

13 Natural Heritage and Biodiversity

Aim: To protect, conserve and manage natural heritage in a sustainable manner ensuring that the future economic growth and development of Athy complements its natural setting.

13.1 Background

Natural heritage or biodiversity (biological diversity) refers to the variety of all living things, including plants, animals and their habitats as well as the physical and geological foundation that forms the landscape. Biodiversity is vital for the supply of clean air and water, healthy soils, food, building materials, and medicines. The conservation of biodiversity and natural heritage is an integral part of good environmental management and sustainable development.

There is a great diversity of natural and semi-natural habitats in Athy, in particular, groups of trees, grassland areas, river and canal habitats and riparian habitat. Athy boasts significant designated sites within the town development boundary. A sustainable approach to protecting conserving and enhancing this natural heritage resource is proposed.

13.2 Strategy

The following principles will guide the Council's natural heritage and bio-diversity policies and objectives set out in this Plan:

- To promote a reasonable balance between conservation measures and development objectives in the interests of promoting the orderly and sustainable development of Athy.
- To protect national important sites including the Special Area of Conservation (River Barrow) and

the proposed Natural Heritage Area (the Grand Canal).

- To mitigate the impacts to natural heritage, where it cannot be avoided.
- To promote appropriate habitat enhancement as an integral part of any development.
- To avoid undue negative effects upon the natural environment.

13.3 Policy Context-National/Local

While legislative provision exists governing the protection of important habitats and species, there are also a number of policy documents, which seek to protect and enhance natural heritage and promote the enhancement of biodiversity.

13.3.1 National Biodiversity Plan (2002)

The National Biodiversity Plan recognises that conservation and enhancement of biological diversity is essential for sustainable development, and for maintaining the quality of life. A key target of the Plan is to halt biodiversity loss by 2010.

13.3.2 County Biodiversity Plan (2009-2013)

The County Biodiversity Plan was adopted in November 2008. The National Biodiversity Plan recognises the key role of local authorities in promoting and delivering the conservation of biodiversity and recommends the preparation of local biodiversity plans. The County Biodiversity Plan provides a framework for conserving biodiversity and natural heritage at a local level. The Biodiversity Plan focuses on gathering information on and managing

the biodiversity resource, education/awareness raising and the promotion of effective cooperation between stakeholders. The Biodiversity Plan complements the County Heritage Plan by including detailed actions to deliver positive outcomes focussed on species and habitats.

13.3.3 Legislative Context

Ireland has signed and ratified a number of international conventions and agreements including the Convention on Biological Diversity, the Convention on the Conservation of European Wildlife and Natural Habitats (Bern) and the Convention on Wetlands of International Importance (Ramsar). These various obligations are given legal effect through both European and National legislation.

13.4 Designated Sites

European and national legislation protects the most valuable of our natural heritage areas. At European level, Natura 2000 sites form a network of protected areas throughout the European Union and comprise Special Areas of Conservation (SAC) designated under the EU Habitats Directive and Special Protection Areas (SPAs), designated under the EU Birds Directive. Local authorities are required to ensure that an appropriate assessment of the implications of proposals affecting designated conservation sites is undertaken in respect of developments requiring planning permission. This applies to all development proposals, irrespective of location, likely to impact on these sites.

At national level, the Wildlife Act 1976 and the Wildlife (Amendment) Act 2000 are the principal statutory provisions for the protection of wildlife (both flora and fauna) and the control of activities which may impact adversely on the conservation of wildlife. Under the Wildlife (Amendment) Act 2000, Natural Heritage Areas (NHAs) are designated to conserve species and

habitats of national importance and sites of geological interest.

The designation of these sites at a national level is the responsibility of the National Parks and Wildlife Service of the Department of Environment, Heritage and Local Government. The designation of these sites is an ongoing process as boundaries are revised and adjusted and new sites added.

At present there are two important designated biodiversity sites within the Athy area. The Grand Canal is designated as a proposed Natural Heritage Area and the River Barrow is listed as a Special Area of Conservation.

13.4.1 The River Barrow (cSAC)

The River Barrow is protected under National and EU legislation by way of its designation as a proposed Natural Heritage Area (pNHA) – (site number 00858) and a candidate Special Area of Conservation (cSAC) – (site number 02162). The site is of considerable conservation significance given the occurrence of good examples of habitats and of populations of plant and animal species that are listed in Annexes I and II of the E.U. Habitats Directive respectively. Furthermore the River Barrow is of high conservation value for the populations of bird species that use it. The occurrence of several Red Data Book plant species add further interest to this site.

