RIVERBANK ESTATE STAGE 2B FOR PEET CABOOLTURE SYNDICATE LTD



LOCALITY PLAN NTS



EXISTING LOT LOT 1024 SP317233 PROPOSED NO. OF LOTS: 28

MORETON BAY



21-000078.2



LANDSCAPE DRAWINGS (PREPARED BY SAUNDERS HAVILL GROUP)

GEOTECHNICAL REPORT (PREPARED BY SOIL SURVEYS)

PRIOR TO CONSTRUCTION THE CONTRACTO SHALL VERIFY LEVELS OF ALL EXISTING

CONSTRUCTION HOLD POINT

CROSSINGS AND CONNECTION POINTS.

CONSTRUCTION HOLD POINT ONCE THE BASE OF MANHOLES, INSPECTION PITS, GULLIES AND FIELD

INLETS FOR STORMWATER DRAINAGE AND SEWER RETICULATION HAVE BEEN POURED, FURTHER CONSTRUCTION SHALL NOT PROCEED UNTIL TH SUPERINTENDENT AND OR ENGINEER HAVE INSPECTED THE WORKS FOR FINISHED LEVELS AND APPROVED CONSTRUCTION TO CONTINUE.





DRAWING IN	DEX						
GENERAL							
000	COVER SHEET LOCALITY PLAN AND DRAWING INDEX						
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201	BULK EARTHWORKS NOTES AND DETAILS						
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410	STORMWATER DRAINAGE CATCHMENT PLAN						
420	STORMWATER DRAINAGE LONGITUDINAL SECTIONS SHEET 1 OF 2						
421	STORMWATER DRAINAGE LONGITUDINAL SECTIONS SHEET 2 OF 2						
430	STORMWATER DRAINAGE CALCULATIONS TABLES SHEET 1 OF 2						
431	STORMWATER DRAINAGE CALCULATIONS TABLES SHEET 2 OF 2						
440	STORMWATER DRAINAGE NOTES AND DETAILS						
450	STORMWATER DRAINAGE MANHOLE DETAILS						
SEWER RET	CULATION						
500	SEWER RETICULATION NOTES AND DETAILS						
501	SEWER RETICULATION LAYOUT PLAN						
510	SEWER RETICULATION LONGITUDINAL SECTIONS SHEET 1 OF 2						
511	SEWER RETICULATION LONGITUDINAL SECTIONS SHEET 2 OF 2						
WATER RET	CULATION						
600	WATER RETICULATION COVER SHEET						
601	WATER RETICULATION LAYOUT PLAN						

RIVERBANK ESTATE

AS

CONSTRUCTED

2B

M.B.R.C. REF No. DA/2021/0413

000

Α

18.12.2023



Point No.	Easting	Northing		
1	5901.507	3317.431		
2	5903.432	3326.223		
3	5849.462	3338.998		
4	5860.469	3357.014		
5	5853.885	3368.127		
6	5827.045	3364.444		
7	5824.479	3377.844		
8	5824.946	3381.753		
9	5869.699	3396.934		
10	5900.675	3404.408		
11	5907.592	3406.835		
12	5922.146	3408.972		
13	5925.548	3406.558		
14	5949.258	3411.865		
15	5971.865	3421.410		
16	5973.739	3426.110		
17	5970.146	3437.692		
18	5990.156	3461.489		
19	6000.452	3466.091		
20	6010.313	3475.267		

ALL DIMENSIONS TO BE CHECKED ON SITE BY CONTRACTOR PRIOR TO CONSTRUCTION, USE WRITTEN DIMENSIONS ONLY, DO NOT SCALE.



SCALE 1 : 20 (A1)

BULK EARTHWORKS NOTES

- 1
- 2.
- SUPERINTENDENT.
- 4. SITE AREA.

3.

- 5 6.
- 7.
- 8
- 9
- 10.
- AND SAFETY REQUIREMENTS.

* The original issue or last amendment of this drawing contained the original signature.

REVISIO	N DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS	CALE	CLIENT	
1	18.05.22	2 ISSUED FOR APPROVAL	CHC	CHC		AS CONSTRUCTED			
2	21.03.23	3 ISSUED FOR CONSTRUCTION	CHC	CHC					
A	18.12.23	3 AS CONSTRUCTED	JM	HS	05010110115014		1:20 0.2 0 0.2 0.4 0.6 0.8 1 A1		
					DESIGN CHECK	MARK WYFR RPFQ 16191	1:40 A3		
								CABOOLTURE	© 2023 Egis Consulting Pty Ltd
								SYNDICATE LTD	www.eais-aroup.com
						FOR & ON BEHALF OF EGIS CONSULTING PTY LTD			

NOTWITHSTANDING THE LIMITS OF CUTTING AND FILLING SHOWN ON THE CROSS SECTIONS. THE ACTUAL LIMITS SHALL BE DETERMINED ON-SITE BY THE SUPERINTENDENT DURING CONSTRUCTION AND SIMILARLY THE FINISHED SURFACE CONTOURS MAY BE ADJUSTED BY WRITTEN DIRECTION OF THE SUPERINTENDENT DURING CONSTRUCTION.

SUBGRADE TEST RESULTS TO BE FORWARDED TO THE SUPERINTENDENT FOR DETERMINATION OF BOX DEPTHS PRIOR TO EXCAVATION. TESTS SHALL INCLUDE SOAKED CBR AND/OR OTHER TESTS AS REQUESTED BY THE

CONTRACTOR TO LIAISE WITH ALL RELEVANT SERVICE AUTHORITIES TO ASCERTAIN SERVICES PRESENT ON-SITE, ANY ALTERATION WORKS TO SERVICES WILL BE CARRIED OUT BY THAT SERVICE AUTHORITY ONLY. THE CONTRACTOR SHALL NOTIFY THE SUPERINTENDENT PRIOR TO COMMENCING THE DEMOLITION OF ANY EXISTING STRUCTURES WITHIN THE

ALL DRAINAGE STRUCTURES TO BE PRESERVED FROM THE EFFECTS OF STRUCTURAL LOADING GENERATED BY THE EARTHWORKS. ALL EXCAVATION AND FILLING SHALL BE COMPACTED TO THE REQUIREMENTS OF AS3798-2007 IN ACCORDANCE WITH THE LOCAL AUTHORITY REQUIREMENTS. LEVEL 1 SUPERVISION IS REQUIRED. ALL CLEARING SHALL BE CARRIED OUT IN STAGES TO ALLOW FOR RELOCATION OF FAUNA, COMMENCING AT THE LOWER AREAS OF THE SITE. SETBACK TO FRONT OF PADS ARE 3.00m UNLESS OTHERWISE NOTIFIED. CONTRACTOR TO USE INDUSTRY BEST PRACTICE TO ENSURE ADEQUATE DUST CONTROL DURING EARTHWORKS OPERATIONS. ALL CONSTRUCTION ACTIVITIES SHALL COMPLY WITH WORKPLACE HEALTH



M.B.R.C. REF No. DA/2021/0413

BULK EARTHWORKS NOTES AND DETAILS



ALL DIMENSIONS TO BE CHECKED ON SITE BY CONTRACTOR PRIOR TO CONSTRUCTION, USE WRITTEN DIMENSIONS ONLY, DO NOT SCALE. 21-000078.2 201

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	CUT VOLUME (m ³)	FILL VOLUME (m ³)
I PARK CUT	99280	
WITHIN FUTURE PARK	9150	
SIN FILL		15267
PUMP STATION FILL	320	16006
E 14 FILL		19369
		5555
ND WESTERN BRIDGE EMBANKMENT		50376
EMBANKMENT		2008
ROAD FILL		1948
PARK CUT	75632	
INCT		12418
	93	14360
	79	14756
	15053	39096
	45872	33862
	5811	65572
INCT DECANTING BASINS	93875	38352
	126	42873
		45273
	42140	
	57632	
	681	15609
	10320	
	1704	12874
	457768	445574
	12,194m ³ ADDITIONAL FLOOD STORAGE CREATED	

DRAWING TITLE	COMPEN	SATORY							
	EARTHWORKS								
	LAYOU	t plan							
PROJECT No.		DRAWING No.	REVISION						



\triangle

ANDREW STREET ROAD 09 CONTROL SETOUT TABLE

PT	CHAINAGE	EASTING	NORTHING	HEIGHT	BEARING	RAD/SPIRAL	A.LENGTH	DEFL.ANGLE
IP 1	0.000	6060.771	3421.472	8.619	233°10'30.98"			
TC	12.966	6050.392	3413.700	8.324	233°10'30.98"			
IP 2	14.482	6049.175	3412.789	8.322		R = -16.000	3.030	10°51'05.98"
CT	15.997	6048.152	3411.666	8.327	222°19'25.00"			
TC	103.209	5989.431	3347.185	8.807	222°19'25.00"			
IP 3	109.442	5984.854	3342.159	8.841		R = 12.600	12.467	56°41'35.00"
CT	115.676	5978.140	3343.225	8.876	279°01'00.00"			
END	192.252	5902.510	3355.226					
TC	208.794	5886.172	3357.818	9.203	279°01'00.00"			
IP 4	218.612	5873.827	3359.777	9.129		R = 12.500	19.635	90°00'00.00"
CT	228.429	5875.786	3372.123	9.055	9°01'00.00"			
IP 5	289.396	5885.340	3432.336		9°01'00.00"			

START 75.414 6085.285 3394.757 IP 8 78.961 6082.885 3397.379 R = 900.000 39.902 2°32'24.75" CC 98.912 6070.703 3413.183 322°22'25.92" IP 9 102.460 6068.500 3416.040 R = -16.000 7.098 25°24'59.71" CC 106.009 6065.284 3417.676

WATERSIDE ESPLANADE CONTROL LINE SETOUT TABLE

BEARING

RAD/SPIRAL

A.LENGTH DEFL.ANGLE

R = -13.000 23.583 103°56'28.13"

NORTHING

00	100.003	0000.204	3417.070	230 31 20.21			
IP 10	111.958	6059.577	3420.578		R = 13.000	11.897	52°26'09.54"
CC	117.907	6058.399	3426.871	349°23'35.75"			
IP 11	121.455	6057.735	3430.417		R = -16.000	7.098	25°24'59.71"
CC	125.004	6055.613	3433.335	323°58'36.04"			
IP 12	142.938	6045.065	3447.841		R = 900.000	35.867	2°17'00.05"
СТ	160.871	6035.103	3462.756	326°15'36.09"			
END	176.157	6026.612	3475.468				
TC	177.686	6025.763	3476.739	326°15'36.09"			



PT

CHAINAGE

EASTING

IP 13 189.477 6016.531 3490.561

SCALE 1:25

★ NOMINAL KERB LINE









* The original issue or last amendment of this drawing contained the original signature.

REV	ISION [DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS	SCALE	CLIENT	
	1 18	8.05.22	ISSUED FOR APPROVAL	CHC	CHC		AS CONSTRUCTED			
	2 21	1.03.23	ISSUED FOR CONSTRUCTION	CHC	CHC		/ CONCINCTED			
	A 18	8.12.23	AS CONSTRUCTED	JM	HS			1:25 0.25 0 0.25 0.5 0.75 1.0 1.25 A1		
						DESIGN CHECK		1:50 A3		
						-	MARK WYER RPEQ 10191			© 2022 Eais Consulting Phy Ltd
									CABOOLTURE	© 2025 Egis Consulting Pty Etd
									SYNDICATE LTD	www.eais-aroup.com
							FOR & ON BEHALF OF EGIS CONSULTING PTY LTD			S









<u> </u> -		PROPOSED CONCRETE SLEEPER RETAINING WALL REFER REFERENCE TYPICAL DETAILS ON DRG No. 201
-		PROPOSED BARRIER KERB & CHANNEL TYPE B1
-		PROPOSED MOUNTABLE KERB & CHANNEL TYPE M3
-		PROPOSED BARRIER KERB TYPE B2
-		PROPOSED SPLITTER ISLAND
-		PROPOSED CHANNEL (600mm)
-	— — 8.0- — —	EXISTING SURFACE CONTOUR (0.5m INTERVALS)
-		DESIGN SURFACE CONTOUR (0.1m INTERVALS)
-	SWD	PROPOSED STORMWATER DRAINAGE PROPOSED SEWERAGE RETICULATION PROPOSED SEWERAGE RETICULATION (TRUNK)
		PROPOSED WATER RETICULATION
-	— — SWD— — SWD— —	EXISTING STORMWATER DRAINAGE
-	— — ST — — ST — —	EXISTING TRUNK SEWERAGE RETICULATION
-	ss	EXISTING SEWERAGE RETICULATION
-	— — w — — w — — —	EXISTING WATER RETICULATION
ENT	— к — R ♀ ♀	KERB ADAPTOR Ø150 uPVC ROOFWATER CONNECTION TO GULLY PIT INDICATIVE DRIVEWAY LOCATIONS MANDATORY ZERO LOT BOUNDARY NOMINAL ZERO LOT BOUNDARY
		PROPOSED AREA OF ASPHALT SURFACING
		PROPOSED CONCRETE FOOTPATH IN ACCORDANCE WITH IPWEAQ STANDARD DRAWING RS-065
		STAMPED ASPHALT THRESHOLD TREATMENT
	P	PROPOSED RAMP IN ACCORDANCE WITH MBRC STANDARD DRAWING PC-2101
	0000	PROPOSED BOLLARDS. REFER LANDSCAPE DRAWINGS

