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

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	ent:			·	; 40 m	EC			GEOTI	ECHN	ICA	AL LOG OF NON-CORE DRILLHOLE	1	Borehole Sheet No Project N	b: 1 OF 3
Pro Fea	ojec atur	:t: 'e:	Sm		lsen			Des	ign Geotec	h Inves	tiga	tion Co-ordinates System: UTM Zone 56 Easting: 536457.3m E Northing: 6906747.6m S	Α	urface F Ingle fro Virection	m Horz: 90
		DRI	ILLIN	G				TES	STING		_	SUBSTANCE		1	
Method		Fast	Sate Slow		Sample	Depth (m)	Depth/RL	Type	Sample or Field Test	Graphic Log	USC Symbol	Description Soil Type: density/consistency, grain size/plasticity, colour, particle shape/secondary components, minor constituents, moisture, origin, additional observations.	Moisture	Consistency/ Density	Other Observations
_ - -	2	3	4 5	6	7	8	9	10	11	12	13 CI	14 Silty CLAY: Firm to stiff, medium plasticity, pale brown red-brown, dry, possible fill.	15 D	F St	17
ATC						- 1 -	0.90 14.81					Silty CLAY: Very stiff, low to medium plasticity, grey mottled red-brown, moist residual.	м	VSt	
					SPT	- - 2	<u>1.50</u> 14.21	s	5,5,6 N=11			SILTSTONE: Extremely low strength, extremely weathered, grey-yellow and red some quarts inclusions (remoulds to low-medium plasticity Silty CLAY).			-
					SPT	- 3 -	<u>3.00</u> 12.71	S	14,13,12 N=25			Extremely low strength very low strength in parts, grey to dark grey some iron staining, thinly laminated.			
-						4	4.20					Refer to Geotechnical Log of Cored Drillhole			-
-						- - 5	-								
-						- - 6-	-								-
-						- - 7—	-								-
						- - - 8-									
-						-	-								
-						9									-
Not	es (I	nstr	umen	tation	etc):										
Con Equ	ipm	tor: ent:	(GeoDri Hydrop	ll			tions :	are given on e	xplanatory	note	Commenced: 11/08/11 Completed: 11/08/11			Logged By: ME/BD Checked By: AR

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Pro Fea		e: on:	QI Sn Re	DTN nith	Olse	en De	etaile Plan	d Design Geotech Investigation Co-c	ordinates (Sy	rstem: UTM E: 5364 N: 6906	157. 6747	3 7.6	6			Angle f	e RL (m): 15.71 from Horz: 90 on: n/a
	DRIL	LIN	IG					SUBSTANCE		Τ			EST	-				DEFECTS
					Ê	Ч		Description	Weatherin	g	Estimated Strength				Fractu acing	ure (mm)		Description
Method	Water	TCR %	RQD %	±	Depth (m)	Depth/RL	Graphic Log	ROCK TYPE, mineralogy, grain size, colour, fabric, etc.				Type	Result		40 3	300	Depth	Type, Orientation, Spacing, Infi Coating, Planarity, Roughne Thickness.
Ĕ 1	2	Р 3	8 4	Lift 5	õ 6	ŏ 7	ت <u>ق</u> 8	9	출독	Ĕ	<u>ਜ਼ਖ਼ੑੑੑੑੑੑਸ਼ਫ਼ਸ਼ਖ਼ਜ਼</u> 11	12	_	20	100	1000	15	16
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					-													
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					2-			Refer to Geotechnical log of Non-cored Drillhole										
					-													
					-3-													
					-													
					4-													
		100				<u>4.20</u> 11.51	•	Start Coring at 4.20m ARGILLITE: Pale grey stained pale orange, fragmented, laminated, extremely low strength to										
		100	0	4.7	_	4.70		very low strength, extremely weathered.									4.73	Be, 30, St, Fe, Un, Ro
		100	20		5-	11.01		Dark grey stained orange-brown and pale brown, fractured, low strength, highly weathered to moderately weathered.									4.73	J, 45, Vn, Cy, Pl, Sm
				5.2	- -	5.20 10.51	•										5.07-5.20	CZ, In, Cy, Ir, Ro
					-	10.51		Dark grey with pale grey-brown laminations, some iron staining along defects/laminations, slightly fractured, medium strength to low									5.31	Be, 30, Vn, Fe, Un, Ro
					_			strength, moderately weathered to slightly weathered.									5.54	Be, 40, St, Fe, Pl, Sm
		100	66		6-													
					-		•										6.32	F, 20, Vn, Cl, Un, Ro
				6.6		6.55 6.65			┤╎┡┻┩╵								6.45	Be, 40, Vn, Fe, Un, Ro
					-	9.06	•	CORE LOSS (6.55m to 6.65m) Dark grey with pale grey-brown laminations,	1								6.69	J, 50, Vn, Cy, Pl, Sm
		87	17		7—			some iron staining along defects/laminations, slightly fractured, medium strength to low strength, moderately weathered to slightly									6.90 7.10	J, 50, Vn, Cy, Pl, Ro SM, 20, In, Cy, St, Sm
				7.4	-			weathered.									7.41	Be, 40, Vn, Cy, Un, Sm
					-													,,,,,
		100	0		-												7.77 7.85	J, 15, Ct, Cy, Pl, Sm J, 50, St, Cy, Un, Ro
					8-												8.00 8.12 8.22	Be, 20, In, Cy, PI, Sm, 3mm Be, 30, St, Fe, PI, Ro
				8.4	-												8.22	J, 30, In, Cy, Ir, Ro, 3mm
					-	8.66 7.05		Medium strength to high strength, slightly	╡╎┡╋╢╵								8.30-8.70	cz
		100	42		- 9			weathered.									8.98 9.02	Be, 30, Vn, Cy, Pl, Sm J, 60, Dis, Vr
																	9.02	J, 60, Dis, Vr
				9.6	-		• •											
		100	10		-		•										9.66	Be, 60, St, Fe, Pl, Ro
				Itatic	on etc).				Ц								
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		ILLI						SUBSTANCE								TE	ST					DEFECTS		
								Description		Weat	theri	ng	Est	imat	ed			Fra	acture			Descrip	tion	
12		%	%		Ē	/RL	i	ROCK TYPE, mineralogy, grain size,					Str	engt	th		Ŧ	Spaci	ing (mi	m)		Type Orient	ation, Spacing	
Method	Water	TCR	RQD	Lift	Depth (m)	Depth/RL	Graphic Log	colour, fabric, etc.		223	≧≷ư		┙┙		лт	Type	Result	40	300		Depth	Coating, F	lanarity, Rou Thickness.	jhness,
1	2	3		5	6	7	8	9	i		≥ິທີມີ 10			11 II	:>ш	12	13		100 10 14	000	15		16	
					_		•	Medium strength to high strength, slightly weathered. (continued)																-
ŀ		100	0 10		-																10.40	J, 85, St, Fe, Pl, R	2	-
F				10.6	-	-		Hole discontinued at 10.55m					++							╟				
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	Grey Scale	Borehole	Number	BH	114
		Box	1	of	2
L	Colour Scale	Depth	4.20m	to	10.00m
1		Project	Smith St & O	lsen Av	
i.		Number	3003659		
		Client	QDTMR		
BHII4					
	COLORE LOS COLORE LOS				
	CORE LOS				
12 10 10 10 10 10 10 10 10 10 10 10 10 10					

