



Ramsar Information Sheet

Published on 9 January 2017

United Kingdom Killough Bay



Designation date	23 March 2003
Site number	2278
Coordinates	54°15'17"N 05°37'55"W
Area	104,00 ha

Color codes

Fields back-shaded in light blue relate to data and information required only for RIS updates.

Note that some fields concerning aspects of Part 3, the Ecological Character Description of the RIS (tinted in purple), are not expected to be completed as part of a standard RIS, but are included for completeness so as to provide the requested consistency between the RIS and the format of a 'full' Ecological Character Description, as adopted in Resolution X.15 (2008). If a Contracting Party does have information available that is relevant to these fields (for example from a national format Ecological Character Description) it may, if it wishes to, include information in these additional fields.

1 - Summary

Summary

Killough Bay encompasses the intertidal areas and adjoining areas of notable habitat, including mudflats, sand-dominated beaches, gravel and cobble units and rocky shore. The boundary of the Ramsar site includes Killough Harbour and Coney Island Bay. The principal interest is the wintering population of light-bellied brent goose *Branta bernicla hrota*, which feeds on the rich mats of the green alga *Enteromorpha* spp. present especially in Killough Harbour. The birds find refuge here during late winter and spring, once the main wintering flock from Strangford Lough disperses due to lack of food.

2 - Data & location

2.1 - Formal data

2.1.1 - Name and address of the compiler of this RIS

Compiler 1

Name	Joint Nature Conservation Committee
Institution/agency	Joint Nature Conservation Committee
Postal address	Monkstone House City Road Peterborough Cambridgeshire PE1 1JY UK
E-mail	ris@jncc.gov.uk
Phone	+44 01733 562 626
Fax	+44 01733 555 948

2.1.2 - Period of collection of data and information used to compile the RIS

To year

2.1.3 - Name of the Ramsar Site

Official name (in English, French or Spanish)

2.2 - Site location

2.2.1 - Defining the Site boundaries

b) Digital map/image

<1 file(s) uploaded>

Boundaries description (optional)

The site boundary follows that of the Special Protection Area (SPA) classified under the EU's Birds Directive.

2.2.2 - General location

a) In which large administrative region does the site lie?

b) What is the nearest town or population centre?

2.2.3 - For wetlands on national boundaries only

a) Does the wetland extend onto the territory of one or more other countries? Yes No

b) Is the site adjacent to another designated Ramsar Site on the territory of another Contracting Party? Yes No

2.2.4 - Area of the Site

Official area, in hectares (ha):

Area, in hectares (ha) as calculated from GIS boundaries

2.2.5 - Biogeography

Biogeographic regions

Regionalisation scheme(s)	Biogeographic region
EU biogeographic regionalization	Atlantic

3 - Why is the Site important?

3.1 - Ramsar Criteria and their justification

<no data available>

<no data available>

<no data available>

Criterion 4 : Support during critical life cycle stage or in adverse conditions

Criterion 6 : >1% waterbird population

3.2 - Plant species whose presence relates to the international importance of the site

<no data available>

3.3 - Animal species whose presence relates to the international importance of the site

Phylum	Scientific name	Common name	Species qualifies under criterion				Species contributes under criterion				Pop. Size	Period of pop. Est.	% occurrence 1)	IUCN Red List	CITES Appendix I	CMS Appendix I	Other Status	Justification
			2	4	6	9	3	5	7	8								
Birds																		
CHORDATA / AVES	<i>Branta bernicla hrota</i> 	Light-bellied brent goose	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	354	1992-1997	1.8		<input type="checkbox"/>	<input type="checkbox"/>		feeding site, 5 year peak mean for 1992/93 – 1996-97, peak counts in winter, East Canada (br), Ireland (w), wintering site

1) Percentage of the total biogeographic population at the site

The principal interest is the wintering population of light-bellied brent goose *Branta bernicla hrota*, which feeds on the rich mats of the green alga *Enteromorpha* spp. present especially in Killough Harbour. The birds find refuge here during late winter and spring, once the main wintering flock from Strangford Lough disperses due to lack of food.

