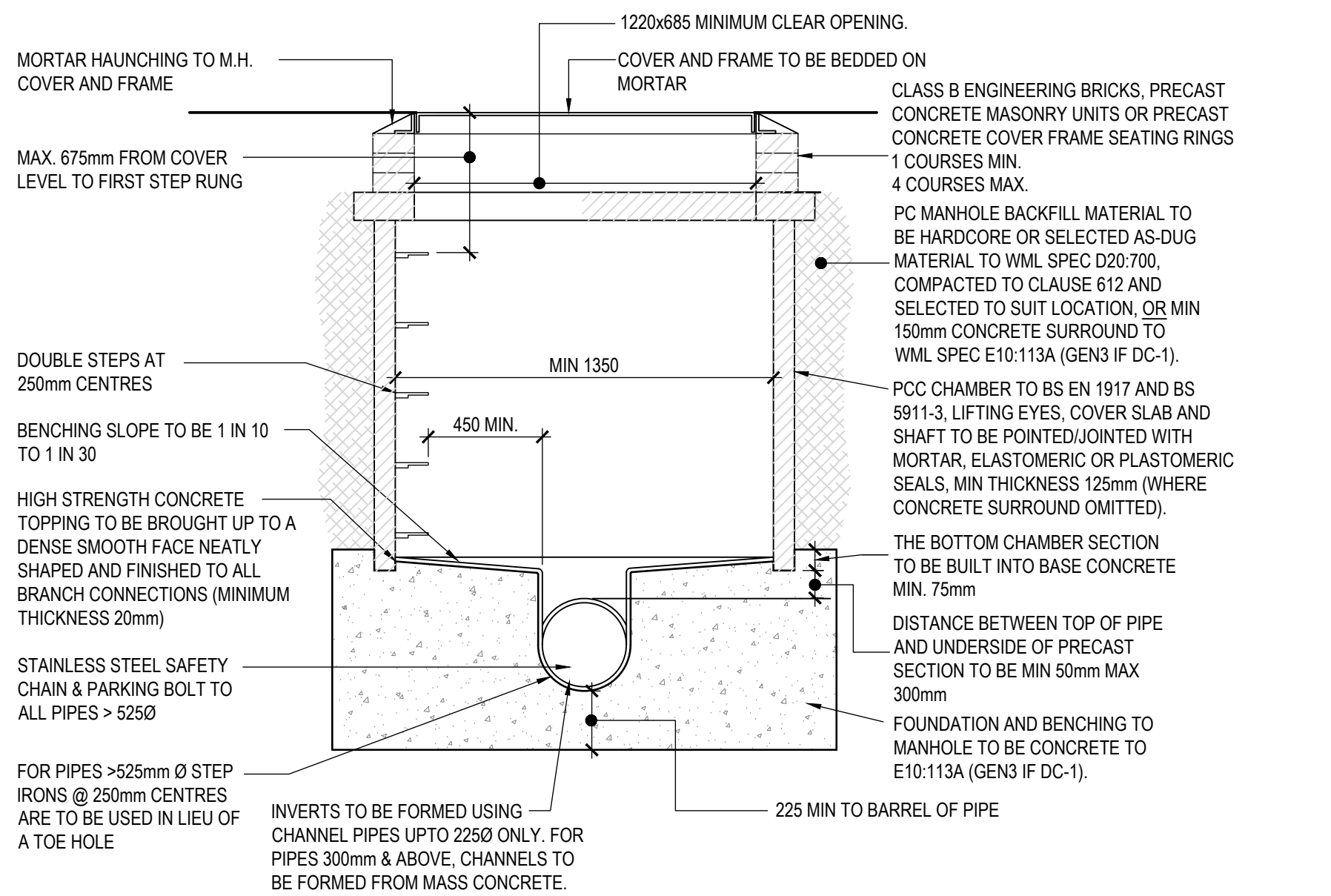
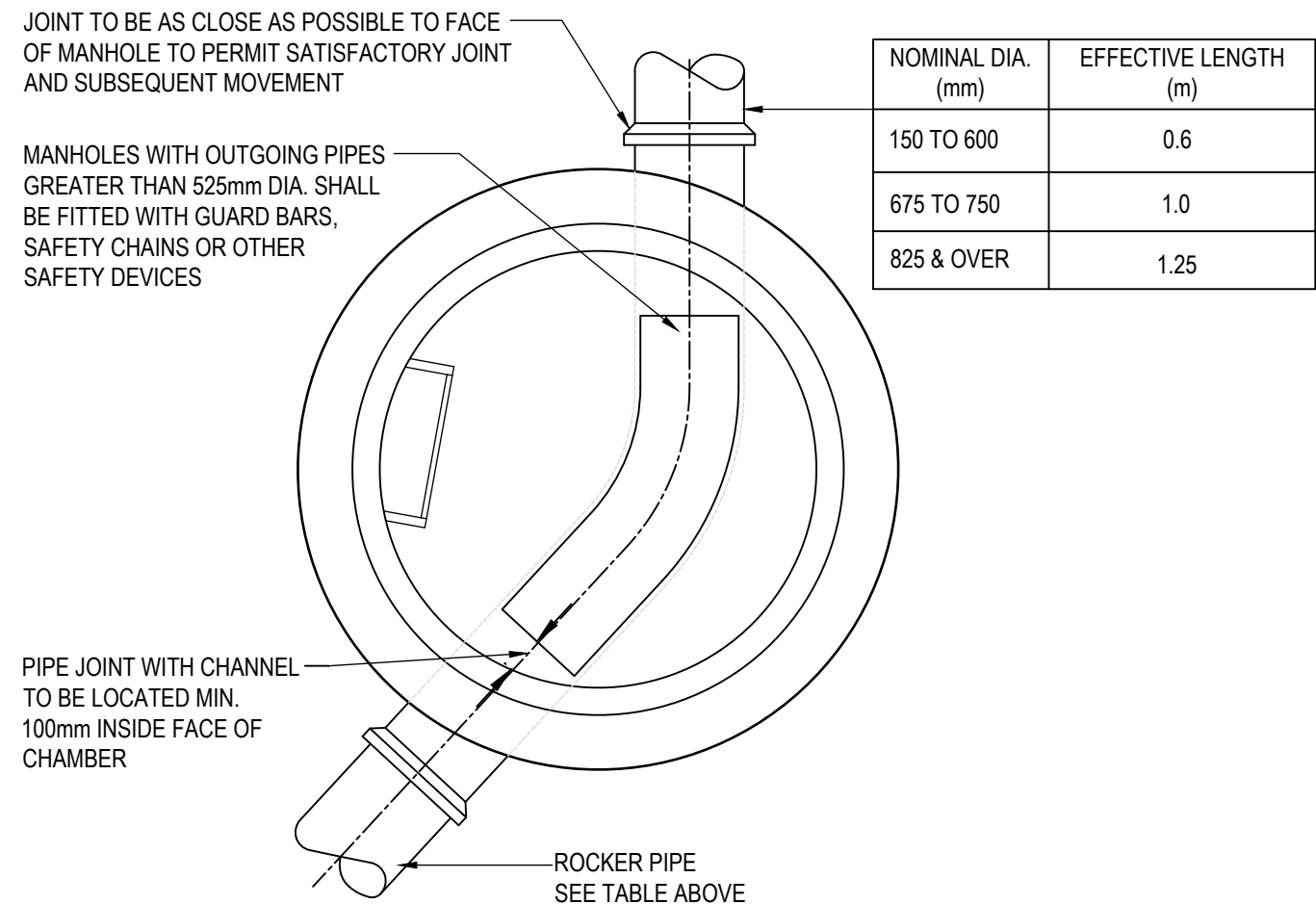
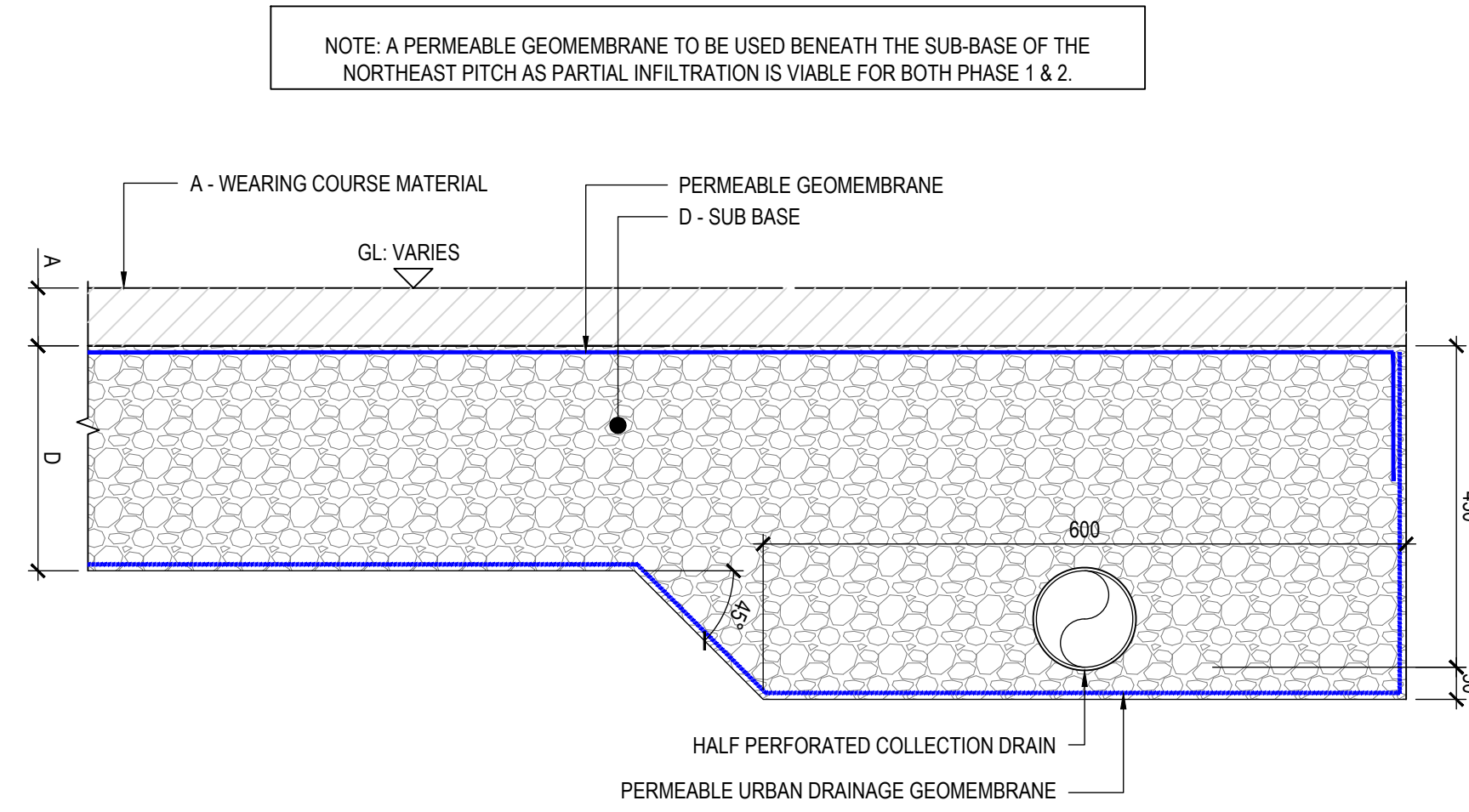




