



NON-CORE DRILL HOLE - GEOLOGICAL LOG

HOLE NO : BH-014

CLIENT : MPDC
LOCATION : Macquarie Point

PROJECT : Macquarie Point GI

FILE / JOB NO : PS212776
SHEET : 1 OF 4

POSITION : E: 527567.03, N: 5252421.68 (MGA2020-55) SURFACE ELEVATION : 3.79 (AHD) ANGLE FROM HORIZONTAL : 90°
 RIG TYPE : MRS XL Max MOUNTING : Track CONTRACTOR : SWD DRILLER : GB
 DATE STARTED : 29/4/2024 DATE COMPLETED : 30/4/2024 DATE LOGGED : 30/4/2024 LOGGED BY : TS CHECKED BY : JRG

DRILLING					MATERIAL					
PROGRESS		DRILLING PENETRATION	GROUND WATER LEVELS	SAMPLES & FIELD TESTS	DEPTH (m) RL (m AHD)	GRAPHIC LOG	GROUP SYMBOL	MATERIAL DESCRIPTION Soil Type, Colour, Plasticity or Particle Characteristic Secondary and Minor Components	MOISTURE CONDITION CONSISTENCY RELATIVE DENSITY	STRUCTURE & Other Observations
DRILLING & CASING	WATER									
		F			0.0		0.06m	FILL ASPHALTIC CONCRETE.	D	FILL Acid Sulfate Sampling every 0.5m to bedrock
					0.65m		FILL Clayey Gravelly SAND: fine to medium grained, black to dark grey, gravel is fine to medium grained, sub-angular to angular.	D - M		
		E-F		1.50m SPT 4.9.5 N=14	1.90m		FILL Silty Gravelly CLAY: low to medium plasticity, dark grey to pale grey, gravel is fine to medium grained, sub-angular to angular; with sand, trace building material fragments.	w<PL - w=PL		
				1.95m	2.0		2.70m	FILL Gravelly Clayey SAND: fine to coarse grained, red brown.	D	
				3.00m SPT 3.1.1 N=2	3.0		3.00m	2.90m: steel mesh fragment FILL Gravelly Sandy CLAY: sub-rounded to sub-angular, medium plasticity, black, trace glass, wood.	w=PL	3.10-4.00: PP=60kPa
				3.45m	4.0		4.00m	Clayey SAND: fine to medium grained, uniform, black to dark grey mottled green.	L	
		E		4.00m U	4.0		4.00m		M - W	
				4.45m SPT 4.6.4 N=10	5.0	SC	5.80m	SAND: fine to medium grained, uniform, black to dark grey, trace sea-shells, sub-rounded to angular gravel.	VL - L	
				4.95m	6.0		6.80m			
				6.00m SPT 1.1.3 N=4	6.0	SP-SC	6.80m			
				6.45m	7.0	SP	7.00m	SHELLY SAND: fine to medium, uniform, black to dark grey, shelly sub-rounded to sub-angular; trace sub-rounded to rounded gravel.		
		VH		Is(50) I=5.57 MPa	8.0			DOLERITE: fine to medium grained, grey-blue, with iron staining, inferred as moderately weathered, high to very high strength.		ROCK

See Explanatory Notes for details of abbreviations & basis of descriptions.

WSP-AU-GLB Log IS AU BOREHOLE 2A PS212776_MASTER.CPJ <DrawingFiles> 18/6/2024 12:25 10.03.00.09 Digital Lab and H. Silu Tech - DGD [Lib: WSP-5.05.2.2023-08-23 Proj: WSP-5.04.0.2023-04-11