ROADWORKS AND DRAINAGE NOTES

- 1. ALL WORKS SHALL BE CARRIED OUT IN ACCORDANCE WITH CURRENT MBRC STANDARD DRAWINGS AND METHODS.
- 2. LEVELS FOR KERB AND CHANNELING CONSTRUCTION ARE AT EQUAL INTERVALS AT LIP OF CHANNEL UNLESS SHOWN OTHERWISE.
- 3. SIDE DRAINS TO BE CONSTRUCTED UNDER ALL KERBS AND ALL KERB AND CHANNEL AND IN LOCATIONS DIRECTED BY THE SUPERINTENDENT IN ACCORDANCE WITH MBRC. STANDARDS.
- 4. LEVELS AND GRADIENTS AT JUNCTIONS WITH EXISTING WORKS MAY BE VARIED AS REQUIRED TO ACHIEVE A SATISFACTORY CONNECTION AND THE CONTRACTOR SHALL INCLUDE THE COST OF THIS WORK IN THE TENDER PRICE. WHERE NEW WORK JOINS EXISTING, THE WORK SHALL TRANSITION NEATLY WITH THE PAVEMENT SO THAT DEVIATION FROM THE LINE OF A 3.0m STRAIGHT EDGE SHALL BE NO GREATER THAN 10mm.
- 5. ALL DIMENSIONS ARE IN METRES UNLESS SHOWN OTHERWISE.
- 6. SUBGRADE TEST RESULTS TO BE FORWARDED TO SUPERINTENDENT FOR DETERMINATION OF BOX DEPTHS PRIOR TO EXCAVATION, TESTS SHALL INCLUDE SOAKED CBR AND/OR OTHER TESTS AS REQUESTED BY THE SUPERINTENDENT.
- CONTRACTOR TO LIAISE WITH ALL RELEVANT SERVICE AUTHORITIES TO ASCERTAIN SERVICES PRESENT ON-SITE. ANY ALTERATION WORKS TO SERVICES WILL BE CARRIED OUT BY THAT SERVICE AUTHORITY ONLY.
- 8. FOOTPATHS AND BATTERS TO HAVE MINIMUM OF 75mm TOPSOIL (AND GRASSING IF ORDERED).
- 9. PROVIDE 'B' GRADE TURFING TO OUTLETS AS DIRECTED BY THE SUPERINTENDENT.
- 10. ALL DISTURBED AREAS STEEPER THAN 1 IN 6 SHALL BE HYDROMULCHED, TURFED OR EQUIVALENT.
- 11. ALL CONSTRUCTION ACTIVITIES SHALL COMPLY WITH WORKPLACE HEALTH AND SAFETY REQUIREMENTS.
- 12. ALL FOOTPATHS ARE TO BE CONSTRUCTED IN ACCORDANCE WITH IPWEAQ STANDARD DRAWING RS-065

M.B.R.C. REF No. DA/2021/0413

RIVERBANK ESTATE STAGE 2B	DRAWING TITLE ROADV LAYOU	VORKS T PLAN	
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	START OF CONSTRUCTION CH0.000 RL8.619 LP CH 15.680 RL 8.448	E DESIGN SURFACE -	XISTING SURFACE		HP CH 191.710 RL 9.291 END OF CONSTRUCTION CH191.710 RL9.291	- 1 IN 3 (MAX) BATTER
					TEM	PORARY
			STAGE 2B		FUTUR	E STAGE
	IP CH 3.699 RL 8.508 IP CH 15.680 RL 8.448				IP CH 191.710 RL 9.329	IP CH 278.105 RL 8.897 IP CH 285.382 RL 8.969
VERTICAL CURVE LEGTH (m) VERTICAL CURVE RADIUS (m) VERTICAL GRADE (%) -3.000	0% -0.500%		0.500%	-	VC 30.0 (R3000) 	1.000% 3.000%
DATUM RL -10.0						
CUT (-) / FILL	0.685 0.760 1.419 1.751 1.793 2.318	2.860 2.001	0.655 0.098 0.013 -0.339 -0.368	-0.269 0.330 0.796	1.204 1.204 1.204 1.385 1.385 1.385 1.385 1.385 1.204 1.204 2.575 2.771	2.722 1.177 0.740 0.779 0.889
LHS LIP LEVEL		8.458 8.558 8.558	8.658 8.758 8.774 8.836 8.836 8.858	8.958 9.058 9.142 9.142	9.179 9.179 9.168 9.168 9.168 9.142 9.075 9.075	8.875
RHS LIP LEVEL		8.458 8.558 8.558	8.658 8.758 8.777 8.834 8.834 8.834	8.958 9.058 9.142 9.142	9.179 9.179 9.168 9.048 9.036 8.981	8.975
DESIGN SURFACE	8.619 8.508 8.462 8.462 8.448 8.450 8.450 8.470	8.570	8.770 8.870 8.886 8.948 8.948 8.970	9.070 9.170 9.254 9.268	9.291 9.291 9.280 9.280 9.243 9.243 9.145 9.145	9.087 8.987 8.897 8.916 8.969
EXISTING SURFACE	7.934 7.749 7.043 6.698 6.657 6.152	5.710 6.669	8.115 8.772 8.873 9.288 9.338	9.339 9.339 8.840 8.458 8.458 8.458 8.458	8.087 8.087 7.895 7.759 7.759 6.612 6.612 6.374	6.365 8.157 8.137 8.080 8.033
CHAINAGES	0.000 3.699 12.966 15.680 15.680 20.000	40.000 60.000	80.000 100.000 103.209 115.676 120.000	140.000 160.000 176.710	191.710 191.710 200.000 206.710 208.794 220.000 228.429	240.000 260.000 278.105 286.382 289.396 289.396
HORIZONTAL CURVES	R-16.000		R12.600		R12.500	

LONGITUDINAL SECTION (ROAD 09 ANDREW STREET) \mathbb{A}

HORIZ SCALE: 1000 VERTICAL SCALE: 100



***** The original issue or last amendment of this drawing contained the original signature

REVISIO	N DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS	SCALE	CLIENT				
1	18.05.22	ISSUED FOR APPROVAL	CHC	CHC		AS CONSTRUCTED	1:1000 10 0 10 20 30 40 50 A1					
2	21.03.23	ISSUED FOR CONSTRUCTION	CHC	CHC			1:2000					
A	18.12.23	AS CONSTRUCTED	JM	HS			HORIZONTAL					
					DESIGN CHECK	APPROVED	1.400 0 4 0 0 4 44					
						MARK WYER RPEQ 16191	1:100 2 1 0 2 4 AT		© 2022 Fair Consulting Dty Ltd			
							1:200 VERTICAL A3	CABOOLTURE	© 2023 Egis Consulting Pty Etd			
							VENTIONE	SYNDICATE LTD	www.eais-aroup.com			
						FOR & ON BEHALF OF EGIS CONSULTING PTY LTD			S			

 \mathbb{A} INFORMATION SHOWN ON THIS DRAWING INDICATES DESIGN ONLY. PLEASE REFER TO AS CONSTRUCTED PREPARED BY WOLTER CONSULTING GROUP PTY LTD FOR FINAL AS CONSTRUCTED INFORMATION. AS CONSTRUCTED DETAILS I CERTIFY ON BEHALF OF EGIS CONSULTING THAT THE 'AS CONSTRUCTED' DETAILS SHOWN ON THIS PLAN ARE A TRUE AND ACCURATE RECORD OF THE WORKS. M.B.R.C. REF No. DA/2021/0413 GTTLE ANDREW STREET \triangle LONGITUDINAL SECTION



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					*	The original issue or last amendment of this drawing o	ntained the original signature			
REVISION	DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS	SCALE	CLIENT		
1	18.05.22	ISSUED FOR APPROVAL	CHC	CHC		AS CONSTRUCTED				
2	29.08.22	CROSS SECTIONS AMENDED	CHC	CHC		ACCONCILCOTED				
3	06.12.22	CROSS SECTIONS UPDATED	HS	CHC			1:100 1 0 1 2 3 4 5 A1			2
4	20.01.23	WATERSIDE ESPLANADE VERTICAL CURVE REMOVED	CHC	HS	DESIGN CHECK	APPROVED	1:200 A3			-
5	21.03.23	ISSUED FOR CONSTRUCTION	CHC	HS		MARK WYER RPEQ 16191				
A	18.12.23	AS CONSTRUCTED	JM	HS				CABOOLTURE	© 2023 Egis Consulting Pty	Ltd
								SYNDICATE LTD	www.eais-aroup.com	
						FOR & ON BEHALF OF EGIS CONSULTING PTY LTD			C	

1		
- 5		GITODINAL SECTION - WATERSIDE LOF LANADE
		HORIZ SCALE: 1000
		VERTICAL SCALE: 100
Ī	ON	GITUDINAL SECTION - WATERSIDE ESPLANADE HORIZ SCALE: 1000 VERTICAL SCALE: 100

PLAN ARE A TRUE AND ACCURATE RECORD OF THE WORKS. 15-01-20 SIGNEDMark. Way DATE MARK WYER RPEQ 16191		CH75.414 RL8.508		- DE SU	HP CH 106.189 RL 8.662 NJ IS	N ACE		LP CH 127.965 RL 8.553			HP CH 152.974 RL 8.678	LP CH 161.036 RL 8.638		END OF CONSTRUCTION	CU110-131 KE0.111		/	11 BA	N 3 (MAX) ATTER
JOIN NEATLY TO EXISTING			EXISTINC			y		•			+ 					•	Y_	TEM	PORARY AROUND
	-	-			S	TAĊ	SE 2	в 	-		+			~	F	UTURE	STA	AGE	
				IP CH 106.189 RL 8.662			IP CH 127.965 RL 8.553			ID CH 150 074 DI 8 678		IF CH 101.030 KL 8.038							
VERTICAL CURVE LEGTH (m) VERTICAL CURVE RADIUS (m) VERTICAL GRADE (%)			0.500%		-(0.50	0%		0.50	0%	-0.5	00%	2		0	.500%			
DATUM RL -10.0					A	_	$\overline{/}$	$\left\langle \right\rangle$	\geq	\rightarrow	\downarrow		\sum		\square	\	À		
CUT (-) / FILL	1.059	0.874	0 642	0.641	0.629	0.633	0.652	0.631	0.590	0.879	0.730	0.685	0.682	0.976	0.833	0.928	0.930	1.844	
LHS LIP LEVEL	8.369	8.419	0 611	8.519	8.549	8.550	8.506	8.500	8.471 8.442	8.502	8.567	8.531	8.527 6.527	0.520 0.614	8.616	8.589	8.589	8.821	
RHS LIP LEVEL	8.370	8.420				Ø)			8.503	8.567	8.532	8.528	0.037	8.965	8.411	8.724	8.821	
DESIGN SURFACE	8.481	8.531	0 676	0.020 8.631	8.661	8.662	8.604	8.593	8.568 8.553	8.614	8.678	8.643	8.639	8.038 8.720	8.733	8.833	8.836	8.933	
EXISTING SURFACE	7.422	7.657	7 084	7.991	8.032	8.030	7.951	7.963	7.978	7.735	7.949	7.958	7.957	7 003	006.7	7.905	7.906	7.089	
CHAINAGES	70.000	80.000	00 010	100.000	106.009	106.189	117.907	120.000	125.004 127.965	140.000	152.974	160.000	160.871	101.030	180.000	200.000	200.627	220.000	
HORIZONTAL CURVES	-		R900	R-1	6 R	13 F	-16		R	900					R	R-11.8	+		

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INFORMATION SHOWN ON THIS DRAWING

INDICATES DESIGN ONLY. PLEASE REFER TO AS CONSTRUCTED PREPARED BY WOLTER

CONSULTING GROUP PTY LTD FOR FINAL AS CONSTRUCTED INFORMATION.

AS CONSTRUCTED DETAILS I CERTIFY ON BEHALF OF EGIS CONSULTING THAT THE 'AS CONSTRUCTED' DETAILS SHOWN ON THIS PLAN ARE A TRUE AND ACCURATE RECORD OF THE WORKS.





