

National Parks and Wildlife Service

Conservation Objectives Series

Clare Island Cliffs SAC 002243



An Roinn Ealaíon, Oidhreachta,
Gnóthaí Réigiúnacha, Tuaithe agus Gaeltachta

Department of Arts, Heritage,
Regional, Rural and Gaeltacht Affairs



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Citation:

**NPWS (2016) Conservation Objectives: Clare Island Cliffs SAC 002243. Version 1.
National Parks and Wildlife Service, Department of Arts, Heritage, Regional,
Rural and Gaeltacht Affairs.**

**Series Editor: Rebecca Jeffrey
ISSN 2009-4086**

Introduction

The overall aim of the Habitats Directive is to maintain or restore the favourable conservation status of habitats and species of community interest. These habitats and species are listed in the Habitats and Birds Directives and Special Areas of Conservation and Special Protection Areas are designated to afford protection to the most vulnerable of them. These two designations are collectively known as the Natura 2000 network.

European and national legislation places a collective obligation on Ireland and its citizens to maintain habitats and species in the Natura 2000 network at favourable conservation condition. The Government and its agencies are responsible for the implementation and enforcement of regulations that will ensure the ecological integrity of these sites.

A site-specific conservation objective aims to define favourable conservation condition for a particular habitat or species at that site.

The maintenance of habitats and species within Natura 2000 sites at favourable conservation condition will contribute to the overall maintenance of favourable conservation status of those habitats and species at a national level.

Favourable conservation status of a habitat is achieved when:

- its natural range, and area it covers within that range, are stable or increasing, and
- the specific structure and functions which are necessary for its long-term maintenance exist and are likely to continue to exist for the foreseeable future, and
- the conservation status of its typical species is favourable.

The favourable conservation status of a species is achieved when:

- population dynamics data on the species concerned indicate that it is maintaining itself on a long-term basis as a viable component of its natural habitats, and
- the natural range of the species is neither being reduced nor is likely to be reduced for the foreseeable future, and
- there is, and will probably continue to be, a sufficiently large habitat to maintain its populations on a long-term basis.

Notes/Guidelines:

1. The targets given in these conservation objectives are based on best available information at the time of writing. As more information becomes available, targets for attributes may change. These will be updated periodically, as necessary.
2. An appropriate assessment based on these conservation objectives will remain valid even if the targets are subsequently updated, providing they were the most recent objectives available when the assessment was carried out. It is essential that the date and version are included when objectives are cited.
3. Assessments cannot consider an attribute in isolation from the others listed for that habitat or species, or for other habitats and species listed for that site. A plan or project with an apparently small impact on one attribute may have a significant impact on another.
4. Please note that the maps included in this document do not necessarily show the entire extent of the habitats and species for which the site is listed. This should be borne in mind when appropriate assessments are being carried out.
5. When using these objectives, it is essential that the relevant backing/supporting documents are consulted, particularly where instructed in the targets or notes for a particular attribute.

Qualifying Interests

** indicates a priority habitat under the Habitats Directive*

002243	Clare Island Cliffs SAC
<hr/>	
1230	Vegetated sea cliffs of the Atlantic and Baltic coasts
8210	Calcareous rocky slopes with chasmophytic vegetation
8220	Siliceous rocky slopes with chasmophytic vegetation

Please note that this SAC overlaps with Clare Island SPA (004136) and is adjacent to West Connaght Coast SAC (002998). See map 2. The conservation objectives for this site should be used in conjunction with those for the overlapping and adjacent sites as appropriate.

