



South Wales RIGS Group Site Record

RIGS Description

SECTION A

General	South Wales
Site Name: Coed Craig Ruperra	File Number: Site_TS_4
RIGS Number: 697	Surveyed by: T Sharpe & J Hiscott
Grid Reference: ST 2250 8654	Date of Visit: 27 th November 2009
RIGS Category: Scientific	Date Registered:
Earth Science Category: Stratigraphical	Owner: Ruperra Conservation Trust Planning Authority: Caerphilly County Borough Council
Site Nature: Disused quarry	Documentation prepared by: T Sharpe
Unitary Authority: Caerphilly County Borough Council	Documentation last revised: 7 th September 2011
OS 1:50,000 Sheet: 171	Photographic Record: Attached
OS 1:25,000 Explorer Sheet: 152	
BGS 1:50,000 Sheet: 249	
<p>RIGS Statement of Interest:</p> <p>The red mudstone rocks of the late Silurian-early Devonian Old Red Sandstone in this part of South Wales contain several beds of limestone, one of which is the Ruperra Limestone. This occurs over a distance of about 3 km only in the area south of Draethen. These limestones (known as calcretes) formed by the growth of calcium carbonate nodules within soils in the semi-arid environment which prevailed here about 400 million years ago. The limestone was quarried on a small scale for agricultural lime. The Ruperra Limestone forms a low NE-SW ridge parallel and close to the southeastern boundary of the Coed Craig Ruperra Reserve.</p> <p>The site is important because not only does it provide a potentially valuable exposure of the Ruperra Limestone for future study, but it lies within a reserve with good public access.</p>	

Geological setting/context:

The site is a steep slope on the SE side of a low, overgrown ridge close and parallel to the SE boundary of the Coed Craig Ruperra Reserve, 550 m ENE of Ruperra Castle. The ridge is formed of the Ruperra Limestone, an impersistent rubbly grey calccrete limestone near the top of the St Maughans Formation of the early Devonian (Emsian) Lower Old Red Sandstone. The limestone lies within a series of conglomeratic units known as the Llanishen Conglomerate and forms a low ridge along its outcrop. In this area, the Ruperra Limestone extends for about 3 km, although exposure is intermittent. The Ruperra Limestone has been worked in several places for agricultural lime. About 2 m of limestone dipping northwest at 30° have been recorded at a now much overgrown disused quarry in this vicinity.

In the Newport district, three pedogenic limestones have been recorded within the largely mudrock sequence of the Lower Old Red Sandstone, the Bishop's Frome Limestone at the top of the Raglan Mudstone Formation, the Coldra Limestone within the lower St Maughan's Formation, and the Ruperra Limestone near the top of the St Maughan's Formation.

References:

ALLEN, J R L. 1975. Source rocks of the Lower Old Red Sandstone: Llanishen Conglomerate of the Cardiff area, South Wales. *Proceedings of the Geologists' Association*, **86**, pp.63-76.

SHARPE, T. 2010. The rocks of Craig Ruperra. *Ruperra Conservation Trust Newsletter*, No 39, Winter 2009-10, pp.5-8.

SQUIRRELL, H C and DOWNING, R A. 1969. *Geology of the South Wales Coalfield, Part I, the country around Newport (Mon.). Explanation of One-inch Geological Sheet 249, New Series*. Third edition. London: HMSO, xiii + 333pp.

STRAHAN, A. 1899. *The geology of the South Wales Coalfield. Part I. The country around Newport. Memoirs of the Geological Survey of England and Wales*, 249. London: HMSO, vi + 97pp.

SECTION B

PRACTICAL CONSIDERATIONS:

Please score Accessibility and Safety Red Amber or Green

Accessibility:



Comment: The site can be reached by a track from the gate into the woodland about 370 m east of Ruperra Castle. From the gate, take a footpath running behind the reserve noticeboard into the woods and follow this until about 15 m before a wooden bench and turn SE through vegetation to the SE side of a low ridge.

Safety:



Comment: The site is an over grown steep rock face and care is required on the approach and when pushing through dense undergrowth.

Conservation status:

The site is owned by Ruperra Conservation Trust.

OWNERSHIP/PLANNING CONTROL:

Owner/tenant: Ruperra Conservation Trust

Planning Authority: Caerphilly County Borough Council

Planning status/constraints/opportunities:

There are no known planning constraints or opportunities

CONDITION, USE & MANAGEMENT:

Present use: Disused quarry and adjacent scarp slope.

Site condition: Poor. The site is very overgrown with only a little exposure. Clearance could expose a section approximately 4 m high by 6 m long.

Potential threats: Further growth of vegetation at the site.

Site Management: Once cleared, vegetation at the site would need to be kept under control to maintain exposure.

SITE DEVELOPMENT:

Potential use (general): The site has the potential for academic study.

Potential use (educational): The site is of value for demonstrating the occurrence of calcretes with the Old Red Sandstone to students.

Other comments:

Photographic Record



Overgrown scarp slope of the Ruperra Limestone



Hand specimen of Ruperra Limestone