# **GALWAY - COUNTY GEOLOGICAL SITE REPORT**

NAME OF SITE Lough Coy

Other names used for site

IGH THEME IGH1 Karst

TOWNLAND(S) Loughaunawadda

NEAREST TOWN/VILLAGE Gort SIX INCH MAP NUMBER 114

ITM CO-ORDINATES 548962E 707490N (centre of lake)
1:50,000 O.S. SHEET NO. 52 GSI BEDROCK 1: 100,000 SHEET NO. 14

# **Outline Site Description**

A large turlough in the lowlands, on the north western flanks of Slieve Aughty.

# **Geological System/Age and Primary Rock Type**

The karst feature is in Carboniferous Limestone but is probably post glacial (Holocene) in age.

#### **Main Geological or Geomorphological Interest**

This turlough is presumed to lie on the underground route of the Owenshree River downstream of its lowest sink at Peterswell/Blackrock. It occupies a 20 m deep hollow in till deposits. The turlough fills and empties via a large estavelle, its hydraulic behaviour depending on the relative water levels in Blackrock and in the Hammerhead sink of the Ballylee River 1 km to the south. The water drains to the eastern spring at Kinvara. Interesting sediment sequences are exposed in the sides of the hollow, including lacustrine marl with dropstones, some 6-10 m above the present floor of the turlough. There are also fluvioglacial gravels underneath the marls. This sediment sequence has great research potential. Lough Coy is an excellent example of an estavelle fed turlough which may be operative at any time of the year.

## Site Importance - County Geological Site; recommended for Geological NHA

This is one of numerous sites within the Gort-Kinvara lowlands which make up a complex of international importance. The site is recommended to NPWS for designation as a geological NHA, comprising one of 15 critical sites within the Gort-Kinvara lowland karst which is one of the best studied lowland karst areas of the World.

## Management/promotion issues

The geological boundary is the same as the existing SAC 002117 – Lough Coy. The site is on private farmland and permission should be sought from the landowner before visiting. It is not particularly suitable for promotion to the general public, being a sensitive ecological environment.



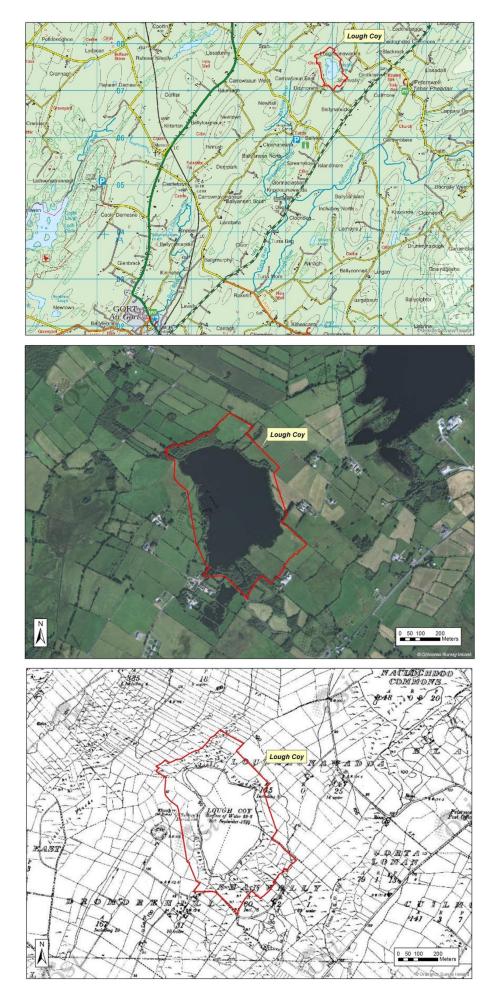
Lough Coy panoramic view.



Lough Coy panoramic view.



Lough Coy sink and a panoramic view.



Meehan et al. 2019. Geological Survey Ireland.