Supporting documents, relevant reports & publications

Supporting documents, NPWS reports and publications are available for download from: www.npws.ie/Publications

NPWS Documents

Year :	2011
Title :	National survey and assessment of the conservation status of Irish sea cliffs
Author :	Barron, S.J.; Delaney, A.; Perrin, P.M.; Martin, J.; O'Neill, F.
Series :	Irish Wildlife Manual No. 53
Year :	2012
Title :	Ireland Red List No. 8: Bryophytes
Author :	Lockhart, N.; Hodgetts, N.; Holyoak, D.
Series :	Ireland Red List series, NPWS
Year :	2013
Title :	The status of EU protected habitats and species in Ireland. Volume 2. Habitats assessments
Author :	NPWS
Series :	Conservation assessments
Year :	2014
Title :	Guidelines for a national survey and conservation assessment of upland vegetation and habitats in Ireland, Version 2.0
Author :	Perrin, P.M.; Barron, S.J.; Roche, J.R.; O'Hanrahan, B.
Series :	Irish Wildlife Manual No. 79
Year :	2016
Title :	Clare Island Cliffs SAC (site code: 2243) Conservation objectives supporting document-coastal habitats V1
Author :	NPWS
Series :	Conservation objectives supporting document
Year :	2016
Title :	Ireland Red List No. 10: Vascular Plants
Author :	Wyse Jackson, M.; FitzPatrick, Ú.; Cole, E.; Jebb, M.; McFerran, D.; Sheehy Skeffington, M.; Wright, M.
Series :	Ireland Red Lists series, NPWS

Other References

Year :	1986
Title :	A resurvey of Clare Island flora
Author :	Doyle, G.J.; Foss, P.J.
Series :	Irish Naturalists' Journal, 22: 85-89
Year :	2005
Title :	National inventory of sea cliffs and coastal heaths
Author :	Browne, A.
Series :	Unpublished Report to NPWS

Spatial data sources

Year : 2011

Title : National survey and assessment of the conservation status of Irish sea cliffs

GIS Operations : Clipped to SAC boundary

Used For : 1230 (map 3)

Conservation Objectives for : Clare Island Cliffs SAC [002243]

1230 Vegetated sea cliffs of the Atlantic and Baltic coasts

To maintain the favourable conservation condition of Vegetated sea cliffs of the Atlantic and Baltic coasts in Clare Island Cliffs SAC, which is defined by the following list of attributes and targets:

Attribute	Measure	Target	Notes
Habitat length	Kilometres	Area stable, subject to natural processes, including erosion. For the sub-site mapped (Capnagower), total length of cliff sections: 14.69km. See map 3	Based on data from the Irish Sea Cliff Survey (ISCS) (Barron et al., 2011). Cliffs are linear features and are therefore measured in kilometres. The sub-site Capnagower (ISCS site ID: 08017) was identified using a combination of aerial photos and the DCENR helicopter viewer. The length of cliff was measured (in sections) to give a total estimated area of 14.69km within the SAC. The length of cliff is likely to be underestimated. See the Clare Island Cliffs SAC conservation objectives supporting document for coastal habitats for further details
