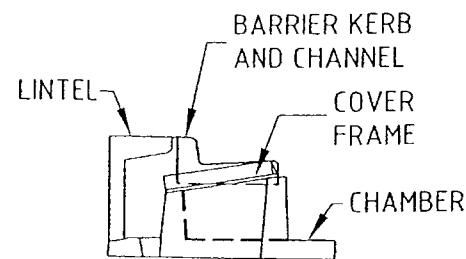
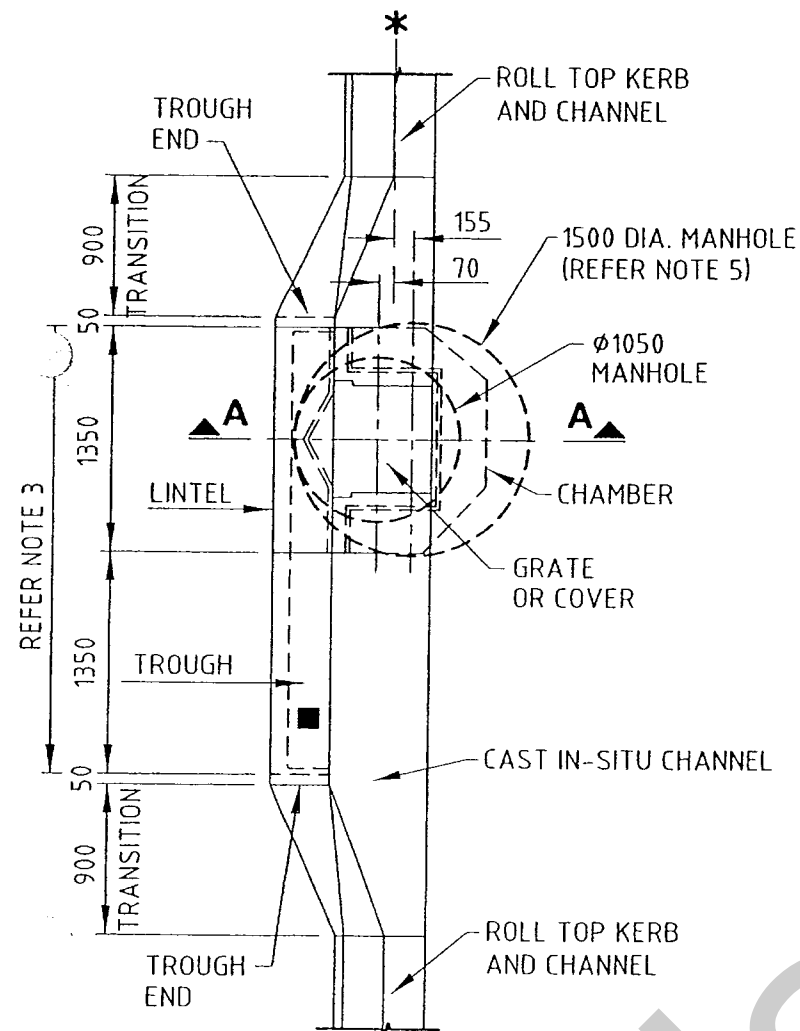


