# **Screening for Appropriate Assessment**

# Proposed Residential Development at Coolaghknock Glebe, Kildare Town, Co. Kildare

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## **Executive Summary**

This *Screening for Appropriate Assessment* report has been prepared by NM Ecology Ltd on behalf of Kildare County Council regarding a proposed residential development at Coolaghknock Glebe, Kildare Town. The proposed social housing development will consist of approx. 131 residential units, a creche, and associated works.

In accordance with their obligations under the *European Communities (Birds and Natural Habitats) Regulations* 2011 (SI 477/2011), the competent authority must assess whether the proposed development could have 'likely significant effects' on any European sites. This document provides information to support an Appropriate Assessment screening exercise, including: a description of the proposed development, a map and list of European sites in the surrounding area, a review of potential source-pathway-receptor links, an appraisal of the suitability of the habitats for birds associated with nearby SPAs, and a screening conclusion.

There is no risk of direct impacts on European sites. Potential pathways for indirect impacts were considered, but none were found to be feasible. Habitats within the site are unsuitable for any of the species associated with nearby SPAs. Therefore, with regard to Article 42 (7) of the European Communities (Birds and Natural Habitats) Regulations 2011, it can be concluded that the proposed development will not be likely to have a significant effect on any European sites. The assessment can conclude at Stage 1 of the Appropriate Assessment process, and it is not necessary to proceed to Stage 2.

# 1 Introduction

# 1.1 Background to Appropriate Assessment

Approximately 14% of the land area of Ireland is included in the European Network of Natura 2000 sites (hereafter referred to as European sites), which includes Special Protection Areas (SPAs) to protect important areas for birds, and Special Areas of Conservation (SACs) to protect a range of habitats and species. Legislative protection for these sites is provided by the *European Council Birds Directive* (79/409/EEC) and *E.C. Habitats Directive* (92/43/EEC, as amended), which are jointly transposed into Irish law by the *European Communities (Birds and Natural Habitats) Regulations 2011* (SI 477/2011, as amended).

Regulation 42 (1) states that: "Screening for Appropriate Assessment of a plan or project for which an application for consent is received [...] shall be carried out by the public authority to assess, in view of best scientific knowledge and in view of the conservation objectives of the site, if that plan or project, individually or in combination with other plans or projects is likely to have a significant effect on [any European sites]." To ensure compliance with this regulation, planning authorities must screen all planning applications for potential impacts on European sites. Supporting information may be requested from the applicant to assist with this process.

This document provides information to support the competent authority's *Screening for Appropriate Assessment* exercise for the proposed development. It includes a description of the proposed development, a map and list of European sites in the surrounding area, a review of potential source-pathway-receptor links, and an appraisal of the suitability of the habitats for birds associated with nearby SPAs.

#### 1.2 Statement of authority

This report was written by Nick Marchant, the principal ecologist of NM Ecology Ltd. He has sixteen years of professional experience, including thirteen years as an ecological consultant, one year as a local authority biodiversity officer, and two years managing an NGO in Indonesia. He provides ecological assessments for developments throughout Ireland and Northern Ireland, including wind farms, infrastructural projects (roads, water pipelines, greenways, etc.), and a range of residential and commercial developments.

He has an MSc in Ecosystem Conservation and Landscape Management from NUI Galway and a BSc in Environmental Science from Queens University Belfast. He is a member of the Chartered Institute of Ecology and Environmental Management, and operates in accordance with their code of professional conduct.

#### 1.3 Methods

This report has been prepared with reference to the following guidelines:

- OPR Practice Note PN01: Appropriate Assessment Screening for Development Management (Office of the Planning Regulator 2021)
- Assessment of plans and projects significantly affecting Natura 2000 sites: Methodological guidance on the provisions of Article 6(3) and (4), (E.C., 2021)
- Appropriate Assessment of Plans and Projects in Ireland (Department of the Environment, Heritage and Local Government, 2009)
- Guidelines for Ecological Impact Assessment in the UK and Ireland: Terrestrial, Freshwater and Coastal (Chartered Institute of Ecology and Environmental Management, 2018)

A desk-based study was carried out using data from the following sources:

- Plans and specifications for the proposed development
- Qualifying interests / conservation objectives of European sites from www.npws.ie
- Bedrock, soil, subsoil, surface water and ground water maps from the Geological Survey
  of Ireland webmapping service (dcenr.maps.arcgis.com), the National Biodiversity Data
  Centre (http://maps.biodiversityireland.ie/), and the Environmental Protection Agency
  web viewer (gis.epa.ie/EPAMaps/)
- The *Kildare County Development Plan* 2023 2029, and details of permitted or proposed developments from the local authority's online planning records

Desktop data from internet resources was accessed between June and November 2023, and a multi-disciplinary ecological survey was carried out on 14 June 2023.

# 2 Description of the Project

# 2.1 Environmental setting

#### Site location and surroundings

The proposed development site (hereafter referred to as 'the Site') is located in a suburban area in the east of Kildare Town. It consists of agricultural grasslands surrounded by hedgerows and modern concrete walls. The north-western and south-western boundaries of the Site adjoin the Coolaghknock housing estate, and there are agricultural pastures on all other sides.

