
Screening for Appropriate Assessment

Redevelopment of Kildare County Library,
Newbridge, Co. Kildare

30 March 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 the Kildare County Council (the applicant) for the redevelopment of Kildare County Library in Newbridge. The proposed development will involve the repair and renovation of the original library building (a protected structure), the demolition of a modern single-storey structure, and the construction of a new two-storey building, along with associated services and landscaping.

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 Natura 2000 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 Natura 2000 sites within the potential zone of impact, and consideration of potential source-pathway-receptor links.

There is no risk of direct impacts on Natura 2000 sites. Potential pathways for indirect impacts were considered, but none were found to be feasible. Therefore, we conclude that the proposed development will not cause direct or indirect impacts on any Natura 2000 sites, and thus 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, 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 Natura 2000 sites].*” To ensure compliance with this regulation, planning authorities must screen all planning applications for potential impacts on Natura 2000 sites. Supporting information may be requested from the applicant to assist with this process.

This document provides background information to assist the planning 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 Natura 2000 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 was written by Nick Marchant, the principal ecologist of NM Ecology Ltd. 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.

He has fourteen 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, infrastructural projects (roads, water pipelines, greenways, etc.), and a range of residential and commercial developments.

1.3 Methods

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

- *Appropriate Assessment of Plans and Projects in Ireland* (National Parks and Wildlife Service, 2009)
- *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., 2002*
- *Guidelines for Ecological Impact Assessment in the UK and Ireland: Terrestrial, Freshwater and Coastal* (Chartered Institute of Ecology and Environmental Management, 2018)

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

1. Description of the project and local site characteristics
2. Identification of relevant Natura 2000 sites, and compilation of information on their qualifying interests and conservation objectives
3. Assessment of potential impacts upon Natura 2000 sites, including:
 - Direct impacts (e.g. loss of habitat area, fragmentation)
 - Indirect impacts (e.g. disturbance of fauna, pollution of surface water)
 - Cumulative / 'in-combination' effects from other concurrent projects
4. Screening Statement with conclusions

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

- Plans and specifications provided by the project design team
- Qualifying interests / conservation objectives of Natura 2000 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 November and December 2021, and a site inspection was carried out on 15th November 2021.

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 an urban setting in the north-east of Newbridge. It currently contains two connected structures: the original 1930s two-storey library building (a protected structure), and a modern single-storey building. The rest of the Site consists of car parks, pavements and other artificial surfaces, with some ornamental shrubs near the entrance to the library.

The northern boundary of the Site is formed by Main Street (R445), and the eastern boundary by Athgarvan Road (R416). The Riverbank Arts Centre is located to the west of the Site, and there are residential properties to the south. The River Liffey is located approximately 40 m east of the Site.

Geology and soils

The Site is underlain by limestone (cherty, often dolomitised), which is a regionally-important gravel aquifer. Sub-soils are a mixture of limestone till and alluvium, and soils are made ground.

Hydrology

The River Liffey is approx. 40 m east of the Site. There are no other substantial watercourses (as per the EPA database of rivers and streams) in the vicinity of the Site (Figure 1).

The Liffey flows north-east through County Kildare towards Dublin City, and ultimately meets the coast at Dublin Bay approx. 60 – 70 km downstream of the Site. It is currently of Good status (Water Framework Directive Status Assessments 2013-2018) over much of its course, declining to Moderate status in some sections.

Existing site drainage

Almost all of the Site consists of buildings and hard surfaces. Rainwater flows into a network of gutters and drains, from which it is discharged to the River Liffey. Foul water is discharged to a combined sewer on Athgarvan Road.

2.2 Description of the proposed development

The proposed development will involve the repair and renovation of the original library building (a protected structure), the demolition of a single-storey structure, and the construction of a new two-storey building. Hard landscaping will be provided around the building.

Foul water will continue to be discharged to a local authority combined sewer on Athgarvan Road, and conveyed to the Osberstown Waste Water Treatment Works (part of the Upper Liffey Valley Sewerage Scheme). Surface water will continue to be discharged to the River Liffey.

2.3 Other nearby developments (potential in-combination effects)

The Site is in an urban setting in Newbridge. Under the *Kildare County Development Plan 2017-2023* it was included in Zone M2 'City/Town/Village Centre, central area'. The planning objective for this zone is "to provide for the development and improvement of appropriate town centre uses including retail, residential, commercial, and civic uses". The surrounding areas are long-established and settled, so they are unlikely to be subject to significant development pressure in the short term.

Nearby planning applications were reviewed on the online planning records of Kildare County Council. There is a live planning application approx. 30 m south of the Site for the demolition of an existing dwelling and construction of eight replacement apartments (planning reference 211388). At the time of writing in December 2021 Kildare County Council had requested further information on the development proposals, and a decision had not been made. With this exception, all other planning applications in the surrounding area were for small-scale developments such as residential extensions, which pose no risk of in-combination effects.

