GALWAY - COUNTY GEOLOGICAL SITE REPORT

NAME OF SITE	**Tully Shore**
Other names used for site	
IGH THEME	**IGH11 Igneous intrusions, IGH6 Mineralogy**
TOWNLAND(S)	**Gorteennaglogh**
NEAREST TOWN/VILLAGE	**Tully**
SIX INCH MAP NUMBER	**10**
ITM CO-ORDINATES	**469630E 763150N**
1:50,000 O.S. SHEET No. 37	**GSI BEDROCK 1:100,000 SHEET NO. 10**

Outline Site Description
Series of large outcrops on foreshore.

Geological System/Age and Primary Rock Type
Ben Levy Grit Formation schists, of uncertain but possible Dalradian age, hosting serpentinite bodies. The serpentinite is of uncertain age but presumed to be Cambro-Ordovician. Conspicuous emerald green fuchsite occurs within the serpentinite.

Main Geological or Geomorphological Interest
Pods of serpentinite occur within the Ben Levy Grit Formation schists along the foreshore east of Tully pier. The schists are generally mylonitic and comprise grey semi-pelitic and psammitic rocks. The serpentinite pods range in size from less than a metre across to >5 m. Marginal serpentinite is commonly sheared and altered to talcose material. The mylonitic nature of the host rocks and the sheared marginal serpentinite tend to obscure the true nature of the contact between the pods and the enclosing schists, although intrusive or faulted contacts are absent. They are thus distinct from the other mafic rocks found within the Ben Levy Grit Formation, including the Dawros and Currywongaun metagabbros. The serpentinites may be olistoliths, i.e. components of an olistostrome, a heterogenous mass of blocks and mud produced by submarine flow in a sedimentary basin. They have also been considered to be alpine-type serpentinites, produced by secondary emplacement following remobilization from their original location during orogeny.

The serpentinites are exposed over a distance of c. 300 m eastwards from Tully pier. At the eastern end of the site abundant emerald green fuchsite, a chromium-rich mica, occurs within serpentinite and its altered talcose margin.

Site Importance – County Geological Site
Tully Shore is a readily accessible site with excellent exposures of relatively uncommon serpentinite rock and the Cr-rich mica fuchsite.

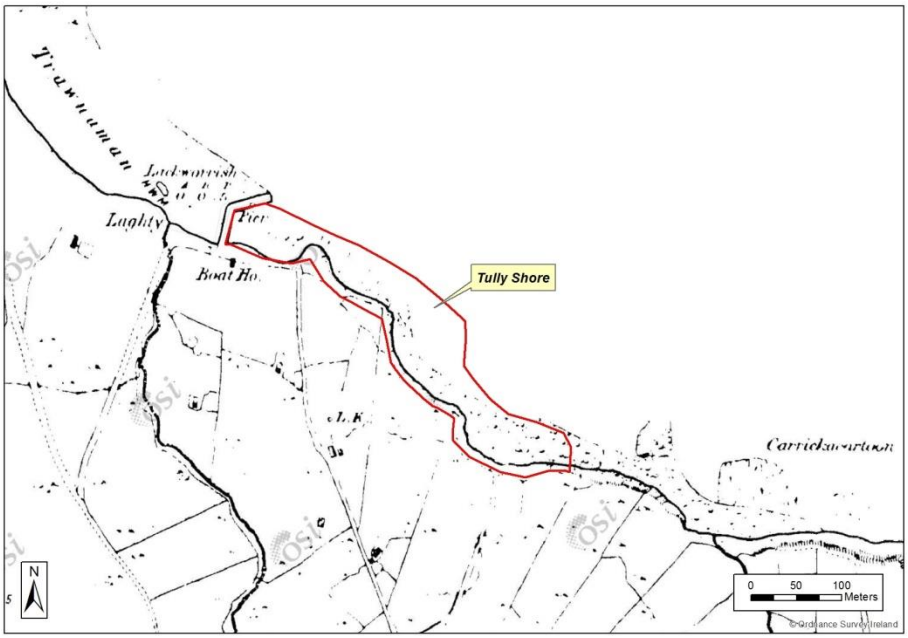
Management/promotion issues
The site is on the foreshore and abuts the West Connacht Coast SAC (002998), designated for its marine habitats. Although good exposures of fuchsite are relatively uncommon in Ireland, there is no evidence of any mineral collecting at the site. There appears to be no requirement for specific management. Promotion is not required and may even be undesirable lest it lead to unwanted collection of mineral specimens.

View east from Tully pier showing large foreshore outcrop. The site extends a further 250 m east from here.

Talcose rock (below hammer, eastern end of site) at margin of serpentinite body.

Green fuchsite in talcose rock, eastern end of site.

Serpentinite ‘pod’ (centre, darker colour) in host schists – the softer serpentinite has a lower profile than the schists. Western end of site.



Meehan et al. 2019. Geological Survey Ireland.