Screening for Appropriate Assessment

Proposed residential infill development at Carbury Dispensary site, Carbury, Co. Kildare

17th January 2023



NM Ecology Ltd - Consultant Ecologists 38 Maywood Avenue, Raheny, Dublin 5

Website: www.nmecology.com
Email: info@nmecology.com

Tel: 087-6839771

Executive Summary

This *Screening for Appropriate Assessment* report has been prepared by NM Ecology Ltd on behalf of Kildare County Council (the applicant) as part of a planning application for a residential infill development at Carbury Dispensary site. The proposed development will involve the construction of 5 dwellings, refurbishment of an existing structure as a community facility, and associated works.

In accordance with their obligations under the *European Communities* (*Birds and Natural Habitats*) *Regulations 2011* (SI 477/2011), Kildare County Council must assess whether the proposed development would be likely to have significant effects on any European sites. This document provides supporting information to assist the local authority with an Appropriate Assessment screening exercise, including: a description of the proposed development, details of its environmental setting, a map and list of European sites within the potential zone of impact, and consideration of potential source-pathway-receptor links.

The only European sites of relevance to this assessment are the *River Boyne and River Blackwater* SAC and the *River Boyne and River Blackwater* SPA, which are associated with a nearby watercourse. However, no feasible pathways for indirect impacts were identified to these or any other European sites. Therefore, we conclude that the proposed development poses no risk of direct or indirect impacts on any European sites, and that Appropriate Assessment is not required.

1 Introduction

1.1 Background to Appropriate Assessment

Approximately 10% 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 background information to assist the competent authority with a *Screening for Appropriate Assessment* exercise for the proposed development. It includes a description of the proposed development, a review of the Site's environmental setting, details of European sites within the potential zone of impact, an appraisal of source-pathway-receptor relationships, and an assessment of potential impacts.

1.2 Statement of authority

This report has been prepared by Nick Marchant, the principal ecologist of NM Ecology Ltd. He has fifteen years of professional experience, including eleven 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, infrastructure projects (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)
- Appropriate Assessment of Plans and Projects in Ireland (Department of the Environment, Heritage and Local Government, 2009)
- Assessment of plans and projects in relation to Natura 2000 sites Methodological guidance on Article 6(3) and (4) of the Habitats Directive 92/43/EEC, 2021
- Guidelines for Ecological Impact Assessment in the UK and Ireland: Terrestrial, Freshwater, Coastal and Marine (Chartered Institute of Ecology and Environmental Management, 2018)

In accordance with Section 3.2 of *Appropriate Assessment of Plans and Projects in Ireland*, the screening exercise was conducted using the following steps:

- Description of the project and local site characteristics
- Identification of relevant European sites, and compilation of information on their qualifying interests and conservation objectives
- Assessment of potential impacts upon European sites, including:
 - Direct impacts (e.g. loss of habitat area, fragmentation)
 - o Indirect impacts (e.g. disturbance of fauna, pollution of surface water)
 - o Cumulative / 'in-combination' effects associated with other concurrent projects
- Screening Statement with conclusions

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 2017-2023, and details of permitted or proposed developments from the local authority's online planning records

All web-based resources were accessed in October and November 2022.

2 Description of the Project

2.1 Environmental setting

The proposed development site (hereafter referred to as 'the Site') is located in the south of Carbury village. It currently consists of two unoccupied structures and a large garden.

The R402 road forms the southern boundary of the Site, and the main street of Carbury forms the western boundary. There is agricultural pasture to the north and east. The broader surroundings consist of Carbury village and agricultural land.

Geology and soils

The Site is underlain by limestone (dark limestone and shale) bedrock, which is a locally-important aquifer. Subsoils are limestone till, and soils are a fine loamy drift. As the bedrock and soils are well drained, it is expected that most rainwater on green areas of the Site would percolate to ground rather than flowing into surface water drainage features.

Hydrology

There are no rivers, streams or drainage ditches within the Site. The closest watercourse is the River Boyne, which is approx. 200 m east of the Site at the closest point. The river initially flows south, but then turns to the west. At Edenderry it turns north, and starts to flow north-east through county Meath, ultimately reaching the coast at Drogheda, approx. 110 km downstream of the Site.

Under the Water Framework Directive status assessments 2016 – 2021, the River Boyne is of Moderate status in the vicinity of the Site, and of variable condition over the remainder of its course downstream.

2.2 Description of the proposed development

The proposed development will involve the construction of 5 no. residential units, with designs ranging from one to three bedrooms. An existing structure will be refurbished and altered for use as a community facility. Road access will be from the west of the Site, and internal roads and shared parking areas will be provided. New dwellings will have private rear gardens, and the eastern half of the Site will be used as public open space.

Foul water will be discharged to an Irish Water foul sewer and conveyed to a public Waste Water Treatment Plant. Storm water from roofs and hard surfaces will be directed to a number of small soakaways throughout the Site. Other hard surfaces will be permeable, allowing rainwater to soak to ground.

