism, walking, horse-riding and non-motorised vehicles, tree surgery, felling for public safety, removal of roadside trees, attraction park, missing or wrongly directed conservation measures, golf course, invasive non-native species, grazing, roads, motorways, burning down
000725	Knocksink Wood SAC	Petrifying springs with tufa formation (<i>Cratoneurion</i>) [7220], Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i> (<i>Alno-Padion</i> , <i>Alnion incanae</i> , <i>Salicion albae</i>) [91E0], Old sessile oak woods with Ilex and Blechnum in the British Isles [91A0]	I01, B01.02, G03, A04, G05.07, G05.04, G01.02, G05.06, G02.08, D01.01, D05, B01, E03.01, E01.02, D01.02, B02.03	Invasive non-native species, artificial planting on open ground (non-native trees), interpretative centres, grazing, missing or wrongly directed conservation measures, vandalism, walking, horse-riding and non-motorised vehicles, tree surgery, felling for public safety, removal of roadside trees, camping and caravans, paths, tracks, cycling tracks, improved access to site, forest planting on open ground, disposal of household or recreational facility waste, discontinuous urbanisation, roads, motorways, removal of forest undergrowth
002122	Wicklow Mountains SAC	Siliceous rocky slopes with chasmophytic vegetation [8220], European dry heaths [4030], Blanket bogs * if active bog [7130], Old sessile oak woods with Ilex and Blechnum in the British Isles [91A0], Otter (<i>Lutra lutra</i>) [1355], Siliceous scree of the montane to snow levels (<i>Androsacetalia alpinae</i> and <i>Galeopsietalia ladani</i>) [8110], Alpine and Boreal heaths [4060], Calcareous rocky slopes with chasmophytic vegetation [8210], Oligotrophic waters containing very few minerals of sandy plains (<i>Littorelletalia uniflorae</i>) [3110], Calaminarian grasslands of the <i>Violetalia calaminariae</i> [6130], Northern Atlantic wet heaths with <i>Erica tetralix</i> [4010], Species-rich <i>Nardus</i> grasslands, on siliceous substrates in mountain areas - and submountain areas in Continental Europe [6230], Natural dystrophic lakes and	G01.04, F03, G05.09, G04.01, G05.04, G01, E01, L05, E03.01, I01, G05.07, B06, F04.02, G01.02, A04, C01.03, K04.05, G05.06, G02.09, D01.01, J01.01, K01.01, A05.02, G01.03.02, F03.02.02, B02.05, G05.01	Mountaineering, rock climbing, speleology, hunting and collection of wild animals (terrestrial), fences, fencing, military manouvres, vandalism, outdoor sports and leisure activities, recreational activities, urbanised areas, human habitation, collapse of terrain, landslide, disposal of household or recreational facility waste, invasive non-native species, missing or wrongly directed conservation measures, grazing in forests or woodland, collection (fungi, lichen, berries etc.), walking, horse-riding and non-motorised vehicles, grazing, peat extraction, damage by herbivores (including game species), tree surgery, felling for public safety, removal of roadside trees, wildlife watching, paths, tracks, cycling tracks, burning down, erosion, stock feeding, off-road motorized driving, taking from nest (e.g. falcons), non-intensive timber production (leaving dead wood or old trees untouched), trampling, overuse