The broader surroundings are characterised by suburban housing, farmland (predominantly pastures and paddocks for horse husbandry, and some cattle grazing) and industrial facilities. The Curragh is located to the east of the Site.

#### Geology and soils

The underlying bedrock is limestone ('cherty often dolomitised limestone' on the GSI database), which is a regionally-important, karstified aquifer. Subsoils are limestone gravel, and soils are a fine loamy drift.

#### **Hydrology**

The EPA database of rivers and streams does not show any watercourses within or adjacent to the Site. None were observed during surveys.

One of the key characteristics of 'The Curragh' region is the high drainage capacity of its bedrock, subsoils and soils, which means that any rainwater soaks rapidly to ground. There are no rivers, streams or other waterbodies in the region.

The closest watercourse is the Tully Stream (a tributary of the River Barrow), which is approx. 1.8 km south of the Site at the closest point. Due to its distance from the Site and the presence of intervening buildings and roads, it can be concluded that the Site has no connection to the Tully Stream.

In summary, the Site has no connection to any watercourses.

# 2.2 Description of the proposed development

The proposed development will comprise 131 no. residential units and a creche. Road access will be from Connagh Road at the north-western boundary, and internal roads and parking areas will be provided. Public open space will be created in the south-west of the Site, and houses will have private gardens.

Foul water from the proposed development will be connected to a local authority pumping station in the south-west of the Site, which will convey it to the Kildare Town Waste Water Treatment Plant (WWTP). In the latest Annual Environmental Report for the WWTP, it is reported that the WWTP is operating within its organic capacity and hydraulic capacity, and the effluent is compliant with the Emission Limit Values in its wastewater discharge licence.

Rainwater runoff from roofs and other impermeable surfaces will be channelled to a detention basin in the south of the Site, and discharged at a controlled rate to an existing soakaway to the north of the pumping station. The system will include an oil and hydrocarbon interceptor.

# 3 Review of relevant European sites

In this section we identify European sites that could potentially be affected by the proposed development. The primary consideration is whether the proposed development is within the boundaries of any European sites, because this could lead to direct effects. This is discussed in Section 3.1.

It is also possible that the proposed development could cause indirect effects on European sites located outside the boundary. This is considered using the *source-pathway-receptor* model, which identifies potential *pathways* (e.g. surface water) between the *source* (the Site) and the *receptor* (a European site). This is discussed in Section 3.2.

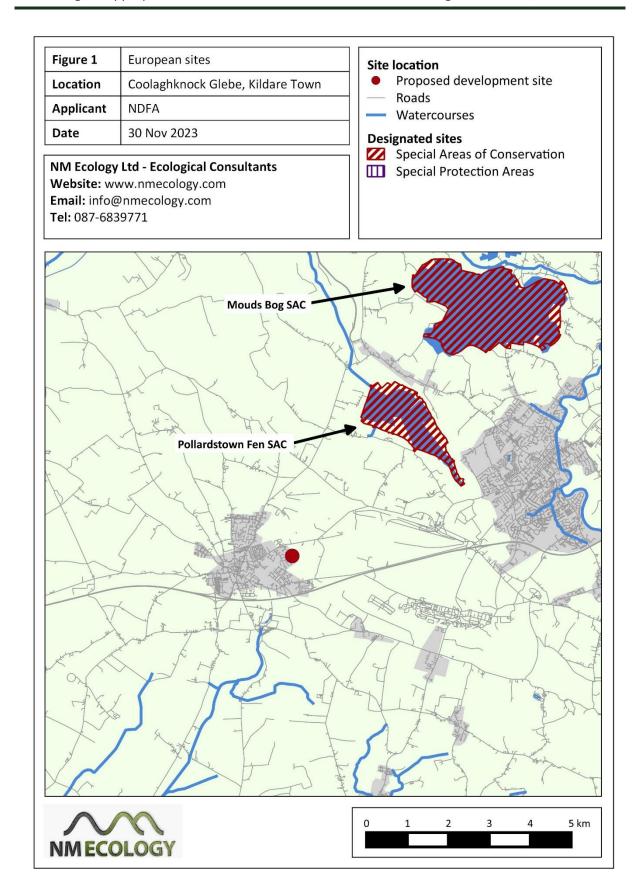
Some of the bird species associated with SPAs can use secondary habitats outside the SPA boundaries, e.g. brent geese feeding on urban grasslands. The suitability of habitats within the Site for SPA bird species is discussed in Section 3.3.

To support the above assessments, a map of European sites in the surrounding area is shown in Figure 1, and details of relevant European sites are provided in Table 1. For the avoidance of doubt, an arbitrary zone of influence (e.g. 15 km) has not been used for this assessment, as it is no longer considered to be best practice (OPR 2021).

