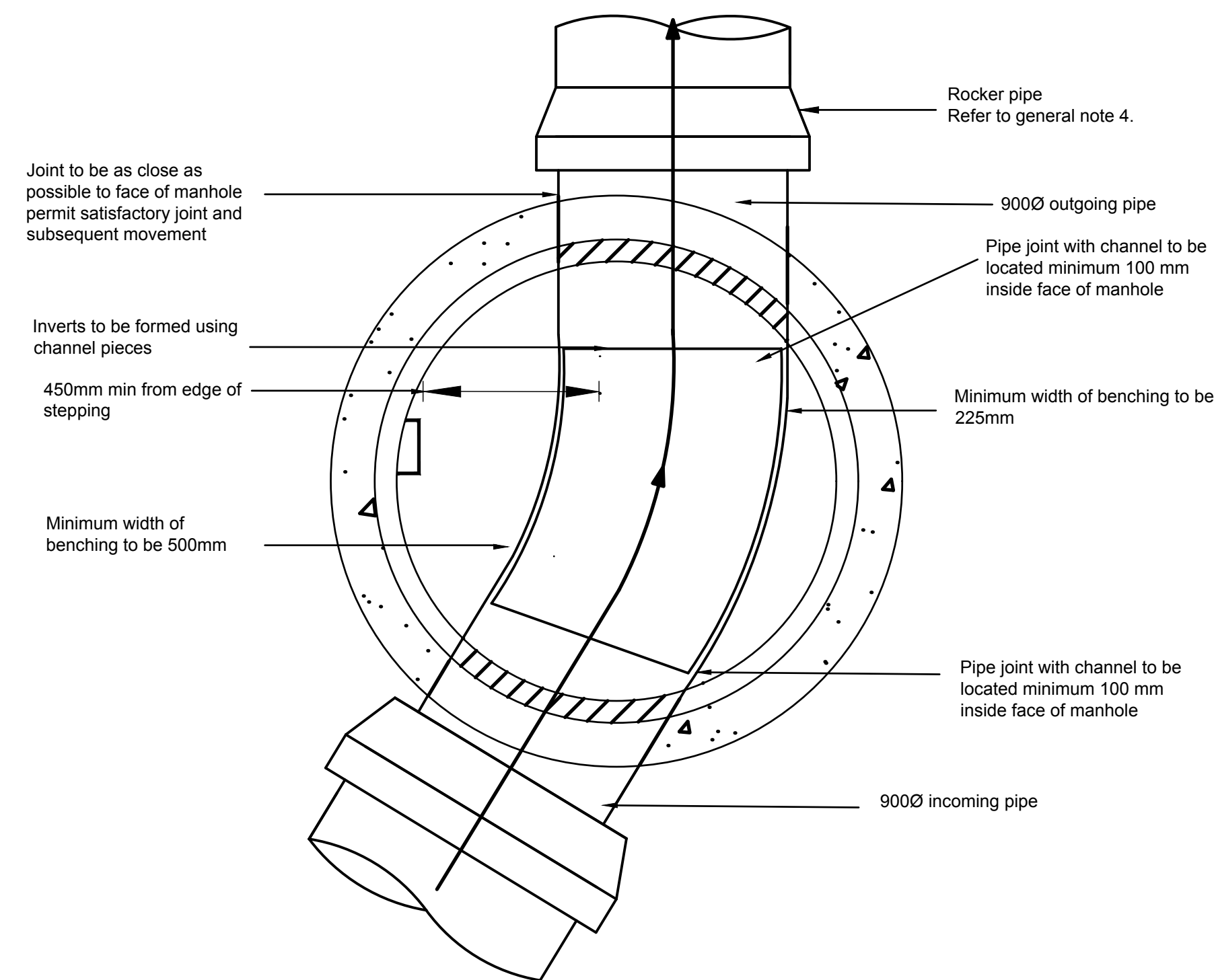