ROAD	COLOURS	SUBGRADE CBR	TRAFFIC ESA'S	ROAD CLASS	AC SURFACING (mm)	BASE (mm)	SUB-BASE (mm)	BLANKET (mm)	TOTAL BOX (mm)
ROAD 09 CH0.000 - CH191.794		3 *	3 x 1(130	100	330	600
WATERSIDE ESPLANADE CH75-414-CH176.157		3*	2.5 x 10 ⁵	RESIDENTIAL COLLECTOR (MINOR)	40	130	100	330	600

			AS	CONSTRUCTED P	AVEMENT DES	SIGN				
ROAD	COLOURS	DESIGN CBR	TRAFFIC ESA'S	ROAD CLASS	AC SURFACING (mm)	PRIMER SEAL (mm)	BASE (mm)	SUB-BASE (mm)	LOWER SUB-BASE (mm)	TOTAL BOX (mm)
ANDREW STREET CH0.000 - CH10		4.5	8 x 10 ⁴	ACCESS STREET	40	5	100	110	150	405
ANDREW STREET CH10 - CH60		4.5	8 x 10 ⁴	ACCESS STREET	30	5	100	100	110	345
ANDREW STREET CH60 - CH180		5	8 x 10 ⁴	ACCESS STREET	30	5	100	100	100	335
ANDREW STREET CH180 - CH191.800		4.5	8 x 10 ⁴	ACCESS STREET	30	5	100	100	110	345
WATERSIDE ESPLANADE CH75.5-CH130		4.5	2.5 x 10 ⁵	RESIDENTIAL COLLECTOR (MINOR)	40	5	100	110	150	405
WATERSIDE ESPLANADE CH130-CH176		5	2.5 x 10 ⁵	RESIDENTIAL COLLECTOR (MINOR)	40	5	100	100	130	375

				(*	The original issue or last amendment of this drawing co	ontained the original signature		
REVISION DAT	E ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS	SCALE	CLIENT	
1 18.05	22 ISSUED FOR APPROVAL	CHC	CHC	1	AS CONSTRUCTED			
2 21.03	23 ISSUED FOR CONSTRUCTION	CHC	CHC		ACCONCINCTED			
A 18.12	23 AS CONSTRUCTED	JM	HS			1:500 10 5 0 10 20 A1		
				DESIGN CHECK	APPROVED	1:1000 A3		
					MARK WYER RPEQ 16191			© 2023 Eais Consulting Pty Ltd
							CABOULTURE	© LOLD Light Consulting P iy Lid
							SYNDICATE LTD	c www.egis-group.com
					FOR & ON BEHALF OF EGIS CONSULTING PTY LTD			9 331



* The original issue or last amendment of this drawing contained the original signature;

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REVISION	DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS	SCALE	CLIENT	
1	18.05.22	ISSUED FOR APPROVAL	CHC	CHC]	AS CONSTRUCTED			
2	18.10.22	FINAL SURFACE, TABLE AND STORMWATER PIPES AMENDED	EGC	CHC					
3	20.01.23	FINAL SURFACE AND STORMWATER LAYOUT AMENDED	CHC	HS			1:500 10 5 0 10 20 A1		
4	21.03.223	ISSUED FOR CONSTRUCTION	CHC	HS	DESIGN CHECK	APPROVED	1:1000 A3		
Α	18.12.23	AS CONSTRUCTED	JM	HS		MARK WYER RPEQ 16191			
								CABOOLTURE	© 2023 Egis Consulting Pty Ltd
								SYNDICATE LTD	www.eais-aroup.com
						FOR & ON BEHALF OF EGIS CONSULTING PTY LTD			S

LEGEND

CATCHMENT NAME

 PROPOSED CATCHMENT BOUNDARY

 EXISTING CATCHMENT BOUNDARY

 PROPOSED STORMWATER DRAINAGE

 SWD

 EXISTING STORMWATER DRAINAGE

 -....

 EXISTING SURFACE CONTOUR (0.5m INTERVALS)

 DESIGN SURFACE CONTOUR (0.1m INTERVALS)

 PROPOSED BARRIER KERB & CHANNEL TYPE B1

 PROPOSED MOUNTABLE KERB & CHANNEL TYPE M3

 PROPOSED BARRIER KERB TYPE B2

 PROPOSED SPLITTER ISLAND

 PROPOSED CHANNEL (600mm)

CATCHMENT TABLE

CATCHMENT NAME	CATCHMENT AREA (Ha)
G1/C	0.188
G1/D	0.031
G2/DB	0.142
G3/CC	0.208
G3/DC	0.115
G4/CD	0.169
G4/DD	0.047
G5/CE	0.270
G6/CF	0.144
G7/CG	0.099
G8/CH	0.130
G9/CJ	0.128

M.B.R.C. REF No. DA/2021/0413

STORMWATER DRAINAGE CATCHMENT PLAN

RIVERBANK ESTATE STAGE 2B

ALL DIMENSIONS TO BE CHECKED ON SITE BY CONTRACTOR PRIOR TO CONSTRUCTION. USE WRITTEN DIMENSIONS ONLY, DO NOT SCALE.

21-000078.2

А

STRUCTURE NAME	G1/C	2/C	3/C		4/0	5/0	6/C	7/C	NICI		0/0	4/A		04/20	4/C	G3/CC	JC	Ĵ	G5/CE	4/C		G6/CF	5/C	G7/CG	5/C
STRUCTURE DESCRIPTION	GULLY PIT L.I.L; 2.4m Lintel; MK&C	STD IPWEAQ MANHOLE	1050mm DIA STD IPWEAQ MANHOLE	1050mm DIA	STD IPWEAQ MANHOLE 1200mm DIA	STD IPWEAQ MANHOLE 1350mm DIA	1500 × 600 EXTENDED MANHOLE	REFER MANHOLE DETAILS STD IPWEAQ MANHOLE	2100mm DIA REFER MANHOLE DE TAILS IDE CONNECTION - NO MANHOLE		SID IPWEAQ MANHOLE 1500mm DIA	MANHOLE 1500mm DIA		GULLY PII L.I.L; 2.4M LINTEL; MK&C	STD IPWEAQ MANHOLE 1200MM DIA	ΟΠΓΓΥ ΡΙΤ	LIL; 2.4M LINTEL; MK&C	1050MM DIA	GULLY PIT L.I.L; 2.4M LINTEL; MK&C	STD IPWEAQ MANHOLE	1200MM DIA	GULLY PIT L.I.L; 2.4m Lintel; MK8C	STD IPWEAQ MANHOLE 1350mm DIA	GULLY PIT L.I.L; 2.4m Linte; MK8C	STD IPWEAQ MANHOLE
LEGEND DESIGN SURFACE EXISTING SURFACE LIVE ALP HYDRAULIC GRADE LINE NOTES: DESIGN SURFACE INDIVIDUAL CONTRACT DESIGN SURFACE DESIGN SURFACE EXISTING SURFACE INDIVIDUAL CONTRACT DESIGN SURFACE INDIVIDUAL CONTRACT INDIVIDUAL					- DESIGN SURFACI	E				EXISTING SURFACE REMOVE BAGS ANI EXISTING	EXISTING D CONNE B PIPE	G SAND)												
 I. NOTMINIATION THE CIVE THE STORMWATER STRUCTURE LEVELS SHOWN, THE COVER OR GRATE LEVEL SHALL SUIT THE FINISHED SURFACE PROFILE. THE PIPE CLASSES HAVE BEEN DESIGNED FOR SERVICE LOADS ONLY. THE CONTRACTOR SHALL ASSESS ANTICIPATED LOADS AND UPGRADE THE PIPE CLASSES IF NECESSARY IN ACCORDANCE WITH AS 3725-1989. CRACKED PIPES WILL NOT BE ACCEPTED. REFER CONSTRUCTION EQUIPMENT LOADING TABLE ON DWG 21-000078.2-440 REFER TO DWG 21-000078.2-450 FOR STRUCTURE SETOUT. 			SEWER LINE DN160mm	12.5	SEMER LINE DNY 60mm	SEWER LINE DN160mm		1500 DICL WATER MAIN	CLEARANCE TO SWD = 0.15m	SEWER LINE DN160mm	1500 aPVC WATER MAIN /					=									
PIPE SIZE (mm) PIPE CLASS (FRC) PIPE GRADE (%) PIPE SLOPE (1 in X) FULL PIPE VELOCITY (m/s) PART FULL VELOCITY (m/s) DATUM RL H.G.L IN PIPE & W.S.E IN STRUCTURE	8.614 8.513 2-	375 3 1.00% <u>0.99%</u> 100.53 0.69 1.53 .0 0058 8 8	450 3 0.40% 0.40% 250.00 1.00 1.28 1.00 1.28	450 3 0.50% 0.47% 211.55 0.98 1.37 88 88 88 88 88 80 80 80 80 80 80 80 80	600 3 0.41% 0.41% 243.54 1.15 1.56 0528 000 000 000 000 000 000 000 0	8.063	600 3 0.40% 550.15 1.52 1.52 98882 2 98822 2 2 2 2 2 2 2 2 2 2 2 2	900 3 (RCP) 0.44% 0.44% 247.84 0.83 1.77 828 247.84	900 3 (RCP) 0.39% 0.49% 249.60 1.03 1.86 982.12 1.86	900 3 (RCP) 0.39% 250.00 1.02 1.86 250.27	90 3 (R(400. 1.1 1.5	00 CP) 55% .00 11 577 8992 2 8992 2 8992 2 8992 2 8992 2 8992 2 8992 2 8992 2 8992 2 8 8 8 8 8 8 8 8 8 8 8 8 8	8 786	450 3 2.359 2.329 43.19 43.19 -6.0 -6.0	8.200	8.592	375 3 1.73% 1.28% 78.32 0.75 1.71 -5.0	8.394	8.338 8.203 (-)	450 3 04% 22% 81.98 0.65 1.77 0 0 0 0 0 0 0 0 0 0 0 0 0	8.151	45 3 48 73. 73. -7.0 821.8 82.8	0 5% 86 14 16 150 18 14 16 150 18 18 10 18 18 10 10 10 10 10 10 10 10 10 10 10 10 10	8.117 8.095 <u></u>	450 3 2.25% 4.25% 80.01 0.25 1.37 .0 55 80 80.88 80.88 80.89 80.89 80.88
PIPE FLOW 10% AEP (Cumecs)		0.077	0.159	0.156	0.326		0.430	0.526	0.657	0.651	0.70	08		0.070)		0.082			0.103		0.0	70		0.040
PIPE FLOW 1% AEP (Cumecs)		0.068	0.132	0.127	0.275		0.345	0.486	0.727	0.716	0.80	09		0.060)		0.064			0.090		0.0	48		0.035
DEPTH TO INVERT	1000 1000 1000 1000 1000 1000 1000 100	1.430 1.550 1.556	1.570 1.570 1.570	1.560 1.590 1.580	4.567 4 .747 1.730 1.680	1.683 1.840	1.845 1.846	1.865 1.865 2.010 2.015	2.030 2.030 2.111	2.111 2.030	2.056 2.076	1.982		1.200	++20 +-420 1.730		1.350 1.330 1.440	1.570	1.355	1.310 1.450 1.433	1.730	1.355 1.310	1.470 1.438 1.833 1.840	1-355	1.230 1.490 1.490 1.833
INVERT LEVEL OF DRAIN	7.536 7.536	7.470 7.470 7.46 0	7.457 7.450 7.330 7.331	7.310 7.310 7.200	7.203 7.050 6.900	6.097 6.747 6.740	6.580 6.573	6.550 6.560 6.520 6.514	6.500 6.500 6.300	6.330	6.319 6.300	6.207		7.496 7.480	7.050 7.050 7.050		7.628 7.610 7.580	7.450	7.967	7.380 7.330 7.336	7.050 7.050	7.174 7.170	7.110 7.142 6.747 6.740	101/2	7.1210 7.090 7.101
DESIGN SURFACE LEVEL	8.950 8.985	9.020 0.023	8.900 8.7 0	8.780	8.58 0	8.501	8.420 8.425	8.530 8.529	8 510	8.360	8.375	8.209	8.680	0.717	0.700 0.700	8.940 8.978	9.020	22.0	8.690 8.722	8.780 8.769		8.480 8.520	8.580 8.501	8.500 8.530	8.580 0.501
SETOUT COORDINATES	E 5949.427 N 3352.132	E 5951.136	N 3345.485 E 5979.859	N 3341.071	E 5998.536 N 3354.213	E 6023.920 N 3382.086	E 6052.773	N 3412.894 E 6063.830	N 3414.353 E 6081 330	N 3398.353	E 6096.091 N 3384.858	E 6116.925 N 3364.656	E 6003 870	L 3358.453	E 5998.536 N 3354.213	E 5949.510	N 3343.416 E 6064 136	N 3345.485	E 5999.561 N 3351.926	E 5998.536	N 3354.213	E 6025.618 N 3380.539	E 6023.920 N 3382.086	E 6017.897 N 3384.827	E 6023.920 N 3382.086
RUNNING CHAINAGE	-44.994	5.790 6.900	28.070 8 29.060 9	5. 21.780 - 22.837	\$ 동 문 36.380 우드 37.700	61.503 47.026	40.780 12.236 31	9.140 9.140 41.153	996-96 28.712 41	20.000 S	3.8 8 8 8 29.0	177.624		5.240 6.297	<mark>6.207</mark> 5.240	0.000	1.550 2.696	1.550	000 1 2	.550 3 8		00000000000000000000000000000000000000	40 97-	0.000	5.410 3 4 5 5 4 5 5 4 1 0 5 4 1 0 5 4 1 0 5 5 4 1 0 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5
						DRAWN CHEC	C * The origina	l issue or last	tamendment	of this drawin	ig containe	ed the ori	ginal signat			Ic				CE		С	F		CG
VINUM DATE ISSUED DE IAILS 1 18.05.22 ISSUED FOR APPROVAL 2 18.10.22 ISSUED FOR APPROVAL 3 06.12.22 MANHOLES AND PIPES SIZE AMENDED 4 20.01.23 STORMWATER LINES C, CF, CG AND CH A 5 21.03.23 ISSUED FOR CONSTRUCTION A 18.12.23 AS CONSTRUCTED) MENDED				CHC CHC CHC CHC CHC CHC CHC CHC CHC CHC CHC HS CHC HS JM HS	DESIGN CHEC		AS CON	RPEQ 16	3191		1:1000 10 1:2000 1 1:100 2 1:200 1	0 0 10	0 20 30 HORIZONTAL 2 VERTICAL	40 50) A1 A3 A1 A3	P	CAI	BOOLTURE DICATE LTD		Γ	¢	e e e	eggi	S Pty Ltd