3.4 - Ecological communities whose presence relates to the international importance of the site

<no data available>

4 - What is the Site like? (Ecological character description)

4.1 - Ecological character

Much of the Killough Bay shoreline supports a complex mosaic of annual driftline and cobble beach communities, interspersed with areas of saltmarsh, rock outcrop and low cliffs. Killough Harbour is a sheltered, mixed substrate, sediment shore with a notably rich invertebrate fauna and widespread distribution of the green alga *Enteromorpha* spp., that attracts internationally important numbers of wintering light-bellied brent goose *Branta bernicla hrota* to feed on it. Sheets of sand, supporting sand couch *Elytrigia juncea*, are occasionally present along the upper beach.

At Coney Island Bay, the moderately exposed sediment shore is an important example of its type. The rest of the bay is generally sheltered and rocky with rockpools and boulders, forming a species-rich area with a diverse range of seaweeds, such as toothed wrack *Fucus serratus* and knotted wrack *Ascophyllum nodosum*, and invertebrates, including the notable polychaete worm *Sabellaria alveolata* at its northern limit. On the rocks, a sparse covering of sea campion *Silene uniflora*, thrift *Armeria maritima* and sea plantain *Plantago maritima* gives way to a more species-rich maritime grassland community, typified by sea campion *S. uniflora*, wild carrot *Daucus carota* ssp. *carota*, thrift *A. maritima* and red fescue *Festuca rubra*.

4.2 - What wetland type(s) are in the site?

Marine or coastal wetlands

Wetland types (code and name)	Local name	Ranking of extent (1: greatest - 4: least)	Area (ha) of wetland type	Justification of Criterion 1
D: Rocky marine shores		2		
E: Sand, shingle or pebble shores		2		
G: Intertidal mud, sand or salt flats		1		

Other non-wetland habitat

Other non-wetland habitats within the site	Area (ha) if known
Coastal mosaic	

4.3 - Biological components

4.3.1 - Plant species

Other noteworthy plant species

Scientific name	Common name	Position in range / endemism / other
<i>Armeria maritima</i>	Thrift	
<i>Daucus carota carota</i>	Wild carrot	
<i>Festuca rubra</i>	Red fescue	
<i>Plantago maritima</i>	Sea plantain	
<i>Silene uniflora</i>	Sea campion	

4.3.2 - Animal species

Other noteworthy animal species

Phylum	Scientific name	Common name	Pop. size	Period of pop. est.	%occurrence	Position in range / endemism / other
ANNELIDA/POLYCHAETA	<i>Sabellaria alveolata</i>	Polychaete worm				northern limit of distribution in Ireland

4.4 - Physical components

4.4.1 - Climate

Climatic region	Subregion
C: Moist Mid-Latitude climate with mild winters	Cfb: Marine west coast (Mild with no dry season, warm summer)

Annual averages (Armagh, 1971–2000) (www.metoffice.com/climate/uk/averages/19712000/sites/armagh.html)

Max. daily temperature: 12.9° C

Min. daily temperature: 5.8° C

Days of air frost: 40.4

Rainfall: 795.4 mm

Hrs. of sunshine: 1191.6

4.4.2 - Geomorphic setting

a) Minimum elevation above sea level (in metres)

a) Maximum elevation above sea level (in metres)

Entire river basin

Upper part of river basin

Middle part of river basin

RIS for Site no. 2278, Killough Bay, United Kingdom

- Lower part of river basin
- More than one river basin
- Not in river basin
- Coastal

Please name the river basin or basins. If the site lies in a sub-basin, please also name the larger river basin. For a coastal/marine site, please name the sea or ocean.

Irish Sea

4.4.3 - Soil

- Mineral
- Organic
- No available information

Are soil types subject to change as a result of changing hydrological conditions (e.g., increased salinity or acidification)? Yes No

Please provide further information on the soil (optional)

Dominated by mineral gleys and brown earths.

4.4.4 - Water regime

Water permanence

Presence?
Usually permanent water present

4.4.5 - Sediment regime

- Significant erosion of sediments occurs on the site
- Significant accretion or deposition of sediments occurs on the site
- Significant transportation of sediments occurs on or through the site
- Sediment regime is highly variable, either seasonally or inter-annually
- Sediment regime unknown

Please provide further information on sediment (optional):

Killough Harbour is a sheltered, mixed substrate, sediment shore. Coney Island Bay is a moderately exposed sediment shore and an important example of its type. intertidal sediments (including sandflat/mudflat)