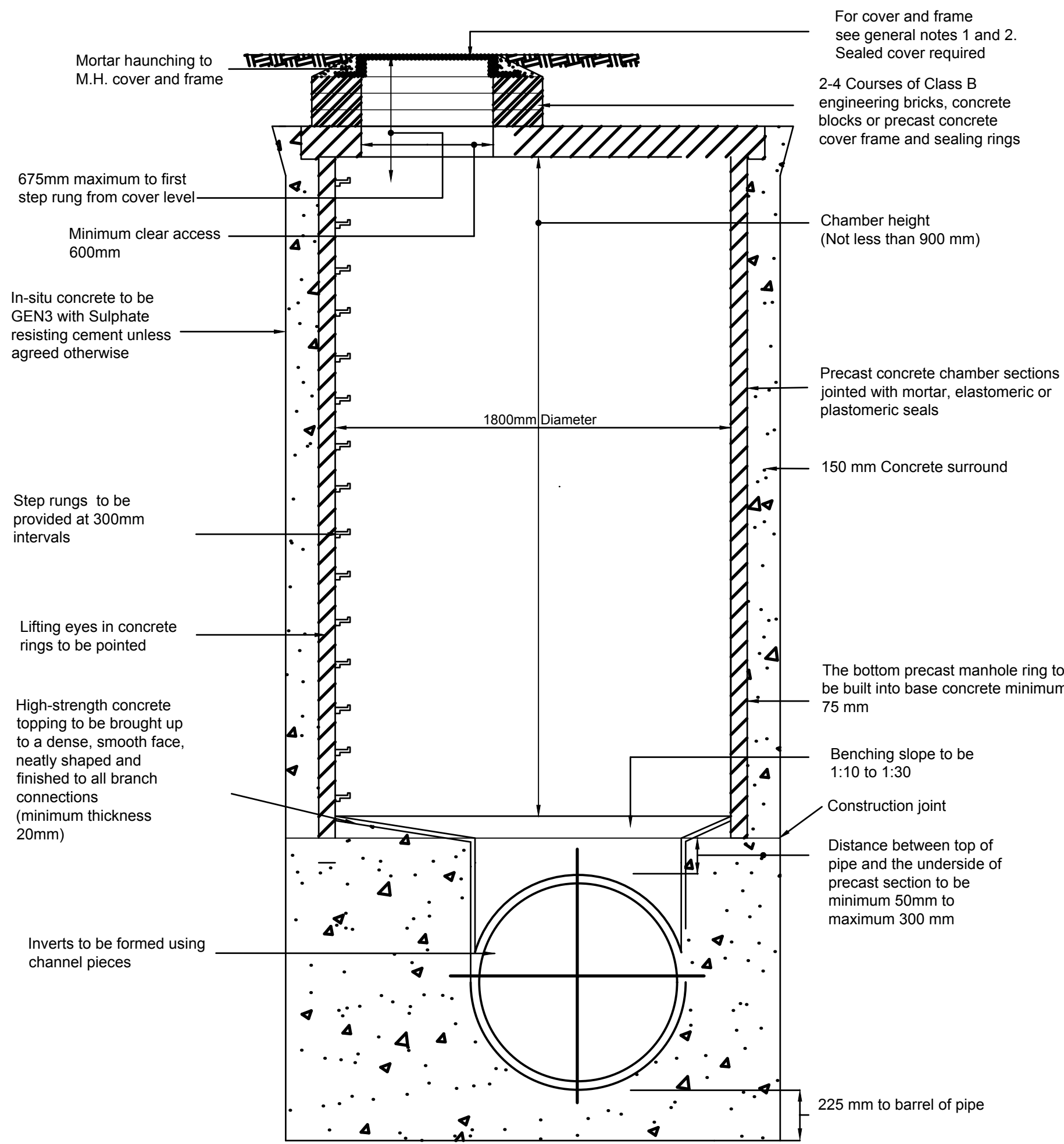
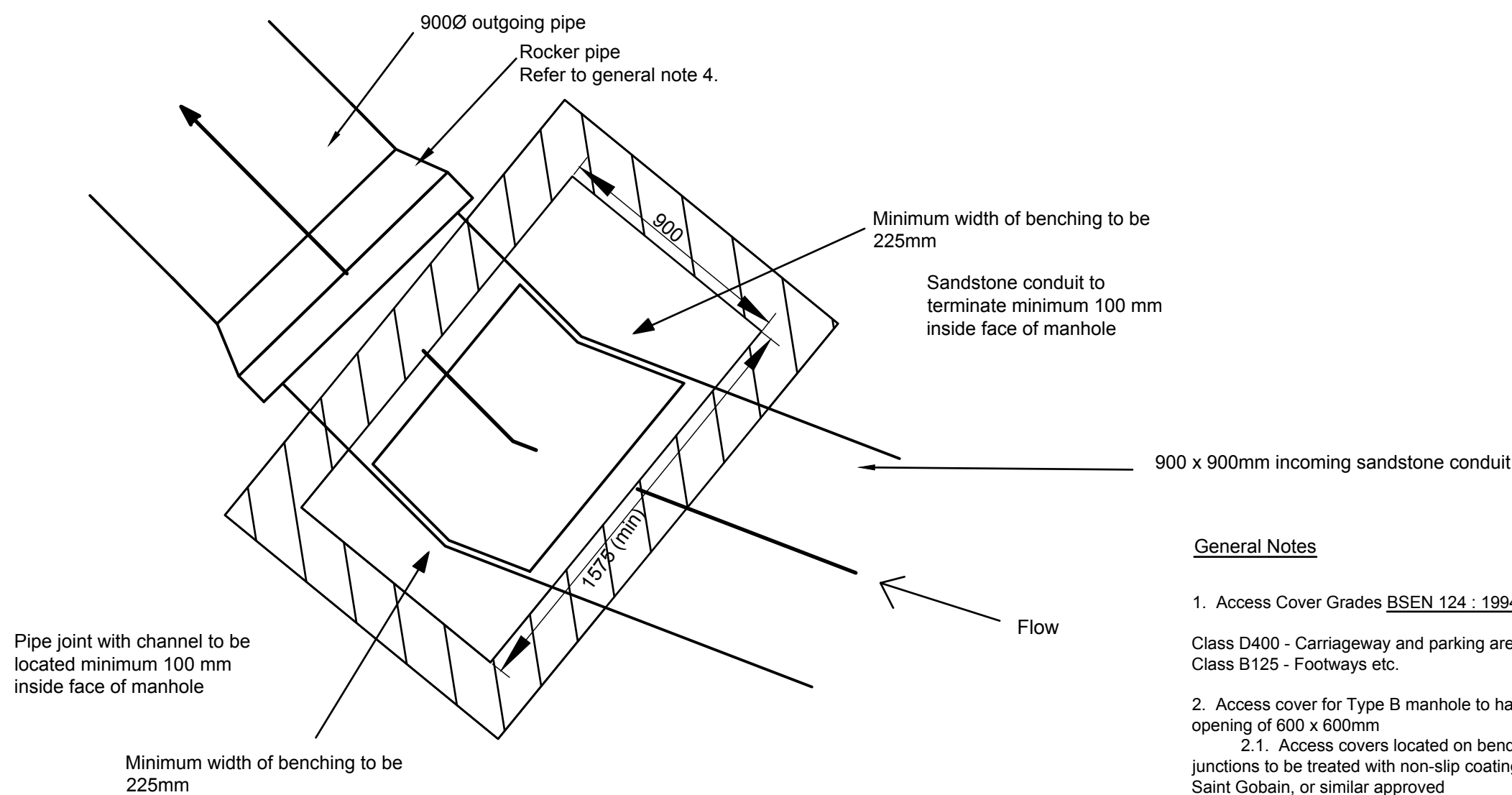
