



**PROVISION OF INFORMATION TO SUPPORT SCREENING FOR APPROPRIATE ASSESSMENT
EDENDERRY LOCAL AREA PLAN 2017-2023**

OFFALY COUNTY COUNCIL



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1 INTRODUCTION

1.1 Appropriate Assessment Screening Report: Purpose and Process

Offaly County Council has commenced the preparation of the draft Edenderry Local Area Plan 2017-2023 (hereafter referred to as the “Plan”). This Plan, through a series of objectives and policies, will set out the vision and direction for the future development of the Edenderry area up to 2023.

Proposed land use plans and proposed variations must undergo a formal “test” or “screening” to ascertain whether they are likely to result in any significant adverse effects on specific sites designated for their nature conservation importance. These sites are those designated under the European Commission’s Natura 2000 network of sites (hereafter “European sites”¹). These sites are designated on the basis of the presence of certain habitats and species that are deemed to be of international importance. The Irish Government and local planning authorities have a legal obligation to protect these sites.

The EC Habitats and Birds Directives are the framework for the designation of these sites. The EC Habitats Directive requires the “screening” of plans and projects under Article 6(3). If the screening process results in a judgement that likely significant effects may occur or cannot be ruled out, then a more detailed ‘appropriate assessment’ (AA) is required.

Scott Cawley Ltd. was appointed by Offaly County Council to analyse the draft Plan during early stages of preparation and prepare an AA Screening Report to inform the draft Edenderry LAP.

2 EXISTING ENVIRONMENT

The Edenderry Local Area Plan 2017-2023 set out the vision and direction for the strategic future development of the town and its environs.

The town of Edenderry is located within the Boyne catchment and the Boyne sub-catchment. According to the EPA’s online Map Viewer, the River Boyne flows c. 300m to the north of the town, while the Grand Canal flows to the south. Numerous tributaries of the River Boyne such as the Kinnafad River and the Clonkeen River are located within the towns environs. The River Boyne flows in a north-westerly direction from Edenderry before changing course to the north-east and flowing towards Meath, before ultimately discharging to the Irish Sea, to the east of Drogheda. The waters of the River Boyne are also of moderate (Q3-4) quality both upstream and downstream of Edenderry as measured at the EPA’s monitoring stations at “Boyne Bridge” and “Kinnafad Bridge”.

The water quality of the Boyne Estuary is of intermediate quality, while the Boyne Estuary Plume Zone is currently regarded as unpolluted. As such, there have been no breaches of the EPA’s threshold values for nutrient enrichment, accelerated plant growth, or disturbance of

¹ Natura 2000 sites are defined under the Habitats Directive (Article 3) as a European ecological network of special areas of conservation composed of sites hosting the natural habitat types listed in Annex I and habitats of the species listed in Annex II. The aim of the network is to aid the long-term survival of Europe’s most valuable and threatened species and habitats. In Ireland these sites are designed as *European sites* - defined under the Planning Acts and/or Birds and Habitats Regulations as (a) a candidate site of Community importance, (b) a site of Community importance, (c) a candidate special area of conservation, (d) a special area of conservation, (e) a candidate special protection area, or (f) a special protection area. They are commonly referred to in Ireland as candidate Special Areas of Conservation (cSACs) and Special Protection Areas (SPAs).

the level of dissolved oxygen normally present under the EPA's "Trophic Status Assessment Scheme" classification (EPA 2010) in the Boyne Estuary Plume Zone.

The subject lands are located within the Trim groundwater body. According to the EPA Envision Map Viewer this groundwater body is described as '*productive fissured bedrock*'. According to GSI Map Viewer, the level of vulnerability to groundwater contamination from human activities ranges from '*moderate*' to '*extreme*' and '*rock at or near the surface*'. It is also described as a '*locally important aquifer- bedrock which is moderately productive only in local zones*'. The bedrock of the area is classified as '*Dinantian upper impure limestones*' and '*Dinantian pure unbedded limestones*'.

3 IDENTIFICATION OF EUROPEAN SITES, GENERIC THREATS AND PRESSURES

As part of the analysis of the proposed Plan, all European sites (SACs and SPAs) within the zone of influence of the Plan's boundary were identified. Any Natural Heritage Areas (NHAs) and proposed Natural Heritage Areas (pNHAs) which were deemed to act as connecting features to European Sites were identified. NHAs, pNHAs and other designated sites such as Nature Reserves, Wildfowl Sanctuaries and Ramsar sites do not form part of the European site network, however they often provide an important supporting role to the network, particularly when it comes to fauna species which often do not obey site boundaries. A list of all European sites, NHAs and pNHAs located within the Plan's Zone of Influence can be found in Section 3.1.

Threats and pressures to the integrity of the European sites and hence the sensitivities of the Qualifying Interests (QI) and Special Conservation Interests (SCI) of the European sites within the zone of influence of the Plan have been identified. Threats and pressures for QI bird species were extracted from "*Annex 2: Bird Species' status and trends reporting format for the period 2008-2012*" (NPWS, 2008), while those for habitats and protected species (except birds) were taken from "*The Status of EU Protected Habitats and Species in Ireland: Habitat Assessments Volume 2, Version 1.1*" (NPWS, 2013) and "*The Status of EU Protected Habitats and Species in Ireland: Species Assessments Volume 3, Volume 1.1*" (NPWS, 2013). Information on the parameters contributing to achieving and/or maintaining favourable conservation condition were largely compiled from a range Site Specific Conservation Objectives (SSCOs) downloaded from the NPWS website, but is also based on professional judgement. Generic threats and pressures to key environmental and ecological conditions required for QIs/SCIs can be found in Section 3.1 also.