· · · · · · ·		CA	ATCHME	NT				055		D			055							ON							DDAU										0050					DADT					DEGION				
	LUCATION	PF	ROPERT	IES		FULL AR	EARUN	UFF		P#									NLET DESI	GN							DRAI	DESIGN	4		_					HEADLU	00000		-			PART	OLL				DESIGN	LEVELS			
		fi	Ci	Ср	tc	Ι	A	CA	Q	tc	1 .	A C	CA (Q Q	а						Qg	Qb		tc	1	CA	Qp	L	S		Vf	S/Do	Qg/Qo [Du/Do		Vf2/2g	Ku hu	ı Kw	hw	Sf	hf	dn	Vn								
DESIGN AEP	STRUCTURE No.	FRACTION IMPERVIOUS	COEFFICIENT OF RUNOFF IMPERVIOUS AREA	COEFFICIENT OF RUNOFF PERVIOUS AREA	TIME OF CONCENTRATION	RAINFALL INTENSITY	SUB-CATCHMENT AREA	EQUIVALENT IMPERVIOUS AREA	SUB-CATCHMENT DISCHARGE	TIME OF CONCENTRATION	RAINFALL INTENSITY	PARTIAL CATCHMENT AREA	EQUIVALEN I IMPERVIOUS AKEA	SUB-CATCHMENT DISCHARGE ELOWIN K&C(INC RYPASS)	FLOW WIDTH	FLOW DEPTH	FLOW DxV	ROAD GRADE AT INLET	אסעה או ארך אי ווארך ו	INLET TYPE	FLOW INTO INLET	BYPASS FLOW	BYPASS STRUCTURE No.	CRITICAL TIME OF CONC.	RAINFALL INTENSITY	TOTAL (C × A)	PIPE FLOW	REACH LENGTH	PIPE GRADE	PIPE SIZE	FULL PIPE VELOCITY	SUBMERGENCE RATIO	GRATE FLOW RATIO	DIAMETER RATIO	CHART(S) USED	VELOCITY HEAD	U/S HEAD LOSS COEFFICIENT	W.S.E COEFFICIENT	CHANGE IN W.S.E	PIPE FRICTION SLOPE	PIPE FRICTION HEAD LOSS	NORMAL DEPTH	NORMAL DEPTH VEL.	PIPE U/S I.L	PIPE D/S I.L	PIPE U/S H.G.L	PIPE D/S H.G.L	W.S.E	GRATE LEVEL	FREEBOARD	STRUCTURE No.
%					min	mm/h	ha	ha	L/s	min m	ım/h h	na h	na L	./s L/	s m	m		% %	Ď		L/s	L/s		min	mm/hr	ha	L/s	m	%	mm	m/s					m	m		m	%	m	m	m/s	m	m	m	m	m	m	m	'
10	G1/C	65	0.9	0.66	10	171	0.188	0.154	73	5	211 0.	155 0.1	132 7	77 7	7 3.08	0.098	0.06	0.5 3	i (GULLY MK-S	77	1	G4/CD	5	211	0.132	77	6.9	0.99	375	0.69	2.87	1		G2	0.025	4.08 0.1	1	0.1	0.19	0.013	0.174	1.53	7.536	7.468	8.513	8.5	8.614 8	.985	J.372	G1/C
10	2/C	0																		MH1050				5.07	210	0.278	159	29.06	0.4	450	1	2.34	0	1	T5/T8	0.051	1.1 0.05	56 1.14	0.058	0.31	0.09	0.328	1.28	7.447	7.331	8.444	8.354	8.502 9	.023	J.522	2/C
10	3/C	0																		MH1050				5.5	207	0.278	156	22.837	0.47	450	0.98	2.32	0	1	T2/T5	0.049	0.73 0.03	36	0.036	0.3	0.068	0.304	1.37	7.311	7.203	8.318	8.25	8.354 8	.879	J.526	3/C
10	4/C	0																		MH1200				5.81	205	0.594	326	37.7	0.41	600	1.15	2	0	1	T2/T5	0.068	0.73 0.04	19	0.049	0.28	0.106	0.417	1.56	7.052	6.897	8.2	8.094	8.25 8	.769	0.52	4/C
10	5/C	0																		MH1350				6.26	201	0.771	430	42.236	0.4	600	1.52	2.24	0	1	T1/T2	0.118	0.27 0.03	31	0.031	0.49	0.207	0.6	1.52	6.747	6.579	8.063	7.855	8.094 8	.581	J.487	5/C
10	6/C	0																		MH				6.77	197	0.962	526	11.153	0.4	900	0.83	1.44	0	1	T2/T5	0.035	0.64 0.02	22	0.022	0.08	0.009	0.427	1.77	6.559	6.514	7.833	7.824	7.855 8	.425	0.57	6/C
10	7/C	0																		MH2100				6.87	196	1.206	657	23.712	0.4	900	1.03	1.48	0	1	T2/T5	0.054	0.72 0.03	39	0.039	0.13	0.031	0.488	1.86	6.494	6.399	7.785	7.754	7.824 8	.529	0.705	7/C
10	8/C	0																		MH1800				7.28	193	1.322	708	29.02	0.25	900	1.11	1.47	0	1	T1/T2	0.063	0.21 0.01	14	0.014	0.15	0.044	0.599	1.57	6.3	6.227	7.608	7.563	7.621 8	.375	0.754	8/C
10	G4/CD	65	0.9	0.66	10	171	0.169	0.138	65	5	211 0.	139 0.1	118 6	69 70	2.963	0.095	0.05	0.5 3	. (GULLY MK-S	70	0	G7/CG	5	211	0.118	70	6.297	2.32	450	0.44	1.85	1		G2	0.01	7.79 0.07	77	0.077	0.06	0.004	0.122	2	7.496	7.35	8.253	8.25	8.33 8	.717	0.387	G4/CD
10	G3/CC	65	0.9	0.66	10	171	0.208	0.17	81	5	211 0.	172 0.1	146 8	36 81	6 3.2	0.101	0.06	0.5 3	. (GULLY MK-S	82	3	G5/CE	5	211	0.146	82	2.696	1.28	375	0.75	2.68	1		G2	0.028	4.5 0.12	28	0.128	0.22	0.006	0.169	1.71	7.628	7.594	8.506	8.5	8.634 F	.978	0.344	G3/CC
10	G5/CE	65	0.9	0.66	10	171	0.27	0.221	105	5	211 0.:	223 0.	.19 1	11 11	4 4.01	0.114	0.07	0.5 3	. (GULLY MK-S	103	11	G6/CF	5	211	0.19	103	2.549	1.22	450	0.65	2.25	1		G2	0.021	5.95 0.12	27	0.127	0.13	0.003	0.177	1.77	7.367	7.336	8.253	8.25	8.38 F	.722	0.343	G5/CE
10	G6/CF	65	0.9	0.66	10	171	0.144	0.118	56	5	211 0.	119 0.1	101 5	59 70	2.971	0.095	0.05	0.5 3	; (GULLY MK-S	70	0	G8/CH	5	211	0.101	70	2.297	1.35	450	0.44	2.19	1		G2	0.01	6.22 0.06	52	0.062	0.06	0.001	0.141	1.66	7.174	7.142	8.095	8.094	8.158 F	.529	0.371	G6/CF
10	G7/CG	65	0.9	0.66	10	171	0.099	0.081	38	5	211 0.	081 0.0	069 4	10 4	0 2.401	0.079	0.04	0.5 3	; (GULLY MK-S	40	0	G9/CJ	5	211	0.069	40	6.638	1.25	450	0.25	2.07	1		G2	0.003	6.69 0.02	22	0.022	0.02	0.001	0.108	1.37	7.184	7.101	8.095	8.094	8.117 F	.539	0.422	G7/CG
10	G8/CH	65	0.9	0.66	10	171	0.13	0.106	50	5	211 0.	107 0.0	091 5	53 53	3	0.04		0.5 2.9	8	SAG MK-S	53	0	G9/CJ	5	211	0.091	53	4.241	1.74	525	0.25	1.68	1		G2	0.003	8.74 0.02	27	0.027	0.02	0.001	0.109	1.65	7.002	6.928	7.856	7.855	7.883 F	.338	0.455	G8/CH
10	G9/CJ	65	0.9	0.66	10	171	0.128	0.104	50	5	211 0.	105 0.	.09 5	53 53	3	0.039		0.15 2.	91	SAG MK-S	53	0	G3/DC	5	211	0.09	53	7.983	1.41	525	0.24	1.7	1		G2	0.003	8.63 0.02	26	0.026	0.01	0.001	0.114	1.52	6.991	6.878	7.857	7.855	7.883 F	.345	0.463	G9/CJ
10	G10/CK	65	0.9	0.66	10	171	0.118	0.097	46	5	211 0.	098 0.0	083 4	19 4	9 2.58	0.084	0.04	0.5 3		GULLY MK-S	49	0	G3/AC	5	211	0.083	49	8.971	0.98	375	0.44	1.78	1		G2	0.01	8.17 0.08	31	0.081	0.08	0.007	0.136	1.35	7.04	6.952	7.628	7.621	7.709 {	353	0.644	G10/CK
10	G11/CL	65	0.9	0.66	10	171	0.035	0.029	14	5	211 0.	029 0.0	025 1	14 14	4 1.465	0.074	0.03	0.5 3		GULLY MK-S	14	0	LOST	5	211	0.025	14	6.536	0.97	375	0.13	1.6	1		G2	0.001	9.15 0.00	08	0.008	0.01	0	0.073	0.95	7.029	6.966	7.622	7.621	7.63 1	354	0.725	G11/CL
10	G1/D	65	0.9	0.66	10	171	0.031	0.025	12	5	211 0	026 0.0	022 1	13 1	3	0.03		0.5 3		ESIP-6x9	13	0		5	211	0.022	13	6.74	0.4	450	0.08	1.48	1		G2	0	97 0.00	13	0.003	0	0	0.081	0.65	7 206	7 179	7.868	7 868	7.871 {	488	0.617	G1/D
10	1/D	0	5.0												-					MH1050		-		5.1	210	0.121	70	31.097	0.4	450	0.44	1.57	0	1	T2/T5	0.01	0.72 0.00)7	0.007	0.06	0.019	0.195	1.06	7.159	7.034	7.86	7.841	7.868 1	.593	0.726	1/D
10	2/D	0																		MH1050				5.56	207	0.236	135	22.333	1	600	0.48	1.47	0	1	T2/T5	0.012	0.56 0.00	07	0.007	0.05	0.011	0.191	1.74	6.959	6.736	7.835	7.824	7.841 1	.499	0.657	2/D
10	G2/DB	65	0.9	0.66	10	171	0.141	0.115	55	5	211 0.	116 0.0	099 5	58 5	3	0.043		0.5 3		SAG MK-S	58	0		5	211	0.099	58	3.635	0.97	375	0.52	1.75	1		G2	0.014	8.34 0.1	17	0.117	0.11	0.004	0.149	1.41	7.332	7.297	7.871	7.868	7.989 1	.527	0.538	G2/DB
10	G4/DD	65	0.9	0.66	10	171	0.047	0.038	18	5	211 0.	039 0.0	033 1	9 1	9	0.014		0.51 3	1	SAG MK-S	19	0	LOST	5	211	0.033	19	6.391	1	375	0.17	1.96	1		G2	0.002	7.23 0.0	11	0.011	0.01	0.001	0.084	1.04	7.119	7.056	7.842	7.841	7.853 1	.442	0.589	G4/DD
10	G3/DC	65	0.9	0.66	10	171	0.115	0.094	45	5	211 0.	095 0.	.08 4	17 4	7	0.035		0.96 2.	91	SAG MK-S	47	0	G4/DD	5	211	0.08	47	2.505	1.5	375	0.43	2.07	1		G2	0.009	6.69 0.06	52	0.062	0.07	0.002	0.119	1.56	7.127	7.09	7.843	7.841	7.905 1	.442	0.537	G3/DC