Site Code	Site Name	Qualifying Feature	Pressures Codes	Known Threats and Pressures
		ponds [3160]		
003000	Rockabill to Dalkey Island SAC	Harbour porpoise (<i>Phocoena phocoena</i>) [1351], Reefs [1170]	E03, D03.02, H06.01, F02.02, J02.11, D02, J02.02	Discharges, shipping lanes, noise nuisance, noise pollution, professional active fishing, siltation rate changes, dumping, depositing of dredged deposits, utility and service lines, removal of sediments (mud...)
004006	North Bull Island SPA	Grey Plover (<i>Pluvialis squatarola</i>) [A141], Oystercatcher (<i>Haematopus ostralegus</i>) [A130], Shelduck (<i>Tadorna tadorna</i>) [A048], Wetland and Waterbirds [A999], Bar-tailed Godwit (<i>Limosa lapponica</i>) [A157], Curlew (<i>Numenius arquata</i>) [A160], Shoveler (<i>Anas clypeata</i>) [A056], Black-tailed Godwit (<i>Limosa limosa</i>) [A156], Pintail (<i>Anas acuta</i>) [A054], Redshank (<i>Tringa totanus</i>) [A162], Dunlin (<i>Calidris alpina</i>) [A149], Turnstone (<i>Arenaria interpres</i>) [A169], Black-headed Gull (<i>Chroicocephalus ridibundus</i>) [A179], Sanderling (<i>Calidris alba</i>) [A144], Light-bellied Brent Goose (<i>Branta bernicla hrota</i>) [A046], Knot (<i>Calidris canutus</i>) [A143], Teal (<i>Anas crecca</i>) [A052], Golden Plover (<i>Pluvialis apricaria</i>) [A140]	E01.01, F02.03.01, G02.01, D01.05, G03, D01.02, D03.02, E03, G01.01, G01.02, E01.04, E02	Continuous urbanisation, bait digging or collection, golf course, bridge, viaduct, interpretative centres, roads, motorways, shipping lanes, discharges, nautical sports, walking, horse-riding and non-motorised vehicles, other patterns of habitation, industrial or commercial areas
004016	Baldoyle Bay SPA	Ringed Plover (<i>Charadrius hiaticula</i>) [A137], Shelduck (<i>Tadorna tadorna</i>) [A048], Grey Plover (<i>Pluvialis squatarola</i>) [A141], Golden Plover (<i>Pluvialis apricaria</i>) [A140], Wetland and Waterbirds [A999], Light-bellied Brent Goose (<i>Branta bernicla hrota</i>) [A046], Bar-tailed Godwit (<i>Limosa lapponica</i>) [A157]	G02.01, F02.03.01, I01, A08, D01.02, K02.03, J02.01.02, G01.02, E01, F03.01	Golf course, bait digging or collection, invasive non-native species, fertilisation, roads, motorways, eutrophication (natural), reclamation of land from sea, estuary or marsh, walking, horse-riding and non-motorised vehicles, urbanised areas, human habitation, hunting
004024	Sandymount Strand/Tolka Estuary SPA	Ringed Plover (<i>Charadrius hiaticula</i>) [A137], Oystercatcher (<i>Haematopus ostralegus</i>) [A130], Bar-tailed Godwit (<i>Limosa lapponica</i>) [A157], Redshank (<i>Tringa totanus</i>) [A162], Light-bellied Brent Goose (<i>Branta bernicla hrota</i>) [A046], Wetland and Waterbirds [A999], Black-headed Gull (<i>Chroicocephalus ridibundus</i>) [A179], Dunlin (<i>Calidris alpina</i>) [A149], Common tern (<i>Sterna hirundo</i>) [A193], Sanderling (<i>Calidris alba</i>) [A144], Knot (<i>Calidris canutus</i>) [A143], Grey Plover (<i>Pluvialis squatarola</i>) [A141], Arctic tern (<i>Sterna paradisaea</i>) [A194],	G01.01, E01, D01.02, F02.03, G01.02, K02.03, J02.01.02, E02, F02.03.01, E03	Nautical sports, urbanised areas, human habitation, roads, motorways, leisure fishing, walking, horse-riding and non-motorised vehicles, eutrophication (natural), reclamation of land from sea, estuary or marsh, industrial or commercial areas, bait digging or collection, discharges