SECTION A-A

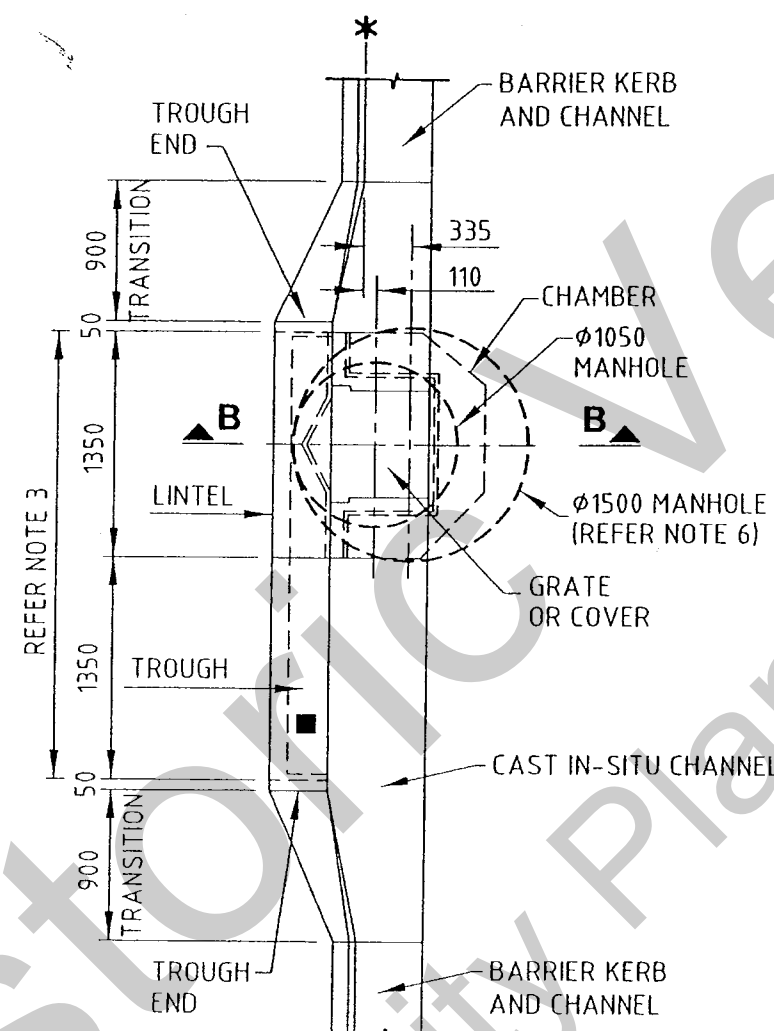


SECTION B-B



PLAN

TYPICAL ROLL TOP KERB AND CHANNEL



PLAN

TYPICAL BARRIER KERB AND CHANNEL

* NOMINAL KERB LINE

■ LINTEL NOTE

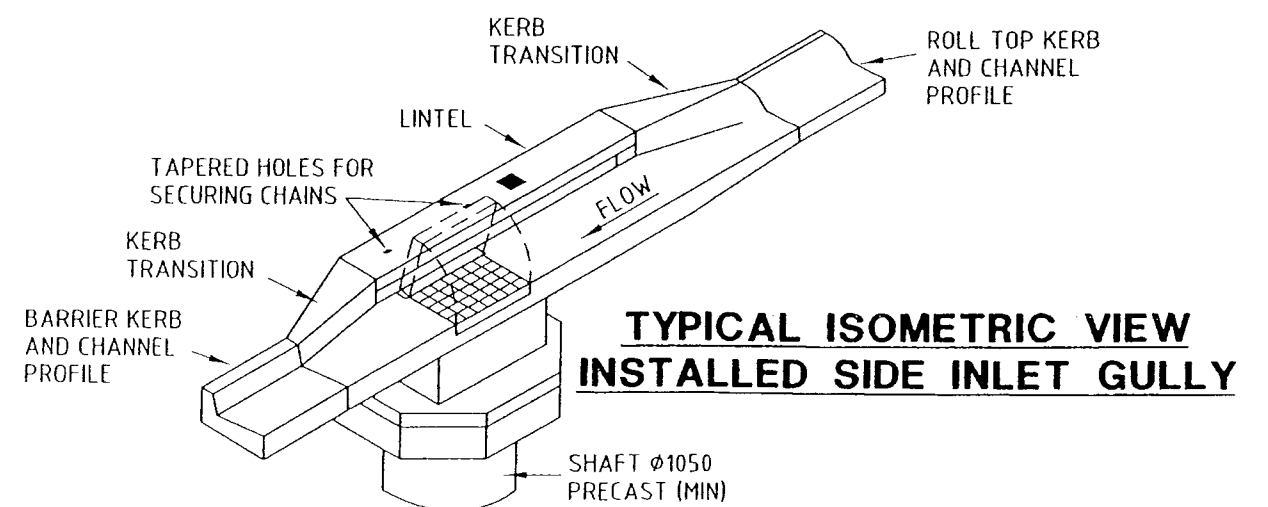
PROTECT OUR WATERWAYS - FLOWS TO THE OCEAN
TEXT 40 HIGH - LETTERS IMPRINTED 5 INTO CONCRETE
FACING FOOTPATH

SYSTEM	No SHAFT	SHAFT H 450	SHAFT H 600	SHAFT H 900	SHAFT H 1200
	0TCS0	0TCS4.5	0TCS6	0TCS9	0TCS12
	1TCS0	1TCS4.5	1TCS6	1TCS9	1TCS12
	2TCS0	2TCS4.5	2TCS6	2TCS9	2TCS12
	3TCS0	3TCS4.5	3TCS6	3TCS9	3TCS12
	4TCS0	4TCS4.5	4TCS6	4TCS9	4TCS12


SYSTEM TERMINOLOGY

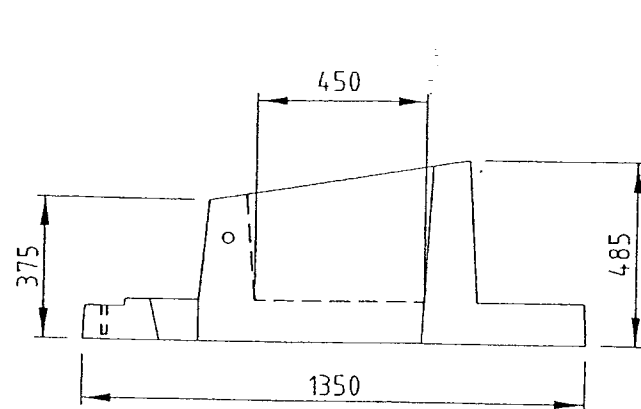
NOTES

1. ALL COMPONENTS TO BE PROPRIETARY PRODUCTS APPROVED BY COUNCIL.
2. INLET COVERS AND GRATES ARE TO COMPLY WITH COUNCILS STANDARD SPECIFICATION SS5.
3. TOTAL LENGTH OF LINTEL VARIES DEPENDENT ON THE INLET CAPACITY REQUIREMENTS.
4. STORMWATER PIPES PARALLEL TO KERB AND CHANNEL ARE TO BE LOCATED NO CLOSER TO THE FOOTPATH VERGE THAN THE BACK OF KERB.
5. AN APPROVED MANHOLE CONVERTER SLAB TO BE USED UNDER THE CHAMBER FOR MANHOLE SHAFT DIAMETERS LARGER THAN 1050mm.
6. FOR COMPONENT DETAILS REFER R.C.C. STD. DWG. NO. 59303.
7. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

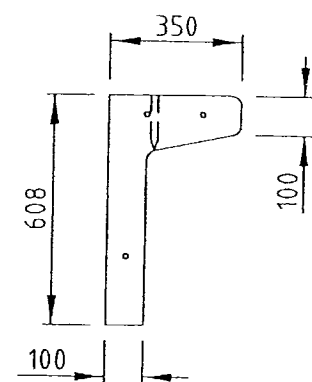


**TYPICAL ISOMETRIC VIEW
INSTALLED SIDE INLET GULLY**

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES				BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING					
	FILE NAME	DATE	BACKUP LOCATION	DATE		A	ORIGINAL ISSUE						SCALE	As Shown		PRECAST STORMWATER INLET					
			G:\Standard Drawings\RCC\Stormwater										SURV'D.:	CHK'D.:		SIDE INLET GULLY MANHOLE CONSTRUCTION DETAILS					
													DRN.:	APP'D.:							
																A				SHEET 1 of 1	59302

