

County: Cornwall

Site Name: De Lank Quarries

District: North Cornwall

Status: Site of Special Scientific Interest (SSSI) notified under Section 28 of the Wildlife and Countryside Act, 1981, as amended.

Local Planning Authority: Cornwall County Council
North Cornwall District Council

National Grid Reference: SX 101753 **Area:** 21.91 (ha) 54.13 (ac)

Ordnance Survey Sheet 1:50,000: 200 **1:10,000:** SX 17 SW, NW
SX 07 SE, NE

Date Notified (Under 1949 Act): – **Date of Last Revision:** –

Date Notified (Under 1981 Act): 1994 **Date of Last Revision:** –

Other Information:

A Geological Conservation Review site.

Description and Reasons for Notification:

This site provides a superb example of Cornubian coarse biotite granite of small megacryst type (S-type), within the Permo-Carboniferous Bodmin Moor intrusion. The granite has a strong, approximately north-south trending sub-vertical tectonic foliation, emphasised by orthoclase megacrysts and irregular bands of strained quartz. This site provides one of the strongest examples of this texture and unique, unambiguous evidence of a deformation origin. The deep quarries also clearly demonstrate that the sub-horizontal jointing within near-surface granite exposures disappears with depth, and are not therefore an original cooling feature. Other important features of this site include a major occurrence of fresh, fine-grained megacrystic biotite granite and three substantial outcrops of late-stage granite porphyry ('elvan') dykes.

All these features are of key importance in deciphering the complex intrusive history of the Cornubian batholith during the late Palaeozoic.