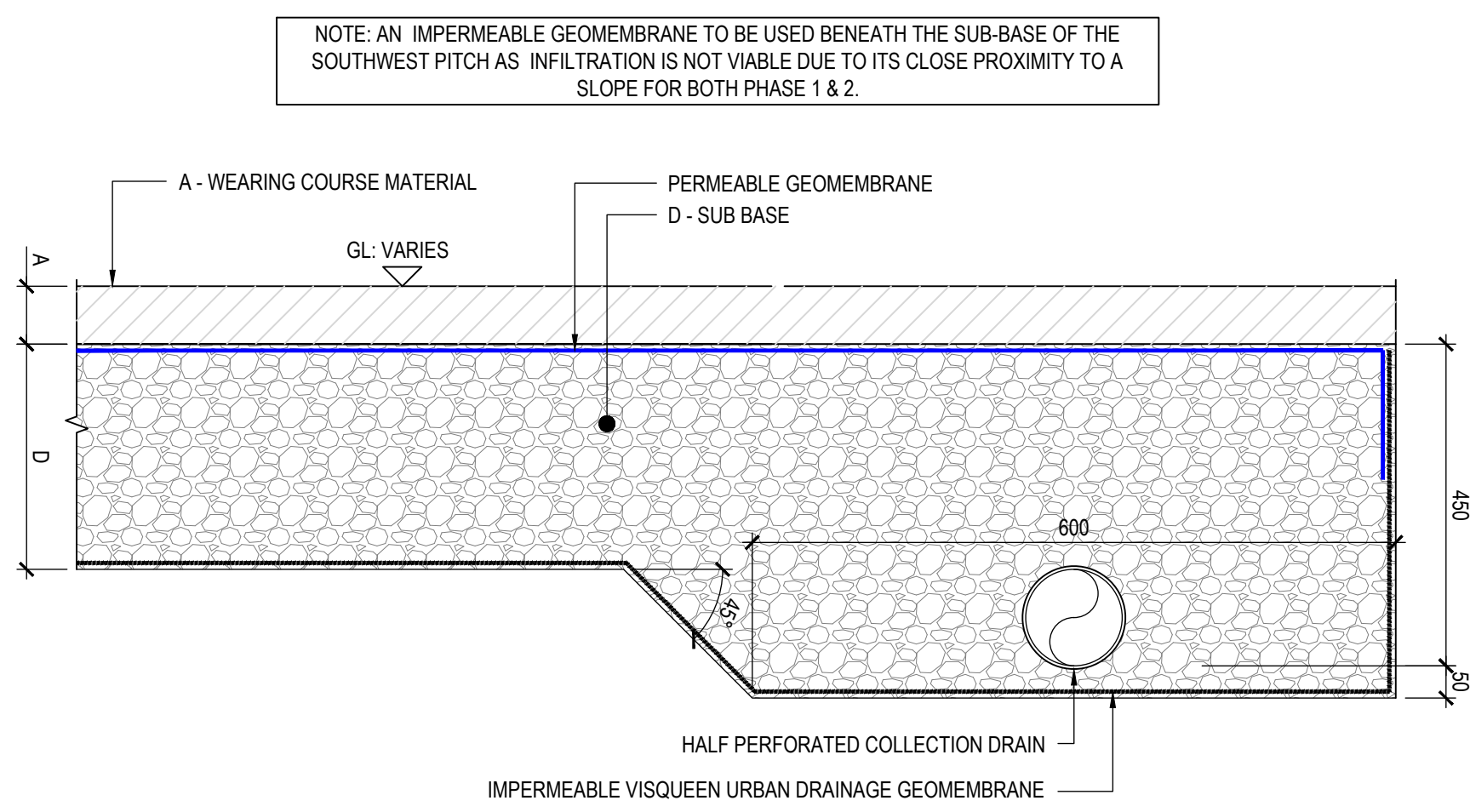
TYPICAL MANHOLE SECTION DETAIL TYPE C (TYPE 2)
DEPTH TO SOFFIT OF PIPE LESS THAN 1.5m,
MAX PIPE DIA 450mm
(SCALE 1:20)