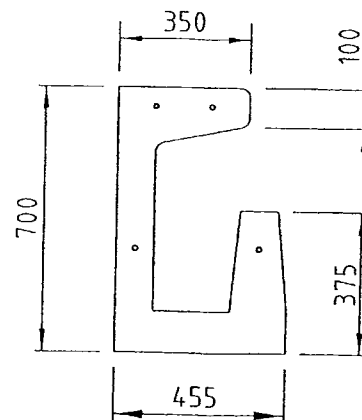


SECTION A-A



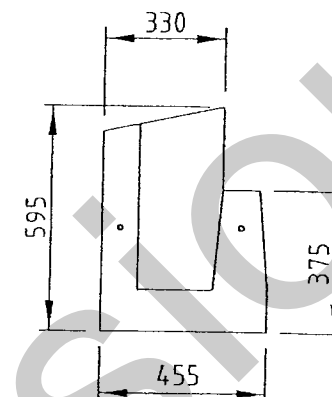
LINTEL DETAIL

1.35m LONG

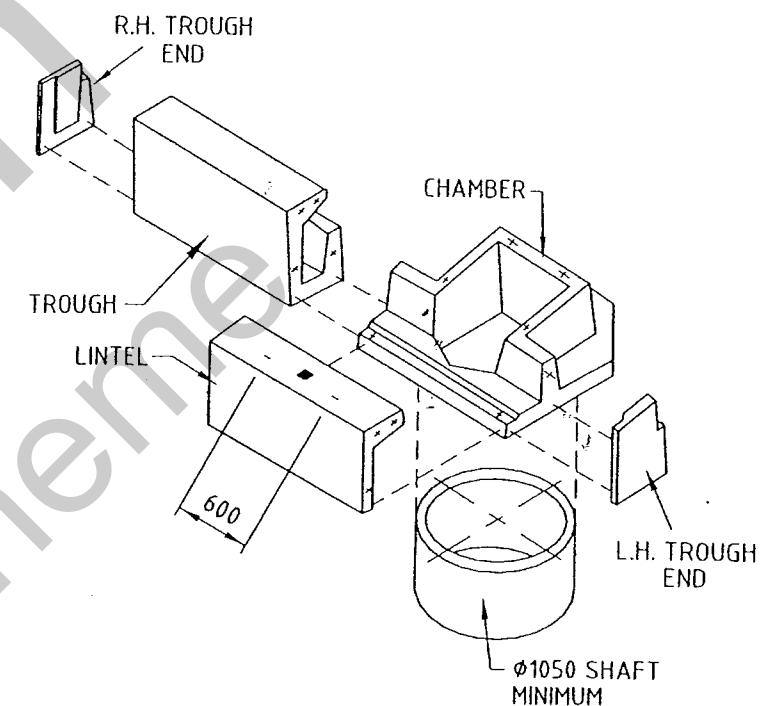


TROUGH DETAIL

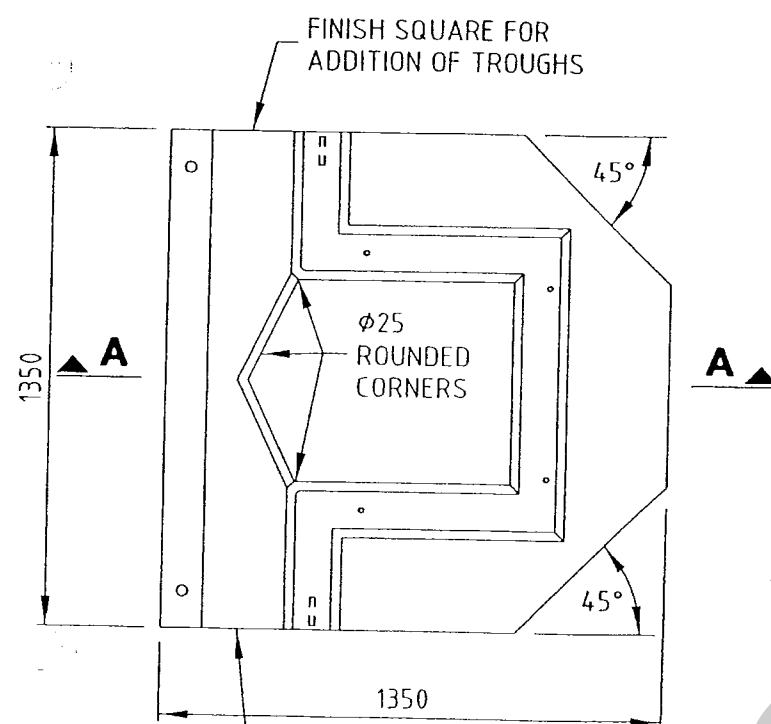
1.35m LONG



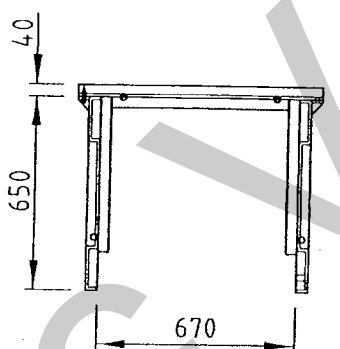
TROUGH END



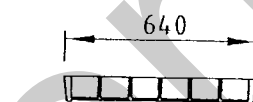
**EXPLODED VIEW
OF COMPONENTS**



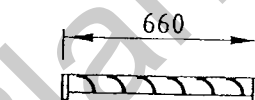
**PLAN
CHAMBER DETAIL**



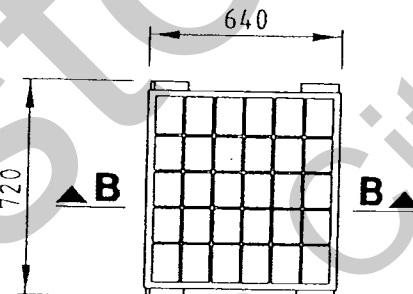
**PLAN
COVER FRAME**



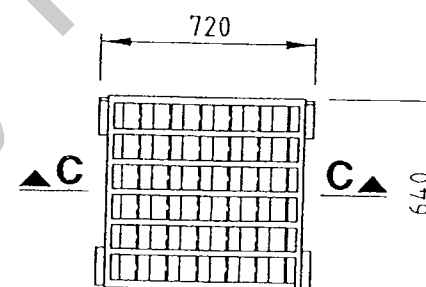
SECTION B-B



SECTION C-C



**PLAN
CONCRETE INFILL COVER**



