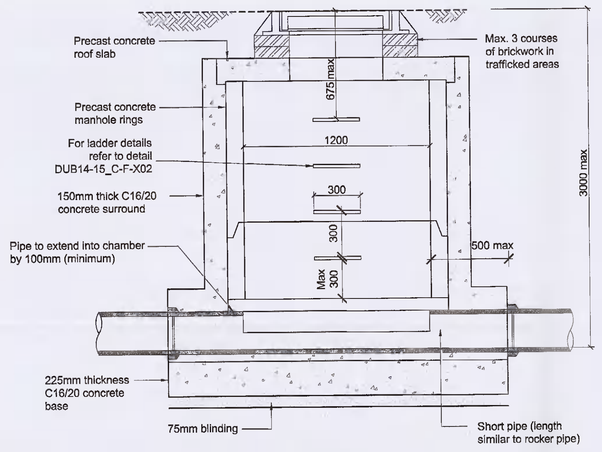
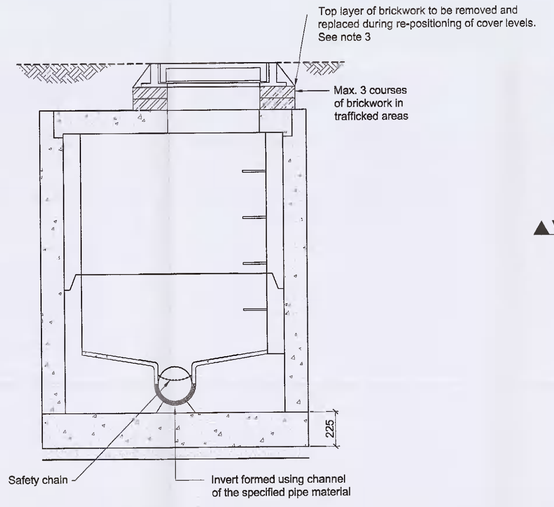
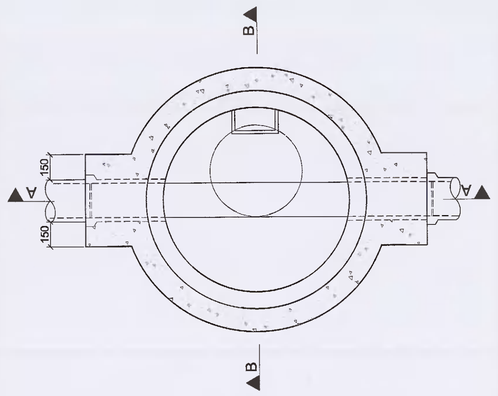


Section A-A



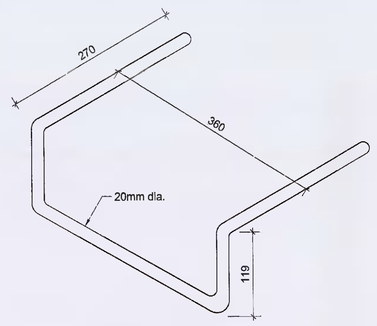
Section B-B



Sectional plan

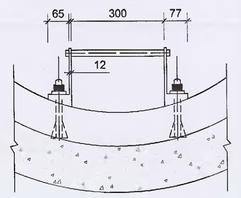
Shallow Precast Concrete Manhole

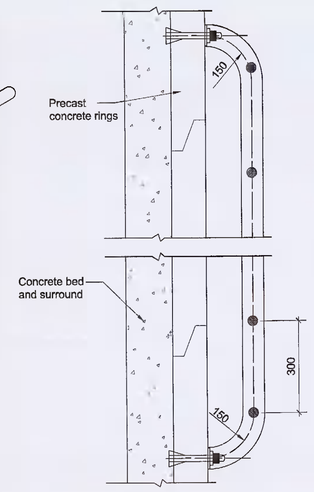
(Depths up to 3.0m on Pipes up to 300mm dia.)
1:20