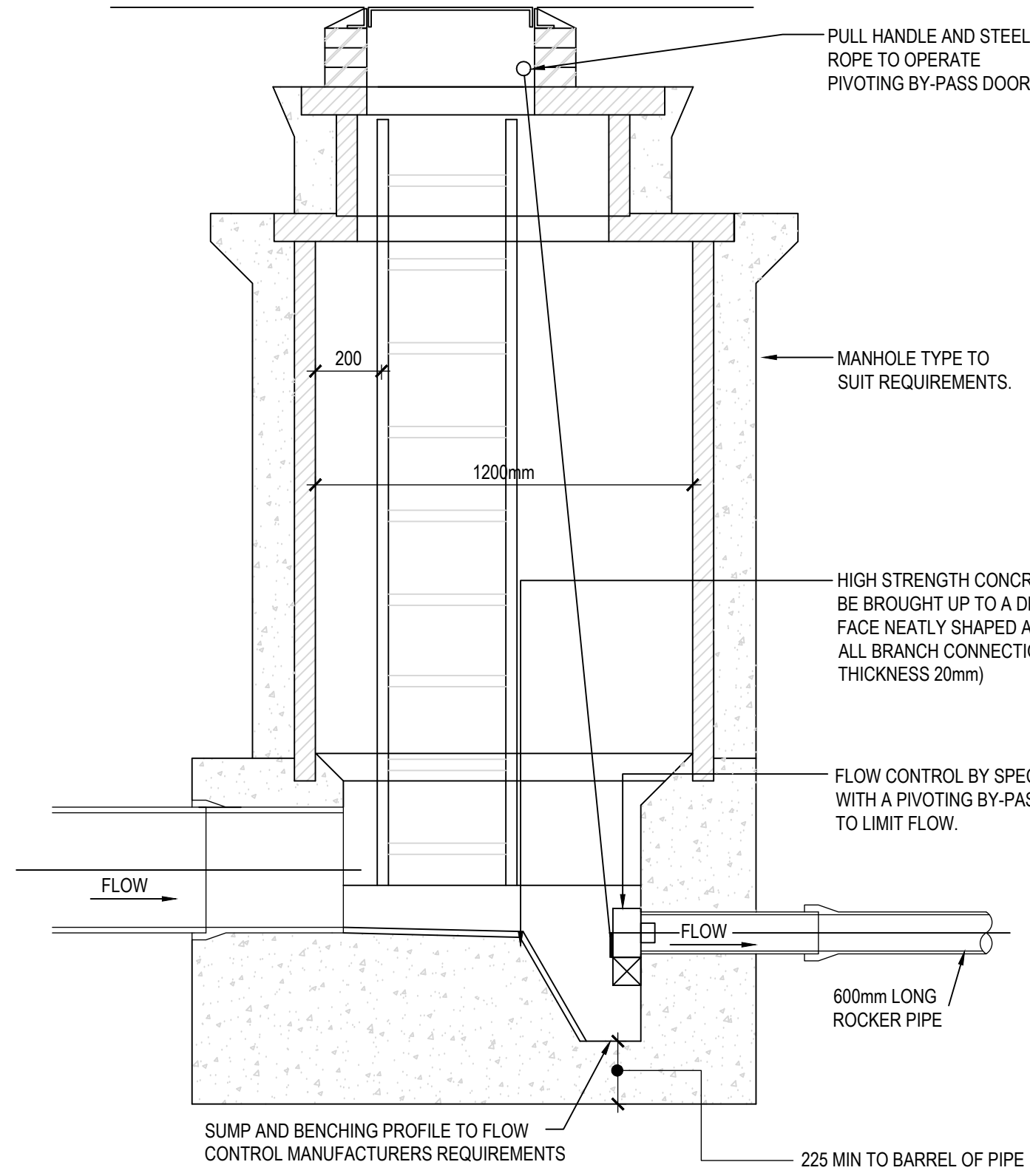
TYPICAL MANHOLE PLAN DETAIL TYPE C (TYPE 2)
DEPTH TO SOFFIT OF PIPE LESS THAN 1.5m,
MAX PIPE DIA 450mm
(SCALE 1:20)



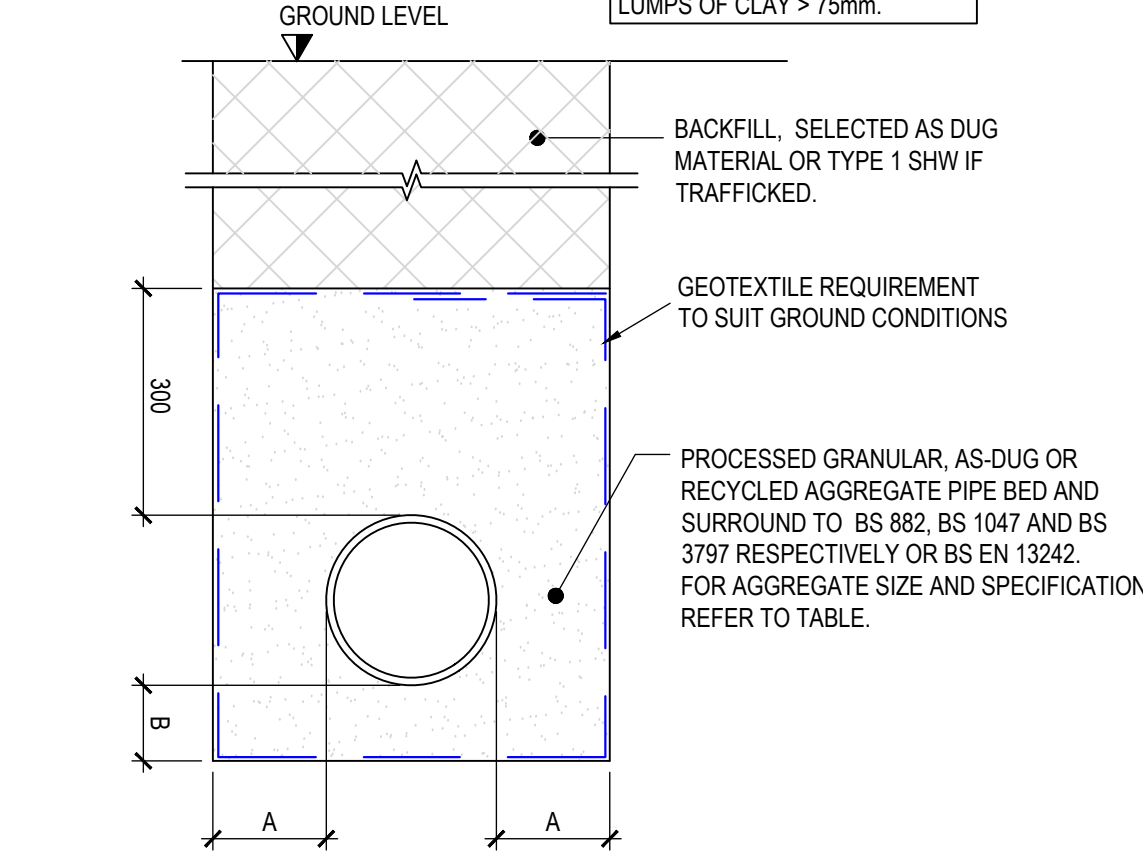
TYPICAL SECTION THROUGH PERMEABLE HARD PLAY SURFACE (PARTIAL INFILTRATION)
(SCALE 1:10)