**PLAN
INLET GRATE**

COVER DETAILS

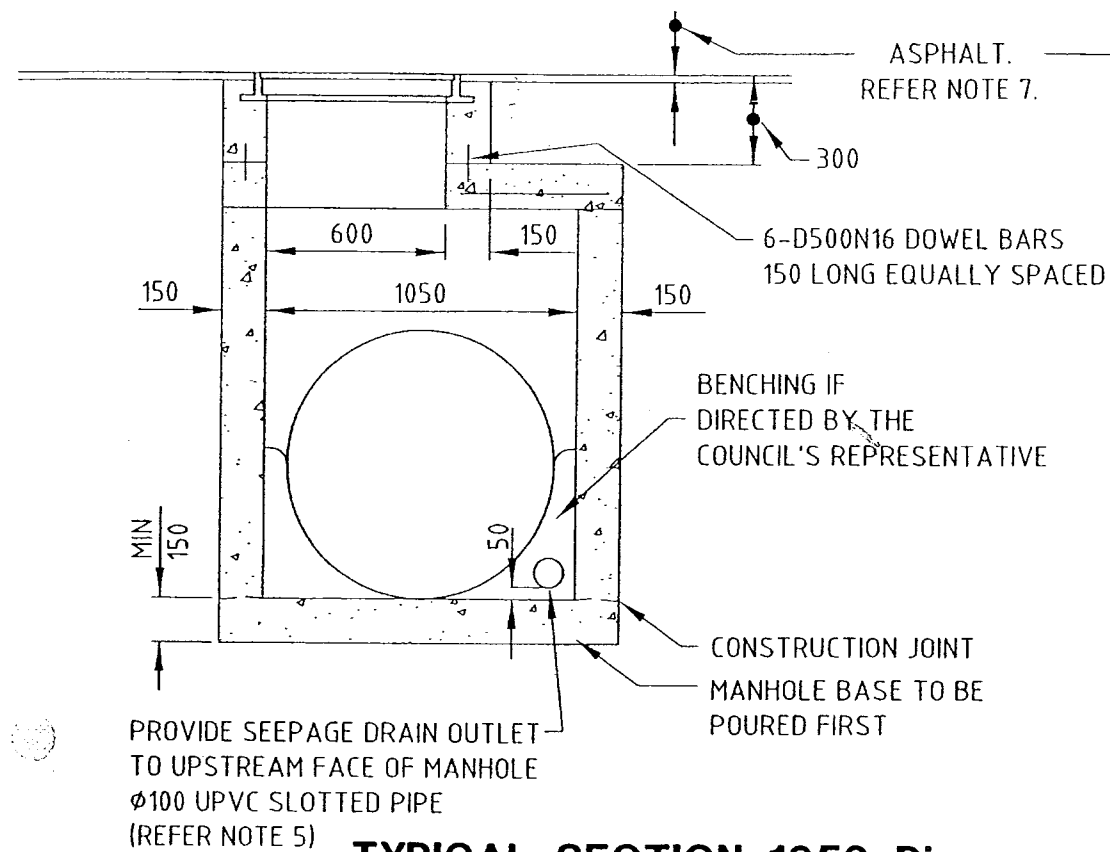
NOTES:

1. ALL PRECAST COMPONENTS ARE TO BE PROPRIETARY PRODUCTS APPROVED BY COUNCIL.
2. THE INLET COVERS SHOWN ARE TYPICAL ONLY. COVERS AND GRATES ARE TO COMPLY WITH COUNCIL STANDARD SPECIFICATIONS SS5.
3. MINIMUM CONCRETE CHARACTERISTIC COMPRESSIVE STRENGTH OF PRECAST COMPONENTS TO BE 35MPa.
4. ALTERNATIVE ARRANGEMENTS FOR VARIOUS COMPONENTS MAY BE APPROVED SUBJECT TO PROPRIETARY DRAWINGS BEING APPROVED BY COUNCIL.
5. FOR CONSTRUCTION DETAILS, REFER TO R.C.C. STD. DWG. NO. 59302.
6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

