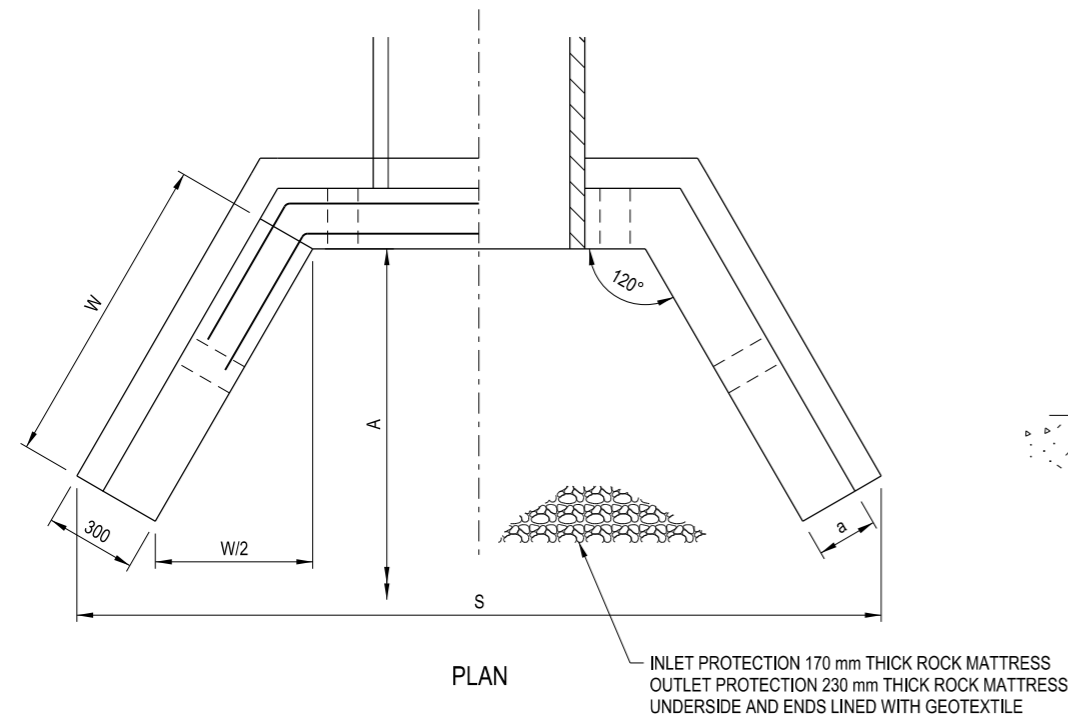


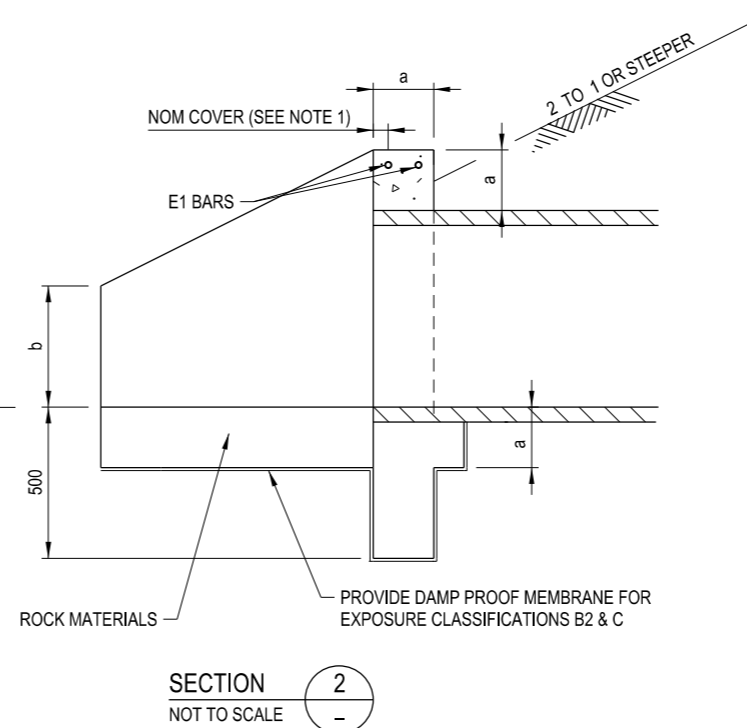
ELEVATION



SECTION 1 -  
NOT TO SCALE

INLET PROTECTION 170 mm THICK ROCK MATTRESS  
OUTLET PROTECTION 230 mm THICK ROCK MATTRESS  
UNDERSIDE AND ENDS LINED WITH GEOTEXTILE