3.1 European Sites

The analyses identified 5 SACs and one SPA within 15km of the Plan's boundary –

- The Long Derries, Edenderry SAC
- Mount Hevey Bog SAC
- River Boyne and Blackwater SAC
- Ballynafagh Bog SAC
- Ballynafagh Lake SAC
- River Boyne and Blackwater SPA

Figure 1 shows all European sites within 15km of the Plan boundary. Information regarding these European Sites located within 15km of the Plan are outlined in Table 2.1.1.

Table 2.1.1. European Sites within 15km of the Plan.

European Sites within 15km of the Draft Plan			
Site Code	Special Areas of Conservation	Site Code	Special Protection Areas
Sites within 15km of Draft Plan's Boundary			
000925	The Long Derries, Edenderry SAC	004232	River Boyne and Blackwater SPA
002342	Mount Hevey Bog SAC		
002299	River Boyne and Blackwater SAC		
001387	Ballynafagh Lake SAC		
000391	Ballynafagh Bog SAC		

The Qualifying Interests of the European Sites within 15km of the Plan boundary are presented in Table 2.1.2 below.

Table 2.1.2 Qualifying Interests of European sites within the Plan's Zone of Influence

Qualifying Interests of European sites within the Plan's Zone of Influence	
Site Name:	The Long Derries, Edenderry SAC
Site Code:	000925
Distance:	c. 4km south-east of the Plan boundary
Qualifying Interests:	<ul style="list-style-type: none"> Semi-natural dry grasslands and scrubland facies on calcareous substrates (<i>Festuco Brometalia</i>) (* important orchid sites)* [6210]
Source: NPWS (2016) <i>Generic Conservation Objectives for The Long Derries, Edenderry SAC [000925]</i> (15/08/2016)	
Site Name:	Mount Hevey Bog SAC
Site Code:	002342
Distance:	c. 13km north of the Plan boundary
Qualifying Interests:	<ul style="list-style-type: none"> Active raised bogs [7110] Degraded raised bogs still capable of natural regeneration [7120] Depressions on peat substrates of the <i>Rhynchosporion</i> [7150]
Source: NPWS (2016) <i>Conservation Objectives: Mount Hevey Bog SAC 002342. Version 1.</i> (21/03/2016)	
Site Name:	River Boyne and Blackwater SAC
Site Code:	002299
Distance:	c. 13.2km north-east of the Plan boundary
Qualifying Interests:	<ul style="list-style-type: none"> Alkaline fens [7230] Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i> (Alno-Padion, Alnion incanae, Salicion albae) [91E0] River Lamprey (<i>Lampetra fluviatilis</i>) [1099] Salmon (<i>Salmo salar</i>) [1106] Otter (<i>Lutra lutra</i>) [1355]
Source: NPWS (2016) <i>Generic Conservation Objectives for River Boyne and River Blackwater SAC [002299]</i> (15/08/2016)	
Site Name:	Ballynafagh Lake SAC
Site Code:	001387
Distance:	c. 15km south-west of the Plan boundary
Qualifying Interests:	<ul style="list-style-type: none"> Alkaline fens [7230] Desmoulin's Whorl Snail (<i>Vertigo moulinsiana</i>) [1016] Marsh Fritillary (<i>Euphydryas aurinia</i>) [1065]
Source: NPWS (2016) <i>Generic Conservation Objectives: Ballynafagh Lake SAC. [001387]</i> (15/08/2016)	
Site Name:	Ballynafagh Bog SAC
Site Code:	000391
Distance:	c. 15km south-west of the Plan boundary
Qualifying Interests:	<ul style="list-style-type: none"> Active raised bogs [7110] Degraded raised bogs still capable of natural regeneration [7120] Depressions on peat substrates of the <i>Rhynchosporion</i> [7150]
Source: NPWS (2015) <i>Conservation Objectives: Ballynafagh Bog SAC. Version 1. [000391]</i> (10/11/2015)	
Site Name:	River Boyne and Blackwater SPA

Site Code:	004232
Distance:	c. 13.2km north-east of the Plan boundary
Qualifying Interests:	<ul style="list-style-type: none"> ▪ Kingfisher (<i>Alcedo atthis</i>) [A229]
Source: NPWS (2016) <i>Generic Conservation Objectives for River Boyne and River Blackwater SPA</i> [004232] (15/08/2016)	

Sites of national importance were also considered throughout this screening exercise. Four NHA sites and 7 pNHA sites are located within the Plan's zone of influence. These sites were considered as they were deemed to provide connectivity to European sites. These sites are presented in Table 2.1.3 below.

Table 2.1.3 Proposed Natural Heritage Areas within the zone of influence of the Plan

Natural Heritage Areas and proposed Natural Heritage Areas within the Zone of Influence of the Plan		
Site Code	Natural Heritage Areas (NHAs)	Distance from Plan's Boundary
000570	Black Castle Bog NHA	c. 2.8km north-west
001388	Carbury Bog NHA	c. 5.2km north-east
001393	Hodgestown Bog NHA	c. 15km south-west
001582	Molerick Bog NHA	c. 13.8km north-west
Site Code	proposed Natural Heritage Areas (pNHAs)	Distance from Plan's Boundary
000925	The Long Derries, Edenderry pNHA	c. 3.7km south-west
002104	Grand Canal pNHA	<i>Within the LAP boundary</i>
000390	Ballina Bog pNHA	c. 10km north-east
002103	Royal Canal pNHA	c. 12.6km north- east
001387	Ballynafagh Lake pNHA	c. 15km south-west
000391	Ballynafagh Bog pNHA	c. 15km south-west
002342	Mount Hevey Bog pNHA	c. 13.8km north

The ecological interest of these national sites are outlined in Table 2.1.4 below while a map of these sites is presented in Figure 2 (overleaf).