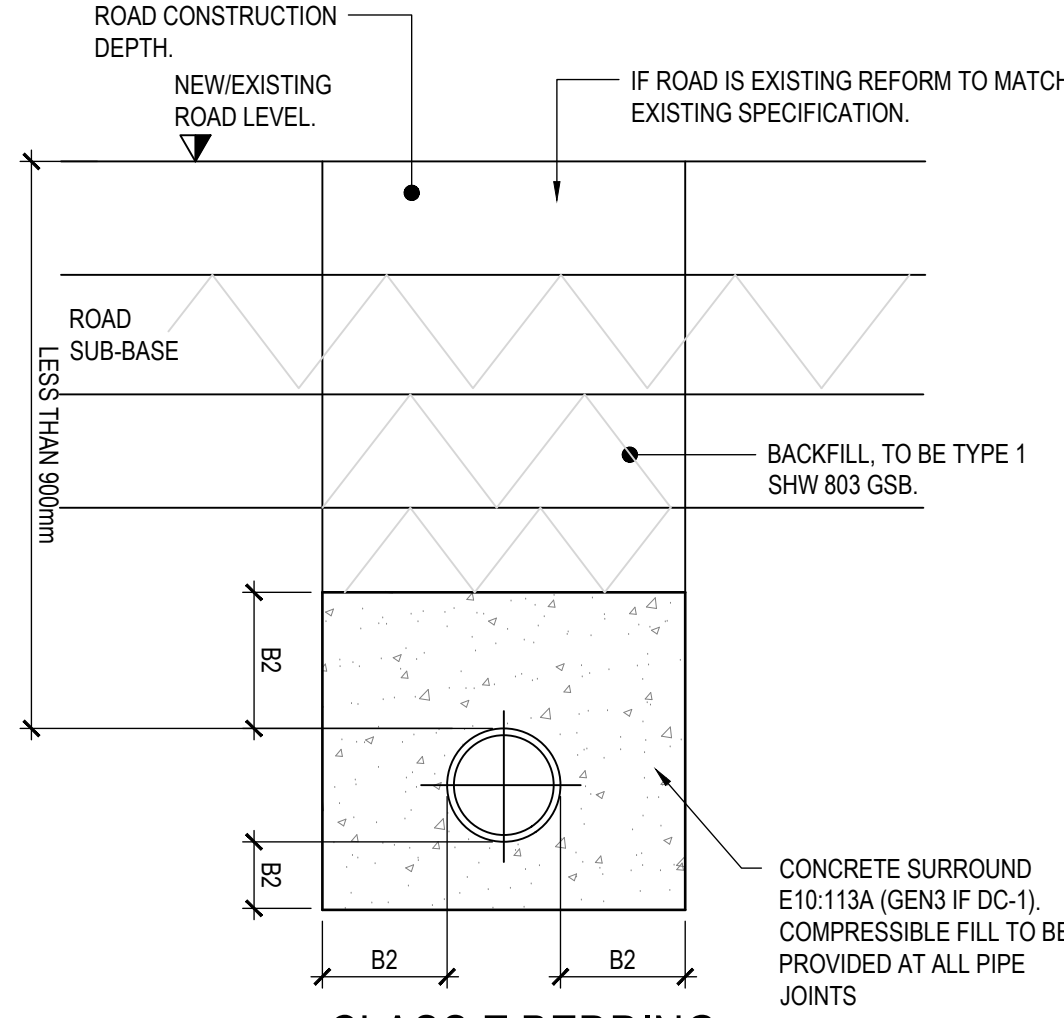
TYPICAL SECTION THROUGH PERMEABLE HARD PLAY SURFACE (NO INFILTRATION)
(SCALE 1:10)



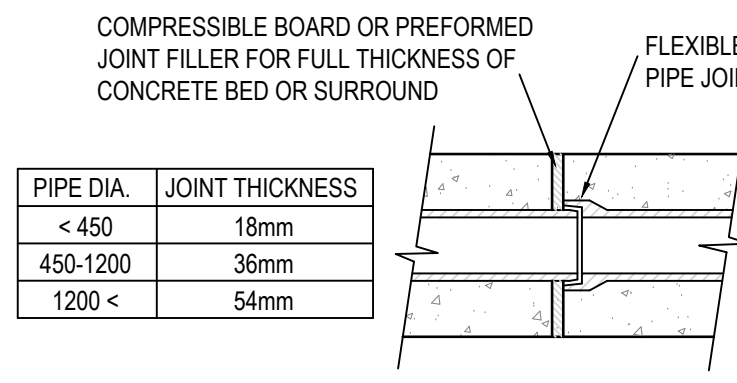
FLOW CONTROL CHAMBER
(BACKFILL, SHAFT, ACCESS, COVER SLAB AND COVER & FRAME AS PER PCC MANHOLES)
(SCALE 1:20)



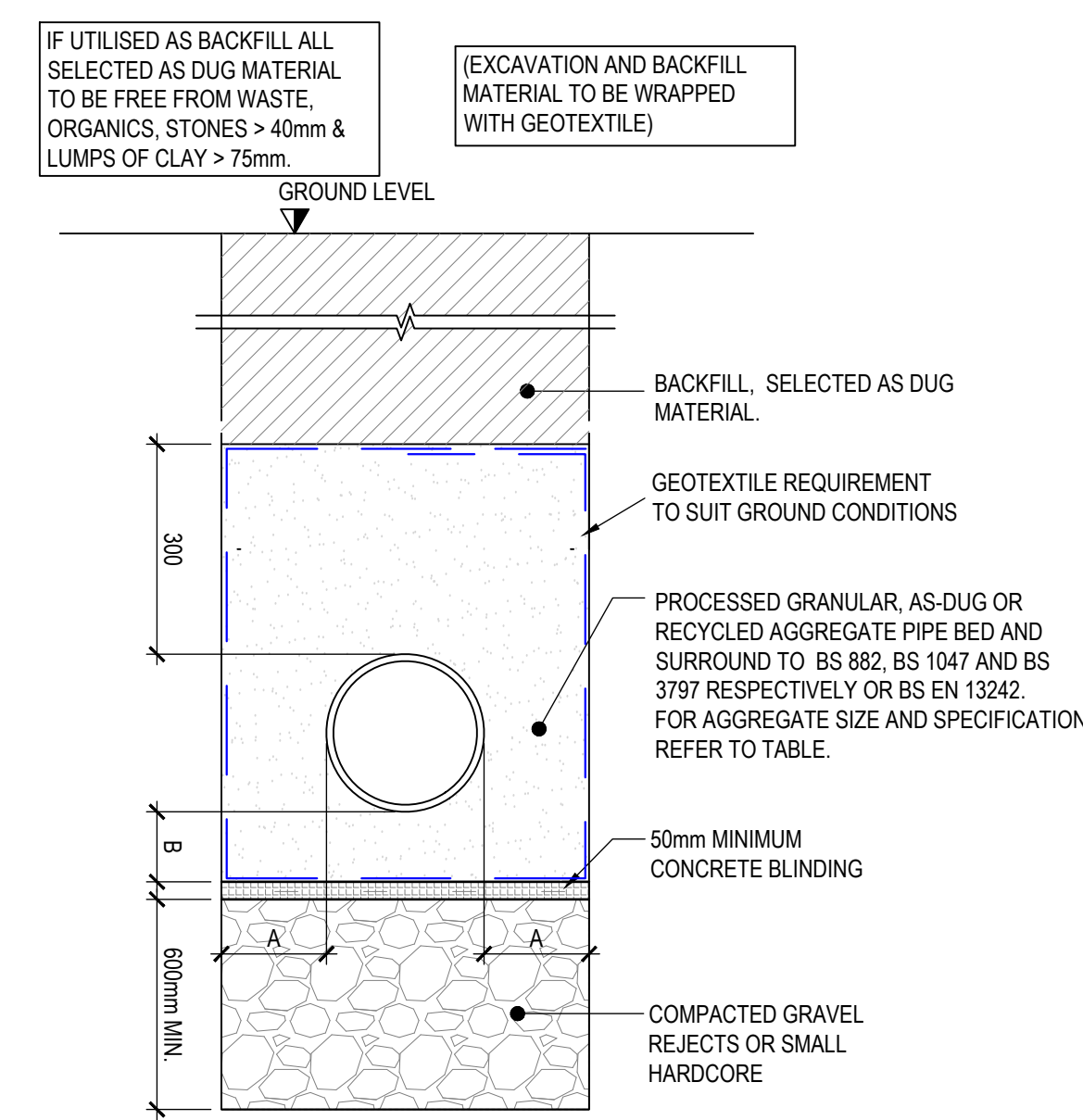
CLASS S BEDDING
NON PRESSURISED FLEXIBLE PIPES
(SCALE 1:10 @ A1)