4.4.6 - Water pH

- Acid (pH<5.5)
- Circumneutral (pH: 5.5-7.4)
- Alkaline (pH>7.4)
- Unknown

4.4.7 - Water salinity

- Fresh (<0.5 g/l)
- Mxohaline (brackish)/Mxosaline (0.5-30 g/l)
- Euhaline/Eusaline (30-40 g/l)
- Hyperhaline/Hypersaline (>40 g/l)
- Unknown

4.4.8 - Dissolved or suspended nutrients in water

- Eutrophic
- Mesotrophic
- Oligotrophic
- Dystrophic
- Unknown

4.4.9 - Features of the surrounding area which may affect the Site

Please describe whether, and if so how, the landscape and ecological characteristics in the area surrounding the Ramsar Site differ from the site itself: i) broadly similar ii) significantly different

- Surrounding area has greater urbanisation or development
- Surrounding area has higher human population density
- Surrounding area has more intensive agricultural use
- Surrounding area has significantly different land cover or habitat types

4.5 - Ecosystem services

4.5.1 - Ecosystem services/benefits

Provisioning Services

Ecosystem service	Examples	Importance/Extent/Significance
Food for humans	Sustenance for humans (e.g., fish, molluscs, grains)	Medium
Wetland non-food products	Livestock fodder	Medium

Regulating Services

Ecosystem service	Examples	Importance/Extent/Significance
Hazard reduction	Coastal shoreline and river bank stabilization and storm protection	Medium

Cultural Services

Ecosystem service	Examples	Importance/Extent/Significance
Recreation and tourism	Picnics, outings, touring	Medium
Recreation and tourism	Nature observation and nature-based tourism	Medium
Spiritual and inspirational	Aesthetic and sense of place values	Medium
Scientific and educational	Educational activities and opportunities	Medium
Scientific and educational	Long-term monitoring site	Medium

Other ecosystem service(s) not included above:

Nature conservation, Transportation/navigation

Have studies or assessments been made of the economic valuation of ecosystem services provided by this Ramsar Site? Yes No Unknown

4.5.2 - Social and cultural values

- i) the site provides a model of wetland wise use, demonstrating the application of traditional knowledge and methods of management and use that maintain the ecological character of the wetland
- ii) the site has exceptional cultural traditions or records of former civilizations that have influenced the ecological character of the wetland
- iii) the ecological character of the wetland depends on its interaction with local communities or indigenous peoples
- iv) relevant non-material values such as sacred sites are present and their existence is strongly linked with the maintenance of the ecological character of the wetland

<no data available>

4.6 - Ecological processes

<no data available>

5 - How is the Site managed? (Conservation and management)

5.1 - Land tenure and responsibilities (Managers)

5.1.1 - Land tenure/ownership

Public ownership

Category	Within the Ramsar Site	In the surrounding area
National/Federal government	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>

Private ownership

Category	Within the Ramsar Site	In the surrounding area
Other types of private/individual owner(s)	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>

5.1.2 - Management authority

Please list the local office / offices of any agency or organization responsible for managing the site:

Northern Ireland Environment Agency
Department of the Environment

Provide the name and title of the person or people with responsibility for the wetland:

Ian Enlander

Postal address:

Klondyke Building
Cromac Avenue
Gasworks Business Park
Lower Ormeau Road
Belfast
BT7 2JA
Tel: 028 90569647

5.2 - Ecological character threats and responses (Management)

5.2.1 - Factors (actual or likely) adversely affecting the Site's ecological character

<no data available>

5.2.2 - Legal conservation status

Regional (international) legal designations

Designation type	Name of area	Online information url	Overlap with Ramsar Site
EU Natura 2000	Special Protection Area (SPA)		whole

National legal designations

Designation type	Name of area	Online information url	Overlap with Ramsar Site
Area of Outstanding National Beauty (AONB)			whole
Site/ Area of Special Scientific Interest (SSSI/ASSI)			whole

5.2.3 - IUCN protected areas categories (2008)

Ia Strict Nature Reserve

Ib Wilderness Area: protected area managed mainly for wilderness protection

II National Park: protected area managed mainly for ecosystem protection and recreation

III Natural Monument: protected area managed mainly for conservation of specific natural features

IV Habitat/Species Management Area: protected area managed mainly for conservation through management intervention

V Protected Landscape/Seascape: protected area managed mainly for landscape/seascape conservation and recreation

VI Managed Resource Protected Area: protected area managed mainly for the sustainable use of natural ecosystems

<no data available>

5.2.4 - Key conservation measures

<no data available>

5.2.5 - Management planning

Is there a site-specific management plan for the site? No

Has a management effectiveness assessment been undertaken for the site? Yes No

If the site is a formal transboundary site as indicated in section Data and location > Site location, are there shared management planning processes with another Contracting Party? Yes No

Please indicate if a Ramsar centre, other educational or visitor facility, or an educational or visitor programme is associated with the site:

The management of Ramsar sites in the UK is determined by either a formal management plan or through other management planning processes, and is overseen by the relevant statutory conservation agency. Details of the precise management practices are given in these documents.