Habitat distribution	Occurrence	No decline, subject to natural processes. See map 3	Sea cliffs are known to occur along the coastline from Kinnacorra in the east, along the north coast and around the south-western corner of the island as far east as Tonabrickill. Both hard and soft cliffs have been noted in this SAC, with hard cliffs being by far the most dominant type (Browne, 2005; Barron et al., 2011). See the coastal habitats supporting document for further details
Physical structure: functionality and hydrological regime	Occurrence of artificial barriers	No alteration to natural functioning of geomorphological and hydrological processes, including groundwater quality, due to artificial structures	Based on data from Barron et al. (2011). Maintaining natural geomorphological processes, including natural erosion, is important for the health of vegetated sea cliffs. Hydrological processes maintain flushes, and in some cases tufa formations, that can be associated with sea cliffs. Hydrological features such as gullies, streams and cascades were identified by the ISCS as occurring within Clare Island Cliffs SAC. See the coastal habitats supporting document for further details
Vegetation structure: zonation	Occurrence	Maintain the range of sea cliff habitat zonation including transitional zones, subject to natural processes including erosion and succession	Based on data from Barron et al. (2011). The cliffs in the south-west and eastern sectors are low-lying with a sward of maritime grassland vegetation. On the upper cliffs, there is a concentration of alpine vegetation, which is species-rich and includes a number of rarities, in association with a species-rich bryophyte flora. See the coastal habitats supporting document for further details
Vegetation structure: vegetation height	Centimetres	Maintain structural variation within sward	Based on data from Barron et al. (2011). The cliffs in the south-west and east of the SAC have low-growing vegetation along the cliff top. See the coastal habitats supporting document for further details
Vegetation composition: typical species and sub-communities	Percentage cover at a representative number of monitoring stops	Maintain range of sub-communities with typical species listed in the Irish Sea Cliff Survey (Barron et al., 2011)	The cliffs are well-vegetated, with a maritime sward of grasses and herbs. A plantain (<i>Plantago</i> spp.) dominated sward of low-growing vegetation occurs along the tops of some of the cliffs. On the upper cliffs, there is a concentration of species-rich alpine vegetation, which occurs in association with a species-rich bryophyte flora. See the coastal habitats supporting document for further details
Vegetation composition: negative indicator species	Percentage	Negative indicator species (including non-native species) to represent less than 5% cover	Based on data from Barron et al. (2011). See the coastal habitats supporting document for further details
Vegetation composition: bracken and woody species	Percentage	Cover of bracken (<i>Pteridium aquilinum</i>) on grassland and/or heath less than 10%. Cover of woody species on grassland and/or heath less than 20%	Based on data from Barron et al. (2011). See the coastal habitats supporting document for further details