Ladder rungs

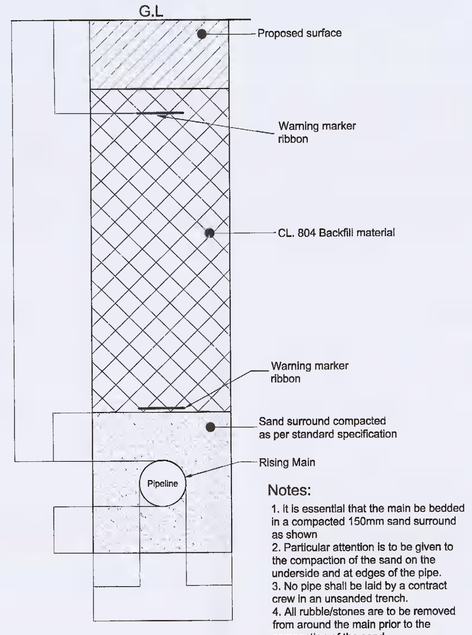
1:20





Access Ladder Detail

1:10

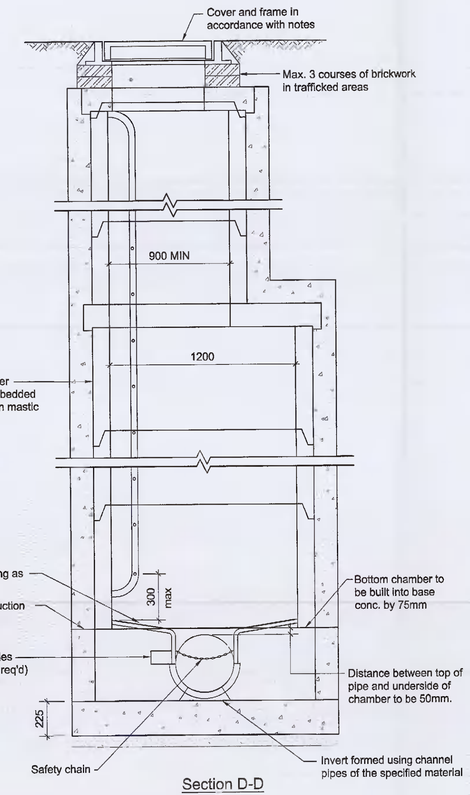


Notes:

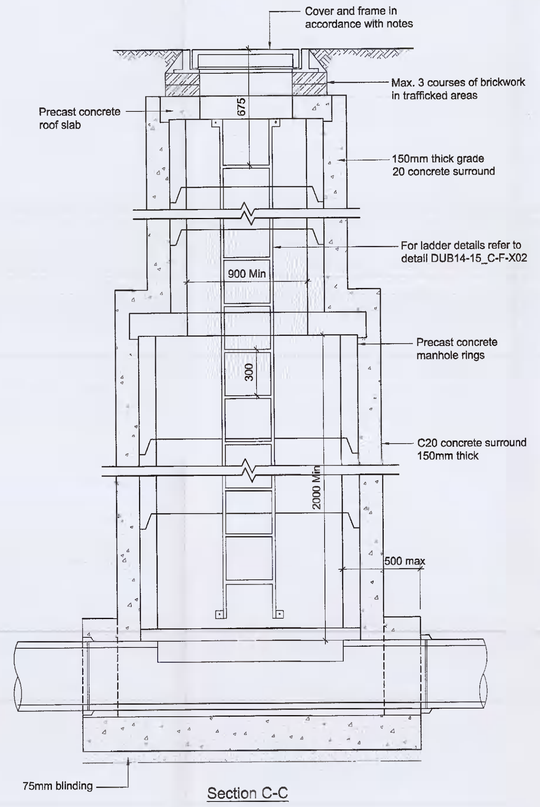
1. It is essential that the main be bedded in a compacted 150mm sand surround as shown
2. Particular attention is to be given to the compaction of the sand on the underside and at edges of the pipe.
3. No pipe shall be laid by a contract crew in an unsanded trench.
4. All rubble/stones are to be removed from around the main prior to the compaction of the sand.

Rising Main Trench Detail

Scale 1:10



Section D-D



Section C-C

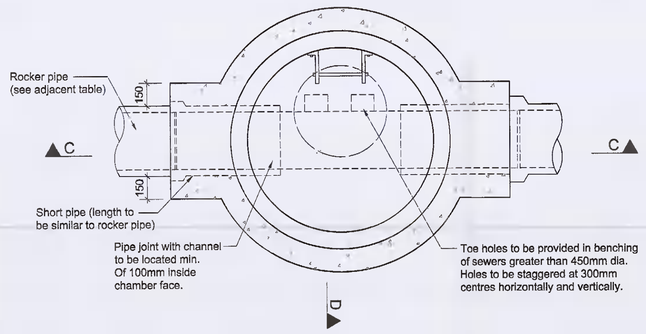
Deep precast concrete manhole

(Depths over 3.0m & up to 5.5m)
1:20

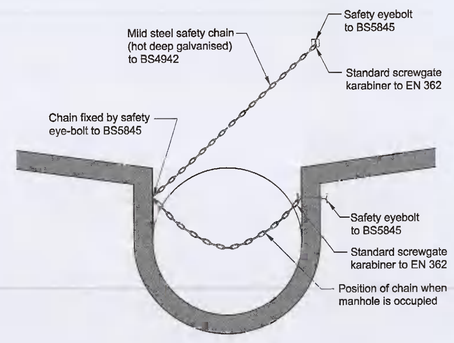
Manhole sizes	
Pipe dia. mm	Manhole size dia.
100 - 300	1.2m Ø
375 - 750	1.5m Ø
750 - 900	1.8m Ø