Site Code	Site Name	Qualifying Feature	Pressures Codes	Known Threats and Pressures
		Roseate Tern (<i>Sterna dougallii</i>) [A192]		
004040	Wicklow Mountains SPA	Peregrine falcon (<i>Falco peregrinus</i>) [A103], Merlin (<i>Falco columbarius</i>) [A098]	C01.03, G01.02, G03, D01.01, A04, B	Peat extraction, walking, horse-riding and non-motorised vehicles, interpretative centres, paths, tracks, cycling tracks, grazing, sylviculture, forestry
004113	Howth Head Coast SPA	Kittiwake (<i>Rissa tridactyla</i>) [A188]	J01, G01.02	Fire and fire suppression, walking, horse-riding and non-motorised vehicles
004117	Ireland's Eye SPA	Guillemot (<i>Uria aalge</i>) [A199], Razorbill (<i>Alca torda</i>) [A200], Cormorant (<i>Phalacrocorax carbo</i>) [A017], Kittiwake (<i>Rissa tridactyla</i>) [A188], Herring Gull (<i>Larus argentatus</i>) [A184]	F02.03, G01.02	Leisure fishing, walking, horse-riding and non-motorised vehicles
004172	Dalkey Islands SPA	Common tern (<i>Sterna hirundo</i>) [A193], Arctic tern (<i>Sterna paradisaea</i>) [A194], Roseate tern (<i>Sterna dougallii</i>) [A192]	G01.01, E01, G01.02, A04	Nautical sports, urbanised areas, human habitation, walking, horse-riding and non-motorised vehicles, grazing

Appendix II Qualifying Interests of SACs that have undergone assessment including summaries of current threats and sensitivities

Qualifying Interests	EU Code	Current threats to Qualifying Interests	Sensitivity of Qualifying Interests
Mudflats and sandflats not covered by seawater at low tide	[1140]	Aquaculture, fishing, bait digging, removal of fauna, reclamation of land, coastal protection works and invasive species, particularly cord-grass; hard coastal defence structures; sea-level rise.	Surface and marine water dependent. Moderately sensitive to hydrological change. Moderate sensitivity to pollution. Changes to salinity and tidal regime. Coastal development.
Reefs	[1170]	Professional fishing; taking for fauna; taking for flora; water pollution; climate change; and change in species composition.	Sensitive to disturbance and pollution.
Annual vegetation of drift lines	[1210]	Grazing; sand and gravel extraction; recreational activities; coastal protection works.	Overgrazing and erosion. Changes in management.
Vegetated sea cliffs of the Atlantic and Baltic coasts	[1230]	A number of significant pressures were identified, including trampling by walkers, invasive non-native species, gravel extraction, and sea-level and wave exposure changes due to climate change. There have been no significant losses in sea cliff habitat since the Directive came into force.	Land use activities such as tourism and/or agricultural practices. Direct alteration to the habitat or effects such as burning or drainage.
Salicornia and other annuals colonising mud and sand	[1310]	Invasive Species; erosion and accretion.	Marine water dependent. Medium sensitivity to hydrological change. Changes in salinity and tidal regime. Infilling, reclamation, invasive species.
Atlantic salt meadows (<i>Glaucopuccinellietalia maritimae</i>)	[1330]	Overgrazing; erosion; invasive species, particularly common cordgrass (<i>Spartina anglica</i>); infilling and reclamation.	Marine and groundwater dependent. Medium sensitivity to hydrological change. Changes in salinity and tidal regime. Overgrazing, erosion and accretion.
Harbour Porpoise (<i>Phocoena phocoena</i>)	[1351]	Pressures acting on the species in Irish waters mainly involve commercial vessel-based activities such as impacts arising from geophysical seismic exploration or from local/regional prey removal from fisheries.	Sensitive to disturbance, prey availability and pollution.
Otter (<i>Lutra lutra</i>)	[1355]	Decrease in water quality: Use of pesticides; fertilization; vegetation removal; professional fishing (including lobster pots and fyke nets); hunting; poisoning; sand and gravel extraction; mechanical removal of peat; urbanised areas; human habitation; continuous urbanization; drainage; management of aquatic and bank vegetation for drainage purposes; and canalization or modifying structures of inland water course.	Surface and marine water dependent. Moderately sensitive to hydrological change. Sensitivity to pollution.