Conservation Objectives for : Clare Island Cliffs SAC [002243]

8210 Calcareous rocky slopes with chasmophytic vegetation

To maintain the favourable conservation condition of Calcareous rocky slopes with chasmophytic vegetation in Clare Island Cliffs SAC, which is defined by the following list of attributes and targets:

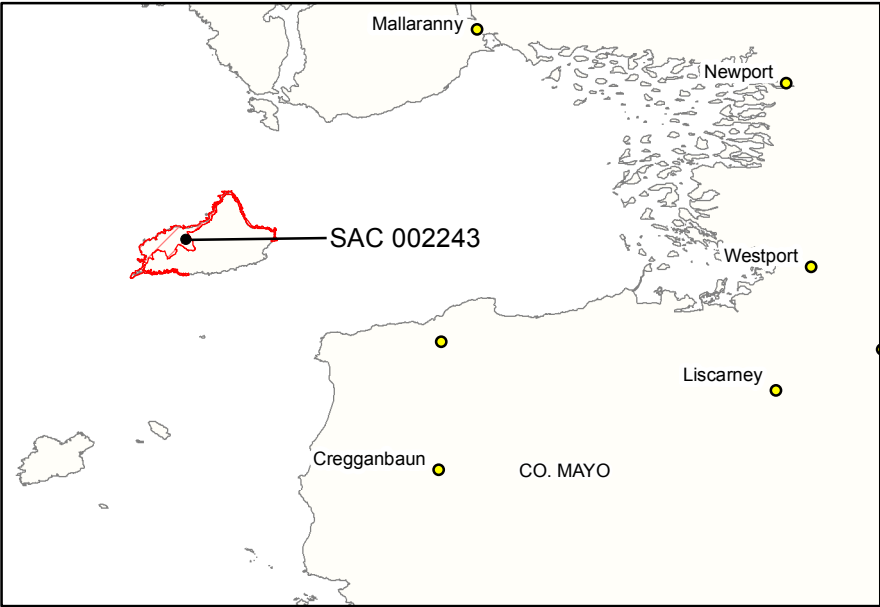
Attribute	Measure	Target	Notes
Habitat area	Hectares	Area stable or increasing, subject to natural processes	Calcareous rocky slopes with chasmophytic vegetation has not been mapped in detail for Clare Island Cliffs SAC and thus the total area of the qualifying habitat is unknown. It occurs as a mosaic with siliceous rocky slopes with chasmophytic vegetation (8220) and is generally found on the sheer cliffs on the seaward face of Croaghmore and to the north and north-west of the island on some of the higher sea cliffs, above c.250m (NPWS internal files)
Habitat distribution	Occurrence	No decline, subject to natural processes	See note on area above
Ecosystem function: soil nutrients	Soil pH and appropriate nutrient levels at a representative number of monitoring stops	Maintain soil nutrient status within natural range	Relevant nutrients and their natural ranges are yet to be defined. However, nitrogen deposition is noted as being relevant to this habitat (NPWS, 2013)
Vegetation composition: positive indicator fern and <i>Saxifraga</i> species	Number of species in local vicinity of a representative number of monitoring stops	Number of ferns and <i>Saxifraga</i> indicators at each monitoring stop is at least one	Attribute and target based on Perrin et al. (2014), where the list of positive indicator species for this habitat is also presented
Vegetation composition: positive indicator species	Number of species in local vicinity of a representative number of monitoring stops	Number of positive indicator species at each monitoring stop is at least three	Attribute and target based on Perrin et al. (2014), where the list of positive indicator species for this habitat is also presented
Vegetation composition: non-native species	Percentage cover in local vicinity of a representative number of monitoring stops	Proportion of vegetation composed of non-native species less than 1%	Attribute and target based on Perrin et al. (2014). Non-native species can be invasive and have deleterious effects on native vegetation. A low target is set as non-native species can spread rapidly and are most easily dealt with when still at lower abundances
Vegetation composition: bracken, native trees and shrubs	Percentage cover in local vicinity of a representative number of monitoring stops	Total cover of bracken (<i>Pteridium aquilinum</i>), native trees and shrubs less than 25%	Attribute and target based on Perrin et al. (2014). High cover of bracken, native trees and shrubs would indicate that the rocky slopes are becoming more vegetated which would impact on the niches of the chasmophytic vegetation
Vegetation structure: grazing and browsing	Percentage of leaves/shoots grazed/browsed in local vicinity of a representative number of monitoring stops	Live leaves of forbs and shoots of dwarf shrubs showing signs of grazing or browsing collectively less than 50%	Attribute and target based on Perrin et al. (2014)
Indicators of local distinctiveness	Occurrence and population size	No decline in distribution or population sizes of rare, threatened or scarce species associated with the habitat	This includes species listed in the Flora (Protection) Order, 2015 and/or the red data lists (Lockhart et al., 2016; Wyse Jackson et al., 2016). The red-listed (Wyse Jackson et al., 2016) species holly-fern (<i>Polystichum lonchitis</i>) and alpine saw-wort (<i>Saussurea alpina</i>) have been recorded from the rocky cliffs (NPWS internal files; Doyle and Foss, 1986)

Conservation Objectives for : Clare Island Cliffs SAC [002243]

8220 Siliceous rocky slopes with chasmophytic vegetation


To maintain the favourable conservation condition of Siliceous rocky slopes with chasmophytic vegetation in Clare Island Cliffs SAC, which is defined by the following list of attributes and targets:

Attribute	Measure	Target	Notes
Habitat area	Hectares	Area stable or increasing, subject to natural processes	Siliceous rocky slopes with chasmophytic vegetation has not been mapped in detail for Clare Island Cliffs SAC and thus the total area of the qualifying habitat is unknown. It occurs as a mosaic with calcareous rocky slopes with chasmophytic vegetation (8210) and is generally found on the sheer cliffs on the seaward face of Croaghmore and to the north and north-west of the island on some of the higher sea cliffs, above c.250m (NPWS internal files)
Habitat distribution	Occurrence	No decline, subject to natural processes	See note on area above
Ecosystem function: soil nutrients	Soil pH and appropriate nutrient levels at a representative number of monitoring stops	Maintain soil nutrient status within natural range	Relevant nutrients and their natural ranges are yet to be defined. However, nitrogen deposition is noted as being relevant to this habitat (NPWS, 2013)
Vegetation composition: positive indicator species	Number of species in local vicinity of a representative number of monitoring stops	At least one positive indicator species present in vicinity of each monitoring stop	Attribute and target based on Perrin et al. (2014), where the list of positive indicator species for this habitat is also presented
Vegetation composition: non-native species	Percentage cover in local vicinity of a representative number of monitoring stops	Proportion of vegetation composed of non-native species less than 1%	Attribute and target based on Perrin et al. (2014). Non-native species can be invasive and have deleterious effects on native vegetation. A low target is set as non-native species can spread rapidly and are most easily dealt with when still at lower abundances
Vegetation composition: bracken, native trees and shrubs	Percentage cover in local vicinity of a representative number of monitoring stops	Total cover of bracken (<i>Pteridium aquilinum</i>), native trees and shrubs less than 25%	Attribute and target based on Perrin et al. (2014). High cover of bracken, native trees and shrubs would indicate that the rocky slopes are becoming more vegetated which would impact on the niches of the chasmophytic vegetation
Vegetation structure: grazing and browsing	Percentage of leaves/shoots grazed/browsed in local vicinity of a representative number of monitoring stops	Live leaves of forbs and shoots of dwarf shrubs showing signs of grazing or browsing collectively less than 50%	Attribute and target based on Perrin et al. (2014)
Indicators of local distinctiveness	Occurrence and population size	No decline in distribution or population sizes of rare, threatened or scarce species associated with the habitat	This includes species listed in the Flora (Protection) Order, 2015 and/or the red data lists (Lockhart et al., 2016; Wyse Jackson et al., 2016). The red-listed (Wyse Jackson et al., 2016) species holly-fern (<i>Polystichum lonchitis</i>) and alpine saw-wort (<i>Saussurea alpina</i>) have been recorded from the rocky cliffs (NPWS internal files; Doyle and Foss, 1986)



Legend

 Clare Island Cliffs SAC 002243

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Department of Arts, Heritage, Regional, Rural and Gaeltacht Affairs

**MAP 1:
CLARE ISLAND SAC
CONSERVATION OBJECTIVES
SAC DESIGNATION**

Map to be read in conjunction with the NPWS Conservation Objectives Document.