Table 2.1.4 Ecological Interests of National sites within the Plan's zone of influence boundary

Ecological Interests of National sites within the ELAP's Zone of Influence	
Site Name:	Black Castle Bog NHA
Site Code:	000570
Ecological Interest:	<ul style="list-style-type: none"> Black Castle Bog NHA is a site of considerable conservation significance, comprising as it does, a raised bog, a rare habitat in the E.U. and one that is becoming increasingly scarce and under threat in Ireland. This site also supports a wide range of habitats, especially associated with the cutover areas.
Source: NPWS (2002) <i>Site Synopsis for Black Castle Bog NHA [000570] (14/11/2002)</i>	
Site Name:	Carbury Bog NHA
Site Code:	001388
Ecological Interest:	<ul style="list-style-type: none"> Carbury Bog NHA is a site of considerable conservation significance comprising of raised bog, a rare habitat in the E.U. and one that is becoming increasingly scarce and under threat in Ireland. This site supports a good diversity of raised bog microhabitats including some hummock/hollow complexes, scrub and marginal deciduous woodland which add to the diversity and scientific value of the site. The Red Data Book species, Round-leaved Wintergreen has been recorded on this site. This site is only one of a few remaining raised bog habitats in Co Kildare.
Source: NPWS (2002) <i>Site Synopsis for Carbury Bog NHA [001388] (15/11/2002)</i>	
Site Name:	Hodgestown Bog NHA

Site Code:	001393
Ecological Interest:	<ul style="list-style-type: none"> ▪ Hodgestown Bog NHA is a site of considerable conservation significance comprising as it does a raised bog, a rare habitat in the E.U. and one that is becoming increasingly scarce and under threat in Ireland. ▪ This site supports a good diversity of raised bog microhabitats, including hummocks.
Source: NPWS (2002) <i>Site Synopsis for Hodgestown Bog NHA [001393] (15/11/2002)</i>	
Site Name:	Molerick Bog NHA
Site Code:	001582
Ecological Interest:	<ul style="list-style-type: none"> ▪ Molerick Bog NHA is a site of conservation significance comprising as it does a raised bog, a rare habitat in the E.U. and one that is becoming increasingly scarce and under threat in Ireland. ▪ This site is located in Co. Meath at the eastern extreme of raised bogs in Ireland and is one of only four raised bogs in the county.
Source: NPWS (2002) <i>Site Synopsis for Molerick Bog NHA [001582] (14/11/2002)</i>	
Site Name:	The Long Derries, Edenderry pNHA
Site Code:	000925
Ecological Interest:	<ul style="list-style-type: none"> ▪ The Long Derries is of botanical importance due to the presence of good quality dry, calcareous grassland, an interesting gravel pit flora and the presence of three rare plant species, two of which are legally protected. ▪ The presence of an interesting transition habitat from esker to peatland, and a varied bird population, including the rare Nightjar and Partridge, adds to the importance of the site. ▪ The site is a Special Area of Conservation (SAC) selected for the following habitats and/or species listed on Annex I / II of the E.U. Habitats Directive: Orchid-rich Calcareous Grassland*[6210].
Source: NPWS (2013) <i>Site Synopsis for The Long Derries, Edenderry SAC [000925] (24/09/2013)</i>	
Site Name:	Grand Canal pNHA
Site Code:	002104
Ecological Interest:	<ul style="list-style-type: none"> ▪ The ecological value of the canal lies more in the diversity of species it supports along its linear habitats than in the presence of rare species. ▪ It crosses through agricultural land and therefore provides a refuge for species threatened by modern farming methods. ▪ The rare and legally protected Opposite-leaved Pondweed (<i>Groenlandia densa</i>) (Flora Protection Order 1987) is present at a number of sites in the eastern section of the Main Line, between Lowtown and Ringsend Basin in Dublin. ▪ The Smooth Newt (<i>Lissotriton vulgaris</i>) breeds in the ponds on the bank at Gollierstown in Co. Dublin. ▪ Otter spraints are found along the towpath, particularly where the canal passes over a river or stream.
Source: NPWS (2009) <i>Site Synopsis for the Grand Canal pNHA [002104] (09/12/2009)</i>	
Site Name:	Ballina Bog pNHA
Site Code:	000390
Ecological Interest:	<ul style="list-style-type: none"> ▪ Despite the presence of many drains, the condition of the vegetation and surface makes this bog of considerable scientific importance. It is one of the most easterly raised bogs which are relatively intact.