3 Description of Natura 2000 sites

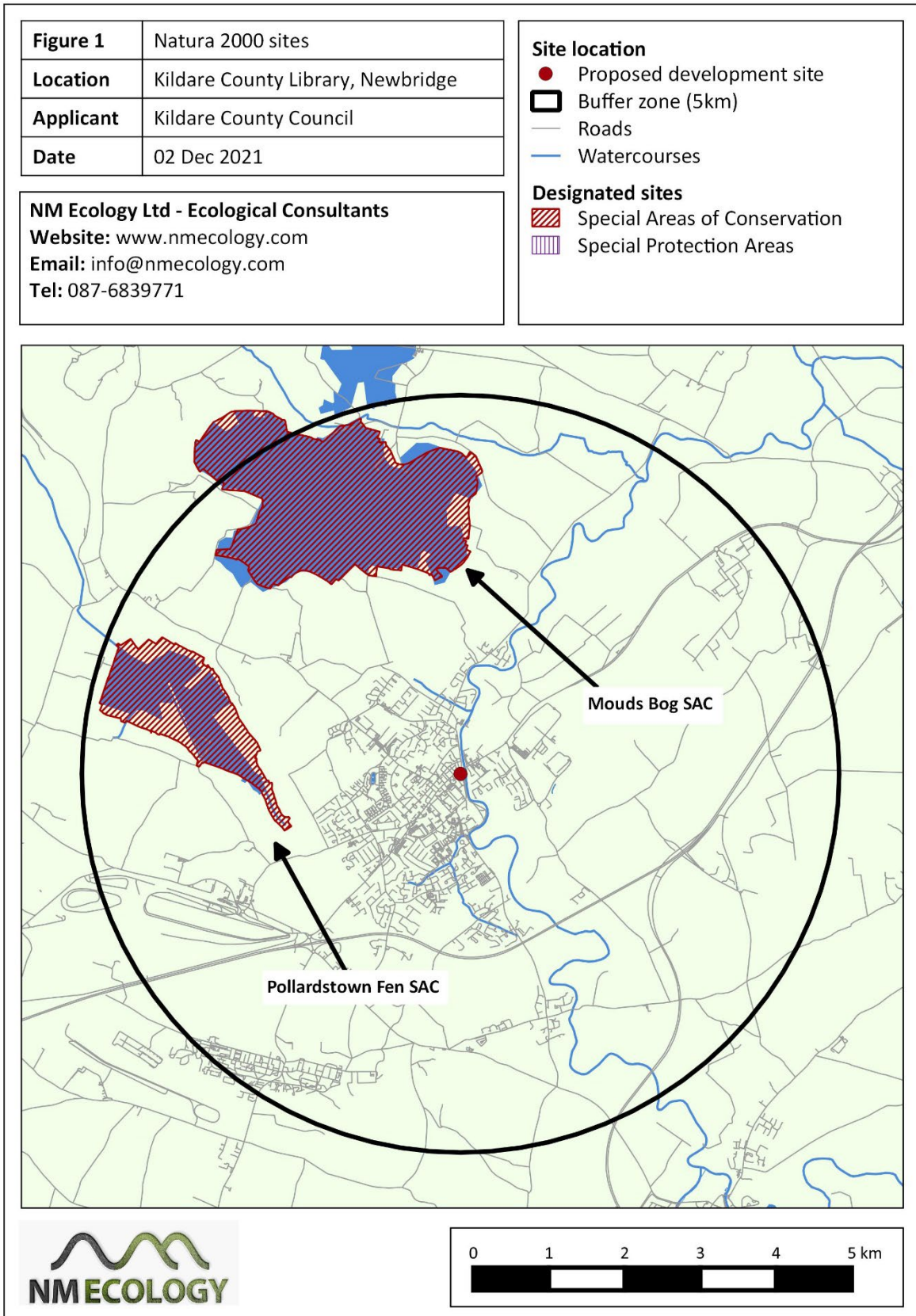
3.1 Identification of Natura 2000 sites within the zone of influence

The Site is not located within or adjacent to any Natura 2000 sites. Potential indirect impacts were considered within a zone of influence¹ of 5km. A map of nearby Natura 2000 sites is shown in Figure 1, and details of relevant sites are provided in Table 1.

Table 1: Natura 2000 sites within 5 km of the Site

Site Name	Distance	Qualifying Interests
Pollardstown Fen SAC (site code 396)	2.3 km west	Annex I habitats: Petrifying springs with tufa formation, Calcareous fens with <i>Cladium mariscus</i> , alkaline fens Annex II species: <i>Vertigo angustior</i> , <i>Vertigo geyeri</i> , <i>Vertigo moulinsiana</i> (both are species of whorl snail)
Mouds Bog SAC (2331)	2.5 km north	Annex I habitats: active raised bogs, degraded raised bogs still capable of natural regeneration, depressions on peat substrates of the Rhynchosporion

¹ We consider 5 km to be a proportionate zone of influence due to the moderate scale of the development and its urban setting.