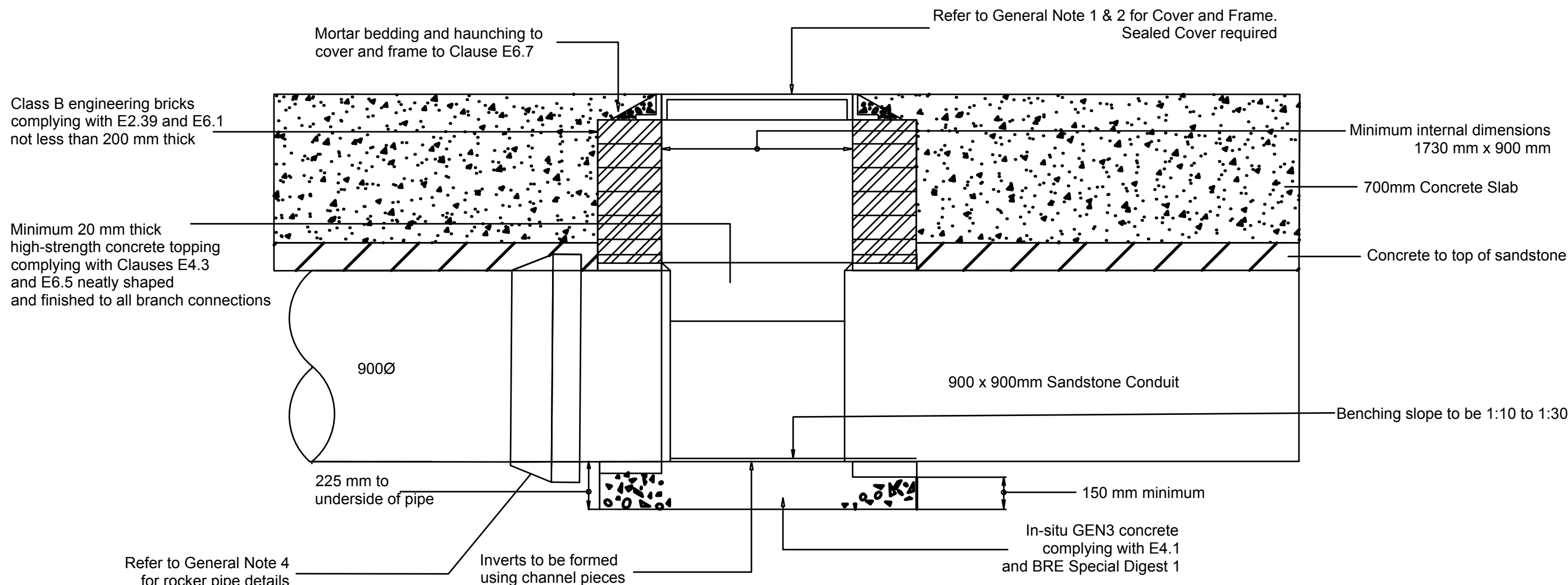