Source: NPWS (2009) <i>Site Synopsis for Ballina Bog pNHA [000390] (05/11/2009)</i>	
Site Name:	Royal Canal pNHA
Site Code:	002103
Ecological Interest:	<ul style="list-style-type: none"> ▪ The ecological value of the canal lies more in the diversity of species it supports along its linear habitats than in the presence of rare species. ▪ It crosses through agricultural land and therefore provides a refuge for species threatened by modern farming methods. ▪ The rare and legally protected Opposite-leaved Pondweed (<i>Groenlandia densa</i>) (Flora (Protection) Order 2015) is present at one site in Dublin, between Locks 4 and 5. ▪ <i>Tolypella intricata</i> (a stonewort listed in the Red Data Book as being vulnerable) is also in the Royal Canal in Dublin, the only site in Ireland where it is now found. ▪ Otter spraints are found along the towpath, particularly where the canal passes over a river or stream.
Source: NPWS (2009) <i>Site Synopsis for the Grand Canal pNHA [002103] (09/12/2009)</i>	
Site Name:	Ballynafagh Lake pNHA
Site Code:	001387
Ecological Interest:	<ul style="list-style-type: none"> ▪ Although originally a reservoir, Ballynafagh Lake has developed a very natural vegetation with some interesting plant communities, including alkaline fen, a habitat that is listed on Annex I of the E.U. Habitats Directive. ▪ The site supports a high diversity of molluscan species, with some rare species recorded, including <i>Vertigo moulinsiana</i>, a species that is listed on Annex II of the E.U. Habitats Directive. ▪ The site is also of ornithological importance. ▪ A wide diversity of insects is also found at Ballynafagh Lake, including the Marsh Fritillary butterfly, a species listed on Annex II of the E.U. Habitats Directive.
Source: NPWS (2013) <i>Site Synopsis for Ballynafagh Lake SAC [001387] (11/10/2013)</i>	
Site Name:	Ballynafagh Bog pNHA
Site Code:	000391
Ecological Interest:	<ul style="list-style-type: none"> ▪ Ballynafagh Bog is of conservation importance as it contains examples of the Annex 1 habitats active raised bog, degraded raised bog and <i>Rhynchosporion</i> vegetation. ▪ The site is within the territory of a breeding pair of Merlin, a species listed on Annex I of the E.U. Birds Directive. Several pairs of Curlew and Snipe breed on the bog. Scrub species such as Stonechat, Redpoll and Long-tailed Tit occur on the cut-away.
Source: NPWS (2013) <i>Site Synopsis for Ballynafagh Bog SAC [000391] (20/08/2013)</i>	
Site Name:	Mount Hevey Bog pNHA
Site Code:	002342
Ecological Interest:	<ul style="list-style-type: none"> ▪ Mount Hevey Bog is a site of considerable conservation significance as it comprises a raised bog, a rare habitat in the E.U. and one that is becoming increasingly scarce and under threat in Ireland. ▪ The site supports a good diversity of raised bog microhabitats, including hummock/hollow complexes, pools, flushes and regenerating cutover, as well as a number of scarce plant species. ▪ Active raised bog is listed as a priority habitat on Annex I of the E.U. Habitats Directive.

Source: NPWS (2014) *Site Synopsis for Mount Hevey Bog SAC [002342]* (09/01/2014)

Legend

- Edenderry LAP Boundary
- Proposed Natural Heritage Area (pNHA)
- Natural Heritage Area (NHA)

Fig. 2. National Sites within 15km of the LAP boundary

Scale: 1:350,000 @ A4

Drawn: CK Approved: PS Rev. No.: 00 Date: 27/03/2017

3.2 Threats and Pressures

The threats to, and pressures on, the integrity of the European sites, as obtained from relevant published NPWS materials are displayed below (Table 2.2.1), followed by generic threats and pressures specific to their Qualifying Interests. Those in bold would be regarded to be potential consequences of implementing the proposed Plan.

Table 3.2.1 Threats and Pressures

Threats and Pressures	
Site Specific Threats/Pressures:	
Site Name:	River Boyne and Blackwater SAC
Site Code:	002299
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Other Sport/Leisure Complexes ▪ Human induced changes in hydraulic conditions ▪ Tree surgery, felling for public safety, removal of roadside trees ▪ Disposal of industrial waste ▪ Industrial or commercial areas ▪ Roads and motorways ▪ Other discharges ▪ Invasive non-native species ▪ Other human intrusions and disturbances ▪ Management of aquatic and bank vegetation for drainage purposes ▪ Bridge, viaduct ▪ Other human induced changes in hydraulic conditions ▪ Pollution to surface waters (limnic, terrestrial, marine and brackish) ▪ Removal of hedges and copses of scrub ▪ Use of biocides, hormones and chemicals ▪ Cultivation ▪ Outdoor sports and leisure activities, recreational activities ▪ Stock feeding ▪ Artificial planting on open ground (non-native trees) ▪ Sand and gravel extraction ▪ Other patterns of habitation ▪ Fertilisation ▪ Storage of materials
Source: NPWS (undated) <i>NATURA 2000- Standard Data Form for River Boyne and River Blackwater SAC [002299]</i>	
Site Name:	Mount Hevey Bog SAC
Site Code:	002342
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Landfill, land reclamation and drying out, general ▪ Invasive, non-native species ▪ Mechanical removal of peat ▪ Paths, tracks, cycling tracks ▪ Parasitism ▪ Disposal of household / recreational facility waste ▪ Canalisation & water deviation ▪ Railway lines, TGV ▪ Introduced genetic material, GMO
Source: NPWS (undated) <i>NATURA 2000- Standard Data Form for Mount Hevey Bog SAC [002342]</i>	
Site Name:	The Long Derries, Edenderry SAC
Site Code:	000925
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Forest planting on open ground ▪ Dispersed habitation ▪ Sand and gravel extraction