NON-CORE DRILL HOLE - GEOLOGICAL LOG

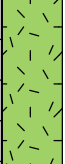
HOLE NO : BH-014

CLIENT : MPDC
LOCATION : Macquarie Point

PROJECT : Macquarie Point GI

FILE / JOB NO : PS212776
SHEET : 2 OF 4

POSITION : E: 527567.03, N: 5252421.68 (MGA2020-55) SURFACE ELEVATION : 3.79 (AHD) ANGLE FROM HORIZONTAL : 90°
 RIG TYPE : MRS XL Max MOUNTING : Track CONTRACTOR : SWD DRILLER : GB
 DATE STARTED : 29/4/2024 DATE COMPLETED : 30/4/2024 DATE LOGGED : 30/4/2024 LOGGED BY : TS CHECKED BY : JRG

DRILLING					MATERIAL						
PROGRESS		DRILLING PENETRATION	GROUND WATER LEVELS	SAMPLES & FIELD TESTS	DEPTH (m) RL (m AHD)	GRAPHIC LOG	GROUP SYMBOL	MATERIAL DESCRIPTION Soil Type, Colour, Plasticity or Particle Characteristic Secondary and Minor Components	MOISTURE CONDITION	CONSISTENCY RELATIVE DENSITY	STRUCTURE & Other Observations
DRILLING & CASING	WATER										
S PWT		VH		Is(50) f=6.69 MPa	8.0 -4.2			DOLERITE: fine to medium grained, grey-blue, with iron staining, inferred as moderately weathered, high to very high strength. (continued)			ROCK
					8.82m			Continued as Cored Drill Hole			
					9.0 -5.2						
					10.0 -6.2						
					11.0 -7.2						
					12.0 -8.2						
					13.0 -9.2						
					14.0 -10.2						
					15.0 -11.2						
					16.0 -12.2						

See Explanatory Notes for details of abbreviations & basis of descriptions.

WSP-AU-GLB Log IS AU BOREHOLE 2A PS212776_MASTER.GPJ <DrawingFiles> 18/6/2024 12:28 10:03:00.Digital Lab and H. Silu Tech - DGD [Lib: WSP 5.05.2.2023-08-23 Proj: WSP 5.04.0.2023-04-11



CORED DRILL HOLE LOG

HOLE NO : BH-014

CLIENT : MPDC
LOCATION : Macquarie Point

PROJECT : Macquarie Point GI

FILE / JOB NO : PS212776
SHEET : 3 OF 4

POSITION : E: 527567.03, N: 5252421.68 (MGA2020-55)	SURFACE ELEVATION : 3.79 (AHD)	ANGLE FROM HORIZONTAL : 90°
RIG TYPE : MRS XL Max	MOUNTING : Track	CONTRACTOR : SWD
DRILLER : GB	DATE STARTED : 29/4/2024	DATE COMPLETED : 30/4/2024
DATE LOGGED : 30/4/2024	LOGGED BY : TS	CHECKED BY : JRG
CASING DIAMETER : 140 mm	BARREL (Length) : 1.50 m	BIT : IMPREG RC10
		BIT CONDITION : Good