Proposed MH04 Manhole Detail

Steps or otherwise to be fitted as required by the Undertaker's policy



Proposed MH03 Manhole Detail

Steps or otherwise to be fitted as required by the Undertaker's policy

General Notes

- Access Cover Grades **BS EN 124 : 1994**
Class D400 - Carriageway and parking areas.
Class B125 - Footways etc.
 - Access cover for Type B manhole to have a minimum clear opening of 600 x 600mm
2.1. Access covers located on bends or within junctions to be treated with non-slip coating, such as 'GripTop' by Saint Gobain, or similar approved
 - Permissible chamber diameters for manhole Type B
- | Diameter of largest pipe in Manhole(mm). | Chamber section diameter(mm). |
|--|-------------------------------|
| Less than 375 | 1200 |
| 375 - 450 | 1350 |
| 500 - 700 | 1500 |
| 750 - 900 | 1800 |

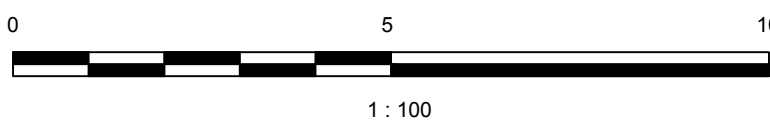
- Pipes built into manholes shall have a flexible joint as close as feasible to the external face of the structure and the length of the first pipe and rocker pipe shall be as shown.