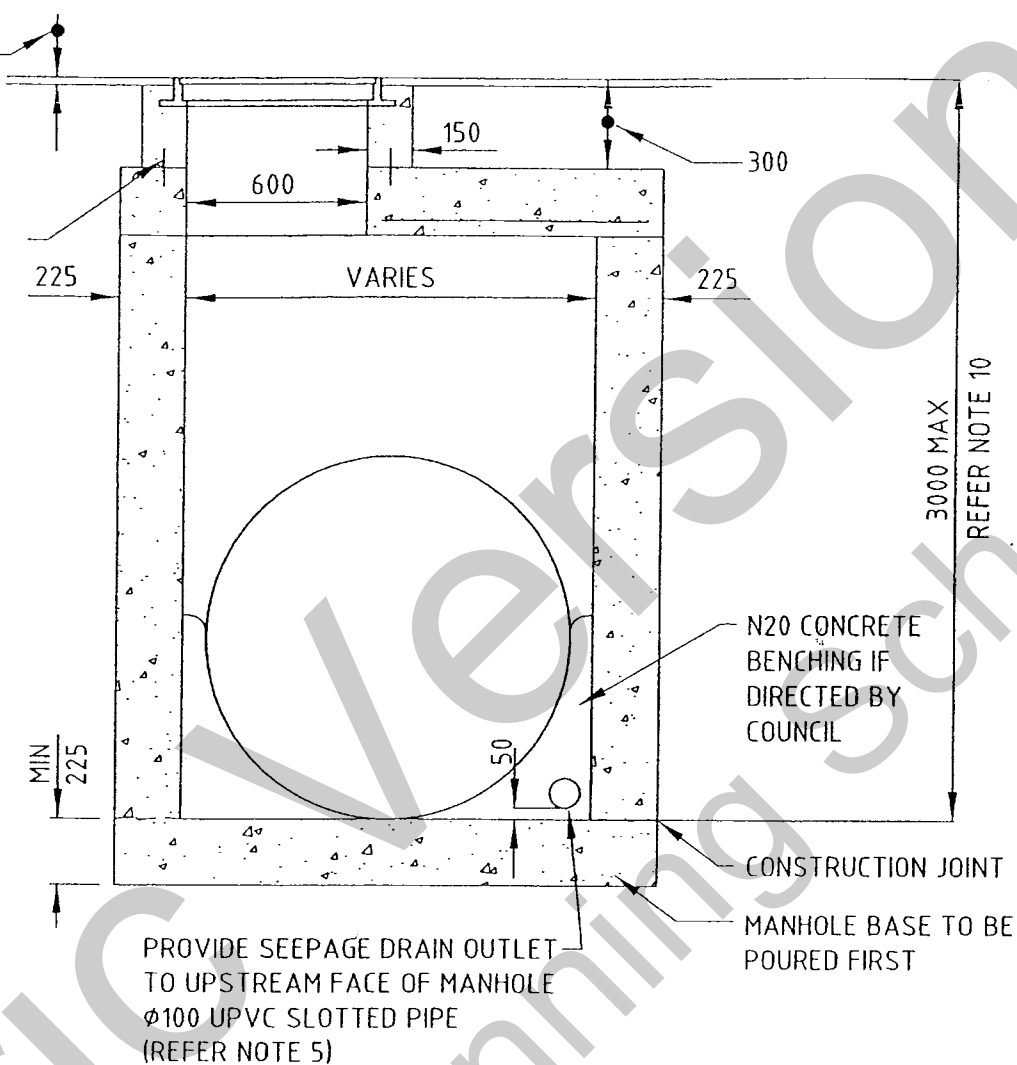
LINTEL NOTE

PROTECT OUR WATERWAYS - FLOWS TO THE OCEAN
TEXT 40 HIGH - LETTERS IMPRINTED 5 INTO CONCRETE
FACING FOOTPATH

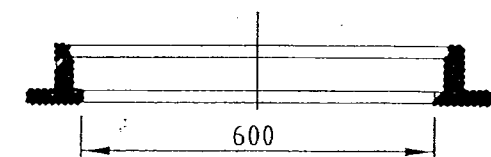
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES			BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING		
	FILE NAME	DATE	BACKUP LOCATION	DATE		ORIGINAL ISSUE								PRECAST CONCRETE	SIDE INLET GULLY MANHOLE COMPONENTS	
			G:\Standard Drawings\RCC\Stormwater		A						SCALE	As Shown				
											SURV'D.	CHK'D.				
											DRN.	APP'D.				
															SHEET 1 of 1	59303