	<ul style="list-style-type: none"> ▪ Hunting ▪ Removal of hedges and copses or scrub ▪ Trampling, overuse ▪ Disposal of inert materials ▪ Motorised vehicles ▪ Roads, motorways ▪ Paths, tracks, cycling tracks ▪ Grazing ▪ Railway lines, TGV ▪ Storage of materials
Source: NPWS (undated) <i>NATURA 2000- Standard Data Form for The Long Derries, Edenderry SAC [000925]</i>	
Site Name:	Ballynafagh Lake SAC
Site Code:	001387
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Grazing ▪ Leisure fishing
Source: NPWS (undated) <i>NATURA 2000- Standard Data Form for Ballynafagh Lake SAC [001387]</i>	
Site Name:	Ballynafagh Bog SAC
Site Code:	000391
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Forest planting on open ground ▪ Peat extraction ▪ Improved access to site ▪ Other patterns of habitation ▪ Gliding, delta plane, paragliding, ballooning ▪ Fire and fire suppression
Source: NPWS (undated) <i>NATURA 2000- Standard Data Form for Ballynafagh Bog SAC [000391]</i>	
Site Name:	River Boyne and River Blackwater SPA
Site Code:	004232
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Roads and motorways ▪ Human induced changes in hydraulic conditions ▪ Discontinuous urbanisation ▪ Urbanised areas, human habitation
Source: NPWS (undated) <i>NATURA 2000- Standard Data Form for the River Boyne and Blackwater SPA [004232]</i>	
Habitat Specific Threats/Pressures:	
Habitat Name:	Alkaline fens [7230]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Water abstractions from groundwater ▪ Reclamation of land from sea, estuary or marsh ▪ Diffuse groundwater pollution due to agriculture and forestry activities ▪ Abandonment of pastoral systems, lack of grazing ▪ Water abstractions from surface waters ▪ Infilling of ditches, dykes, pond, pools, marshes or pits ▪ Invasive non-native species ▪ Diffuse pollution to surface waters due to agricultural and forestry activities ▪ Peat extraction ▪ Artificial planting on open ground (non-native trees) ▪ Restructuring agricultural land holding ▪ Roads, motorways ▪ Disposal of household/ recreational facility waste ▪ Disposal of inert materials ▪ Changes in abiotic conditions
Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Habitat Assessments Volume 2. Version 1.1.</i>	
Habitat Name:	Alluvial forests with <i>Alnus glutinosa</i> and <i>Fraxinus excelsior</i> (Alno-Padion, <i>Alnus incanae</i> , <i>Salix albae</i>) [91E0]

Threats/Pressures:	<ul style="list-style-type: none"> ▪ Invasive non-native species ▪ Problematic native species ▪ Garbage and solid waste ▪ Grazing in forests/ woodland
Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Habitat Assessments Volume 2. Version 1.1.</i>	
Habitat Name:	Active raised bogs [7110]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Water abstractions from groundwater ▪ Peat extraction ▪ Artificial planting on open ground (non-native trees) ▪ Fire and fire suppression ▪ Mining and quarrying ▪ Invasive non-native species ▪ Problematic native species ▪ Grazing ▪ Motorised vehicles
Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Habitat Assessments Volume 2. Version 1.1.</i>	
Habitat Name:	Degraded raised bogs still capable of natural regeneration [7120]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Water abstractions from groundwater ▪ Peat extraction ▪ Artificial planting on open ground (non-native trees) ▪ Fire and fire suppression ▪ Mining and quarrying ▪ Invasive non-native species ▪ Problematic native species ▪ Grazing ▪ Motorised vehicles
Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Habitat Assessments Volume 2. Version 1.1.</i>	
Habitat Name:	Depressions on peat substrates of the <i>Rhynchosporion</i> [7150]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Non-intensive sheep grazing ▪ Artificial planting on open ground (non-native species) ▪ Hand cutting of peat ▪ Mechanical removal of peat ▪ Air pollution, air-borne pollutants ▪ Invasive non-native species ▪ Burning down existing vegetation ▪ Water abstractions from groundwater ▪ Erosion ▪ Changes in abiotic conditions ▪ Changes in biotic conditions
Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Habitat Assessments Volume 2. Version 1.1.</i>	
Habitat Name:	Semi-natural dry grasslands and scrubland facies on calcareous substrates (<i>Festuco Brometalia</i>) (* important orchid sites)* [6210]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Species composition change (succession) ▪ Problematic native species ▪ Fertilisation ▪ Intensive cattle grazing ▪ Walking, horse-riding and non-motorised vehicles ▪ Garbage and solid waste ▪ Intensive horse grazing ▪ Stock feeding ▪ Abandonment of pastoral systems, lack of grazing ▪ Agricultural intensification

Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Habitat Assessments Volume 2. Version 1.1.</i>	
Species Specific Threats/Pressures:	
Species Name:	River Lamprey (<i>Lampetra fluviatilis</i>) [1099]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Dredging/ removal of limnic sediments ▪ Siltation rate changes, dumping, depositing of dredged deposits ▪ Reduction in migration/ migration barriers ▪ Other point source pollution to surface waters ▪ Invasive non-native species ▪ Diffuse pollution to surface waters due to agricultural and forestry activities ▪ Bait digging/collection
Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Species Assessments Volume 3. Version 1.1.</i>	
Species Name:	Salmon (<i>Salmo salar</i>) [1106]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Agricultural intensification ▪ Intensive sheep grazing ▪ Fertilisation ▪ Artificial planting on open ground (non-native trees) ▪ Forest replanting (non-native trees) ▪ Use of fertilisers (forestry) ▪ Peat extraction ▪ Disposal of household/ recreational facility waste ▪ Disposal of industrial waste ▪ Intensive fish farming, intensification ▪ Poaching ▪ Pollution to surface waters by industrial plants ▪ Diffuse pollution to surface waters due to agricultural and forestry activities ▪ Diffuse pollution to surface waters due to household sewage and waste waters ▪ Invasive non-native species ▪ Modification of hydrographic functioning, general ▪ Water abstraction from surface waters ▪ Management of aquatic and bank vegetation for drainage purposes ▪ Predation ▪ Threats and pressures from outside the Member State
Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Species Assessments Volume 3. Version 1.1.</i>	
Species Name:	Otter (<i>Lutra lutra</i>) [1355]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Roads and motorways ▪ Professional passive fishing ▪ Pollution to surface waters (limnic & terrestrial, marine & brackish)
Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Species Assessments Volume 3. Version 1.1.</i>	
Species Name:	Kingfisher (<i>Alcedo atthis</i>) [A229]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Pollution to surface waters (limnic & terrestrial, marine & brackish) ▪ Invasive non-native species ▪ Human induced changes in hydraulic conditions ▪ Outdoor sports and leisure activities, recreational activities ▪ Agricultural activities not referred to above ▪ Roads, paths and railroads