13.4.2 Conservation within Natura 2000 Designated Sites – Appropriate Assessment

Articles 6 (3) and 6 (4) of the Habitats Directive require an Appropriate Assessment of any plan or project whether within or outside a designated Natura 2000 site, which does not directly relate to the management of the site but may impact upon its conservation objectives.

The assessment should be based on best scientific knowledge, and carried out by a

person with ecological expertise. It should address the potential impacts of the plan or project on the conservation objectives of any Natura 2000 site. The impact assessed must include the indirect and cumulative impacts of approving the plan or project, together with any current or proposed activities, developments or policies impacting on the site. The potential impacts of policies outside Natura 2000 sites but potentially impacting upon them (known as 'ex situ' impacts) must also be included in the assessment. Guidelines issued by DoEHLG in 2009 entitled *Appropriate Assessment of Plans and Projects in Ireland, Guidance for Planning Authorities*, or any amendments of these guidelines, should be referenced in this regard.

A project or plan may only proceed if it can be concluded on the basis of Appropriate Assessment that there will be no adverse effects on the integrity of a Natura 2000 site. If adverse effects are likely, or in cases of doubt, then derogation under Article 6 (4) shall apply, but only in cases of imperative reasons of over-riding public interest.

13.4.3 The Grand Canal (pNHA)

The Grand Canal is a man-made waterway linking the River Liffey in Dublin with the Shannon at Shannon Harbour and the Barrow at Athy. The Grand Canal system is protected under National legislation by way of its designation as a proposed Natural Heritage Area (pNHA) – (site number 02104). The Grand Canal Natural Heritage Area comprises the canal channel and the banks on either side of it. Various habitats are found within the canal boundaries - hedgerow, tall herbs, calcareous grassland, reed fringe, open water, scrub and woodland. 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.

13.4.4 European and National Designated Protected Species

Certain plant, animal and bird species are also protected by law. This protection applies wherever the plant, animal or bird species are found and is not confined to sites designated by law and their habitats. This includes plant species listed in the Flora Protection Order 1999 and animals and birds listed in the Wildlife Act 1976 and subsequent statutory instruments, those listed in Annex IV of the Habitats

Directive and those listed in Annex I of the Birds Directive.

13.4.5 Policies – General Natural Heritage and Designated Sites

It is the policy of the Council:

- NH 1: To have regard to the actions contained in the County Biodiversity Plan.
- NH 2: To facilitate the conservation and enhancement of the Grand Canal pNHA, and the River Barrow cSAC, including the adjacent wetlands and associated habitats and to ensure that development does not significantly adversely affect conservation values.
- NH 3: To preserve the quality and quantity of water in the Grand Canal system and the Barrow in partnership with Waterways Ireland and the National Parks and Wildlife Service of the DoEHLG,
- NH 4: To have regard to the views and guidance of National Parks and Wildlife Service of the DoEHLG in respect of proposed development where there is a possibility that such development may have an impact on sites with nature conservation designations.
- NH 5: To require the submission of an Ecological Impact Assessment for

all development which may have a significant impact on the Canal, river and riparian habitats. This assessment should where appropriate suggest a minimum buffer of undisturbed vegetation to be retained to mitigate against pollution risks, reduce flooding potential, maintain habitats and provide an ecological corridor. The buffer zone shall, where possible be maintained free of development and hard surfaces. The assessment shall address the following issues:

- Protected species i.e. bats otters including the requirement for derogation licences
- Cumulative impact of the proposed development.

NH 6: To ensure that any project with the potential to impact upon a Natura 2000 site(s) i.e. the River Barrow shall be subject to Appropriate Assessment in accordance with Article 6(3) of the Habitats Directive.

Potential temporary impacts upon the River Barrow cSAC arising from construction activities shall be avoided by compliance with the measures outlined in Section 3.5.2 of the Appropriate Assessment Natura Impact Statement.

NH 7 To ensure that no project which gives rise to significant cumulative, direct, indirect or secondary impacts on Natura 2000 sites arising from their size or scale, land take, proximity, resource requirements, emissions (disposal to land, water or air), transportation requirements, duration of construction, operation, decommissioning or from any other effects shall be permitted on

the basis of this Plan (either individually or in combination with other plans or projects)¹.

NH 8: A suitable buffer zone will be maintained between the Grand Canal and the River Barrow and any proposed development. The extent and composition of this undisturbed riparian buffer zone should be determined in consultation with a qualified ecologist. In all instances however a buffer of 2.5 metres of vegetation shall be retained along the canal bank to mitigate against pollution risks, reduce flooding potential and maintain habitat.

13.5 Nature/ Biodiversity Conservation outside designated sites

There are habitats and features, which are of particular importance for biodiversity throughout the town area. These include woodlands, hedgerow field boundaries, rivers, streams and associated riparian zones, canals, freshwater wetlands, urban parks and gardens.