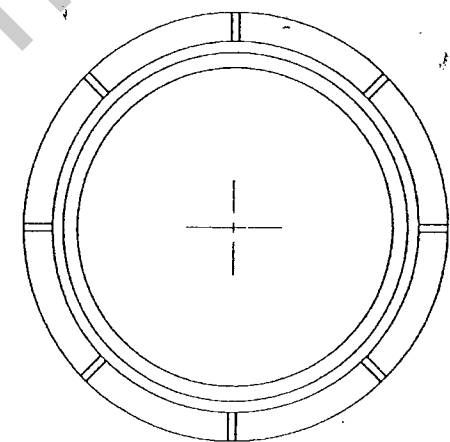
TYPICAL SECTION 1050 Dia



**TYPICAL SECTION
1200 Dia TO 1500 Dia**



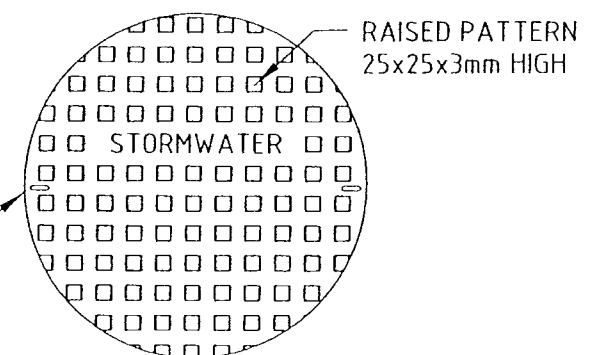
SECTION



DETAIL MANHOLE FRAME



SECTION

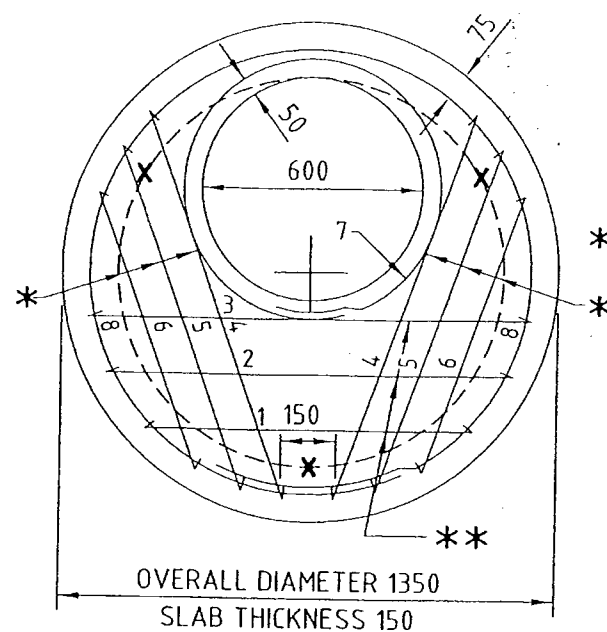


DETAIL MANHOLE COVER

NOTES

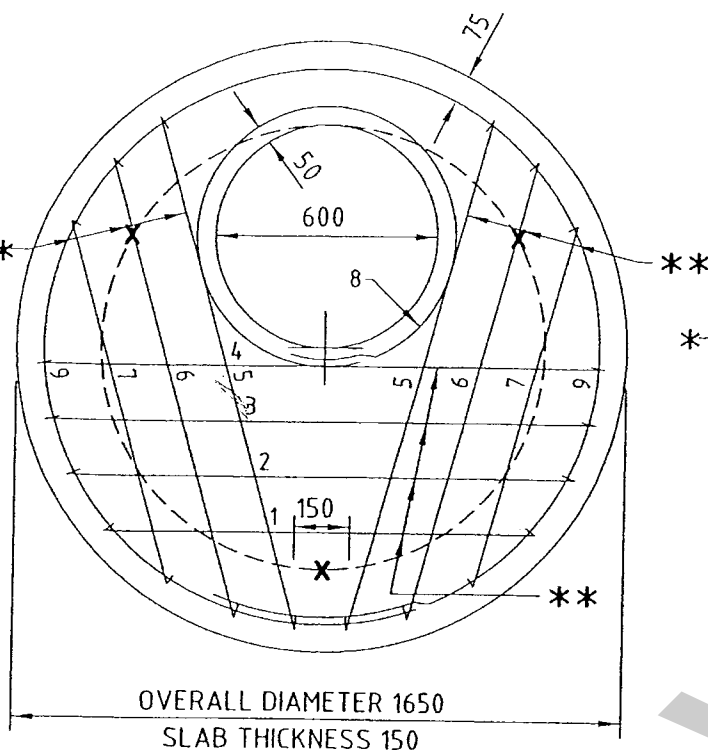
1. THE MANHOLE COVER AND FRAME IS TYPICAL ONLY. COVERS AND FRAMES ARE TO COMPLY WITH COUNCIL'S STANDARD SPECIFICATION SS5.
2. ALL CONCRETE TO WALLS AND FLOOR TO BE GRADE N25.
3. FOR DETAILS OF MANHOLE ROOF SLABS REFER TO R.C.C. STD. DWG. NO'S. 59305 AND 59306.
4. MINIMUM 30 LONGITUDINAL FALL THROUGH MANHOLE.
5. ADDITIONAL SEEPAGE DRAIN OUTLETS TO BE PROVIDED IN WATER CHARGED GROUND AS DIRECTED BY THE COUNCIL'S REPRESENTATIVE.
6. PRECAST PROPRIETARY MANHOLE COMPONENTS APPROVED BY COUNCIL MAY BE USED.
7. ASPHALT THICKNESS TO MATCH NOMINATED PAVEMENT DESIGN.
8. ALL COVERS ARE TO HAVE THE WORD "STORMWATER" CAST ON THE TOP IN LETTERS 40 HIGH BY 25 WIDE AND RAISED 3mm FOR ADDITIONAL REQUIREMENTS REFER TO R.C.C. SPECIFICATION SS5.
9. WHERE BOLT DOWN COVERS ARE SPECIFIED ON THE PROJECT DRAWINGS COVERS TO BE IN ACCORDANCE WITH R.C.C. STD. DWG. NO. 59711 EXCEPT THE LETTERING IS TO BE IN ACCORDANCE WITH NOTE 8 OF THIS DRAWING.
10. MANHOLES DEEPER THAN 3000 REQUIRE INDIVIDUAL DESIGN AND CERTIFICATION.
11. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				AMENDMENTS AND ISSUES			BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING			
	FILE NAME	DATE	BACKUP LOCATION	DATE	No.	ORIGINAL ISSUE							STORMWATER MANHOLES			
			G:\Standard Drawings\RCC\Stormwater		A					SCALE	As Shown		1050 Dia TO 1500 Dia			
										SURV'D.	CHK'D.		SHEET 1 of 1			
										DRN.	APP'D.		59304			