Nominal diameter(mm).	Rocker Pipe length(m).
150 - 600	0.60
675 - 750	1.00
825 & Over	1.25

- All pipes entering the bottom of the manhole to have the same soffit level unless otherwise shown on plan
- The channel shall be preformed half round channel.
- Where a future connection is shown in the manhole schedule the pipe shall be supplied with a stopper and subjected to an air test.
- All work to be carried out in connection with sewers and manholes to be in accordance with the Health and Safety guideline No. 2 'Safe Working in Sewers and Sewage Works' and United Utilities safe system of work for entry into confined spaces.
- All components to be kite marked 2001. Any conflict between the proposals and 'United Utilities Addendum/Sewerage Sector Guidance, United Utilities addendum shall override.
- Drainage pipelines shall be constructed using Class M concrete pipes

NOTES

- ANY drainage works constructed prior to issue of Technical Approval is entirely at the risk of the Contractor/Client.
- The Contractor is to comply fully with the CDM Regulations in the course of constructing the works.
- All adoptable foul sewer drainage works must comply with 'Design and Construction Guidance for foul and surface water sewers, Version 2.1,' and to the satisfaction of United Utilities.
- All levels are in metres above Ordnance Datum.
- All dimensions are in millimeters unless specified otherwise



NOTES:

- REFER TO SPECIFIC UNITED UTILITIES NORTHERN SEWER BUILD OVER NOTES ON DRAWING REN-BGE-C-GEN-035. THIS INCLUDES REQUIREMENTS FOR
 - ADDITIONAL POST DEMOLITION SURVEY;
 - UNITED UTILITIES APPROVAL;
 - TEMPORARY STAGE CONSTRUCTION SEQUENCING;
 - SURVEY DURING CONSTRUCTION;
 - SURVEY POST CONSTRUCTION;
- REFER TO GENERAL CIVIL NOTES DRAWING REN-BGE-C-GEN-005.
- THE COMPLETENESS OF THE UNDERGROUND SERVICE INFORMATION IS BASED ON CURRENT INFORMATION AND SURVEYS AND CANNOT BE GUARANTEED.
- TOPOGRAPHIC SURVEY AS PER ZS SURVEYS DRAWING: "AAP - Deansgate - Manchester - Topo - 2074" RECEIVED 03/02/2021.
- EXISTING STRUCTURE PLAN SURVEYS AS PER ZS SURVEYS DRAWINGS: "AAP - Deansgate, Manchester 2074_3-MBS" RECEIVED 07/10/2021.
- UNITED UTILITIES SITE ADJACENT SEWER POSITIONS BASED ON THE FOLLOWING INFORMATION:
UNITED UTILITIES SEWER RECORDS "UU - 250037-19-02-2021-02-39-22" DATED 19/02/2021.
TEAM DRAINAGE CCTV SURVEY "MH CARD 7602 Deansgate Manchester" RECEIVED 28/07/2021.
- UNITED UTILITIES NORTHERN SEWER OVERRUN POSITION BASED ON THE FOLLOWING INFORMATION:
UNITED UTILITIES SEWER RECORDS "UU - 250037-19-02-2021-02-39-22" DATED 19/02/2021.
TEAM DRAINAGE CCTV SURVEY "Blackfriar Street MCR 4_11" DATED 05/11/2021.
SURVEY SOLUTIONS LOCAL BREAKOUT AND POSITION SURVEY "38738MCLS-01" RECEIVED 21/12/2021.

P00	14.02.2022	ISSUED FOR STAGE 2 TENDER	DF(CE)
REV	DATE	DESCRIPTION	RVD

REVISIONS

CLIENT	PROPERTY ALLIANCE GROUP LTD	ALLIANCE
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PROJECT	RENAISSANCE CIVIL GENERAL
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STATUS	ISSUED FOR INFORMATION NOT TO BE ISSUED FOR CONSTRUCTION
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DRAWN	DESIGNED	CHECKED	APPROVED
JW	JP(CE)	DF(CE)	LJK
DATUM	GRID	SCALE	AT A1 SIZE
OSGB36	BNG	1:20	

TITLE	UNITED UTILITIES - PROPOSED NORTHERN SEWER OVERRUN BUILD OVER - SHEET 4
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PROJECT No	DRAWING No	REV
L20081	REN-BGE-C-GEN-038	P00