

## **COPYRIGHT NOTICE**

This geotechnical log and its associated data (the Document) is licensed by the Queensland Department of Transport and Main Roads under the [Creative Commons Attribution 4.0 Licence](#) (CC BY 4.0). When reusing the Document, in whole or in part, please attribute the Department as follows: "*(c) State of Queensland (Department of Transport and Main Roads) 2020, licensed under the CC BY 4.0 Licence*". This licence does not apply to the Queensland Government logo or trademarks.

## **LIMITATION OF LIABILITY**

The CC BY 4.0 Licence contains a comprehensive Disclaimer of Warranties and Limitation of Liability. In addition, please note that this Document was prepared for Departmental use only. Reuse of the Document by anyone for any other purpose could result in error and/or loss. You should obtain professional advice before making decisions based on the contents of the Document.

When reproducing any part of this Document, you must also reproduce this limitation of liability notice in addition to the italicised attribution statement above.

Retrieved from the Queensland Geotechnical Database <http://qgd.org.au/>



# ENGINEERING BOREHOLE LOG

FOR GEOTECHNICAL TERMS AND  
SYMBOLS REFER FORM F:GEOT 017/6-2010

BOREHOLE No BH54  
SHEET 1 of 2  
REFERENCE No H11093

PROJECT Moreton Bay Rail Link  
LOCATION Bruce Hwy Rail Bridge 6, Abutment B, Ch.4820 COORDINATES 501906.3 E; 6985851.2 N  
PROJECT No FG5921 SURFACE R.L. 7.70m PLUNGE      DATE STARTED 5/7/11 GRID DATUM MGA94 Zone 56  
JOB No 250/120/3 HEIGHT DATUM AHD BEARING      DATE COMPLETED 5/7/11 DRILLER R&D Drilling Pty Ltd

DEPTH (m)	R.L. (m)	AUGER CASING OTHER CORE DRILLING	RQD ( ) %	CORE REC %	SAMPLE	MATERIAL DESCRIPTION	LITHOLOGY	USC WEATHERING	INTACT STRENGTH					DEFECT SPACING (mm)				GRAPHIC LOG	ADDITIONAL DATA AND TEST RESULTS	SAMPLES TESTS
									EH	VH	IN	N	J	VL	EL	20	60	200		
0	7.70					<b>Gravelly Silty CLAY</b> Red yellow, moist, very stiff.  High plasticity.  Gravel fraction sizing <50mm.													Non-destructive drilling up to 1.5m depth. (Based on Driller's logs only)	
1								(CH)												
2	6.20				A	<b>Silty CLAY (RESIDUAL)</b> Mottled grey red white, moist, very stiff to hard.  High plasticity.  Minor gravel and iron oxide in parts.													10,10,17 N=27	SPT
3					B														8,14,19 N=33	SPT
4					C			(CH)											13,14,16 N=30	SPT
5					D	Becoming grey below 4.5m.													9,12,22 N=34	SPT
6	1.70				E	Gradually grading into low strength rock with depth.													16,28,30/110mm N>50	SPT
7			(86)			<b>SANDSTONE</b> Fine to medium grained, massive, poorly cemented sedimentary rock mainly comprising sand-sized particles <b>MW:</b> Mottled red grey yellow, fine grained, massive with slightly laminated, low to medium strength.  Poorly cemented quartz feldspathic clay matrix; iron staining throughout.  Becoming yellow below 8m.  Defects: - Drilling-induced lamination partings @ 5-7° (4/m)  Defect surfaces are mainly medium spaced, irregular, slightly rough, open and iron stained.														
8			100 (79)				MW												Coarse grained Sst, approx. 300mm thick.  Is(50) = 0.12MPa Is(50) = 0.04MPa	x o
9	-1.23		100 (100)																Is(50) = 0.61MPa Is(50) = 0.64MPa	x o
10						<b>SW:</b> Pale grey, fine to coarse grained, massive with slightly laminated, medium to mainly high strength.  (See over)		SW											Is(50) = 1.50MPa Is(50) = 2.10MPa	x o
																			Is(50) = 1.72MPa	x

REMARKS     

LOGGED BY  
BW / LVD



<b>Project Name</b>	<b>Moreton Bay Rail Link (MBRL)</b>		
<b>Project No</b>	FG5921	<b>Date</b>	05/07/11
<b>Borehole No</b>	BH 54	<b>TMR H No</b>	
<b>Location</b>	Bruce Highway Rail Bridge	<b>Start Depth (m)</b>	6.00
<b>Detail</b>	Abutment B Structure	<b>Finish Depth (m)</b>	14.95
<b>Chainage</b>	4828 Approx	<b>Submitted By</b>	BW
<b>Remarks</b>			

  


SCALE 1:5