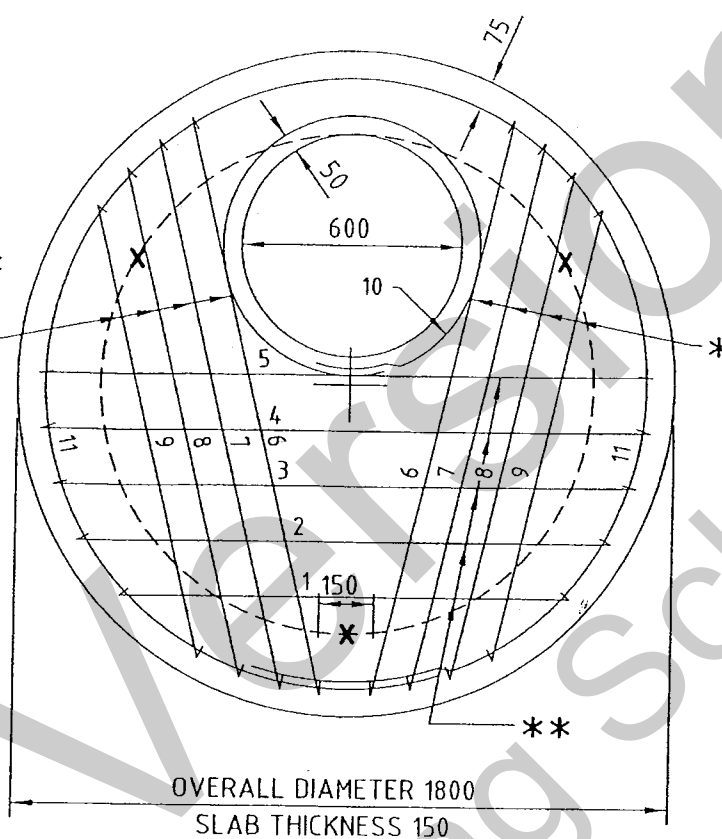
BAR NO.	SHAPE	'a'	OVERALL LENGTH	NO. OFF	TOTAL LENGTH
1		937	1175	1	1175
2	'a'	1125	1350	1	1350
3		1225	1450	1	1450
4		1125	1350	2	2700
5		1000	1225	2	2450
6		812	1050	2	2100
7	'a'	700	2300	1	2300
8		1200	4200	1	4200
MASS 430kg.		TOTAL		17725	

STEEL TO 1050 Dia M.H.



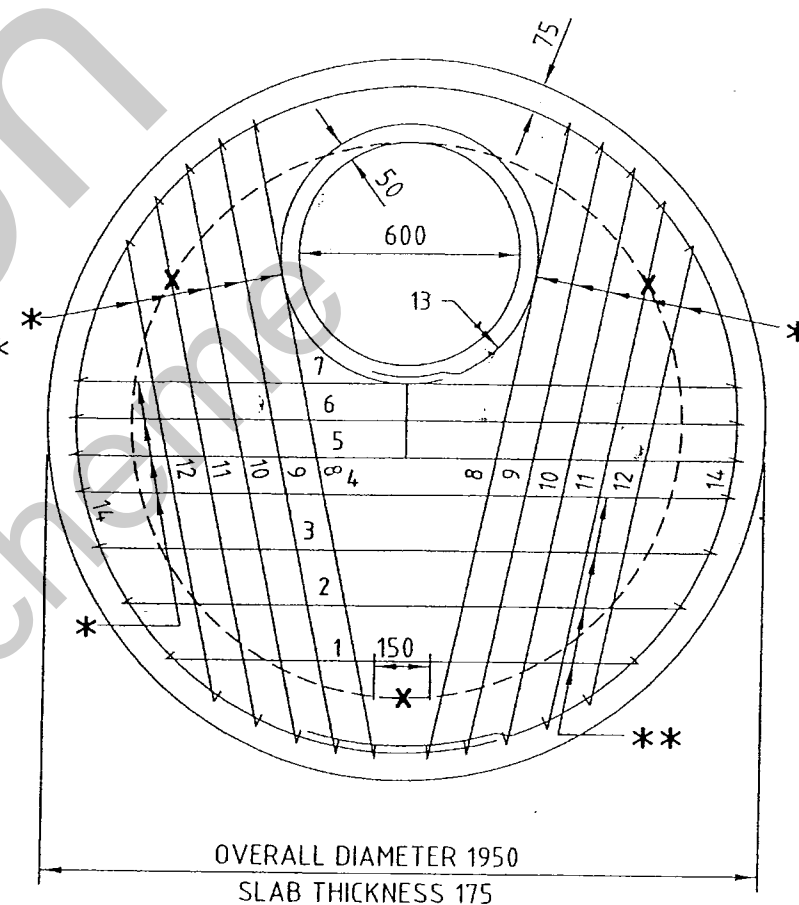
BAR NO.	SHAPE	'a'	OVERALL LENGTH	NO. OFF	TOTAL LENGTH
1		1200	1425	1	1425
2		1400	1625	1	1625
3	'a'	1500	1725	1	1725
4		1537	1775	1	1775
5		1450	1675	2	3350
6		1300	1525	2	3050
7		1050	1275	2	2550
8	'a'	700	2300	1	2300
9		1500	5150	1	5150
MASS 705kg.		TOTAL		22950	

STEEL TO 1200 Dia M.H.



BAR NO.	SHAPE	'a'	OVERALL LENGTH	NO. OFF	TOTAL LENGTH
1		1275	1500	1	1500
2		1488	1725	1	1725
3		1612	1850	1	1850
4	'a'	1675	1900	1	1900
5		1675	1900	1	1900
6		1600	1825	2	3650
7		1525	1750	2	3500
8		1412	1650	2	3300
9		1262	1500	2	3000
10	'a'	700	2300	1	2300
11		1650	5625	1	5625
MASS 830kg.		TOTAL		30250	

STEEL TO 1350 Dia M.H.



BAR NO.	SHAPE	'a'	OVERALL LENGTH	NO. OFF	TOTAL LENGTH
1		1337	1575	1	1575
2		1575	1800	1	1800
3		1712	1950	1	1950
4		1800	2025	1	2025
5		1825	2050	1	2050
6	'a'	1837	2075	1	2075
7		1825	2050	1	2050
8		1762	2000	2	4000
9		1700	1925	2	3850
10		1600	1825	2	3650
11		1462	1700	2	3400
12		1275	1500	2	3000
13	'a'	700	2300	1	2300
14		1800	6100	1	6100
MASS 1015kg.		TOTAL		39825	

STEEL TO 1500 Dia M.H.