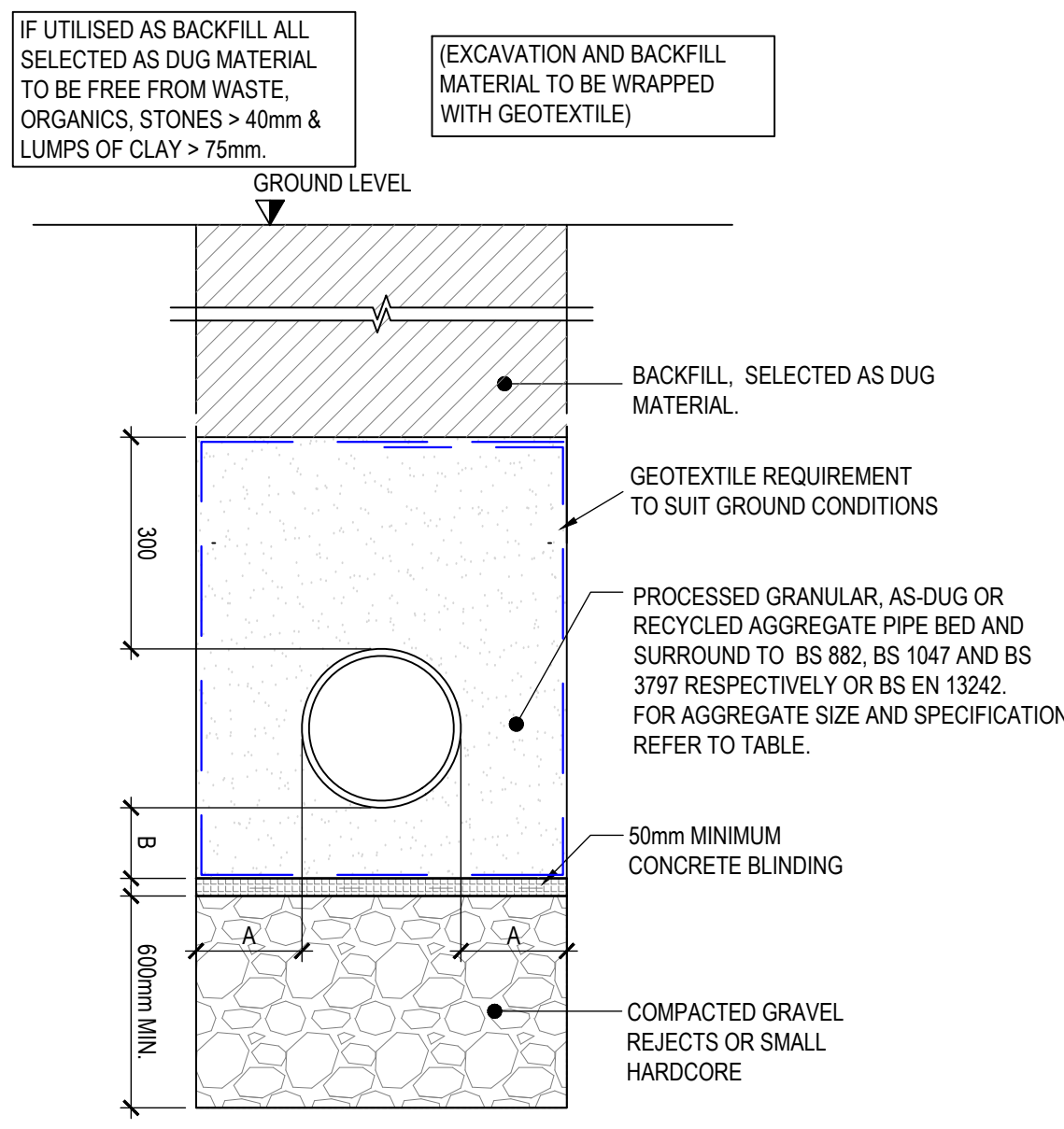
CLASS Z BEDDING
CONCRETE SURROUND UNDER ROADS LESS THAN 1200mm
COVER & NON-TRAFFICKED LESS THAN 900mm COVER.
(SCALE 1:10 @ A1)



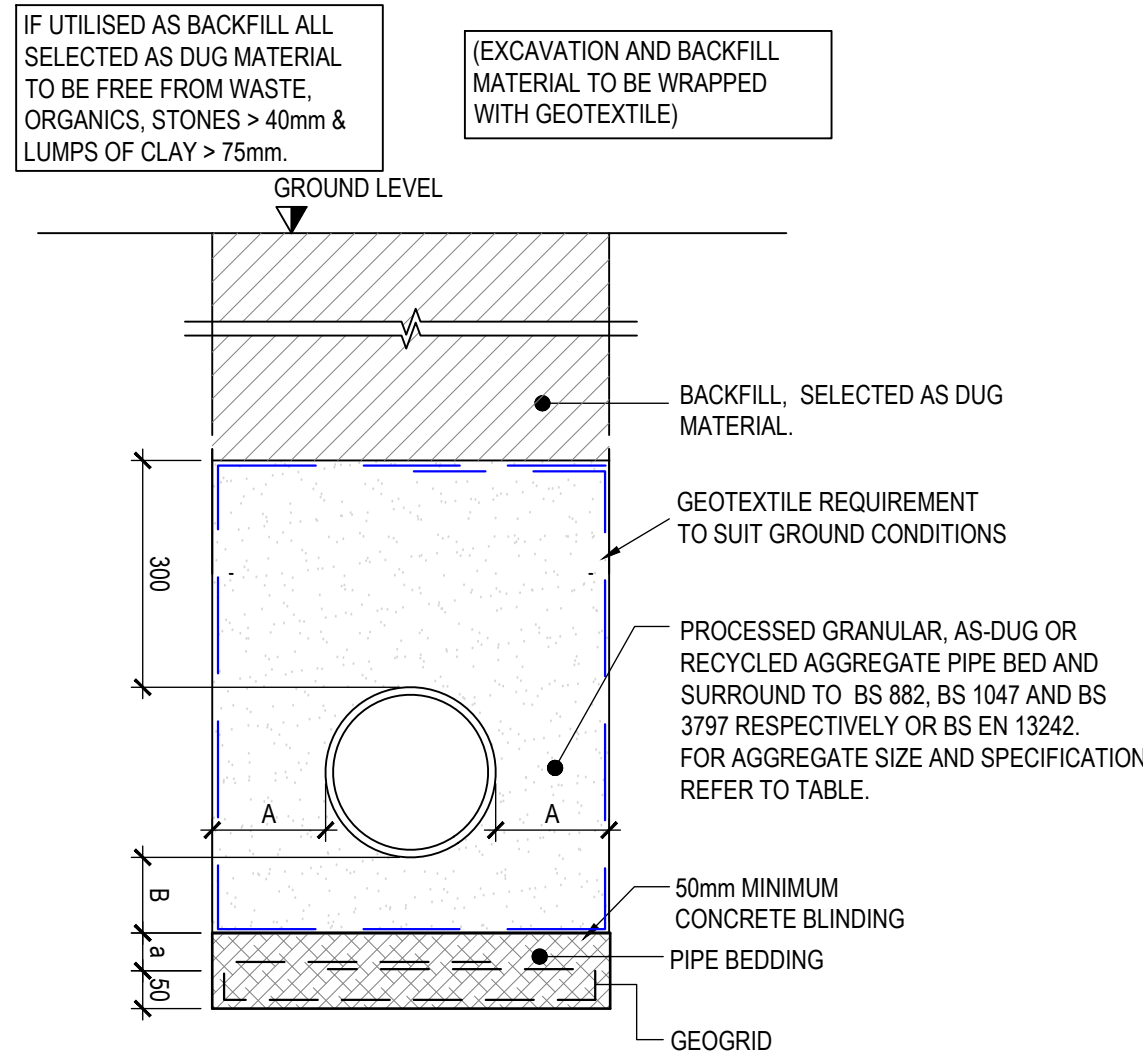
EXPANSION JOINT FOR CONCRETE
TO OCCUR AT EVERY JOINT
(SCALE 1:10 @ A1)