Table 1: European site shown in Figure 1

Site Name	Distance	Reasons for designation
Pollardstown Fen SAC (site code 396)	3.7 km north-east	Annex I habitats: alkaline fens, calcareous fens with Cladium mariscus and species of the Caricion davallianae, petrifying springs with tufa formation
		Annex II species: Narrow-mouthed Whorl Snail Vertigo angustior, Desmoulin's Whorl Snail Vertigo moulinsiana, Geyer's Whorl Snail (Vertigo geyeri)
Mouds Bog SAC (2331)	6.2 km north-east	<b>Annex I habitats:</b> active raised bogs, degraded raised bogs still capable of natural regeneration, depressions on peat substrates of the Rhynchosporion
		Annex II species: N.A.

The Conservation Objectives of all European sites discussed in this report are available at https://www.npws.ie/protected-sites. They are lengthy and repetitive documents, so in the interests of brevity they are not reproduced here.



# 3.1 European sites within the Site boundary (potential direct effects)

The Site is not within or adjacent to any European sites (Figure 1). Therefore, the proposed development poses no risk of direct impacts on any European sites.

### 3.2 European sites outside the Site boundary (potential indirect effects)

In this section we identify potential *pathways* (e.g. surface water) between the *source* (the Site) and the *receptor* (a European site). The most common pathway is surface water, which typically occurs when a pollutant is washed into a river and carried downstream into a European site. Other potential pathways are groundwater, air (e.g. airborne dust or sound waves), or land (e.g. flow of liquids, vibration). The zone of effect for hydrological effects can be several kilometres, but for air and land it is rarely more than one hundred metres.

### Surface water

There are no rivers or streams within or adjacent to the Site (refer to Section 2.1 and Figure 1), so surface water can be ruled out as a pathway to any European sites.

#### Groundwater

The bedrock and soils underlying the Site are highly permeable and are similar to those underlying the Curragh, so it is likely that they are part of the same groundwater body. However, the proposed development will be residential, and will not involve any emissions to groundwater other than surface water outflow from the detention basin. Any material entering groundwater would be filtered and diluted in the 3.7 km of intervening subsoils / groundwater, reducing them to negligible concentrations before they would reach the *Pollardstown Fen* SAC. Therefore, groundwater can be ruled out as a feasible pathway.

#### Land

There is no risk that any pollutants could flow 3.7 km over land to reach the SAC.

### <u>Air</u>

The only potential airborne pollutant generated at the Site would be dust. There is no risk that any perceptible quantity of dust could be carried 3.7 km to the SAC.

#### **Summary**

In summary, no feasible pathways were identified between the Site and any European sites.

# 3.3 Habitat suitability for SPA birds

There are no SPAs in the vicinity of the Site. The closest is the *Poulaphouca Reservoir* SPA, which is located approx. 21 km east of the Site. At this distance there is no risk that any birds associated with the SPA could use the Site.

# 4 Screening Statement

In Section 3 of the OPR guidance (OPR 2021), it is stated that the first stage of the AA process can have two possible conclusions:

## 1. No likelihood of significant effects

Appropriate assessment is not required and the planning application can proceed as normal. Documentation of the screening process including conclusions reached and the basis on which decisions were made must be kept on the planning file.

## 2. Significant effects cannot be excluded

Appropriate assessment is required before permission can be granted. A Natura Impact Statement (NIS) will be required in order for the project to proceed.

Having considered the particulars of the proposed development, we conclude that this application meets the first conclusion, because there is no likelihood of significant impacts on any European sites. This is based on three key conclusions:

- The Site is not within or adjacent to any European sites, so there is no risk of direct effects
- There are no surface water, groundwater or other pathways linking the Site to any European sites, so there is no risk of indirect effects
- There are no SPAs in the vicinity of the Site

Appropriate Assessment Screening must consider the potential implications of a project both in isolation and in combination with other plans and projects in the surrounding area. An 'incombination effect' can occur when a project will have a perceptible but non-significant residual effect on a European site (when considered in isolation), that subsequently becomes significant when the additive effects of other plans and projects are considered. However, as the proposed development poses no risk of impacts on European sites in isolation, the risk of in-combination effects can also be ruled out.

Therefore, with regard to Article 42 (7) of the *European Communities (Birds and Natural Habitats) Regulations* 2011, it can be concluded that the proposed development will not be likely to have a significant effect on any European sites. The assessment can conclude at Stage 1 of the Appropriate Assessment process, and it is not necessary to proceed to Stage 2.

In accordance with the OPR 2021 guidance, we note that no mitigation measures have been considered when reaching this conclusion.

# References

Chartered Institute of Ecology and Environmental Management, 2018. *Guidelines for Ecological Impact Assessment in the U.K and Ireland: Terrestrial, Freshwater, Coastal and Marine* (2<sup>nd</sup> Edition). C.I.E.E.M., Hampshire, England.

Department of the Environment, Heritage and Local Government, 2009. *Appropriate Assessment of Plans and Projects in Ireland*. National Parks and Wildlife Service, DAHG, Dublin, Ireland.

European Commission. 2020. 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. Office for Official Publications of the European Communities, Luxembourg.

Office of the Planning Regulator 2021. *Practice Note PN01: Appropriate Assessment Screening for Development Management*. Available online at opr.ie