CALCULATIONS TABLE - MINOR (10% AEP)

* The original issue or last amendment of this drawing contained the original signature;

REVISION	DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS
1	18.05.22	ISSUED FOR APPROVAL	CHC	CHC		AS CONSTRUCTED
2	18.10.22	MANHOLES AND PIPES SIZE AMENDED	EGC	CHC		ACCONCINCTED
3	20.01.23	CALCULATION TABLE AMENDED	CHC	HS		
4	21.03.23	ISSUED FOR CONSTRUCTION	CHC	HS	DESIGN CHECK	APPROVED
Α	18.12.23	AS CONSTRUCTED	JM	HS		MARK WYER RPEQ 16191
						FOR & ON BEHALF OF EGIS CONSULTING PTY LTD

 \mathbb{A} INFORMATION SHOWN ON THIS DRAWING INDICATES DESIGN ONLY, PLEASE REFER TO AS CONSTRUCTED PREPARED BY WOLTER CONSULTING GROUP PTY LTD FOR FINAL AS CONSTRUCTED INFORMATION. AS CONSTRUCTED DETAILS I CERTIFY ON BEHALF OF EGIS CONSULTING THAT THE "AS CONSTRUCTED" DETAILS SHOWN ON THIS PLAN ARE A TRUE AND ACCURATE RECORD OF THE WORKS. 15-01-2024 SIGNED Mark WyurDATE MARK WYER RPEQ 16191 M.B.R.C. REF No. DA/2021/0413

STORMWATER DRAINAGE

CALCULATIONS TABLES

SHEET 1 OF 2

DISCLAIMER ALL DIMENSIONS TO BE CHECKED ON SITE BY CONTRACTOR PRIOR TO CONSTRUCTION, USE WRITTEN DIMENSIONS ONLY, DO NOT SCALE.

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			CATCHME	INT						DA									IN											N												<u> </u>						DESIGN				
	LUCATIO		PROPERT	IES			KEA KUI		-	FA				-		_				LET DESIGN			_					DRAIN	DESIG					1.0.10	1			J33E3			1 1		FARIT	OLL	<u> </u>			DESIGN				
		fi	Ci	Ср	tc	1	A	CA	Q	tc	IA	A C/	A	Q Qi	a							Qg Q	b		tc	Ι	CA	Qp	L	S		Vf	S/Do	Qg/Qo	Du/Do		Vf2/2g	Ku	nu Kw	hw	Sf	hf	dn	Vn				\square				
DESIGN AEP	STRUCTURE No.	FRACTION IMPERVIOUS	COEFFICIENT OF RUNOFF IMPERVIOUS AREA	COEFFICIENT OF RUNOFF PERVIOUS AREA	TIME OF CONCENTRATION	RAINFALL INTENSITY	SUB-CATCHMENT AREA	EQUIVALENT IMPERVIOUS AREA	SUB-CATCHMENT DISCHARGE	TIME OF CONCENTRATION	KAINFALL INTENSITY DAPTIAL CATCHMENT AREA	FOLIVAL FNT IMPERVIOUS AREA		SUB-CATCHMENT DISCHARGE FLOW IN K&C(INC, BYPASS)	FLOW WIDTH	FLOW DEPTH	FLOW DXV	ROAD GRADE AT INLET	ROAD XFALL AT INLET		INLET TYPE	FLOW INTO INLET RYPASS ELOW		BYPASS STRUCTURE No.	CRITICAL TIME OF CONC.	RAINFALL INTENSITY	TOTAL (C × A)	PIPE FLOW	REACH LENGTH	PIPE GRADE	PIPE SIZE	FULL PIPE VELOCITY	SUBMERGENCE RATIO	GRATE FLOW RATIO	DIAMETER RATIO	CHART(S) USED	VELOCITY HEAD	U/S HEAD LOSS COEFFICIENT	U/S HEAD LOSS W.S.E COEFFICIENT	CHANGE IN W.S.E	PIPE FRICTION SLOPE	PIPE FRICTION HEAD LOSS	NORMAL DEPTH	NORMAL DEPTH VEL.	PIPE U/S I.L	PIPE D/S I.L	PIPE U/S H.G.L	PIPE D/S H.G.L	W.S.E	GRATE LEVEL	FREEBOARD	STRUCTURE No.
%					min	mm/h	ha	ha	L/s r	min mr	m/h ha	a ha	a L	_/s L/	s m	m		%	%			L/s L/	s		min	mm/hr	ha	L/s	m	%	mm	m/s					m	m		m	%	m	m	m/s	m	m	m	m	m	m	m	
1	G1/C	65	1	0.8	10	251	0.188	0.175	122	5 3	16 0.1	55 0.14	49 1	30 13	0 4.422	2 0.11	9 0.0	0.5	3	GULL	Y MK-S	68 63	2 (G4/CD	5	316	0.149	68	6.9	0.99	375	0.62	3.21	1		G2	0.019	3.57 0	069	0.069	0.15	0.01	0.163	1.48	7.536	7.468	8.671	8.661	8.741 8	.985 (0.244	G1/C
1	2/C	0																		MH	11050				5.07	315	0.313	132	29.06	0.4	450	0.83	2.7	0	1	T5/T8	0.035	1.07 0	038 1.13	0.04	0.21	0.062	0.286	1.24	7.447	7.331	8.623	8.561	8.663 9	.023	0.36	2/C
1	3/C	0																		MH	11050				5.5	310	0.313	127	22.837	0.47	450	0.8	2.78	0	1	T2/T5	0.033	0.73 0	024	0.024	0.2	0.045	0.264	1.31	7.311	7.203	8.538	8.492	8.561 8	.879 (0.318	3/C
1	4/C	0																		MH	11200				5.81	305	0.669	275	37.7	0.41	600	0.97	2.4	0	1	T5	0.048	0.76 0	037	0.037	0.2	0.076	0.37	1.51	7.052	6.897	8.456	8.38	8.492 8	.769 (0.277	4/C
1	5/C	0																		MH	11350				6.26	300	0.869	345	42.236	0.4	600	1.22	2.72	0	1	T1/T2	0.076	0.26 (.02	0.02	0.32	0.133	0.44	1.55	6.747	6.579	8.36	8.227	8.38 8	.581 /	0.201	5/C
1	6/C	0																			MH				6.77	293	1.085	486	11.153	0.4	900	0.76	1.85	0	1	T2/T5	0.03	0.62 0	018	0.018	0.07	0.008	0.408	1.73	6.559	6.514	8.209	8.201	8.227 8	.425 (0.198	6/C
1	7/C	0																		MH	12100				6.87	292	1.361	727	23.712	0.4	900	1.14	1.9	0	1	T2/T5	0.067	0.62 0	042	0.042	0.16	0.038	0.52	1.91	6.494	6.399	8.159	8.121	8.201 8	.529 (0.328	7/C
1	8/C	0																		MF	11800				7.28	286	1.491	809	29.02	0.25	900	1.27	1.84	0	1	T1/T2	0.083	0.22 0	018	0.018	0.2	0.058	0.664	1.61	6.3	6.227	7.942	7.884	7.96 8	.375 (0.415	8/C
1	G4/CD	65	1	0.8	10	251	0.169	0.156	109	5 3	16 0.1	39 0.13	33 1	17 17	9 5.396	6 0.13	3 0.0	9 0.5	3	GULL	Y MK-S	64 11	5 (G7/CG	5	316	0.133	64	6.297	2.32	450	0.4	2.33	1		G2	0.008	5.63 0	047	0.047	0.05	0.003	0.117	1.96	7.496	7.35	8.496	8.492	8.542 8	.717 0	0.175	G4/CD
1	G3/CC	65	1	0.8	10	251	0.208	0.193	135	5 3	16 0.1	72 0.10	64 1	44 14	4 4.729	9 0.12	3 0.0	8 0.5	3	GULL	Y MK-S	64 8) (G5/CE	5	316	0.164	64	2.696	1.28	375	0.58	2.94	1		G2	0.017	3.92 0	068	0.068	0.13	0.004	0.147	1.6	7.628	7.594	8.665	8.661	8.732 8	.978 /	0.246	G3/CC
1	G5/CE	65	1	0.8	10	251	0.27	0.251	175	5 3	16 0.2	23 0.2	13 1	87 26	7 6.082	2 0.14	9 0.1	1 0.5	3	GULL	Y MK-S	89 17	8 (G6/CF	5	316	0.213	89	2.549	1.22	450	0.56	2.67	1		G2	0.016	4.53 0	073	0.073	0.1	0.003	0.164	1.71	7.367	7.336	8.495	8.492	8.568 8	.722 /	0.155	G5/CE
1	G6/CF	65	1	0.8	10	251	0.144	0.134	93	5 3	16 0.1	19 0.1	14 1	00 27	7 6.147	7 0.15	5 0.1	1 0.5	3	GULI	Y MK-S	48 23	0 (G8/CH	5	316	0.114	48	2.297	1.35	450	0.3	2.73	1		G2	0.005	4.4 (.02	0.02	0.03	0.001	0.115	1.48	7.174	7.142	8.38	8.38	8.401 8	.529 (0.128	G6/CF
1	G7/CG	65	1	0.8	10	251	0.099	0.091	64	5 3	16 0.0	0.01	178 6	68 18	3 5.466	6 0.13	3 0.0	9 0.5	3	GULL	Y MK-S	35 14	8 (G9/CJ	5	316	0.078	35	6.638	1.25	450	0.22	2.68	1		G2	0.002	4.49 C	011	0.011	0.01	0.001	0.1	1.31	7.184	7.101	8.381	8.38	8.392 8	.539	0.147	G7/CG
1	G8/CH	65	1	0.8	10	251	0.13	0.121	84	5 3	16 0.1	07 0.10	03 9	90 32	0	0.11	2	0.5	2.98	SAC	G MK-S	74 24	6 (G9/CJ	5	316	0.103	74	4.241	1.74	525	0.34	2.4	1		G2	0.006	5.34 0	032	0.032	0.03	0.001	0.128	1.81	7.002	6.928	8.228	8.227	8.26 8	.338 /	0.078	G8/CH
1	G9/CJ	65	1	0.8	10	251	0.128	0.119	83	5 3	16 0.1	05 0.1	101 8	89 48	3	0.11	5	0.15	5 2.91	SAC	G MK-S	86 39	7 (G3/DC	5	316	0.101	86	7.983	1.41	525	0.4	2.44	1		G2	0.008	5.15 0	042	0.042	0.04	0.003	0.146	1.75	6.991	6.878	8.23	8.227	8.272 8	.345	0.073	G9/CJ
1	G10/CK	65	1	0.8	10	251	0.118	0.11	77	5 3	16 0.0	98 0.0	193 8	82 82	2 3.153	3 0.1	0.0	6 0.5	3	GULI	Y MK-S	80 2	(G3/AC	5	316	0.093	80	8.971	0.98	375	0.72	2.8	1		G2	0.027	4.23 0	113	0.113	0.21	0.019	0.179	1.54	7.04	6.952	7.979	7.96	8.092 8	.353	0.261	G10/CK
1	G11/CL	65	1	0.8	10	251	0.035	0.033	23	5 3	16 0.0	29 0.02	28 2	24 24	1.835	5 0.08	5 0.0	4 0.5	3	GULL	Y MK-S	24 0		LOST	5	316	0.028	24	6.536	0.97	375	0.22	2.52	1		G2	0.002	4.86 0	012	0.012	0.02	0.001	0.095	1.1	7.029	6.966	7.961	7.96	7.973 8	.354	0.381	G11/CL
1	G1/D	65	1	0.8	10	251	0.031	0.029	20	5 3	16 0.0	26 0.0	124	21 2	1	0.04	2	0.5	3	FS	P-6x9	21 0			5	316	0.024	21	6.74	0.4	450	0.13	2.52	1		G2	0.001	4.85 0	004	0.004	0.01	0	0.105	0.76	7.206	7.179	8.337	8.337	8.342 8	488	0.146	G1/D
1	1/D	0															-		-	MH	1050				5.1	315	0.136	119	31.097	0.4	450	0.75	2.62	0	1	T2/T5	0.028	0.72 (.02	0.02	0.17	0.054	0.267	1.21	7.159	7.034	8.316	8.263	8.337 8	.593	0.256	1/D
1	2/D	0																		MH	1050				5.56	309	0.266	249	22.333	1	600	0.88	2.17	0	1	T2/T5	0.04	0.64 0	025	0.025	0.16	0.037	0.266	2.06	6.959	6.736	8.237	8.201	8.263 8	.499	0.236	2/D
1	G3/DC	65	1	0.8	10	251	0.115	0.106	74	5 3	16 0.0	95 0.0)91 7	79 47	6	0.11	2	0.96	5 2.91	SAC	G MK-S	74 40	2 (G4/DD	5	316	0.091	74	2.505	1.5	375	0.67	3.25	1		G2	0.023	3.53 (.08	0.08	0.18	0.004	0.152	1.76	7.127	7.09	8.267	8.263	8.347 8	.442	0.095	G3/DC
1	G2/DB	65	1	0.8	10	251	0.141	0.131	91	5 3	16 0.1	16 0.1	11 9	98 98	3	0.07	2	0.5	3	SAC	G MK-S	98 0			5	316	0.111	98	3.635	0.97	375	0.88	3.1	1		G2	0.04	3.69 0	147	0.147	0.31	0.011	0.202	1.61	7.332	7.297	8.348	8.337	8.495 8	.527	0.032	G2/DB
1	G4/DD	65	1	0.8	10	251	0.047	0.043	30	5 3	16 0.0	39 0.03	137 3	32 43	5	0.10	8	0.5	1 3	SAC	G MK-S	60 37	5	LOST	5	316	0.037	60	6.391	1	375	0.54	3.21	1		G2	0.015	3.57 0	053	0.053	0.12	0.007	0.151	1.43	7.119	7.056	8.27	8.263	8.323 8	.442	0.119	G4/DD