DRILLING				MATERIAL				FRACTURES							
DRILLING & CASING	WATER	CORE LOSS DRILL RUN (%)	ROD (%)	SAMPLES & FIELD TESTS	DEPTH (m)	GRAPHIC LOG	DESCRIPTION ROCK TYPE : Colour, Grain size, Structure (texture, fabric, mineral composition, hardness alteration, cementation, etc as applicable)	WEATHERING	ESTIMATED STRENGTH				NATURAL FRACTURE (mm)	VISUAL	ADDITIONAL DATA (joints, partings, seams, zones, etc) Description, orientation, infilling or coating, shape, roughness, thickness, other
									UCS-154 ₂₀₀	UCS	Di	Di ₂₀₀			
					8.0										
					8.82m		8.82m START CORING AT 8.82m								
		0% LOSS	72		9.0		DOLERITE: fine grained, dark grey blue, iron staining along joints.	MW							J, 80°, VN, PR, RF, clay, Fe
		9.50					9.30m-9.85m: vein zone								J, 45°, VN, PR, RF, clay, Fe J, 80°, VN, PR, RF, clay, Fe J, 30°, CT, PR, RF, clayey gravel, 20mm V, 60°, CT, PR, MW Cal, Qz, healed V, 65-80°, CT, PR, MW Cal, Qz, healed V, 75°, CT, PR, MW Cal, Qz, healed V, 75°, CT, PR, MW Cal, Qz, healed V, 85°, CT, PR, MW Cal, Qz, 3mm J, 75°, SN, PR, RF, Fe
		0% LOSS	100		10.0										
		10.38													
		0% LOSS	95	Is(50) I=0.450 MPa	11.0										
		11.71					11.14m								J, 25°, SN, PR, RF, Fe, clay J, 10°, SN, PR, RF, Fe J, 60°, SN, PR, RF, Fe J, 40°, SN, PR, RF, Chl
		0% LOSS	94	Is(50) D>5.86 MPa Is(50) A>7.71 MPa	12.0		DOLERITE: fine grained, pale grey with green, coarse grained, tabular crystals in a fine grain matrix, possible feldspar.	FR							J, 0°, VN, PR, RF, Zeo, Chl J, 75°, CT, PR, RF, Zeo, Chl, clay
		12.86					12.52m								J, 5°, SN, PR, RF, Fe J, 10°, SN, PR, RF, Fe J, 10°, SN, PR, RF, Fe
		0% LOSS	100	Is(50) D>7.51 MPa Is(50) A>8.12 MPa	13.0		DOLERITE: fine to medium grained, dark grey blue, phaneritic.								J, 45°, SN, PR, RF, Chl
		14.35					13.15m								
		0% LOSS	97	Is(50) D>6.88 MPa Is(50) A=6.25 MPa	14.0		DOLERITE: fine to medium grained, dark grey blue, phaneritic.								J, 65°, CT, PR, RF, Zeo, Chl
		15.92					13.70m								
				Is(50) D>8.01 MPa Is(50) A=6.93 MPa	15.0										J, 85-90°, CT, PR, RF, Zeo, Chl
				Is(50) D>2.28 MPa	16.0		16.00m								

See Explanatory Notes for details of abbreviations & basis of descriptions.

WSP-AU-GLB-Log-ISAU-CORED-BOREHOLE-2A-PS212776-MASTER.GPJ -<DrawingFile>- 18/6/2024 12:27 10.03.00.09 Dargal Lab and In Situ Tool - DGD [Lib: WSP-5.03.2 2023-08-23 Proj: WSP-5.04.0 2023-04-11]



CORED DRILL HOLE LOG

HOLE NO : BH-014

CLIENT : MPDC
LOCATION : Macquarie Point

PROJECT : Macquarie Point GI

FILE / JOB NO : PS212776
SHEET : 4 OF 4

POSITION : E: 527567.03, N: 5252421.68 (MGA2020-55)	SURFACE ELEVATION : 3.79 (AHD)	ANGLE FROM HORIZONTAL : 90°
RIG TYPE : MRS XL Max	MOUNTING : Track	CONTRACTOR : SWD
DRILLER : GB	DATE STARTED : 29/4/2024	DATE COMPLETED : 30/4/2024
DATE LOGGED : 30/4/2024	LOGGED BY : TS	CHECKED BY : JRG
CASING DIAMETER : 140 mm	BARREL (Length) : 1.50 m	BIT : IMPREG RC10
		BIT CONDITION : Good