	Grey Scale	Borehole	Number	BH	114
SMEC	Colour Scale	Box Depth Project Number Client	2 10.00m Smith St & C 3003659 QDTMR	of to Disen Av	2 10.55m
BH114			1/2 the	25.01	EOH
81114				45"al	E.O.H
BH114				Stol	E.O.H

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NOTES RELATING TO GEOTECHNICAL REPORTS AND SITE INVESTIGATION LOGS

GEOTECHNICAL REPORTS AND SITE INVESTIGATION LOGS

Geotechnical reports/logs are prepared by qualified personnel on the information supplied or obtained and are based on current engineering standards of interpretation and analysis.

Information may be gained from limited subsurface testing, surface observations, previous work, and is supplemented by knowledge of the local geology and experience of the range of properties that may exhibited by the materials present. For this reason, geotechnical reports should be regarded as interpretative rather than factual documents, limited to some extent by the scope of information on which they rely.

Where the report/log has been prepared for a specific purpose (e.g. design of a three-storey building), the information and interpretation may not be appropriate if the design is changed (e.g. a twenty-storey building). In such cases, the report/log and the sufficiency of the existing work should be reviewed by SMEC in the light of the new proposal.

Every care is taken with the report/log content; however, it is not always possible to anticipate or assume responsibility for the following conditions:

- Unexpected variations in ground conditions. The potential for this depends on the amount of investigative work undertaken.
- Changes in policy or interpretation by statutory authorities
- The actions of contractors responding to commercial pressures

If these occur, SMEC would be pleased to resolve the matter through further investigation, analysis or advice.

UNFORESEEN CONDITIONS

Should conditions encountered on site differ markedly from those anticipated from the information contained in the report/log, SMEC should be notified immediately. Early identification of site anomalies generally results in any problems being more readily resolved and allows re-interpretation and assessment of the implications for future work.

SUBSURFACE INFORMATION

Logs of a borehole, recovered core, test pit, excavated face, or cone penetration test are an engineering and/or geological interpretation of the subsurface conditions. The reliability of the logged information depends on the drilling/testing method, sampling/observation spacing's and the ground conditions. It is not always possible or economic to obtain continuous high-quality data. It should also be recognised that the volume of material observed or tested is only a fraction of the total subsurface profile.

Interpretation of subsurface information and application to design and construction must take into consideration the spacing of the test locations, the frequency of observations and testing, and the possibility that geological boundaries may vary between observation points.

Groundwater observations and measurements outside of specially designed and constructed piezometers should be treated with care for the following reasons:

- In low permeability soils groundwater may not seep into an excavation or bore in the short time it is left open.
- A localised perched water table may not represent the true water table.
- Groundwater levels vary according to rainfall events or season.
- Some drilling and testing procedures mask or prevent groundwater inflow.

The installation of piezometers and long-term monitoring of groundwater levels may be required to adequately identify groundwater conditions.