MAYO - COUNTY GEOLOGICAL SITE REPORT

NAME OF SITE Broad Haven
Other names used for site Broadhaven Bay

IGH THEME IGH13 Coastal Geomorphology

TOWNLAND(S) Glenlara, Aghaglasheen, Pollacappul, Ballyglass, Graghil,

Dooncarton (or Glengad), Killgalligan

NEAREST TOWN/VILLAGE Belmullet SIX INCH MAP NUMBER 3, 10

ITM CO-ORDINATES 476000E 839000N (centre of features) 1:50,000 O.S. SHEET NO. 22 GSI BEDROCK 1:100,000 SHEET NO. 6

GIS Code MO18

Outline Site Description

A wide bay between Erris Head and Kid Island, opening northwards, bordered by a coastline of cliffs, promontories, inlets, shallow sandy bays and estuaries, beaches, sand dunes, and low-lying rocky shoreline.

Geological System/Age and Primary Rock Type

Bedrock exposed along the coastline around Broad Haven Bay is Dalradian (Neoproterozoic in age), comprising metamorphic rocks (predominantly psammite and schist). The feature, as it is appears today, has largely formed since the last glaciation (the Holocene Period). The bay hosts sand and silt sediment, and soft mud, washed into and around it during that time. The main structure of the bay most probably dates back through the Quaternary (Ice Age). Erosion of the coast and deposition of sediments contribute to the continued development of the site's geomorphology.

Main Geological or Geomorphological Interest

The bay is over 9km wide at its widest point between Erris Head and Benwee Head. Much of the bay is bordered by sea cliffs. Cliffs rise to 70m above sea level on the west side of the bay, whilst on the northeast side cliffs rise over 250m above the waves. Sea caves occur along sections of the cliff coastline. The coastline is cut by many inlets and small bays. Blind Harbour is a ~2km long, north-south trending, shallow bay that empties at low tide northwards through a narrow neck, exposing an extensive area of sand. 1-2m high peat cliffs abut onto the sands at the southern head of the bay. Sruwaddacon Bay is a shallow estuary located on the east side of the bay, into which the Glenamoy and Muingnabo rivers drain. Bed types range from mudflats and sand banks in the upper estuary to extensive areas of sandy shore in the outer parts of the estuary. An area of sand dunes occurs on the north side of the mouth of the Sruwaddacon Bay. Salt marshes occur in the very inner, sheltered reaches of Broad Haven Bay, such as at Barnatra.

Site Importance - County Geological Site

Broad Haven Bay is located on the very north-western corner of Mayo and Connacht, and as such occupies something of a frontier location facing into the Atlantic. The site is currently located within the Broad Haven Bay SAC. In addition to the dramatic coastal features, and associated habitats/biodiversity, the coastline is rich in archaeological heritage. This is an important County Geological Site.

Management/promotion issues

An information board at the parking facility/trailhead on Erris Head, at Rinroe Point, and at Broad Haven Pier would prove valuable in communicating aspects of the site's geodiversity and associated biodiversity. Access to prominent viewing locations is naturally limited to specific locations such as beaches, headlands, piers and walking trails. Otherwise, access to cliff sites and tidal areas should be discouraged owing to safety issues.



View of Kid Island and Benwee Head on the NE side of Broad Haven, looking NE from Erris Head.



Rinroe Point, looking south towards Graghil, on the east side of Broad Haven Bay.



Cliffs at Glenlara, looking west across Broad Haven Bay towards Rossport.

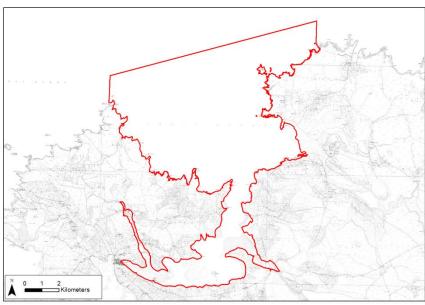


Narrow inlet on the west side of Broad Haven Bay.



Sand dunes along the coast between Rinroe Point and the Sruwaddacon Bay. Dooncarton Radar Station tower visible in the distance (south).





Hennessy et al. 2014 (revised 2019). Geological Survey Ireland.