Qualifying Interests	EU Code	Current threats to Qualifying Interests	Sensitivity of Qualifying Interests
Petalwort(<i>Petalophyllum ralfsii</i>)	[1395]	There are no significant impacts affecting this species.	None identified.
Mediterranean salt meadows (<i>Juncetalia maritimi</i>)	[1410]	Over-grazing by cattle or sheep; infilling and reclamation.	Marine and groundwater dependent. Medium sensitivity to hydrological change. Changes in salinity and tidal regime. Coastal development and reclamation.
Embryonic shifting dunes	[2110]	Natural erosion processes exacerbated by recreation and sand extraction. Coastal protection interfering with natural processes.	Overgrazing, and erosion. Changes in management.
Shifting dunes along the shoreline with white dunes (<i>Ammophila arenaria</i>)	[2120]	Recreation and coastal defences, which may interfere with local sediment dynamics.	Overgrazing, and erosion. Changes in management.
Fixed coastal dunes with herbaceous vegetation (<i>grey Dúnes</i>)	[2130]	Recreation; overgrazing and inappropriate grazing; non-native plant species, particularly sea buckthorn (<i>Hippophae rhamnoides</i>).	Overgrazing, and erosion. Changes in management.
Humid dunes slacks	[2190]	Agricultural improvement; overgrazing and inappropriate grazing; forestry; recreational activity.	Overgrazing, and erosion. Changes in management. Sensitive to hydrological change.
Oligotrophic waters containing very few minerals of sandy plains (<i>Littorelletalia uniflorae</i>)	[3110]	Nutrient enrichment; afforestation; waste water; invasive alien species; sport and leisure activities.	Surface and groundwater dependant. Highly sensitive to hydrological changes. Highly sensitive to pollution.
Natural dystrophic lakes and ponds	[3160]	Nutrient alterations; management shifts in the associated peatland habitat, afforestation; waste water; invasive alien species; sport and leisure activities.	Surface and groundwater dependant. Highly sensitive to hydrological changes. Highly sensitive to pollution
Northern Atlantic wet heaths with <i>Erica tetralix</i>	[4010]	Reclamation, afforestation and burning; overstocking; invasion by non-heath species; exposure of peat to severe erosion.	Surface and groundwater dependent. Highly sensitive to hydrological changes. Inappropriate management.
European dry heaths	[4030]	Afforestation, over burning, over-grazing, under-grazing and bracken invasion.	Moderately sensitive to hydrological change. Changes in management. Changes in nutrient status.
Alpine and Boreal heaths	[4060]	Abandonment; overgrazing; burning; outdoor recreation; quarries; communication networks; and wind farm developments.	Changes in management. Changes in nutrient or base status. Moderately sensitive to hydrological change.
Calaminarian grasslands of the Murawy galmanowa(<i>Violetalia calaminariae</i>)	[6130]	Land reclamation, afforestation; drainage; and infrastructural development.	Surface and groundwater dependent. Highly sensitive to hydrological changes. Inappropriate management.

Qualifying Interests	EU Code	Current threats to Qualifying Interests	Sensitivity of Qualifying Interests
Species-rich <i>Nardus</i> grasslands, on siliceous substrates in mountain areas (and submountain areas, in Continental Europe)	[6230]	Bracken encroachment, succession, inappropriate grazing, afforestation; drainage; and infrastructural development.	Erosion, overgrazing and recreation.
Blanket bogs (* if active bog)	[7130]	Land reclamation, peat extraction; afforestation; erosion and landslides triggered by human activity; drainage; burning and infrastructural development.	Surface and groundwater dependent. Highly sensitive to hydrological changes. Inappropriate management.
Petrifying springs with tufa formation (<i>Cratoneurion</i>)	[7220]	Ground water interactions, on site management activities.	Surface and groundwater dependant. Highly sensitive to hydrological changes. Highly sensitive to pollution.
Alkaline fens	[7230]	Land reclamation, peat extraction; afforestation; erosion and landslides triggered by human activity; drainage; burning and infrastructural development.	Surface and groundwater dependent. Highly sensitive to hydrological changes. Inappropriate management.
Siliceous scree of the montane to snow levels (<i>Androsacetalia alpinae</i> and <i>Galeopsietalia ladani</i>)	[8110]	Overgrazing, under grazing and succession were recorded as medium-importance pressures in this reporting period, and Structure and functions were again assessed as Inadequate, the trend is considered to be stable rather than improving. This change is due to improved knowledge and the habitat is considered to have been stable since before the last assessment.	Erosion, overgrazing and recreation.
Calcareous rocky slopes with chasmophytic vegetation	[8210]	Overgrazing; extractive industries; recreational activities and improved access.	Erosion, overgrazing and recreation.
Siliceous rocky slopes with chasmophytic vegetation	[8220]	Pressures associated with the non-native invasive species New Zealand willowherb (<i>Epilobium brunnescens</i>).	Erosion, overgrazing and recreation.
Old sessile oak woods with Ilex and Blechnum in the British Isles	[91A0]	The introduction of alien species; sub-optimal grazing patterns; general forestry management; increases in urbanisation and human habitation adjacent to oak woodlands; and the construction of communication networks through the woodland.	Changes in management. Changes in nutrient or base status. Introduction of alien species.