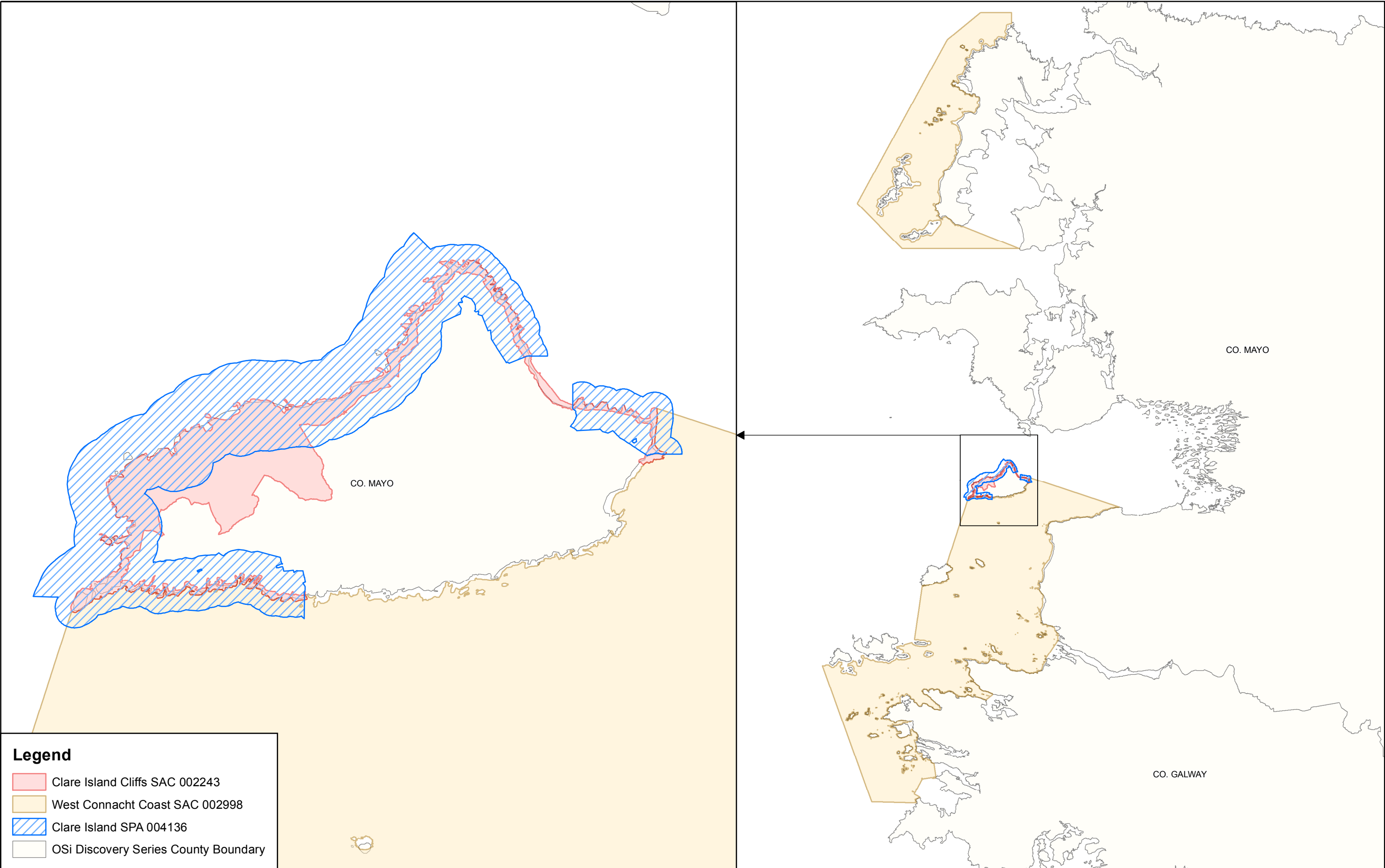
**SITE CODE: SAC 002243; version 3.02
CO. MAYO**