A network of protected areas and ecological corridors available to support the movement of species and to sustain habitats, ecological processes and functions is necessary to maintain biodiversity. Article 10 of the Habitats Directive requires EU member states in their land-use planning and development policies to encourage the management of features which constitute such ecological networks and which are of major importance for wild fauna and flora.

¹ Except as provided for in Section 6(4) of the Habitats Directive, viz. There must be:
(a) no alternative solution available,
(b) imperative reasons of overriding public interest for the plan to proceed; and
(c) adequate compensatory measures in place.

13.5.1 Local Biodiversity Important Areas

Contained within the Plan area are areas which are of local biodiversity significance, which should be protected, enhanced and restored. These areas, such as wetland areas, can contribute significant ecological functions to the Plan area such as the use of natural wetland areas to reduce flooding. It is an aim of this Plan to carry out habitat mapping for the town. Once completed, this mapping will assist in identifying local biodiversity areas throughout the town.

It is the policy of the Council:

- NH 9: To facilitate, maintain and enhance as far as is practicable the natural heritage and amenity of the town by seeking to encourage the preservation and retention of woodlands, hedgerows, stonewalls, rivers, streams and wetlands. Where the removal of such features is unavoidable appropriate measures to replace like with like should be considered, subject to safety considerations.
- NH 10: To ensure that existing biodiversity features such as watercourses, streams, hedgerows, trees, ecological corridors and linkages are incorporated into the design of new developments.
- NH 11: To protect, conserve and enhance the town's biodiversity and natural heritage including wildlife (flora and fauna), habitats, landscapes and/or landscape features of importance to wildlife.
- NH 12: To seek compliance with Article 10 of the Habitats Directive with regard to encouraging the management of features in the landscape which are of major importance for wild fauna and flora. Such features are those

which, by virtue of their linear and continuous structure act as biodiversity (such as rivers with their banks or the traditional systems for marking field boundaries) or their function as stepping stones which are of major importance for wild fauna and flora and (such as ponds or small woods), are essential for the migration, dispersal and genetic exchange of wild species.

13.6 Invasive Non-Native Species

Non native species, both invertebrate and plants, can represent a major threat to local, regional, and national biodiversity. Terrestrial and aquatic habitats can be negatively affected, resulting in significant damage to conservation and economic interests, such as agriculture, forestry and civil infrastructure.

It is the policy of the Council:

- NH 13: To support measures for the prevention and/or eradication of invasive species as appropriate, as opportunities and resources allow.

13.7 Trees, Hedgerows and Woodlands

Trees and hedgerows constitute an important natural and historic resource, given their contribution to landscape quality, their ecological importance as wildlife habitats and historical significance as townland and field boundaries. In urban settings trees and groups of trees can contribute significantly to the local landscape/townscape and in the successful integration of new buildings into the landscape.

Athy contains many large trees and groups of trees of considerable heritage value, which enhance the urban fabric of the town. These are considered visually important to the landscape, as well as

providing significant recreational capacity and important wildlife habitats. The planting or retention of mature trees can contribute to amenity and more attractive developments as well as important wildlife habitats. The retention of trees should be considered at the design stage of any development.

When planting hedgerows, species indigenous to the area should be used. The County Kildare Hedgerow Survey (2006) identified the predominant hedgerow species in Kildare. These species are listed in Chapter 15, Development Management Standards.

It is the policy of the Council:

- NH 14: To promote the protection and preservation of existing hedgerows, where appropriate and encourage planting of native hedgerow species.
- NH 15: To promote the preservation and enhancement of native and semi-natural woodlands, groups of trees and individual trees.
- NH 16: To discourage the felling of mature trees and encourage tree surgery rather than felling where appropriate.
- NH 17: To restrict the cutting of hedges during the bird-nesting season (1st March until 31st August), except in certain legally defined circumstances, in accordance with the provisions of the Wildlife (Amendment) Act 2000.
- NH 18: To discourage the felling of mature trees to facilitate development, and will encourage tree surgery rather than felling where possible.
- NH 19: To promote the protection of trees, in particular native and broadleaf species, which are of conservation and/or amenity value. Development that requires the

felling of mature trees of species interest, notwithstanding the fact that they may not be listed in this Plan, will be discouraged.

13.8 Rivers, Streams and Canals

The canal, streams and particularly the River Barrow are home to a variety of habitats and species. The banks (riparian zones) of rivers and streams are particularly important as they contain a range of habitats and species, which are different from the surrounding landscape. In many cases the maintenance of rivers and streams in an open, semi-natural condition, will be encouraged to protect and maintain biodiversity, landscape and for flood protection control value wherever possible. This will be achieved by regulating development in river and stream corridors by implementing sustainable drainage systems for commercial and residential developments.