DRILLING				MATERIAL				FRACTURES						
DRILLING & CASING	WATER	CORE LOSS DRILL DEPTH (% LOSS)	ROD (%)	SAMPLES & FIELD TESTS	DEPTH (m)	GRAPHIC LOG	DESCRIPTION ROCK TYPE : Colour, Grain size, Structure (texture, fabric, mineral composition, hardness alteration, cementation, etc as applicable)	WEATHERING	ESTIMATED STRENGTH UCS=194 MPa ● - Axial ○ - Diametral L - UCS M - UCS H - UCS VH - UCS EH - UCS	NATURAL FRACTURE (mm)	VISUAL	ADDITIONAL DATA (joints, partings, seams, zones, etc) Description, orientation, infilling or coating, shape, roughness, thickness, other		
													DRILLING & CASING	WATER
		0% LOSS	100		16.0		DOLERITE: fine to medium grained, dark grey blue, phaneritic.	FR						
		17.51		Is(50) D>7.20 MPa Is(50) A=2.55 MPa	17.0		16.50m	DOLERITE: fine grained, dark grey blue.						
	90% Polymer RETURN	0% LOSS	100	Is(50) D>6.90 MPa Is(50) A=6.74 MPa	18.0									
		19.17		Is(50) D=5.53 MPa Is(50) A>6.89 MPa	19.0	19.17m								
							Hole Terminated at 19.17 m Target depth Grouted to Surface							
					20.0									
					21.0									
					22.0									
					23.0									
					24.0									

See Explanatory Notes for details of abbreviations & basis of descriptions.

WSP-AU-GLB-Log-IS-AU-CORED-BOREHOLE-2A-PS212776-MASTER.GPJ -<DrawingFile> 18/6/2024 12:27 10.03.00.09 Datalab and In Situ Tool - DGD | Lib: WSP-5.03.2 2023-08-23 Proj: WSP-5.04.0 2023-04-11




PointID : BH-014 Depth Range: 0.00 - 1.50 m

	TITLE MPDC Macquarie Point Macquarie Point GI Core Photo - BH-014	DRAWN	DATE	18/6/2024
		CHECKED	DATE	18/6/2024
		SCALE	Not To Scale	A4
		PROJECT No PS212776	FIGURE No 1/8	




PointID : BH-014 Depth Range: 1.50 - 4.00 m

	TITLE	DRAWN	DATE
	MPDC Macquarie Point Macquarie Point GI Core Photo - BH-014	CHECKED	DATE
		SCALE	FIGURE No
		PROJECT No	
		PS212776	2/8




PointID : BH-014 Depth Range: 4.00 - 6.00 m

	TITLE MPDC Macquarie Point Macquarie Point GI Core Photo - BH-014	DRAWN	DATE	18/6/2024
		CHECKED	DATE	18/6/2024
		SCALE	Not To Scale	A4
		PROJECT No PS212776	FIGURE No 3/8	




PointID : BH-014 Depth Range: 6.00 - 7.70 m

	TITLE MPDC Macquarie Point Macquarie Point GI Core Photo - BH-014	DRAWN	DATE	18/6/2024
		CHECKED	DATE	18/6/2024
		SCALE	Not To Scale	A4
		PROJECT No PS212776	FIGURE No 4/8	




PointID : BH-014 Depth Range: 7.70 - 8.82 m

	TITLE	DRAWN	DATE
	MPDC Macquarie Point Macquarie Point GI Core Photo - BH-014	CHECKED	DATE
		SCALE	FIGURE No
		PROJECT No	
		PS212776	5/8




PointID : BH-014 Depth Range: 8.82 - 12.00 m

	TITLE MPDC Macquarie Point Macquarie Point GI Core Photo - BH-014	DRAWN	DATE	18/6/2024
		CHECKED	DATE	18/6/2024
		SCALE	Not To Scale	A4
		PROJECT No PS212776	FIGURE No 6/8	




PointID : BH-014 Depth Range: 12.00 - 16.00 m

	TITLE MPDC Macquarie Point Macquarie Point GI Core Photo - BH-014	DRAWN	DATE	18/6/2024
		CHECKED	DATE	18/6/2024
		SCALE	Not To Scale	A4
		PROJECT No	PS212776	FIGURE No



PointID : BH-014 Depth Range: 16.00 - 19.17 m

	TITLE MPDC Macquarie Point Macquarie Point GI Core Photo - BH-014	DRAWN	DATE	18/6/2024
		CHECKED	DATE	18/6/2024
		SCALE	Not To Scale	A4
		PROJECT No PS212776	FIGURE No	8/8