Source: http://cdr.eionet.europa.eu/Converters/run_conversion?file=ie/eu/art12/envuvesya/IE_birds_reports-14328-144944.xml&conv=343&source=remote#A206_B	
Species Name:	Desmoulin's Whorl Snail (<i>Vertigo moulinsiana</i>) [1016]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Abandonment of pastoral systems, lack of grazing ▪ Shipping lanes ▪ Reclamation of land from sea, estuary or marsh ▪ Infilling of ditches, dykes, ponds, pools, marshes or pits ▪ Landfill, land reclamation and drying out, general ▪ Management of aquatic and bank vegetation for drainage purposes ▪ Species composition change (succession) ▪ Dredging/ removal of limnic sediments
Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Species Assessments Volume 3. Version 1.1.</i>	
Species Name:	Marsh Fritillary (<i>Euphydryas aurinia</i>) [1065]
Threats/Pressures:	<ul style="list-style-type: none"> ▪ Agricultural intensification ▪ Abandonment of pastoral systems, lack of grazing ▪ Species composition change (succession) ▪ Forest planting on open ground ▪ Missing or wrongly directed conservation measures ▪ Anthropogenic reduction of habitat connectivity ▪ Peat extraction
Source: (NPWS, 2013) <i>The Status of EU Protected Habitats and Species in Ireland. Species Assessments Volume 3. Version 1.1.</i>	

Following on from the identification of the main threats and pressures to the integrity of the European Sites within the zone of influence, these threats and pressures were grouped into impact types. Impact types were determined by the nature of activities (relevant to the Plan) which could potentially result in such impacts occurring, e.g. agricultural and rural activities may lead to grazing. A summary of the main pressures and threats with regard to impact types is presented in Table 3.2.2 below.

Table 3.2.2 Summary of Pressures and Threats on QIs/SCIs in the zone of influence of the Plan

Summary of Pressures and Threats on QIs/SCIs in the zone of influence of the Plan	
Agricultural and Rural activities	
<ul style="list-style-type: none"> • Agricultural intensification • Intensive sheep grazing • Fertilisation • Artificial planting on open ground (non-native trees) • Forest replanting (non-native trees) • Use of fertilisers (forestry) • Peat extraction • Grazing • Grazing in forests/ woodland • Diffuse groundwater pollution due to agriculture and forestry activities • Abandonment of pastoral systems, lack of grazing • Discontinuous urbanisation • Forest planting on open ground • Dispersed habitation • Hunting 	<ul style="list-style-type: none"> • Intensive fish farming, intensification • Poaching • Diffuse pollution to surface waters due to agricultural and forestry activities • Intensive cattle grazing • Intensive horse grazing • Stock feeding • Non-intensive sheep grazing • Hand cutting of peat • Mechanical removal of peat • Infilling of ditches, dykes, pond, pools, marshes or pits • Restructuring agricultural land holding • Cultivation • Removal of hedges and copses of scrub • Use of biocides, hormones and chemicals • Agricultural activities not referred to above • Removal of hedges and copses or scrub

Economic and Infrastructure Development, Communications and Energy Network Development	
<ul style="list-style-type: none"> Roads, paths and railroads Roads and motorways Disposal of industrial waste Pollution to surface waters by industrial plants Mining and quarrying Reclamation of land from sea, estuary or marsh Urbanised areas, human habitation Sand and gravel extraction Landfill, land reclamation and drying out, general 	<ul style="list-style-type: none"> Diffuse pollution to surface waters due to household sewage and waste waters Management of aquatic and bank vegetation for drainage purposes Dredging/ removal of limnic sediments Canalisation & water deviation Railway lines, TGV Industrial or commercial areas Bridge, viaduct Management of aquatic and bank vegetation for drainage purposes Shipping lanes
Tourism, Recreation and Leisure	
<ul style="list-style-type: none"> Outdoor sports and leisure activities, recreational activities Professional passive fishing Disposal of household/ recreational facility waste Bait digging/collection Tree surgery, felling for public safety, removal of roadside trees 	<ul style="list-style-type: none"> Walking, horse-riding and non-motorised vehicles Trampling, overuse, Paths, tracks, cycling tracks Other Sport/Leisure Complexes Gliding, delta plane, paragliding, ballooning
Other	
<ul style="list-style-type: none"> Pollution to surface waters (limnic & terrestrial, marine & brackish) Invasive non-native species Human induced changes in hydraulic conditions Siltation rate changes, dumping, depositing of dredged deposits Reduction in migration/ migration barriers Other point source pollution to surface waters Fire and fire suppression Motorised vehicles Disposal of inert materials Human induced changes in hydraulic conditions Other discharges Other human intrusions and disturbances Pollution to surface waters (limnic, terrestrial, marine and brackish) Human induced changes in hydraulic conditions Anthropogenic reduction of habitat connectivity Improved access to site 	<ul style="list-style-type: none"> Modification of hydrographic functioning, general Water abstraction from surface waters Predation Threats and pressures from outside the Member State Species composition change (succession) Problematic native species Garbage and solid waste Air pollution, air-borne pollutants Burning down existing vegetation Water abstractions from groundwater Erosion Changes in abiotic conditions Changes in biotic conditions Other patterns of habitation Storage of materials Parasitism Introduced genetic material, GMO Other human induced changes in hydraulic conditions Missing or wrongly directed conservation measures Other patterns of habitation

4 OVER-ARCHING POLICIES & OBJECTIVES CONTAINED WITHIN THE OFFALY COUNTY DEVELOPMENT PLAN (2014-2020)

The following “protective” policies and objectives were extracted from the Offaly County Development Plan (2014-2020). They are regarded as the strategic policies and objectives

for the County and will be implemented in the Edenderry Local Area Plan. In this way measures in the County Development Plan which set out to protect ecological networks and resources will, through the planning hierarchy, help to prevent any adverse effects on European sites (and their supporting networks) which may arise as a result of implementing the proposed Edenderry Local Area Plan.

