LEITRIM - COUNTY GEOLOGICAL SITE REPORT

NAME OF SITE Other names used for site IGH THEME TOWNLAND(S) NEAREST TOWN/VILLAGE SIX INCH MAP NUMBER ITM CO-ORDINATES 1:50,000 O.S. SHEET NUMBER 26 GISCODE LM026 Polticoghlan Pulthy, Pulthyclougher, Pollticlogher, Pollthy IGH1 Karst Gortnawaun, Mullaghgarve Drumshanbo 21 603000E 803970N GSI BEDROCK 1:100,000 SHEET NO. 7

Outline Site Description

A large chambered cave lies beneath a narrow slot in a stream gully, which loses flow into the cave.

Geological System/Age and Primary Rock Type

The cave is formed within the Bricklieve Limestone Formation and the overlying Meenymore Formation, of Mississippian (Dinantian, Lower Carboniferous) age.

Main Geological or Geomorphological Interest

Geologically, the cave is formed on the boundary of impermeable rocks (shales) forming the upland area and the permeable limestone rocks in the lower ground. The stream largely sinks underground into Polticoghlan along a rift opening at the end of a short rocky gorge.

The cave has a very large chamber, around 40m across, with outlet passages, but a further chamber beside it leads downward into a large rift passage which descends, giving a total depth of about 67m below the surface. The water in the cave rises again at Aghacashel around 1.6km away to the southeast.

The cave has not been dated, but the existence of a large chamber prompts the question of whether the cave is simply a large chambered post-glacial cave or whether the cave formation started either before glaciation or during interglacial periods, and is an inherited landform where the current stream is undersized for the cave's volume.

Site Importance – County Geological Site

Polticoghlan is a large cave, somewhat isolated from the main areas of extensive caves and potholes in Leitrim and merits recognition as a County Geological Site. The cave is a good example of where a stream that flows over impermeable rocks and then immediately sinks underground on reaching carbonate (limestone) rocks, which are classed as karstified.

Management/promotion issues

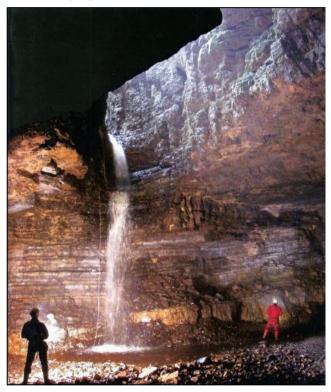
The cave is on the divide between private farmland and mature forestry, and should not be visited without permission. It is extremely overgrown, and from that quite dangerous, and is only really accessible at surface with great effort, and underground only accessible to experienced cavers.



The entrance to Polticoghlan is in a stream gorge within the forestry.



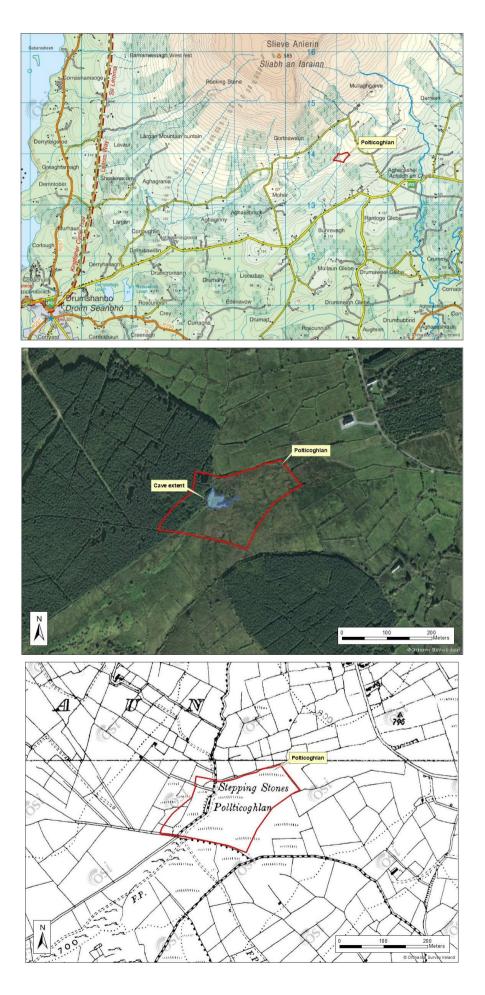
The stream gorge before the cave entrance.



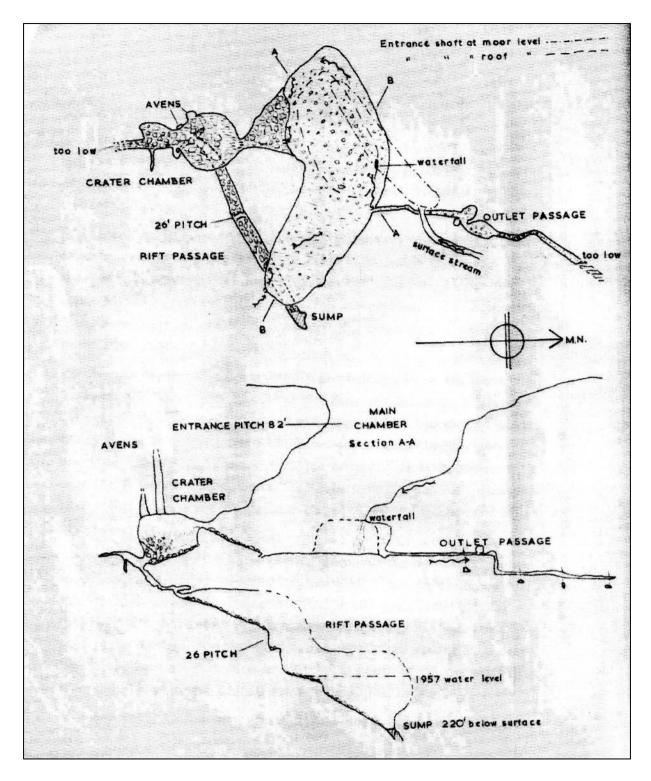
Inside the main chamber of Polticoghlan (photo by Colin Bunce, reproduced from the cover of *Irish Speleology* 19, October 2010).



A view into the chasm.



Parkes et al., 2020. Geological Survey Ireland.



Cave survey and section from 1959 reproduced courtesy of Speleological Union of Ireland