CALCULATIONS TABLE - MAJOR (1% AEP)

* The original issue or last amendment of this drawing contained the original signature;

REVISION	DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS
1	18.05.22	ISSUED FOR APPROVAL	CHC	CHC		AS CONSTRUCTED
2	18.10.22	MANHOLES AND PIPES SIZE AMENDED	EGC	CHC		AGOONGINGGILD
3	20.01.23	CALCULATION TABLE AMENDED	CHC	HS		
4	21.03.23	ISSUED FOR CONSTRUCTION	CHC	HS	DESIGN CHECK	APPROVED
A	18.12.23	AS CONSTRUCTED	JM	HS		MARK WYER RPEQ 16191
						FOR & ON BEHALF OF EGIS CONSULTING PTY LTD

 \mathbb{A} INFORMATION SHOWN ON THIS DRAWING INDICATES DESIGN ONLY, PLEASE REFER TO AS CONSTRUCTED PREPARED BY WOLTER CONSULTING GROUP PTY LTD FOR FINAL AS CONSTRUCTED INFORMATION. AS CONSTRUCTED DETAILS I CERTIFY ON BEHALF OF EGIS CONSULTING THAT THE "AS CONSTRUCTED" DETAILS SHOWN ON THIS PLAN ARE A TRUE AND ACCURATE RECORD OF THE WORKS. 15-01-2024 SIGNED.....Marke.Wyer DATE...... MARK WYER RPEQ 16191 M.B.R.C. REF No. DA/2021/0413

STORMWATER DRAINAGE CALCULATIONS TABLES SHEET 2 OF 2

DISCLAIMER ALL DIMENSIONS TO BE CHECKED ON SITE BY CONTRACTOR PRIOR TO CONSTRUCTION, USE WRITTEN DIMENSIONS ONLY, DO NOT SCALE.

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STORMWATER DRAINAGE NOTES

- ALL WORKS SHALL BE CARRIED OUT IN ACCORDANCE WITH CURRENT M.B.R.C. STANDARD DRAWINGS 1. AND METHODS.
- 2. SIDE DRAINS TO BE CONSTRUCTED UNDER ALL KERBS AND ALL KERB AND CHANNEL AND IN LOCATIONS DIRECTED BY THE SUPERINTENDENT IN ACCORDANCE WITH M.B.R.C. STANDARDS.
- LEVELS AND GRADIENTS AT JUNCTIONS WITH EXISTING WORKS MAY BE VARIED AS REQUIRED TO 3. ACHIEVE A SATISFACTORY CONNECTION AND THE CONTRACTOR SHALL INCLUDE THE COST OF THIS WORK IN THE TENDER PRICE.
- 4. ALL STORMWATER PIPES UNDER ROADWAYS AND FOOTPATHS SHALL BE FRC CLASS 3 U.N.O.
- 5. ALL STORMWATER PIPES SHALL BE R.R.J.
- 6. ALL DIMENSIONS ARE IN METRES UNLESS SHOWN OTHERWISE.
- 7. CONTRACTOR TO LIAISE WITH ALL RELEVANT SERVICE AUTHORITIES TO ASCERTAIN SERVICES PRESENT ON-SITE. ANY ALTERATION WORKS TO SERVICES WILL BE CARRIED OUT BY THAT SERVICE AUTHORITY ONLY.
- ALL EXCAVATION AND FILLING SHALL BE COMPACTED TO THE REQUIREMENTS OF AS3798-2007 IN 8 ACCORDANCE WITH THE LOCAL AUTHORITY REQUIREMENTS. LEVEL 1 SUPERVISION IS REQUIRED.
- THE CONTRACTOR SHALL NOTIFY THE SUPERINTENDENT PRIOR TO COMMENCEMENT OF DEMOLISHING 9 ANY EXISTING STRUCTURES.
- 10. THE STORMWATER PIPE CLASSES HAVE BE DESIGNED FOR SERVICE LOADS ONLY. AND THE CONTRACTOR SHALL ACCESS ANTICIPATED CONSTRUCTION LOADS AND UPGRADE THE PIPE CLASSES IF NECESSARY, IN ACCORDANCE WITH AS3725-2007.
- 11. RETAINING WALL SUBSOIL DRAINS TO CONNECT TO KERB AND CHANNEL SUBSOIL OR STORMWATER DRAINAGE STRUCTURES.
- 12. WORKS SHALL BE PROGRAMMED SO AS NOT TO DISTURB NEARBY HOUSEHOLDERS EITHER BY DUST, NOISE, FLOODING OR DISCONNECTION OF SERVICES.
- 13. ALL CONSTRUCTION ACTIVITIES SHALL COMPLY WITH WORKPLACE HEALTH AND SAFETY REQUIREMENTS.

ROOFWATER NOTES

- 1. ENDS OF PIPES AND STUBS TO BE CAPPED.
- 2. LOTS WITHOUT REAR ALLOTMENT DRAINAGE SHALL HAVE A FULL HEIGHT ROOFWATER KERB ENTRY ADAPTOR AS PER DETAIL (2 PER LOT). WHERE CONCRETE FOOTPATHS ARE CONSTRUCTED, PROVIDE A FULL HEIGHT ROOFWATER KERB ENTRY ADAPTOR WITH 75x100 RHS (GALV) AT 1.0% MINIMUM GRADE EXTENDING PAST THE CONCRETE FOOTPATH TO THE PROPERTY BOUNDARY (2 PER LOT).
- ROOFWATER CONNECTIONS TO MANHOLES AND GULLIES TO BE 1500 uPVC SN6 AT 1.0% MINIMUM WITH 3. 1.00m MIN. COVER WITHIN THE VERGE

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1	Ç	INFORMATION SHOWN ON THIS DRAWING	K)
1	Ç	INDICATES DESIGN ONLY. PLEASE REFER TO	K	1
	Ç	AS CONSTRUCTED PREPARED BY WOLTER	K	
	Ç	CONSULTING GROUP PTY LTD FOR FINAL AS	K	
	Ş	CONSTRUCTED INFORMATION.	K	

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AS CONSTRUCTED DETAILS I CERTIFY ON BEHALF OF EGIS CONSULTING THAT THE "AS CONSTRUCTED" DETAILS SHOWN ON THIS PLAN ARE A TRUE AND ACCURATE RECORD OF THE WORKS.

15-01-2024 SIGNED Mark WYUNDATE MARK WYER RPEQ 16191

* The original issue or last amendment of this drawing contained the original signature.

REVISION	DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS	SCALE	CLIENT	
1	18.05.22	ISSUED FOR APPROVAL	CHC	CHC		AS CONSTRUCTED			
2	18.10.22	(FRC) ADDED. NOTES AMENDED	EGC	CHC					
3	20.01.23	NOTES AND TABLE AMENDED	CHC	HS			1:20 0.2 0 0.2 0.4 0.6 0.8 1 A1		
4	21.03.23	ISSUED FOR CONSTRUCTION	CHC	HS	DESIGN CHECK	APPROVED	1:40 A3		
A	18.12.23	AS CONSTRUCTED	JM	HS		MARK WYER RPEQ 16191			
								CABOOLTURE	© 2023 Egis Consulting Pty Ltd
								SYNDICATE LTD	www.eais-aroup.com
						FOR & ON BEHALF OF EGIS CONSULTING PTY LTD			S. 3. 3

CONSTR

CONSTRUCTION

VIBRATORY RAMMER

VIBRATORY TRENCH

VIBRATORY SMOOTH

ROLLER (UP TO 2t)

EQUIPMENT

(UP TO 75kg)

DRUM ROLLER (7†) VIBRATORY SMOOTH DRUM ROLLER (10t) EXCAVATOR AND COMPACTION WHEEL (15t)

COMPACTION WHEEL (25t)

EXCAVATOR AND

GRADER (CAT120H) (14.5t)

GRADER (CAT140H) (17.0t)

SCRAPER (CAT613C11) (27.2t)

SCRAPER (CAT621F) (53.8t)

DOZER (CATD7 G)

DOZER (CATD9 R)

EXCAVATOR (CAT 315B) (15.8t)

EXCAVATOR (CAT317) (17.3t)

EXCAVATOR

(CAT325B) (25.9t)

RUC	UCTION EQUIPMENT LOADING TYPICAL DETAILS										
PIPE			MINIM	UM CON	IPACTIC	ON COVE	ER TO P	IPE OBVE	ERT		
LASS	Ø300	Ø375	Ø450	Ø525	Ø600	Ø675	Ø750	Ø825	Ø900	Ø1050	
2	0.450	0.450	0.400	0.400	0.350	0.350	0.300	0.300	0.250	0.250	
3	0.300	0.300	0.300	0.300	0.250	0.250	0.200	0.200	0.200	0.200	
2	0.400	0.400	0.400	0.350	0.250	0.250	0.200	0.200	0.200	0.200	
3	0.250	0.250	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	
2	0.700	0.700	0.700	0.650	0.650	0.650	0.600	0.600	0.400	0.400	
3	0.450	0.450	0.450	0.450	0.350	0.350	0.200	0.200	0.200	0.200	
2	0.850	0.850	0.850	0.800	0.800	0.800	0.750	0.750	0.750	0.750	
3	0.550	0.550	0.550	0.500	0.500	0.500	0.200	0.200	0.200	0.200	
2	0.650	0.700	0.650	0.650	0.650	0.650	0.600	0.600	0.550	0.550	
3	0.450	0.450	0.450	0.450	0.450	0.450	0.350	0.350	0.250	0.250	
2	1.000	1.050	1.000	0.950	0.900	0.900	0.850	0.850	0.750	0.750	
3	0.650	0.650	0.650	0.650	0.650	0.650	0.600	0.600	0.500	0.500	
2	0.600	0.600	0.600	0.450	0.200	0.200	0.200	0.200	0.200	0.200	
3	0.600	0.600	0.450	0.450	0.200	0.200	0.200	0.200	0.200	0.200	
2	0.600	0.600	0.600	0.600	0.200	0.200	0.200	0.200	0.200	0.200	
3	0.600	0.600	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	
2	0.600	0.600	0.600	0.600	0.600	0.600	0.600	0.600	0.200	0.200	
3	0.600	0.600	0.600	0.600	0.600	0.600	0.200	0.200	0.200	0.200	
2	0.700	0.700	0.700	0.650	0.650	0.600	0.600	0.600	0.600	0.600	
3	0.650	0.650	0.650	0.600	0.600	0.600	0.600	0.600	0.600	0.600	
2	0.600	0.600	0.600	0.600	0.200	0.200	0.200	0.200	0.200	0.200	
3	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	
2	0.600	0.600	0.600	0.600	0.600	0.600	0.600	0.600	0.600	0.200	
3	0.600	0.600	0.600	0.600	0.600	0.600	0.200	0.200	0.200	0.200	
2	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	
3	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	
2	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	
3	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	
2	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	
3	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	0.200	

M.B.R.C. REF No. DA/2021/0413

STORMWATER DRAINAGE NOTES AND DETAILS

RIVERBANK ESTATE STAGE 2B

ALL DIMENSIONS TO BE CHECKED ON SITE BY CONTRACTOR PRIOR TO CONSTRUCTION, USE WRITTEN DIMENSIONS ONLY, DO NOT SCALE.