Chapter 2: Economic Development Strategy

RDP-15: *It is Council policy to ensure that agricultural developments are designed and constructed in a manner that will ensure that watercourses and sources of potable water are protected from the threat of pollution in line with Water Quality Regulations and the requirements of the Water Framework Directive.*

RDO-04: *It is an objective of the Council to ensure that all agricultural activities adhere to any legislation on water quality and biodiversity e.g. Phosphorus Regulations, Water Framework Directive, Nitrates Directive and Habitats Directive.*

TP-12: *It is Council policy to recognise the value of the Slieve Blooms as an area of natural beauty with considerable recreation value and potential for diverse opportunities for the tourism industry. The Council acknowledges the designation of the Slieve Blooms as a cSAC and SPA and will only support opportunities where it can be demonstrated that they will not result in significant effects to the conservation objectives of the Slieve Bloom European Sites.*

TO-05: *It is an objective of the Council to facilitate the development of a tourism resource using cutaway peatlands in conjunction with Bord na Móna and Fáilte Ireland, subject to environmental considerations and nature designations.*

TO-10: *It is an objective of the plan to promote the existing educational and amenity facilities at Clara Bog and Lough Boora and their expansion, subject to appropriate assessment and environment.*

Chapter 3: Energy Strategy

EP-03: *It is Council policy to encourage the development of wind energy in suitable locations, on cutaway bogs within the wind energy development areas open for consideration identified in Map 3.2, in an environmentally sustainable manner and in accordance with Government policy, having particular regard to the Wind Energy Strategy for the County and Section 3.5.1, which states that appropriate buffers should be provided, which shall be a minimum of 2km from Town and Village Cores, European designated sites, including Special Areas of Conservation (SAC) and Special Protection Areas (SPA), and national designations, Natural Heritage Areas (NHA). Wind Energy developments on cutaway bogs should generally be developed from the centre out. The Area around Corracullin Bog, (Area 4 in Wind Energy Strategy), is omitted from the Wind Energy Development Area.*

EP-02: *It is Council policy to facilitate the continual development of renewable energy sources having regard to the proper planning and sustainable development of the area concerned, the protection of amenities, landscape sensitivities, European Sites, biodiversity, natural heritage, and built heritage, and where such proposals comply with policy contained in the County Development Plan, in the interests of proper planning and sustainable development.*

Chapter 4: Infrastructure & Environment Strategy

STAP-06: *It is Council policy to promote walking and cycling, subject to appropriate environmental assessments, including Habitats Directive Assessment, as an alternative mode of transport for travelling to work and for recreational purposes, to require the provision of cycle ways and walkways and associated facilities as part of new development and to support safer walking and cycling routes to schools under the Green Schools Initiative where feasible.*

EnvP-02: *It is Council policy to comply with the provisions of the EU Water Framework Directive in order to fulfil obligations relating to water quality in the county and to implement the provisions of the River Basin Management Plans i.e. Eastern River Basin District, Shannon River Basin District and South East River Basin District. To this end, the Council will continue to co-operate with other statutory authorities / agencies and stakeholders in the preparation and implementation of existing water quality monitoring and management plans and also implementation of River Basin District Management Plans. In the assessment of development proposals due regard shall be given to the requirements of the plans.*

EnvP-10: *It is Council policy to apply and enforce where appropriate, relevant EU and Irish environmental legislation. Permitted developments shall be required to comply with all such legislation.*

Chapter 7: Heritage & Landscape

NHP-01: *It is Council policy to prohibit any development that would be harmful to or that would result in a significant deterioration of habitats and/or disturbance of species in a Special Protection Area (SPA), Special Area of Conservation (SAC) and candidate Special Area of Conservation (cSAC), Natural Heritage Area (NHA) and Proposed Natural Heritage Area (pNHA), that are listed in tables 7.2.3, 7.2.5, 7.2.1 and 7.2.2 (and also future additions to these lists).*

NHP-02: *It is the policy of the Council to ensure an Appropriate Assessment in accordance with Article 6(3) and Article 6(4) of the Habitats Directive, and in accordance with the Department of Environment, Heritage and Local Government Appropriate Assessment of Plans and Projects in Ireland – Guidance for Planning Authorities, 2009 and relevant EPA and European Commission guidance documents, is carried out in respect of any plan or project not directly connected with or necessary to the management of the site but likely to have a significant effect on a European site(s), either individually or in combination with other plans or projects, in view of the site's conservation objectives.*

NHP-04: *It is Council policy to ensure that development proposals are screened to determine whether they are likely to have a significant direct, indirect or cumulative effect on the integrity or conservation objectives of any European Site and, where significant effects are likely or uncertain, there will be a requirement for consultation with the relevant environmental authorities as part of any Habitats Directive Assessment that may be required.*

NHP-08: *It is Council policy to protect, conserve and enhance the county's biodiversity and natural heritage including wildlife (flora and fauna), habitats, landscapes and/or landscape features of importance to wildlife or which play a key role in the conservation and management of natural resources such as water.*

NHP-09: *It is Council policy to promote the protection and preservation of existing hedgerows and to encourage planting of native hedgerow species. It is also Council policy to encourage the replanting and extension of the treescape within the county (in particular mixed forests and broadleaf forests) in order to ensure the preservation and enhancement of this attractive element of County Offaly's landscape.*

NHP-11: *It is Council policy to conserve, protect and enhance where possible wildlife habitats such as rivers, streams, canals, lakes, and associated wetlands including reed-beds and swamps, ponds, springs, bogs, fens, trees, woodlands and scrub, hedgerows and other boundary types such as stone walls and ditches which occur outside of designated areas providing a network of habitats and corridors essential for wildlife to flourish.*

NHP-22: *It is Council policy to encourage, pursuant to Article 10 of the Habitats Directive, the management of features of the landscape, such as traditional field boundaries, important for the ecological coherence of the Natura 2000 site(s) network and essential for the migration, dispersal and genetic exchange of wild species.*

5 CONCLUSION ON LIKELY SIGNIFICANT EFFECTS OF THE PLAN

Following an examination, analysis and evaluation of the relevant information, including in particular, the nature of the Plan and its potential relationship with European sites, as well as considering other plans and projects, and applying the precautionary principle, it is the professional opinion of the authors of this report that it is possible to rule out likely significant effects on all European sites. This judgement has been reached for the reasons outlined below.