Rocker pipe requirements	
Pipe dia. mm	Rocker pipe length
150 - 450	0.5 - 0.75m
525 - 750	0.75 - 1.0m

Chamber Cover Types			
Reference	Shape	Load Class	Min Opening (mm)
Type A	Square	C250	600x600 grated
Type B	Circular	B125	600Ø
Type C	Circular	C250	600Ø
Type D	Circular	D400	600Ø
Type E	Circular	C250	450Ø



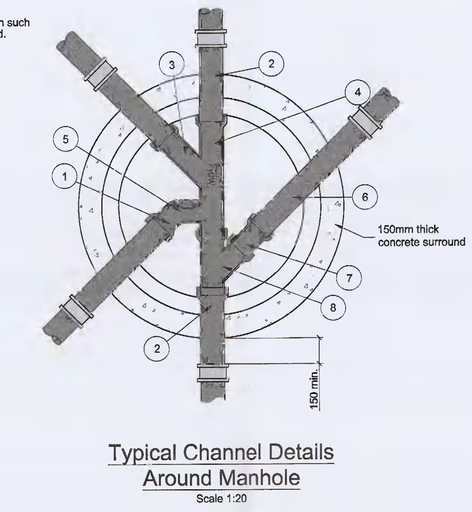
Sectional plan



Safety chain detail

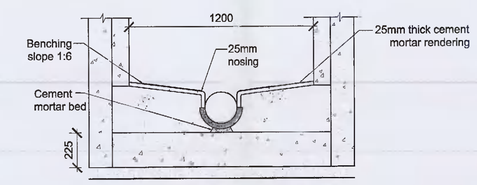
(for pipe diameters > 600mm)
Scale 1:20

1. Angles over 90° are not preferred, in such cases ⅔ section bends must be used.
2. Short length of pipe, (rocker pipe)
3. ½ section bend.
4. Channel pipe.
5. ¾ section bend.
6. Short length pipe.
7. Short section of channel pipe.
8. Right hand channel junction.