CLASS S BEDDING IN SOFT GROUND
NON PRESSURISED FLEXIBLE PIPES NOT SUBJECTED
TO TRAFFIC
(SCALE 1:10 @ A1)



CLASS S BEDDING IN SOFT GROUND
NON PRESSURISED FLEXIBLE PIPES NOT SUBJECTED
TO TRAFFIC
(SCALE 1:10 @ A1)

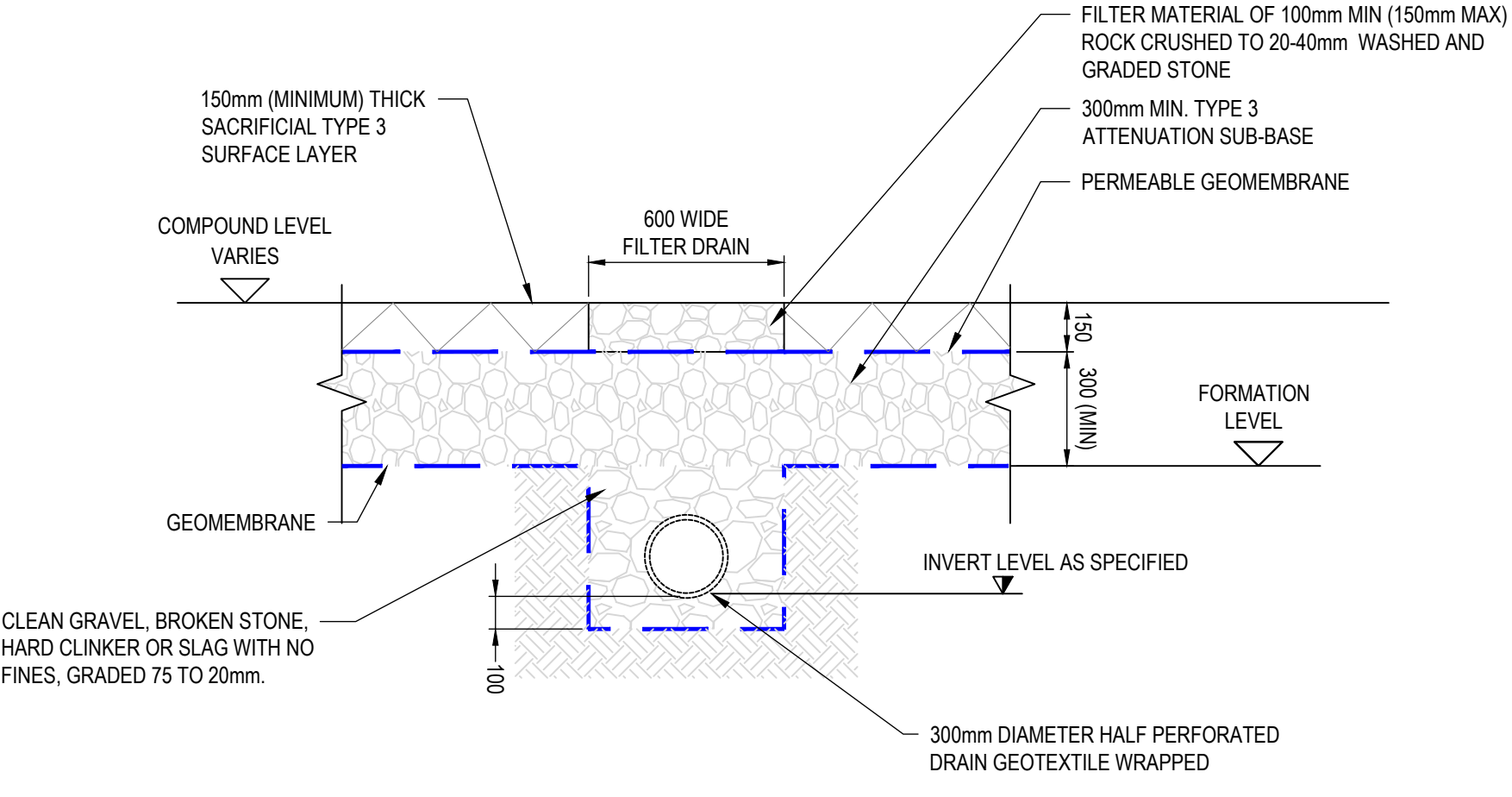


CLASS S BEDDING IN SOFT GROUND
USING GEOGRID
NON PRESSURISED FLEXIBLE PIPES NOT SUBJECTED
TO TRAFFIC
(SCALE 1:10 @ A1)