The AA screening process has identified that 6 European Sites lie within the potential zone of influence of the Local Area Plan; The Long Derries, Edenderry SAC, River Boyne and River Blackwater SAC, Ballynafagh Bog SAC, Ballynafagh Lake SAC, Mount Hevey Bog SAC and River Boyne and River Blackwater SPA. These European Sites are not deemed to be at risk of likely significant effects from the proposed Plan due to the distance between the Plan and the European sites. Of the six European sites within 15km of the LAP boundary, five of them lie over 13km from the site. This distance is regarded to be far enough so as to warrant any effects to be imperceptible within the sites.

The remaining site, The Long Derries, Edenderry SAC, lies c. 4km south-east of the Plan boundary. This site is designated for semi-natural grassland habitats. There is no impact pathway between the LAP area and this European site. Considering this and the distance between the other five European sites, as mentioned above, no significant impacts on European sites are predicted as a result of implementing the proposed Plan.

For these reasons, it is the professional opinion of the authors of this report that the Edenderry Local Area Plan 2017-2023 does not require an Appropriate Assessment.

References

Council of the European Communities (1992) *Council Directive of 21 May 1992 on The Conservation of Natural Habitats and of Wild Fauna and Flora (92/43/EEC)*. O. J. L 206/35, 22 July 1992.

European Parliament and European Council (2009) *Directive 2009/147/EC of 30th November 2009 on the Conservation of Wild Birds (2009/147/EC)*. O.J. L20/7, 26th January 2010.

Environmental Protection Agency (2011) EPA ENVision Service (internet-based environmental information portal). Available online at: <http://gis.epa.ie/Envision>

Geological Survey of Ireland (2011) *GSI Datasets Public Viewer*. Available online at <http://www.gsi.ie>

Offaly County Council (2014). *Offaly County Development Plan 2014-2020*.

NPWS (undated). *NATURA 2000- Standard Data Form for River Boyne and River Blackwater SAC [002299]*

NPWS (undated). *NATURA 2000- Standard Data Form for Mount Hevey Bog SAC [002342]*

NPWS (undated). *NATURA 2000- Standard Data Form for The Long Derries, Edenderry SAC [000925]*

NPWS (undated). *NATURA 2000- Standard Data Form for Ballllynafagh Lake SAC [001387]*

NPWS (undated). *NATURA 2000- Standard Data Form for Ballllynafagh Bog SAC [000391]*

NPWS (undated). *NATURA 2000- Standard Data Form for the River Boyne and Blackwater SPA [004232]*

NPWS (2002a). *Site Synopsis for Black Castle Bog NHA [000570] (14/11/2002)*

NPWS (2002b). *Site Synopsis for Carbury Bog NHA [001388] (15/11/2002)*

NPWS (2002c). *Site Synopsis for Hodgestown Bog NHA [001393] (15/11/2002)*

NPWS (2002d). *Site Synopsis for Molerick Bog NHA [001582] (14/11/2002)*

NPWS (2008). *Annex 2: Bird Species' status and trends reporting format for the period 2008-2012*. Available online at: http://cdr.eionet.europa.eu/Converters/run_conversion?file=ie/eu/art12/envuvesya/IE_birds_reports-14328-144944.xml&conv=343&source=remote#A206_B

NPWS (2009a). *Site Synopsis for the Grand Canal pNHA [002104] (09/12/2009)*

NPWS (2009b). *Site Synopsis for Ballina Bog pNHA [000390] (05/11/2009)*

NPWS (2009c). *Site Synopsis for the Grand Canal pNHA [002103] (09/12/2009)*

NPWS (2013a). *Site Synopsis for Ballllynafagh Lake SAC [001387] (11/10/2013)*

NPWS (2013b). *Site Synopsis for Ballllynafagh Bog SAC [000391] (20/08/2013)*

NPWS (2013c). *The Status of EU Protected Habitats and Species: Species Assessment. Volume 3. Version 1.1*

NPWS (2013). *Site Synopsis for The Long Derries, Edenderry SAC [000925] (24/09/2013)*

NPWS (2014). *Site Synopsis for Mount Hevey Bog SAC [002342] (09/01/2014)*

NPWS (2015). *Conservation Objectives: Ballllynafagh Bog SAC. Version 1. [000391] (10/11/2015)*

NPWS (2016a). *Conservation Objectives: Mount Hevey Bog SAC 002342. Version 1. (21/03/2016)*

NPWS (2016b). *Generic Conservation Objectives for The Long Derries, Edenderry SAC [000925] (15/08/2016)*

NPWS (2016c). *Generic Conservation Objectives for River Boyne and River Blackwater SAC* [002299] (15/08/2016)

NPWS (2016d). *Generic Conservation Objectives: Ballynafagh Lake SAC.* [001387] (15/08/2016)

NPWS (2016e). *Generic Conservation Objectives for River Boyne and River Blackwater SPA* [004232] (15/08/2016)