21-000078.2

440

А

REFERENCE POINT LOCATION FOR DRAINAGE STRUCTURES

STRUCTURE TYPE	HORIZONTA (REFERENCE P	AL CONTROL OINT LOCATION)	VERTICAL CONTROL (REFERENCE LEVEL)
MANHOLE	-Q-REF	€ of Main Shaft	FINISHED SURFACE LEVEL
GULLY PIT	- REF	CENTRE OF STRUCTURE	KERB LIP LEVEL
HEADWALL	REF	INTERSECTION OF HEADWALL FACE AND PIPE &	TOP OF HEADWALL

<u>7/C - 1800Ø MH</u> SCALE (A1): 1:20 SCALE (A3): 1:40

6/C - 1500 x 600 EXTENDED MH SCALE (A1): 1:20 SCALE (A3): 1:40

* The original issue or last amendment of this drawing contained the original signature)

		generation and a second s											
REV	SION DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS	SCALE CL	LIENT					
	18.05.22	2 ISSUED FOR APPROVAL	CHC	CHC		AS CONSTRUCTED							
	2 18.10.22	2 MANHOLES AND PIPES SIZE AMENDED	EGC	CHC		ACCONCILCOTED							
	3 20.01.23	3 MANHOLE DETAILS AMENDED	CHC	HS			1:20 0.2 0 0.2 0.4 0.6 0.8 1 A1						
	21.03.23	3 ISSUED FOR CONSTRUCTION	CHC	HS	DESIGN CHECK	APPROVED	1:40 A3						
	A 18.12.23	3 AS CONSTRUCTED	JM	HS		MARK WYER RPEQ 16191			© 2022 Esis Consulting Deuted				
								CABOOLTURE	© 2023 Egis Consulting Pty Ltd				
								SYNDICATE LTD	c www.eais-aroup.com				
						FOR & ON BEHALF OF EGIS CONSULTING PTY LTD			9				

2(A)

2(B)

AFTER NEW WORKS ACCEPTED 'ON MAINTENANCE' CONTRACTOR TO REMOVE REMOVED CROWN OF PIPE AND COMPLETE BENCHING (OR AS AGREED WITH UNITYWATER).										SEQ CODE. STHIS REPRESENTS AN ACCURATE RECORD OF AS -CONSTRUCTED WORKS. I. ACCEPT RESPONSIBILITY FOR THE INFORMATION CONTAINED IN THIS	1
CONSTRUCTOR TO CONSTRUCT CONSTRUCTED NEW MANHOLE 2A/4 OVER EXISTING SEWER TRUNK MAIN AND BENCH AND RENDER UP TO PIPE AND NOT REMOVE CROWN OF PIPE. AFTER NEW WORKS ACCEPTED 'ON MAINTENANCE' CONTRACTOR TO REMOVE REMOVED	DN160PE	2A/4	MS	D	WATERSIDE ESPLANADE	8.527	7.577	5.672	2.855m	RPEQ (SIGNATURE) RPEQ No23875_ DA 728 JUNE 2024	(1) 川 川 川
CROWN OF PIPE AND COMPLETE BENCHING (OR AS AGREED WITH UNITYWATER).	r last amend	ment of this drawi	ng contained	the original	signature.		c	LIENT			1

R	EVISION DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS	SCALE	
	1 18.05.22	ISSUED FOR APPROVAL	CHC	CHC	1	AS CONSTRUCTED		
	2 31.10.22	STAMP AMENDED	CHC	CHC	1/4	ACCONCINCOLED		
	3 05.12.22	LIVE WORKS TABLE UPDATED	HS	CHC				
	4 21.03.23	ISSUED FOR CONSTRUCTION	CHC	HS	DESIGN CHECK	APPROVED		
	A 18.12.23	AS CONSTRUCTED	JM	HS		MARK WYER RPEQ 16191		
	B 27.06.24	AMENDED AS CONSTRUCTED	LH	HS	1 (1)		CABOOLTURE	© 2023 Egis Consulting Pty Ltd
					1 GM		SYNDICATE LTD	www.eais-aroup.com
						FOR & ON BEHALF OF EGIS CONSULTING PTY LTD		G

ALL DESIGN OF GRAVITY SEWERAGE NETWORK WORKS SHALL BE WERE IN ACCORDANCE WITH THE GRAVITY SEWERAGE CODE OF AUSTRALIA, SOUTH EAST QUEENSLAND SERVICE PROVIDERS EDITION VERSION 2.1 (SEP 2021), PART 1: PLANNING AND DESIGN AND PART 3: DRAWINGS.

2. ALL CONSTRUCTION OF GRAVITY SEWERAGE NETWORK WORKS CHALL BE WERE IN ACCORDANCE WITH THE GRAVITY SEWERAGE CODE OF AUSTRALIA, SOUTH EAST QUEENSLAND SERVICE PROVIDERS EDITION VERSION 2.1 (SP 2021),

ALL PRODUCTS AND MATERIALS USED IN CONSTRUCTION OF GRAVITY SEWERAGE NETWORK WORKS SHALL BE WERE IN ACCORDANCE WITH THE SOUTH EAST QUEENSLAND CODE ACCEPTED CIVIL INFRASTRUCTURE PRODUCTS AND MATERIAL LIST, AND THE MOST RECENT VERSION OF THE LIST IN EFFECT AT THE DATE OF THE CONSTRUCTION

THE CONSTRUCTION OF THE SEWERAGE WORK SHOWN ON THIS DRAWING MUST HAVE HAD CONTRACT ADMINISTRATION UNDERTAKEN BY AN ENGINEER WHO HAS RPEQ REGISTRATION. WORK NOT COMPLYING WITH THIS REQUIREMENT WILL NOT BE WAS NOT PERMITTED TO CONNECT TO THE RETICULATION SYSTEM. PRIOR TO COMMENCEMENT OF ANY VARIATION WORKS, THE CONSTRUCTOR MUST FIRST HAD OBTAIN APPROVAL FROM THE REGISTERED MAJOR CONNECTIONS CERTIFIER. ALL LIVE WORKS ASSOCIATED WITH THE SEWERAGE NETWORK SHALL BE WERE CARRIED OUT AT THE DEVELOPER'S

a) BY THE CONSTRUCTOR, FOR 'MINOR' SEWERAGE CONNECTION WORKS, DEFINED IN THE A&C MANUAL UNDER SECTION PRE-START MEETING. UNDER THE INSPECTION OF THE CONSTRUCTION CERTIFIER WHO SHALL FOLLOW THE PLANNED NETWORK INTERVENTION PROCESS, OR

b) BY QUOTATION REQUEST TO UNITYWATER PRIVATE WORKS, FOR SEWERAGE CONNECTION WORKS NOT MEETING THE CRITERIA FOR CLASSIFICATION AS 'MINOR'

EACH ALLOTMENT SHALL BE WAS SERVED BY A DN110 PE PROPERTY CONNECTION. FOR ALLOTMENTS OTHER THAN SINGLE RESIDENTIAL, A DN160 PE PROPERTY CONNECTION SHALL BE WAS PROVIDED.

8 PROPERTY CONNECTIONS SHALL BE WERE LOCATED WITHIN THE PROPERTY AS SHOWN IN THE DRAWINGS PROPERTY CONNECTION BRANCHES SHALL EXTENDED INTO THE PROPERTY A MINIMUM OF 500mm AND A

10. WHERE PIPES ARE LAID IN FILL, THE FILLING SHALL BE WAS CARRIED OUT IN LAYERS NOT EXCEEDING 300mm (LOOSE) IN DEPTH AND SHALL BE WAS COMPACTED UNTIL THE COMPACTION HS WAS NOT LESS THAN 95% OF THE MATERIAL'S MAXIMUM COMPACTION WHEN TESTED IN ACCORDANCE WITH A.S. 1289 (MODIFIED COMPACTION). TESTING SHALL BE WAS CARRIED OUT AFTER EACH ALTERNATE LAYER. IN ALL SUCH CASES, APPROVAL OF CONSTRUCTED SEWERS WILL NOT BE WAS NOT ISSUED BY SEQ SERVICE PROVIDER UNLESS CERTIFICATES ARE WERE PRODUCED CERTIFYING THAT THE REQUIRED COMPACTION HAS BEEN ACHIEVED.

11. WHERE SEWERS HAVE HAD A GRADE OF 1 IN 20 OR STEEPER. TRENCH STOPS AND/OR BULKHEADS SHALL BE WERE CONSTRUCTED IN ACCORDANCE WITH THE SEQ-SP's.

12. THE CONTRACTOR SHALL VERIFY VERIFIED THE LOCATION AND DEPTH OF EXISTING SERVICES WITH RELEVANT

13. SEWER SHALL BE WAS DISUSED/ABANDONED IN ACCORDANCE WITH PROCEDURES SET OUT IN THE SEQ-SP's.

15. TANGENT POINT SET-OUT INFORMATION FOR HORIZONTAL BENDS IS INCLUDED ON AS-CONSTRUCTED

16. MAINTENANCE STRUCTURES GREATER THAN 4m DEEP AND WITH AN INTERNAL DIAMETER 1500 OR MORE TO BE WAS

17. BOLT DOWN COVERS ARE REQUIRED ON MAINTENANCE STRUCTURES LOCATED BELOW THE 1% AEP FLOOD LEVEL AND IN ACCORDANCE WITH NOTE 13 OF SEQ CODE STD DWG SEQ-SEW-1308-10

18. WHERE HORIZONTAL CURVES ARE PROPOSED. ADOPTED MINIMUM RADIUS BEND AS NOMINATED WITHIN WITH

19. MAINTENANCE STRUCTURES DEEPER THAN THE 1% AEP FLOOD LEVEL (RL7.92) SHALL BE WERE CAST-IN-SITU. 20. ALL WORKS ON EXISTING SEWER(S) TO BE WAS CARRIED OUT BY UNITY WATER PRIVATE WORKS AT THE DEVELOPER'S EXPENSE UNLESS OTHERWISE AGREED AT THE PRE-START MEETING. 21 ALL SEWER HC'S TO BE WERE OFESET 1 0m FROM SIDE PROPERTY BOUNDARY UN O

> ALL CONSTRUCTION WORK UNDERTAKEN BY THE CONTRACTOR SHALL COMPLY COMPLIED WITH ALL APPLICABLE WORKPLACE HEALTH AND SAFETY LEGISLATION.

ALL ENVIRONMENTAL PROTECTION MEASURES SHALL BE WER IMPLEMENTED PRIOR TO ANY CONSTRUCTION WORK, INCLUDING CLEARING COMMENCING

PROPERTY CONNECTIONS HAVE BEEN DESIGNED TO CONTROL THE REQUIRED SERVICE AREA OF EACH LOT AT A GRADE OF 1 IN 60 AND A MAXIMUM DEPTH OF PROPERTY CONNECTION OF 1.50m, UNLESS NOTED OTHERWISE.