DIMENSIONS	DIMENSIONS							
	D	A	A	C	S	W	a	b
D NOMINAL PIPE DIAMETER (mm)	300	375	450	525	600	750	900	
A APRON DEPTH AT INLET (mm)	2 000	2 000	2 000	2 000	2 000	3 000	3 000	
A APRON DEPTH AT OUTLET (mm)	2 000	2 000	2 000	4 000	4 000	4 000	5 000	
C HEADWALL LENGTH (mm)	770	850	940	1 020	1 100	1 270	1 450	
S APRON WIDTH (mm)	1 600	1 850	2 150	2 400	2 700	3 200	3 750	
W WINGWALL LENGTH (mm)	310	480	680	850	1 040	1 400	1 780	
a (mm)	150	150	150	150	150	150	150	
b (mm)	300	300	300	300	400	400	400	
QUANTITIES IN 2 HEADWALLS	QUANTITIES IN 2 HEADWALLS							
	E1 BAR Ø12 mm	L1 (mm)	L2 (mm)	No. REQ (mm)	LENGTH (mm)	STEEL REINFORCEMENT (kg)	CONCRETE N25 (SEE NOTE 1) (m³)	
	885	200	4	5 140	4.6	0.45		
	965	200	4	5 460	4.8	0.57		
	1 055	200	4	5 820	5.2	0.72		
	1 135	200	4	6 140	5.5	0.86		
	1 215	600	4	9 660	8.6	1.05		
	1 385	600	4	10 340	9.2	1.40		
	1 565	600	4	11 060	9.8	1.81		



SECTION 2 -  
NOT TO SCALE

NOTES

1. CONCRETE STRENGTH GRADES SHOWN ARE FOR EXPOSURE CLASSIFICATION A2. REFER TO AS3600-2009, SECTION 4 FOR CONCRETE STRENGTH GRADE, COVER TO REINFORCEMENT AND FOR OTHER EXPOSURE CLASSIFICATIONS.
2. WEEPHOLES ARE TO BE PROVIDED AT 1800 CENTRES (MAXIMUM) AT OUTLET ONLY.
3. ALL STEEL BARS TO BE GRADE 400Y TO AS4671-2001.

REFERENCED DOCUMENTS:

- AS4671-2001 STEEL REINFORCING MATERIALS
- AS3600-2009 CONCRETE STRUCTURES
- SPECIFICATION R11 - STORMWATER DRAINAGE
- SPECIFICATION B80 - CONCRETE WORK FOR BRIDGES

THIS DRAWING MAY BE PREPARED IN COLOUR AND MAY BE INCOMPLETE IF COPIED

50mm ON A3 SIZE ORIGINAL

QR CODE			SCAN TO CHECK DOCUMENT VER.			REV			DATE			AMENDMENT / REVISION DESCRIPTION			WVR No.			APPROVAL			ALL DIMENSIONS ARE IN MILLIMETRES UNLESS OTHERWISE SHOWN			CONTACT DETAILS			ISSUED			SFR			MANAGER ROAD POLICY, SPECIFICATIONS & TECHNOLOGY			DATE 20.01.17			PREPARED BY ENGINEERING SERVICES ROAD POLICY, SPECIFICATIONS AND AND TECHNOLOGY			STANDARD DRAWING No. R0210-02			REV. -		
SEND FEEDBACK ON THIS STANDARD DRAWING TO : technologystandards@rms.nsw.gov.au			DATE 20.01.17			STATUS ISSUED			EDMS No. DS2014/005789			ORIGINAL ISSUE DATE JANUARY 2017			© Roads and Maritime Services			STANDARD DRAWING ROAD DESIGN ENGINEERING R0210 STORMWATER DRAINAGE SERIES - HEADWALLS CONCRETE HEADWALLS SINGLE CELL Ø300mm TO Ø900mm WITH ROCK MATTRESS PROTECTION (2 TO 1 BATTER OR STEEPER) SHEET 1 OF 1			A3																										