It is the policy of the Council:

- NH 20: To protect existing rivers, streams and watercourses and wetlands located on land zoned for development and incorporate them within the overall design for the area, thereby contributing to and connecting into an overall green network for the town.
- NH 21: To consult, as appropriate, with the relevant Fisheries Board in relation to developments that could potentially impact on the aquatic ecosystems and associated riparian habitats.
- NH 22: To protect rivers, streams and other water courses and, wherever possible, maintain them in an open state capable of providing suitable habitats for fauna and flora and discouraging culverting or realignment.
- NH 23: To seek during redevelopment the creation of a riparian buffer strip

along either side of all watercourses where practicable.

13.9 Green Infrastructure

The term 'Green Infrastructure' is increasingly being used to describe the interconnected network of environmental features all around us. This strategically planned and delivered network should be designed and managed as a multifunctional resource capable of delivering a wide range of environmental and quality of life benefits for local communities. Green Infrastructure includes nature conservation areas, parks, open space, rivers, floodplains, wetlands, woodlands and farmland found throughout the town.

Green Infrastructure provides space for nature and ecosystems to work, it regulates our temperature, provides us with clean water and air and many other benefits humans gain from the environment. High quality and accessible parks, open spaces, playing fields, woodlands, allotments and other recreational areas provide health benefits for all, including play areas for children and walking and cycling routes. A high quality environment with an extensive green infrastructure network helps to attract and hold on to high tech industries, entrepreneurs and workers required to underpin the knowledge economy.

Kildare County Council intends to prepare a Green Infrastructure Strategy for the County, including Athy during the lifetime of this plan. It will focus on the appropriate treatment of biodiversity, parks, open space and recreational areas, water management, archaeological and architectural heritage, climate change and landscape. An objective of the strategy in relation to the management and provision of Green Infrastructure will be to provide guidance for the various statutory plans prepared by the Council.

All proposals for new development in the town must have regard to the County's

Green Infrastructure resources and ensure that it is protected, managed, and enhanced as new development takes place. In practical terms this means that development proposals should be integrated to the maximum extent with the green infrastructure in the locality.

It is the policy of the Council:

GI 1: To have regard to the recommendations of the forthcoming Green Infrastructure Strategy prepared for the County as part of the County Development Plan.

13.10 Views and Prospects

The built and natural heritage of Athy provide the town with significant views and prospects which the Council will seek to protect. The significant views and prospect of Athy are listed and shown on Map 13.1 and are listed in the Table 13.1 below.

It is the policy of the Council:

VP 1: To preserve views and prospects listed in Table 13.1.

VP 2: To ensure that development does not disrupt available vistas or impact on the landscape quality and scenic value of the Grand Canal corridor.

Table 13.1: Protected Views and Prospects

Views and Prospects	
VP1	Views of the River Barrow upstream & downstream from Cromaboo Bridge & from Horse Bridge
VP2	Views of the River Barrow upstream & downstream from the proposed Inner Relief Street Bridge.
VP3	Views from the River Barrow across open land to the south and north of the town.
VP4	Views of the Grand Canal and of the Barrow Navigation, upstream and downstream from all bridges.
VP5	Views along the River Barrow from all existing public rights of way (including public roads as well as footpaths).
VP6	Views of the Dominican Church from Barrow Quay and from the banks of the River Barrow.
VP7	Views and prospects forming the setting and environs of all protected structures.

13.11 Natural Heritage/Biodiversity Objectives

It is an objective of the Council:

NHO 1: To conserve and protect national/EU designated sites and to ensure that any new development proposal in the vicinity of, or affecting a designated site, provides sufficient information to show how its proposals will impact on the habitat of the site, and appropriate amelioration, and the Council will consult with the DOEHLG in this regard.

NHO 2: To encourage the development of proposals for new woodlands utilising funding available through schemes such as the Neighbour Wood and Native Woodland Schemes.

NHO 3: To consult with the National Parks and Wildlife Service prior to undertaking, approving or authorising any works or

development that may impact on the natural heritage

NHO 4: To map the habitats contained within and adjacent to the Plan area and to identify the biodiversity areas and recommendations made for their protection and enhancement.

NHO 5: To carry out a tree survey of all trees in the town and to implement its recommendations in relation to the protection of specific trees and groups of trees of special amenity value, including the possible making of Tree preservation Orders (TPO).

NHO 6: To prepare a Green Infrastructure Strategy for the County, including Athy during the lifetime of this plan.

NHO 7: To request National Parks and Wildlife Service to prioritise the preparation of Management Plans for Natura 2000 Sites which are located in the vicinity of the Plan area.