0 0.3 0.6 0.9 1.2 1.5 km

The mapped boundaries are of an indicative and general nature only. Boundaries of designated areas are subject to revision.
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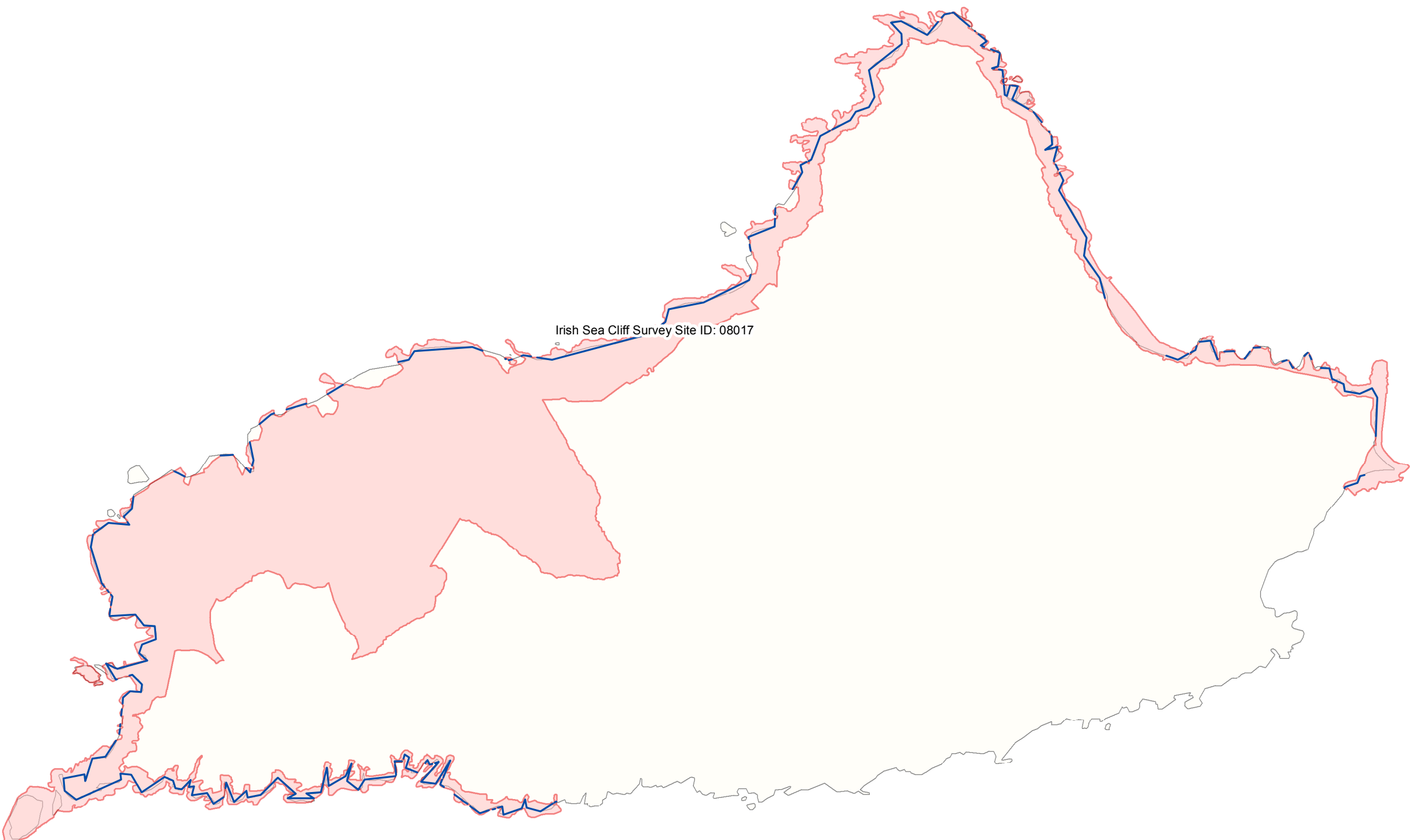
Níl sna teorainneacha ar na léarscáileanna ach nod garshuimhach ginearálta. Féadfar athbhreithnithe a déanamh ar theorainneacha na gceantar comharthaithe. Suirbhéarachta Ordonáis na hÉireann Ceadúnas


**Map Version 1
Date: Oct 2016**



Legend

- Clare Island Cliffs SAC 002243
- West Connacht Coast SAC 002998
- Clare Island SPA 004136
- OSi Discovery Series County Boundary



Legend

- 1230 Vegetated sea cliffs of the Atlantic and Baltic coasts
- Clare Island Cliffs SAC 002243
- OSi Discovery Series County Boundary

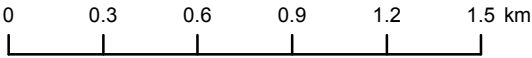


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MAP 3:
CLARE ISLAND SAC
CONSERVATION OBJECTIVES
VEGETATED SEA CLIFFS

Map to be read in conjunction with the NPWS Conservation Objectives Document.

SITE CODE:
SAC 002243; version 3.02,
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The mapped boundaries are of an indicative and general nature only. Boundaries of designated areas are subject to revision.
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Níl sna teorainneacha ar na léarscáileanna ach nod garshuíomhach ginearálta. Féadfar athbhreithnithe a déanamh ar theorainneacha na gceantar comharthaithe. Suirbhéarachta Ordonáis na hÉireann Ceadúnas

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Map Version 1
Date: Oct 2016