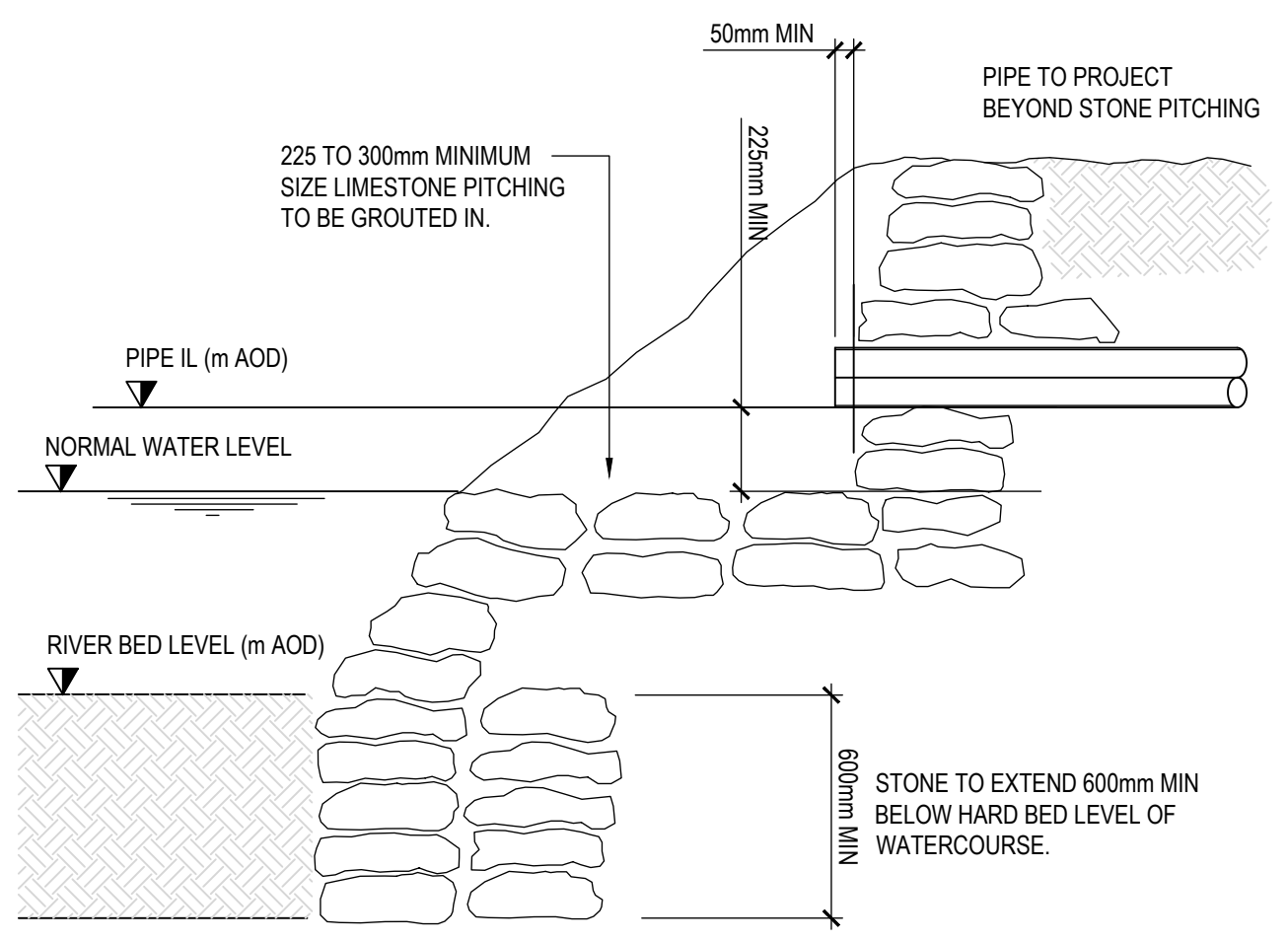
PIPE NOM. ID	(A) MIN	(A) MAX	(B1) EVEN TRENCH BOTTOM	(B2) ROCK OR UNEVEN TRENCH BOTTOM
< 300mm	100mm	300mm	100mm	150mm
350mm	100mm	300mm	100mm	200mm
400-700mm	150mm	350mm	150mm	250mm
725-900mm	200mm	400mm	200mm	300mm
925-1200mm	250mm	500mm	250mm	350mm

PIPE NOM. ID	CLASS OF BEDDING	PERMISSIBLE BEDDING MATERIAL
100mm	S	10mm NOM. SINGLE SIZE
	N	COURSE, MEDIUM OR FINE SAND
100-150mm	S	10 OR 14mm NOM. SINGLE SIZE OR 14-5mm GRADED
	N	COURSE, MEDIUM OR FINE SAND
150-300mm	S	10, 14 OR 20mm NOM. SINGLE SIZE OR 14-5mm GRADED
	N	ALL-IN AGG. OR COURSE, MEDIUM OR FINE SAND
300-550mm	S	14 OR 20mm NOM. SINGLE SIZE OR 14-5mm GRADED
	N	ALL-IN AGG. OR COURSE, MEDIUM OR FINE SAND
OVER 550mm	S	14, 20 OR 40mm NOM. SINGLE SIZE OR 14-5mm GRADED
	N	ALL-IN AGG. OR COURSE, MEDIUM OR FINE SAND

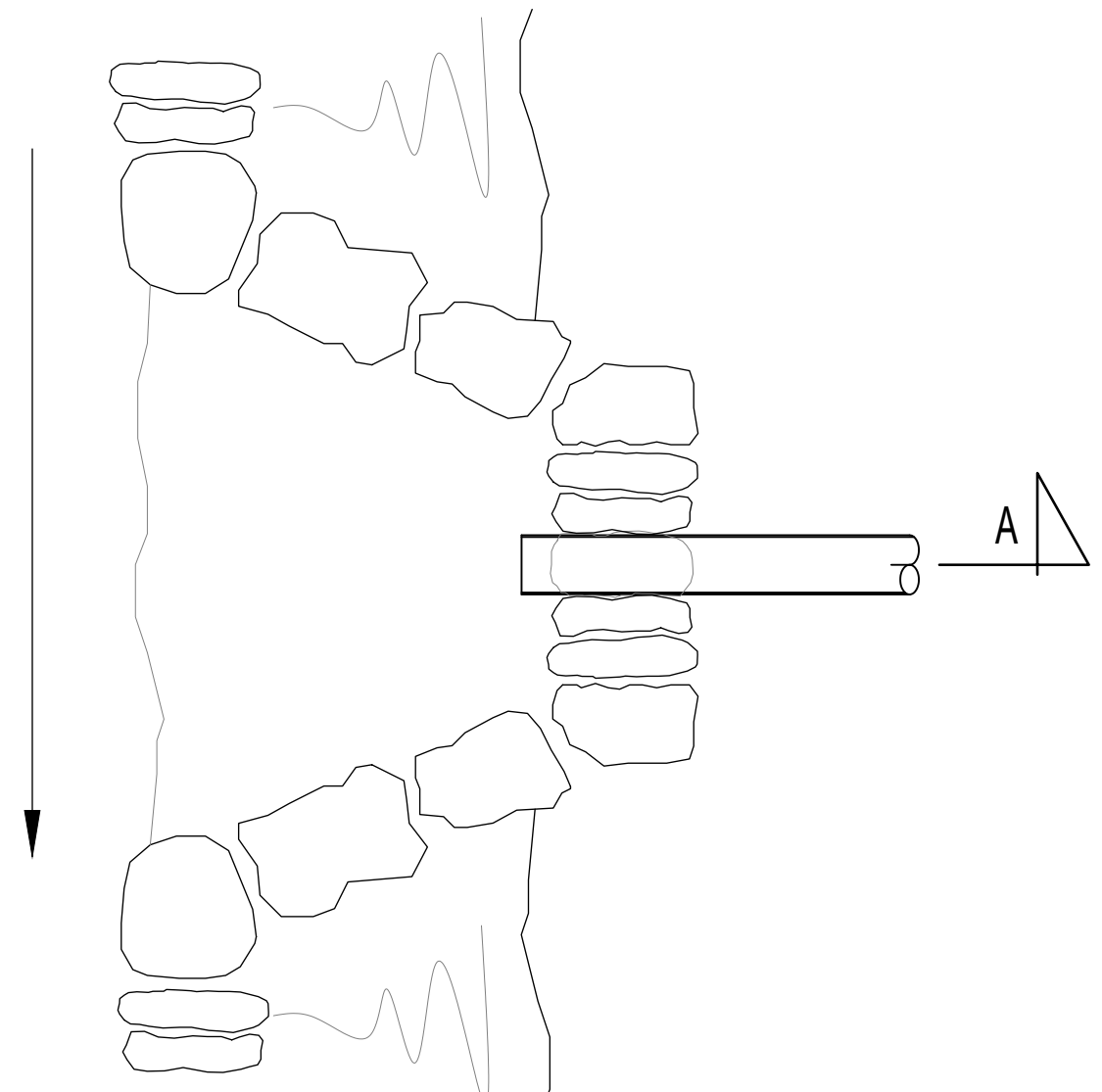
NOTE: PROCESSED AGGREGATE MATERIALS TO BS 882, AIR-COOLED BLAST FURNACE SLAG TO BS 1047 AND LIGHTWEIGHT AGGREGATES TO BS 379



SECTION THROUGH FILTER DRAIN
(PIPED FILTER DRAIN)
(SCALE 1:20)



TYPICAL OUTFALL DETAIL SECTION THROUGH A - A
SCALE: 1:20



TYPICAL OUTFALL DETAIL - PLAN
SCALE: 1:20

GENERAL NOTES

DO NOT SCALE FROM THIS DRAWING WORK TO FIGURED DIMENSIONS ONLY.