3 Description of European sites

3.1 Identification of European sites within the zone of influence

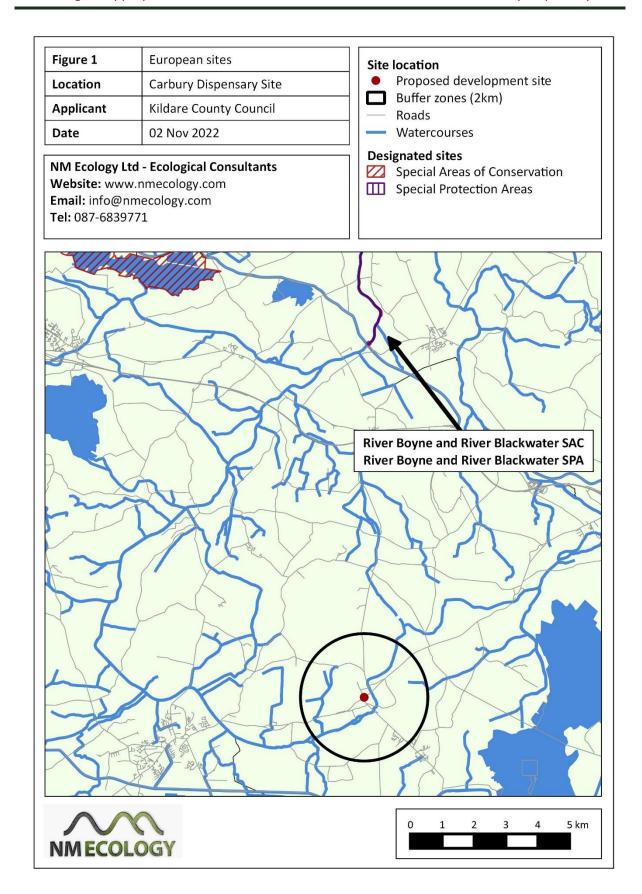
The Site is not located within or adjacent to any European sites. Potential indirect impacts were considered using the source-pathway-receptor model, and a distant surface water pathway to the *River Boyne and River Blackwater* SAC / SPA was identified. The location of the SAC and SPA is shown in Figure 1, and details are provided in Table 1. A buffer zone of 2 km is shown in Figure 1 to assist with the interpretation of scale.

Table 1: European sites of relevance to this assessment

Site Name	Distance	Reasons for designation
River Boyne and River Blackwater SAC (site code 2299)	25 km downstream	Annex I habitats: alkaline fens, alluvial forests Annex II species: otter, Atlantic salmon, river lamprey
River Boyne and River Blackwater SPA (4232)	25 km downstream	Annex I habitats: alkaline fens, alluvial forests

3.2 Conservation objectives

The standard conservation objective for all SACs and SPAs in Ireland is "to maintain or restore the favourable conservation condition of the qualifying interests for which the SAC / SPA has been selected". In addition, the Department of Housing, Local Government and Heritage has produced detailed conservation objectives for individual European sites. They can be viewed on the website of the National Parks and Wildlife Service (http://www.npws.ie/protected-sites), but are not reproduced here in the interests of brevity.



3.3 Identification of potential pathways for indirect impacts

Indirect impacts on European sites can only occur if there is a viable pathway between the source (the Site) and the receptor (the habitats and species for which a site has been designated). The most common pathway for impacts is surface water, for example if a pollutant is washed into a river, carried downstream, and subsequently reaches aquatic habitats or species in 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 impacts can be several kilometres, but for air and land it is rarely more than one hundred metres. An appraisal of potential pathways for impacts on the European sites referenced in Table 1 is provided below.

The *River Boyne and River Blackwater* SAC and the *River Boyne and River Blackwater* SPA are approx. 25 km downstream of the Site via the River Boyne. The SAC was designated to protect riparian habitats (forests and fens) and species (otter, salmon and river lamprey) throughout the catchments of the two rivers. The SPA was designated to protect populations of kingfisher along the rivers. There is a considerable degree of overlap between the SAC and SPA boundaries, so they are considered here in combination.

The Site is located approx. 200 m from the bank of the River Boyne, so it is unlikely that any pollutants generated during the construction of the proposed development could reach the river. Even if small quantities of pollutants reached the river, the 19 km of intervening watercourse would dilute any pollutants to negligible concentrations before they could reach the boundary of the SAC / SPA. On this basis, the river is not considered to provide a feasible surface water pathway to the SAC / SPA. A pathway via groundwater can be ruled out due to the filtration provided by intervening soils. Pathways via land or air can be ruled out due to distance.

In summary, no feasible pathways were identified to the *River Boyne and River Blackwater* SAC, *River Boyne and River Blackwater* SPA or any other European sites.

4 Conclusion of Stage 1: 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:

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 clearly no likelihood of direct or indirect impacts on any European sites. Therefore, with regard to Article 42 (7) of the *European Communities (Birds and Natural Habitats) Regulations 2011*, it can be excluded on the basis of objective scientific information following screening, that the plan or project, individually or in combination with other plans or projects, will have a significant effect on a European site. Appropriate Assessment is not required.

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 and Coastal* (2nd 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. 2021. Assessment of plans and projects in relation to Natura 2000 sites – Methodological guidance on 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