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 the Natura 2000 sites listed in Table 1. 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 can occur if there is a viable pathway between the source (the Site) and the receptor (the habitats and species for which a Natura 2000 site has been designated). The most common pathway for impacts is surface water, e.g. if a pollutant is washed into a river and carried downstream into a Natura 2000 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 Natura 2000 sites is provided below. As part of this appraisal it is important to note that the Site consists almost entirely of buildings and hard surfaces, which alter natural surface water and groundwater processes. All rainwater on the Site is collected in gutters and drains and discharged to the River Liffey. This effectively isolates the Site from underlying groundwater.

The *Pollardstown Fen* SAC is located 2.3 km west of the Site. It has been designated to protect fen habitats (wetlands fed by mineral-rich water) and whorl snails that occupy these habitats. The *Mouds Bog* SAC is located 2.5 km north of the Site, and has been designated for the protection of raised bog and associated habitats. Neither SAC is associated with the River Liffey, so there is no surface water pathway. As discussed above, the existing surface water drainage network within the Site will negate any potential pathways via groundwater. Pathways via land or air can be ruled out due to the distances involved.

The River Liffey could potentially provide a very distant hydrological connection to some Natura 2000 sites in Dublin Bay. However, there is more than 60 km of intervening watercourse between the Site and Dublin Bay, so any pollutants would be reduced to negligible concentrations before they could reach the Natura 2000 sites. Therefore, this is not considered to be a viable surface water connection. All other pathways can be screened out due to the distances involved.

In summary, no potential pathways were identified to any Natura 2000 sites.

4 Assessment of potential impacts

4.1 Direct impacts

The Site is not located within or adjacent to any Natura 2000 sites, so there is no risk of habitat loss, fragmentation or any other direct impacts.

4.2 Indirect impacts

Potential changes in water quality (construction phase)

Construction works typically generate fine sediments, and may occasionally cause accidental spills of oil or other toxic chemicals, which can be harmful to aquatic / marine habitats and species. However, no potential pathways were identified between the Site and the SACs identified in Section 3, so there is no risk that pollutants from the construction site could cause significant negative impacts on any Natura 2000 sites, even in a worst-case scenario and in the absence of standard site-management measures.

Foul water discharge (operational phase)

Foul water from the proposed development will be discharged to a local authority foul sewer and treated in the Osberstown Waste Water Treatment Works, which is part of the Upper Liffey Valley Sewerage Scheme. The WWTW's latest Annual Environmental Report² on the EPA website was reviewed. It has a population equivalent of 130,000 and provides tertiary treatment, with a final discharge point into the River Liffey. The discharge was compliant with the ELVs set in the wastewater discharge licence, but a minor deterioration in water quality downstream of the discharge point has been identified; it is not known if is caused by the WWTP, so further monitoring is underway. It is the responsibility of Irish Water to ensure that adequate treatment of foul water is carried out, and that discharges of treated foul water do not have an impact on receiving waters.

Surface water discharge (operational phase)

Surface water from the development will be discharged to the River Liffey, as is currently the case. As noted above, there are no potential surface water pathways to any Natura 2000 sites.

² Annual Environmental Report 2020 for the Upper Liffey Valley Sewerage Scheme
http://epawebapp.epa.ie/licences/lic_eDMS/090151b2807deff1.pdf

4.3 Potential in-combination effects

One residential development was identified approx. 30 m south of the Site (refer to Section 2.3), which could potentially be constructed at the same time as the proposed development. A Screening for Appropriate Assessment report was not submitted as part of that application, and Kildare County Council has not yet carried out their screening assessment. However, the review of potential pathways in Section 3.3 of this document would also apply to the residential development, i.e. that there are no pathways linking it to any Natura 2000 sites. Therefore, we expect that the nearby development will pose no risk to Natura 2000 sites. On this basis, the risk of in-combination effects can be screened out.

5 Conclusion of Stage 1: Screening Statement

In Section 3.2.5 of *Appropriate Assessment of Plans and Projects in Ireland* (NPWS 2010), it is stated that the first stage of the AA process can have three possible conclusions:

1. AA is not required

Screening, followed by consultation and agreement with the NPWS, establishes that the plan or project is directly connected with or necessary to the nature conservation management of the site.

2. No potential for significant effects / AA is not required

Screening establishes that there is no potential for significant effects and the project or plan can proceed as proposed.

3. Significant effects are certain, likely or uncertain

The project must either proceed to the second stage of the AA process, or be rejected.

Having considered the particulars of the proposed development, we conclude that this application meets the second conclusion, because there is no risk of direct, indirect or in-combination effects on any Natura 2000 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. As a result, we conclude that Appropriate Assessment is not required.

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. 2002. *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