NO DEVIATION FROM THE DETAILS SHOWN ON THIS DRAWING IS ALLOWED WITHOUT PRIOR PERMISSION IN WRITING.

ALL DRAWINGS ARE TO BE READ IN CONJUNCTION WITH ALL ARCHITECTS, ENGINEERS AND SPECIALISTS DRAWINGS AND THE SPECIFICATION.

THE CONTRACTOR SHALL INCORPORATE ALL THE REQUIREMENTS OF THE PRE-TENDER STAGE HEALTH AND SAFETY PLAN.

THIS DRAWING IS TO BE READ IN CONJUNCTION WITH WML DRAINAGE DETAIL DRAWINGS FOR DETAILS OF MATERIALS AND WORKMANSHIP REFER TO THE SPECIFICATION.

THE CONTRACTOR IS RESPONSIBLE FOR CHECKING INVERT LEVELS AND POSITIONS OF ALL EXISTING DRAINS, SEWERS, INSPECTION CHAMBERS AND MANHOLES SHOWN ON THIS DRAWING IMMEDIATELY ON SITE ESTABLISHMENT. ANY DISCREPANCIES MUST BE REPORTED TO WML CONSULTING IMMEDIATELY.

WHERE THE NEW SITE DRAINAGE CONNECTS IN TO EXISTING MANHOLES IN CARRIAGEWAYS AND/OR EXISTING ADOPTED SEWERS, THE CONTRACTOR IS RESPONSIBLE FOR ALL LIAISON WITH THE RELEVANT STATUTORY UNDERTAKER AND LOCAL AUTHORITY WITH REGARD TO ROAD CLOSURES, TRAFFIC MANAGEMENT, PERMITS TO WORK, SUBMISSION OF CONTRACTORS METHOD STATEMENTS AND RISK ASSESSMENTS AND OTHER DOCUMENTATION AND CORRESPONDENCE ASSOCIATED WITH THE SITE STAGE (PART 2) ELEMENT OF THE WORKS.

ROCKER PIPES TO BE PROVIDED AT ALL CONCRETE CASED INTERFACES.

PROVIDE ADEQUATE PROTECTION TO MAINTAIN MINIMUM COVER TO DRAINS DURING THE CONSTRUCTION PERIOD.

COVER LEVELS ON THIS DRAWING ARE APPROXIMATE AND INDICATIVE ONLY ARCHITECT TO CONFIRM COVER LEVELS TO ALL MANHOLES AND GULLIES PRIOR TO CONSTRUCTION.

THE LAYOUT OF DRAINAGE ON THIS DRAWING IS INDICATIVE ONLY ARCHITECT TO CONFIRM EXACT LOCATION OF MANHOLES AND GULLIES.

ALL COVERS AND ROADING ACCESS POINTS TO BE SEALED AND SCREWED TIGHT.

ALL INTERNAL MANHOLE COVERS TO BE DOUBLE SEALED, LOCKABLE AND RECESSED TO ACCEPT FLOOR FINISHES WHERE APPLICABLE.

SETTING OUT OF ALL INTERNAL GULLY/PLUMBING CONNECTIONS TO BE CO-ORDINATED BETWEEN THE SERVICE ENGINEERS AND THE ARCHITECT.

ALL CONNECTIONS TO BE MADE IN ACCORDANCE WITH STANDARD DETAIL DRAWINGS.

ALL PIPEWORK TO BE INSTALLED WITH SOFFITS LEVEL (E.G. AT CHANGES IN PIPE SIZE) U.N.O.

FOR DETAILS OF GREASE TRAP/MACERATOR REQUIREMENTS ASSOCIATED WITH KITCHENS REFER TO SERVICE ENGINEER.

ON COMPLETION OF DRAINAGE WORKS, THE NEW DRAINAGE SYSTEM IS TO BE THOROUGHLY CLEANED AND A CCTV SURVEY CARRIED OUT TO CONFIRM NO CONSTRUCTION DEBRIS OR BLOCKAGES REMAIN.

CONNECTIONS TO CARRIER DRAINS ARE TO BE "Y" JUNCTIONS.

ALL PRIVATE DRAINAGE IS TO COMPLY WITH BS EN 752 AND BUILDING REGS. PART H.

PIPE GRADIENTS ARE INDICATIVE MINIMUMS.

MANHOLES:

ALL PROPOSED NEW MANHOLES TO BE PRECAST RING MANHOLES TYPE B UNLESS NOTED OTHERWISE. INTERNAL DIAMETERS OF MANHOLES TO BE 1050mm WHERE DEPTH TO PIPE SOFFIT IS LESS THAN 1.5m, AND 1200mm Ø ELSEWHERE UNLESS NOTED OTHERWISE.

MANHOLE COVERS:

CARRIAGEWAYS GENERAL - EN124 CLASS D400
CARRIAGEWAYS WITHIN 0.5m OF KERB - EN124 CLASS C250
SLOW MOVING HGV (38t) - EN 124 CLASS B125 SLOW MOVING
GLV (18t) - EN 124 CLASS B125 SLOW MOVING PRIVATE CARS - EN124 CLASS B125.

INTERNAL - JONES OF OSWESTRY - SUPRASTEEL DOUBLE SEALED WITH NEOPRENE GASKET AND COVER GREASE OR SIMILAR APPROVED.

REFER TO ARCHITECTS DRAWINGS FOR DETAILS OF ANY MANHOLE COVERS WHICH REQUIRE INSET PANELS.

**SUBJECT TO APPROVAL FROM
LOCAL PLANNING AUTHORITY
& UNITED UTILITIES**

PRELIMINARY ISSUE

P02	PRELIMINARY ISSUE.			02.25.25	CM
P01	PRELIMINARY ISSUE.			16.04.25	CM
Rev.	Amendment			Date	By
Project					
MANCHESTER COMMUNICATION ACADEMY					
MUGA					
ARCH/CLIENT					
LANCASTER MALONEY MARTIN LTD.					
Title					
PROPOSED DRAINAGE DETAILS					
WML Job No.	11258	Drawn	CM	Checked	JH
				Date	APRIL 24
				Scale	AS SHOWN @ A0
WML CONSULTING				Third Floor South Metropolitan House Station Road Chorley PR6 7AZ Tel: 0161 442 0000 Fax: 0161 442 0010 e-mail: info@wmlconsulting.com www.wmlconsulting.com	
Drawing No.					
Project	Originator	Volume	Level	Type	Role
11258	- WML - MU - XX - DR -				C - Number
					Rev