Appendix III Special Conservation Interests of SPAs that have undergone assessment including vulnerabilities of the SCIs

Special Conservation Interest (SCI) Species
Great cormorant (<i>Phalacrocorax carbo</i>) [A017]
Common shelduck (<i>Tadorna tadorna</i>) [A048]
Eurasian teal (<i>Anas crecca</i>) [A052]
Northern pintail (<i>Anas acuta</i>) [A054]
Northern shoveler (<i>Anas clypeata</i>) [A056]
Merlin (<i>Falco columbarius</i>) [A098]
Peregrine falcon (<i>Falco peregrinus</i>) [A103]
Eurasian oystercatcher (<i>Haematopus ostralegus</i>) [A130]
Ringed plover (<i>Charadrius hiaticula</i>) [A137]
European golden plover (<i>Pluvialis apricaria</i>) [A140]
Grey plover (<i>Pluvialis squatarola</i>) [A141]
Red knot (<i>Calidris canutus</i>) [A143]
Sanderling (<i>Calidris alba</i>) [A144]
Bar-tailed godwit (<i>Limosa lapponica</i>) [A157]
Eurasian curlew (<i>Numenius arquata</i>) [A160]
Common redshank (<i>Tringa totanus</i>) [A162]
Ruddy turnstone (<i>Arenaria interpres</i>) [A169]
Black-headed gull (<i>Larus ridibundus</i>) [A179]
Herring gull (<i>Larus argentatus</i>) [A184]
Black-legged kittiwake (<i>Rissa tridactyla</i>) [A188]
Roseate tern (<i>Sterna dougallii</i>) [A192]
Common tern (<i>Sterna hirundo</i>) [A193]
Arctic tern (<i>Sterna paradisaea</i>) [A194]
Common guillemot (<i>Uria aalge</i>) [A199]
Razorbill (<i>Alca torda</i>) [A200]

Vulnerabilities of Special Conservation Interests

- Bird species are particularly vulnerable to direct disturbance due to noise and/or vibration. These effects are localised, and disturbance effects are foreseen to be low at distances beyond 2km¹⁰.
- Direct habitat loss is a serious concern for bird species, as well as the reduction in habitat quality. Habitat degradation could occur through effects such as local enrichment due to agricultural practices or damage to habitat through activities such as trampling.
- Prey species diversity and availability is a key element of species conservation. Community dynamics and ecosystem functionality are complex concepts and require site specific information. The site synopsis and conservation objectives for the SPAs identified within the ZOI were used to identify any specific prey sensitivities.
- Availability of nesting/roosting habitat. Particularly for the Hen Harrier.
- Vegetation composition, structure and functionality.

Wetland and Waterbirds [A999] Direct land take is a common vulnerability to all sites; as well as significant water quality effects. The conservation objective of all SPAs designated for Wetland and Waterbirds is to maintain the favourable conservation condition of the wetland habitat as a resource for the regularly occurring migratory waterbirds using it.

¹⁰ SNH (2007) A Review of Disturbance Distances in Selected Bird Species: Scottish Natural Heritage; M. Ruddock & D.P. Whitfield