5.2.6 - Planning for restoration

Is there a site-specific restoration plan? Please select a value

5.2.7 - Monitoring implemented or proposed

Monitoring	Status
Birds	Implemented

EHS staff monitor the site on a regular basis and conduct bird counts through the winter and spring seasons.

6 - Additional material

6.1 - Additional reports and documents

6.1.1 - Bibliographical references

ASSI Survey report – Habitat Survey Team, Environment and Heritage Service
Barne, JH, Robson, CF, Kaznowska, SS, Doody, JP, Davidson, NC & Buck, AL (eds.) (1997) Coasts and seas of the United Kingdom. Region 17. Northern Ireland. Joint Nature Conservation Committee, Peterborough. (Coastal Directories Series.)
Buck, AL & Donaghy, A (eds.) (1996) An inventory of UK estuaries. Volume 7. Northern Ireland. Joint Nature Conservation Committee, Peterborough
Cooper, EA, Crawford, I, Malloch, AJC & Rodwell, JS (1992) Coastal vegetation survey of Northern Ireland. (Contractor: University of Lancaster, Unit of Vegetation Science). Unpublished report to Department of the Environment (NI), Belfast
Crowe, O (2005) Ireland's wetlands and their waterbirds: status and distribution. BirdWatch Ireland, Newcastle, Co. Wicklow
Curtis, TGF & McGough, HN (1988) The Irish Red Data Book. 1 Vascular plants. Stationery Office, Dublin
Musgrove, AJ, Pollitt, MS, Hall, C, Hearn, RD, Holloway, SJ, Marshall, PE, Robinson, JA & Cranswick, PA (2001) The Wetland Bird Survey 1999–2000: wildfowl and wader counts. British Trust for Ornithology, Wildfowl and Wetlands Trust, Royal Society for the Protection of Birds & Joint Nature Conservation Committee, Slimbridge. www.wwt.org.uk/publications/default.asp?PubID=14
Stroud, DA, Chambers, D, Cook, S, Buxton, N, Fraser, B, Clement, P, Lewis, P, McLean, I, Baker, H & Whitehead, S (eds.) (2001) The UK SPA network: its scope and content. Joint Nature Conservation Committee, Peterborough (3 vols.) www.jncc.gov.uk/UKSPA/default.htm
Way, LS, Grice, P, MacKay, A, Galbraith, CA, Stroud, DA & Pienkowski, MW (1993) Ireland's Internationally Important Bird Sites: a review of sites for the EC Special Protection Area network. Joint Nature Conservation Committee, Peterborough for to Department of the Environment (NI), Belfast, and Irish Wildlife Service, Dublin
Weighell, AJ, Donnelly, AP & Calder, K (eds.) (2000) Directory of the Celtic coasts and seas. Joint Nature Conservation Committee, Peterborough
Wilkinson, M, Fuller, IWA, Telfer, TC, Moore, CG & Kingston, PF (1988) Northern Ireland Littoral Survey: A conservation-orientated survey of the intertidal seashore of Northern Ireland. Institute of Offshore Engineering, Heriot-Watt University, Edinburgh

6.1.2 - Additional reports and documents

i. taxonomic lists of plant and animal species occurring in the site (see section 4.3)

<no file available>

ii. a detailed Ecological Character Description (ECD) (in a national format)

<no file available>

iii. a description of the site in a national or regional wetland inventory

<no file available>

iv. relevant Article 3.2 reports

<no file available>

v. site management plan

<no file available>

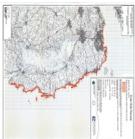
vi. other published literature

<no file available>

<no data available>

6.1.3 - Photograph(s) of the Site

Please provide at least one photograph of the site:



Please provide a caption (
Please specify the copyright
holder, 20-12-2016)

6.1.4 - Designation letter and related data

Designation letter

<1 file(s) uploaded>

Date of Designation 2003-03-23