IOTE:

OTWITHSTANDING THAT EXISTING SERVICES MAY OR MAY NOT BE SHOWN ON HE JOB DRAWINGS, NO RESPONSIBILITY IS WAS TAKEN BY THE UPERINTENDENT OR THE PRINCIPAL FOR THIS INFORMATION WHICH HAS BEEN MPREASED BY OTHERS. THE DETAILS ARE PROVIDED FOR INFORMATION ONLY. HE CONTRACTOR SHALL ASCERTAIN ASCERTAINED THE POSITION OF ANY NDERGROUND SERVICES IN THIS AREA AND SHALL BE WAS RESPONSIBLE FOR AKING GOOD ANY DAMAGE THERETO

U.W. REF No. A/2021/0413

RIVERBANK ESTATE	
STAGE 2B	

SEWER RETICULATION NOTES AND DETAILS

DISCLAIMER ALL DIMENSIONS TO BE CHECKED ON SITE BY CONTRACTOR PRIOR TO CONSTRUCTION, USE WRITTEN DIMENSIONS ONLY, DO NOT SCALE,	PROJECT No. 21-000078.2	DRAWING No.	REVISIO B

PROPOSED EASEMENT PROPOSED SEWERAGE RETICULATION DN160 PROPOSED SEWERAGE RETICULATION DN250 EXISTING DN250 SEWERAGE RETICULATION EXISTING DN160 SEWERAGE RETICULATION **PROPOSED** SLEEPER RETAINING WALL PROPOSED STORMWATER DRAINAGE EXISTING STORMWATER DRAINAGE -PROPOSED WATER RETICULATION EXISTING WATER RETICULATION EXISTING SURFACE CONTOUR (0.5m INTERVALS) DESIGN SURFACE CONTOUR (0.1m INTERVALS) PROPOSED ENERGEX LINE UNDERGROUND PROPOSED ELECTRICAL PIT MANDATORY ZERO LOT BOUNDARY NOMINAL ZERO LOT BOUNDARY INDICATIVE DRIVEWAY LOCATIONS LOT CONTROL LEVEL DIRECTION OF HOUSE CONTROL PROPOSED SEWER STRUCTURE LABEL

EXISTING SEWER STRUCTURE LABEL

SETOUT TO MID POINT OF BEND

REFER DRAWING N 21-000078.2-500 FOR STANDARD SEWERAGE NOTES, LOCALITY PLAN AND LIVE WORKS TABLE

MAJOR CONNECTIONS CERTIFICATION

. certify that:

For and on behalf of EGIS CONSULTING PTY LTD: ACR/MAJ2020-089

ALL WORKS ON EXISTING SEWER(S) TO BE WAS CARRIED OUT BY UNITYWATER PRIVATE WORKS AT THE DEVELOPER'S EXPENSE UNLESS OTHERWISE AGREED AT THE PRESTART MEETING.

RIVERBANK ESTATE STAGE 2B

U.W. REF No. A/2021/0413

SEWER RETICULATION LAYOUT PLAN

LL DIMENSIONS TO BE CHECKED ON SITE BY CONTRACTOR PRIOR TO ONSTRUCTION. USE WRITTEN DIMENSIONS ONLY, DO NOT SCALE.

501

В

NOTE: ALL WORKS ON EXISTING SEWER(S) TO BE WAS CARRIED OUT BY UNITYWATER PRIVATE WORKS

	★ The original issue or last amendment of this drawing contained the original signature.											
REVISION	DATE	ISSUE DETAILS	DRAWN	DESIGN	DRAWN CHECK	STATUS	SCALE	CLIENT				
1	18.05.22	ISSUED FOR APPROVAL	CHC	CHC	1	AS CONSTRUCTED						
2	31.10.22	STAMP AMENDED	CHC	CHC	1/4	ACCONCILCOTED						
3	21.03.23	ISSUED FOR CONSTRUCTION	CHC	HS								
A	18.12.23	AS CONSTRUCTED	JM	HS	DESIGN CHECK	APPROVED	1					
В	27.06.24	AMENDED AS CONSTRUCTED	LH	HS		MARK WYER RPEQ 16191						
					CM			CABOOLTURE				
					1 GM			SYNDICATE LTD				
						FOR & ON BEHALE OF EGIS CONSULTING PTY LTD						

WATER RETICULATION NOTES

ALL DESIGN OF WATER SUPPLY NETWORK WORKS SHALL BE WERE IN ACCORDANCE WITH THE WATER SUPPLY CODE OF AUSTRALIA, SOUTH EAST QUEENSLAND SERVICE PROVIDERS EDITION VERSION 1.3 (AUGUST 2019), PART 1: PLANNING AND DESIGN AND PART 3: DRAWINGS. UNLESS SPECIFIED OTHERWISE, ALL WORK AND MATERIALS SHALL COMPLY COMPLIED WITH THE

ADOPT ADOPTED LIP OF KERB AS PERMANENT LEVEL.

COVER ON MAINS FROM PERMANENT LEVEL TO BE WERE AS SHOWN IN STANDARD DRAWING

CONDUITS TO BE WERE INSTALLED IN ACCORDANCE WITH THE STANDARD DRAWINGS IN SEQ-SP's. A WATER METER SUPPLIED AT DEVELOPER'S COST, IS TO BE WAS INSTALLED AT THE SERVICE POINT OF EACH LOT IN ACCORDANCE WITH THE STANDARD DRAWINGS IN SEQ-SP's.

ALL PRODUCTS AND MATERIALS USED IN CONSTRUCTION OF WATER SUPPLY NETWORK WORKS SHALL BE WERE IN ACCORDANCE WITH THE SOUTH EAST QUEENSLAND CODE ACCEPTED CIVIL INFRASTRUCTURE PRODUCTS AND MATERIAL LIST, AND THE MOST RECENT VERSION OF THE LIST IN

ALL CONCRETE FOOTPATHS TO BE WERE CLEAR OF WATER MAINS, WHERE POSSIBLE.

THE CONSTRUCTION OF THE WATER SUPPLY RETICULATION WORK SHOWN ON THIS DRAWING MUST HAVE HAD CONTRACT ADMINISTRATION UNDERTAKEN BY AN ENGINEER WHO HAS RPEQ REGISTRATION. WORK NOT COMPLYING WITH THIS REQUIREMENT WILL NOT BE WAS NOT PERMITTED

TO CONNECT TO THE RETICULATION SYSTEM. WHERE WATER MAINS CROSS A ROAD, WATER MAIN DEPTH OR PIPE CLASS TO BE WAS ADJUSTED TO

CONSIDER CONSTRUCTION LOADINGS. WATER MAINS ARE NOT TO BE WERE NOT LAID WITHIN ROAD

WATER MAINS ARE TO BE WERE LAID ON A 1.50m ALIGNMENT FROM PROPERTY BOUNDARY UNLESS NOTED OTHERWISE

12. ALL CONSTRUCTION OF WATER SUPPLY NETWORK WORKS SHALL BE WAS IN ACCORDANCE WITH THE WATER SUPPLY CODE OF AUSTRALIA, SOUTH EAST QUEENSLAND SERVICE PROVIDERS EDITION VERSION 1.3 (AUGUST 2019), PART 2: CONSTRUCTION AND PART 3: DRAWINGS

13. CONSTRUCTION WORKS SHALL BE WERE SUPERVISED BY AN ENGINEER WHO HAS RPEQ

REGISTRATION. WORKS NOT COMPLYING WITH THIS REQUIREMENT WILL NOT BE WERE NOT

PERMITTED TO CONNECT INTO UNITYWATER'S WATER SUPPLY NETWORK.

14. ALL LIVE WORKS ASSOCIATED WITH THE WATER SUPPLY NETWORK SHALL BE WERE CARRIED OUT AT THE DEVELOPER'S COST BY QUOTATION REQUEST TO UNITYWATER PRIVATE WORKS ONLY. THE CONSTRUCTOR SHALL VERIFY VERIFIED THE LOCATION AND DEPTH OF EXISTING SERVICES WITH RELEVANT ASSET OWNERS AND AUTHORITIES BEFORE COMMENCING WORKS.

16. PRIOR TO COMMENCEMENT OF ANY VARIATION WORKS, THE CONSTRUCTOR MUST FIRST OBTAIN-OBTAINED APPROVAL FROM THE REGISTERED MAJOR CONNECTIONS CERTIFIER.

ENVIRONMENTAL MANAGEMENT APPROVAL NOTES

TREES LOCATED ALONG FOOTPATH SHOULD BE WERE, WHERE POSSIBLE, TRANSPLANTED PRIOR TO CONSTRUCTION, OR REPLACED IF DESTROYED.

WHEN WORKING WITHIN 4m OF TREES, RUBBER OR HARDWOOD GIRDLES SHOULD BE WERE CONSTRUCTED WITH 1.8m BATTENS CLOSELY SPACED AND ARRANGED VERTICALLY FROM GROUND LEVEL. GIRDLES MUST BE WERE STRAPPED TO TREES PRIOR TO CONSTRUCTION AND REMAIN-**REMAINED TO COMPLETION.**

WHERE POSSIBLE, TREE ROOTS SHOULD BE WERE TUNNELLED UNDER, RATHER THAN SEVERED. IF ROOTS ARE SEVERED, THE DAMAGED AREA SHOULD BE WAS TREATED WITH A SUITABLE FUNGICIDE, CONTACT COUNCIL ARBORIST FOR FURTHER ADVICE.

ANY TREE LOPPING REQUIRED SHOULD BE WAS UNDERTAKEN BY AN APPROVED ARBORIST

TOPSOIL AND SUBSOIL SHOULD BE WERE STOCKPILED SEPARATELY.

CARE SHOULD BE WAS TAKEN TO PREVENT SEDIMENT FROM ENTERING THE STORMWATER SYSTEM. THIS MAY INVOLVE PLACING APPROPRIATE SEDIMENT CONTROLS AROUND STOCKPILES.

A. SILTATION CONTROL MEASURES SHOULD BE WERE PLACED DOWNSTREAM OF ANY EXCAVATION

APPROPRIATE SEDIMENT CONTROLS SHOULD BE WERE USED TO PREVENT SEDIMENT FROM

NO SOIL SHOULD BE WAS STOCKPILED WITHIN 5m OF THE CREEK.

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A. PREDISTURBANCE SOIL PROFILES AND COMPACTION LEVELS ARE TO BE WERE REINSTATED. PREDISTURBANCE VEGETATION PATTERNS SHOULD BE WERE RESTORED.

EGIS CONSULTING PTY LTD
CONTACT
OLIVER HARTIGAN
TELEPHONE
(07) 3228 9000

U.W. REF No. A/2021/0413									
RIVERBANK ESTATE STAGE 2B	WATER RETICULATION COVER SHEET								
DISCLAIMER ALL DIMENSIONS TO BE CHECKED ON SITE BY CONTRACTOR PRIOR TO CONSTRUCTION, USE WRITTEN DIMENSIONS ONLY, DO NOT SCALE,	PROJECT No. 21-000078.2	drawing No. 600	REVISION B						

UNITYWATER PROJECT NUMBER U-2023-4788 MARKET DRIVE, CABOOLTURE SOUTH DN160 & DN250/DN100 & DN150 SEWER/WATER MAIN

		DRAWING INDEX
DRAWING NUMBER		DES
U-2023-4788 Sheet 1	LOCALITY PLAN AND DRAWING INDEX	
U-2023-4788 Sheet 2	SEWER RETICULATION	
U-2023-4788 Sheet 3	SEWER RETICULATION	
U-2023-4788 Sheet 4	WATER RETICULATION	
U-2023-4788 Sheet 5	WATER RETICULATION	

<u>COORDINATE DATUM NOTE:</u> HORIZONTAL COORDINATES(E,N) SUPPLIED ARE MAPPING GRID OF AUSTRALIA(MGA), ZONE 56 BASED ON THE UNIVERSAL TRANSVERSE MERCATOR PROJECTION AND THE GEOCENTRIC DATUM OF AUSTRALIA 1994.					ENGINEER'S CERTIFICATION					RED SURVEYOR'S CERTIFICATION URSTON, hereby certify that the vertical and horizontal is shown on this plan are a true and correct record and were sig.) Reg. Surveyor No. 03047 Date: 01.02.2024			AS	S CONSTRUCTED
	-								-	WOLTER	\wedge	Unitywater	SHEET 1 OF 5 SHEETS REVISION DATE 01.02.2024	SCALE NA REVISION (
	1 E	C 01.02.2024	AS CONSTRUCTED - ADDITIONAL FH TEXT ADDED, EXISTING SEWER AND WATER ADDED	JC	BA A	.D C	DRAWN J	C 01.02.203		consulting group		201500358153	DISCIPLINE CODE	
		B 21.12.2023	AS CONSTRUCTED	JC	BA A	.D C	CHECKED B	A 01.02.202			RIVERBANK STAGE 2B	DRAWING NO.		
		A 13.12.2023	PRELIMINARY	JC	BA A	.D F	PASSED A	.D 01.02.20	Brichano	Richard Land 2 1 Brackfort Ck Band Neurotand OI D 4006 Bhand (07) 3666 5200	I Inity Jup tor I WATERSIDE ESPLANADE	WATERSIDE ESPLANADE	U-2023-4788	
	IN	DEX DATE	REVISIONS	DRAWN	CHECKED PA	SSED	IN	ITIALS DATE	brisbarie.	LEVEL2, I DICAMASI OK NOAM, NEWSLEAD, GLD 4000 PHONE. (07) 3000 5200	Jointywater	COVER SHEET		

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