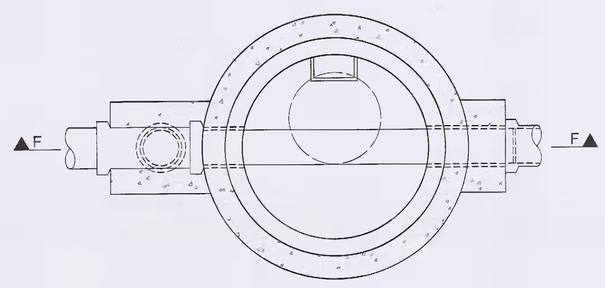
Typical Channel Details Around Manhole

Scale 1:20

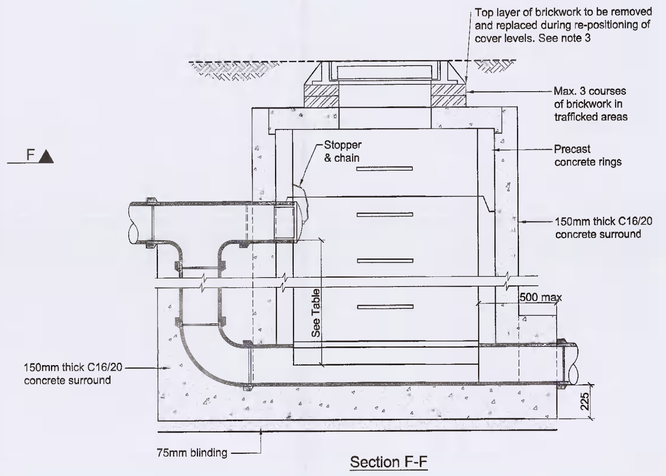


Benching detail

1:20



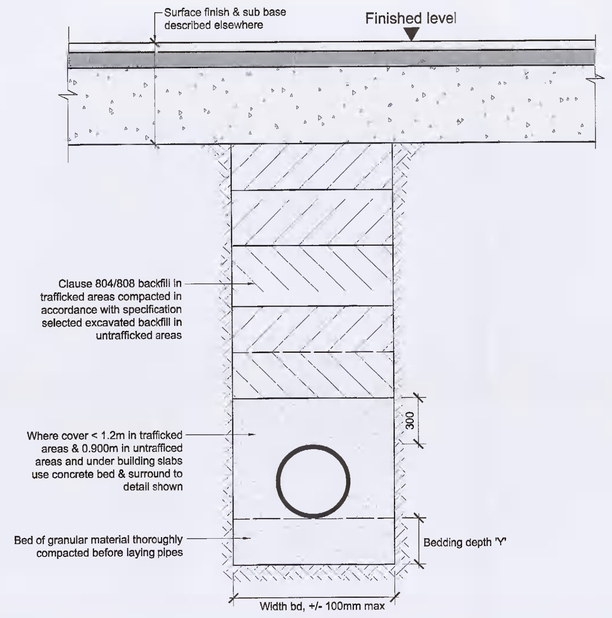
Minimum dimensions required to construct backdrop	
Pipe dia (mm)	Min dimension (mm)
100	530
150	630
225	915
300	1170



Section F-F

Back Drop Detail

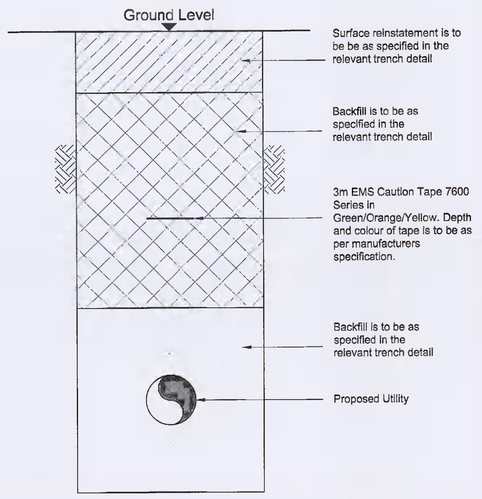
Scale: 1:20



Drainage Pipe Trench Detail

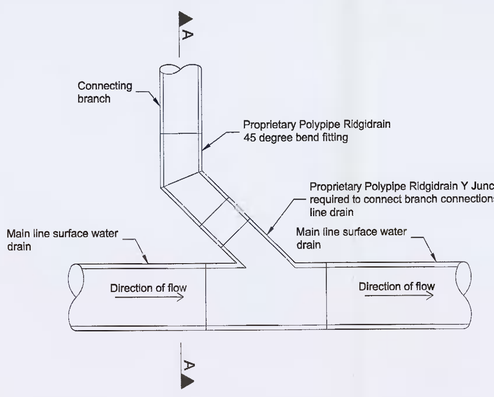
1:20

Note:
Caution Tracer Tape is to be used for all underslab utility trenches in line with the appropriate details specified for the utility in question



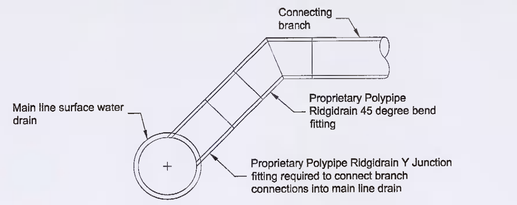
Caution Tracer Tape Detail

Scale 1:10



Surface Water 'Y' Junction Detail - Plan View

Scale: 1:10



Surface Water 'Y' Junction Detail - Section A-A

Scale: 1:10

Approvals:

Customer	Microsoft	Date | 25/06/21
Microsoft Mechanical Engineer	Andy Layer	
Microsoft Telecom Engineer	Cathe O'Sullivan	
Microsoft Electrical Engineer	Alan Kirtell	
Engineering Manager	Dacian Cornerlong	
Security Manager	Daniel Jones	
CSA	Lacles Maher / Shareneora Naidu Jeff Schumacher	

General Notes:

1. This information presented on this drawing relates the design stage as indicated in the revision description.
2. The drawing should be read in conjunction with all relevant and available contract documentation.
3. Some drawings may need to be printed in colour to preserve information indicated in colour on the drawings.
4. All dimensions are in millimeters (mm) unless noted elsewhere. All levels are in metres (m) unless noted elsewhere.
5. Do note scale; work to figured dimensions only.
6. The topographical information provided is based on topographical survey undertaken as part of the planning submission.

Issue	Date	Revision Description
P01	25/06/21	Issued for Planning

ARUP
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www.arup.com

Client: Microsoft

Project Title: DUB14/15 PROPOSED MODIFICATIONS TO PREVIOUSLY APPROVED SCHEME SD20A/2283

Key Plan

Drawing Title: Typical Drainage Details

Scale at A1	By / Chkd / Appd
As Shown	DK/AM/JMacC

Role: Civil

Status: S2 - Suitable for Information - Planning

Arup Job No	Rev
279225-00	P01

ID: DUB14-15_C-F-02

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Do not scale