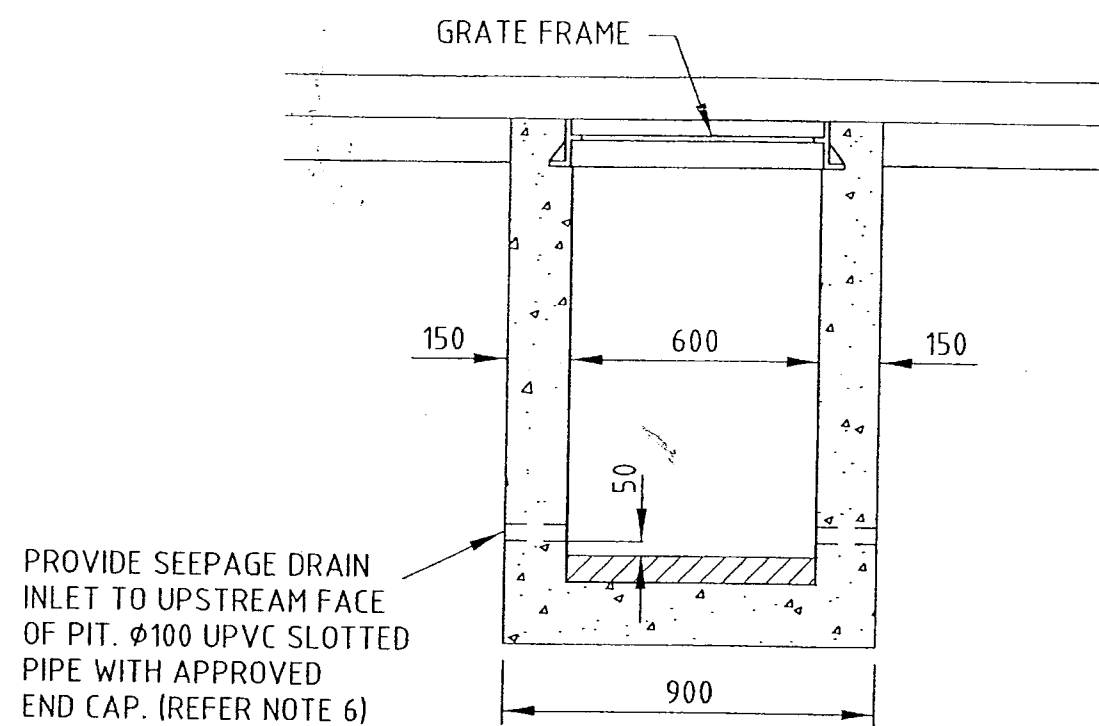
* 100 CRS
** 150 CRS

NOTES:

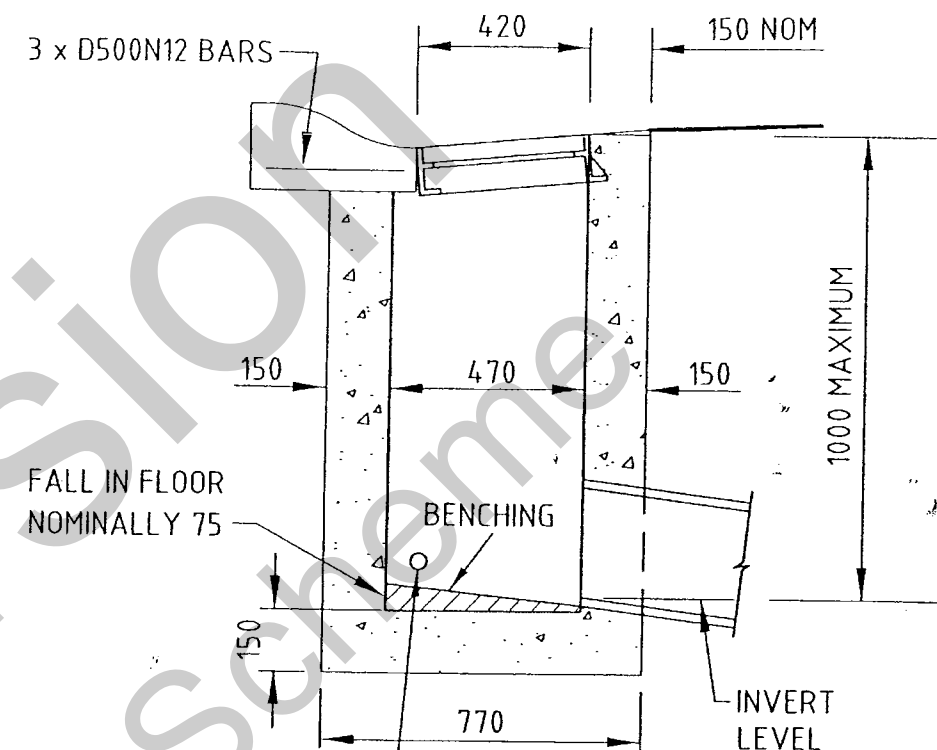
- ALL REINFORCING TO BE D500N12 BARS TO AS/NZS 4671:2001.
- CONCRETE CLEAR COVER 45 (BOTTOM FACE)
- CONCRETE TO BE GRADE N40 TO AS.1379.
- DESIGN LOADING N.A.A.S.R.A. A14.
- WIDTH OF BEARING

Ø1050 M.H.	- 150
Ø1200 M.H.	
Ø1350 M.H.	- 225
Ø1500 M.H.	
- PRECAST PROPRIETARY MANHOLE ROOFS AND RINGS APPROVED BY COUNCIL MAY BE USED.
- EACH LIFTING ANCHOR TO BE 'SWIFTLIFT' OR EQUIVALENT 1.3 TONNE, GALVANISED TO AS/NZS 4680 AND FITTED TO MANUFACTURERS' SPECIFICATIONS AT POINTS SHOWN 'X'.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

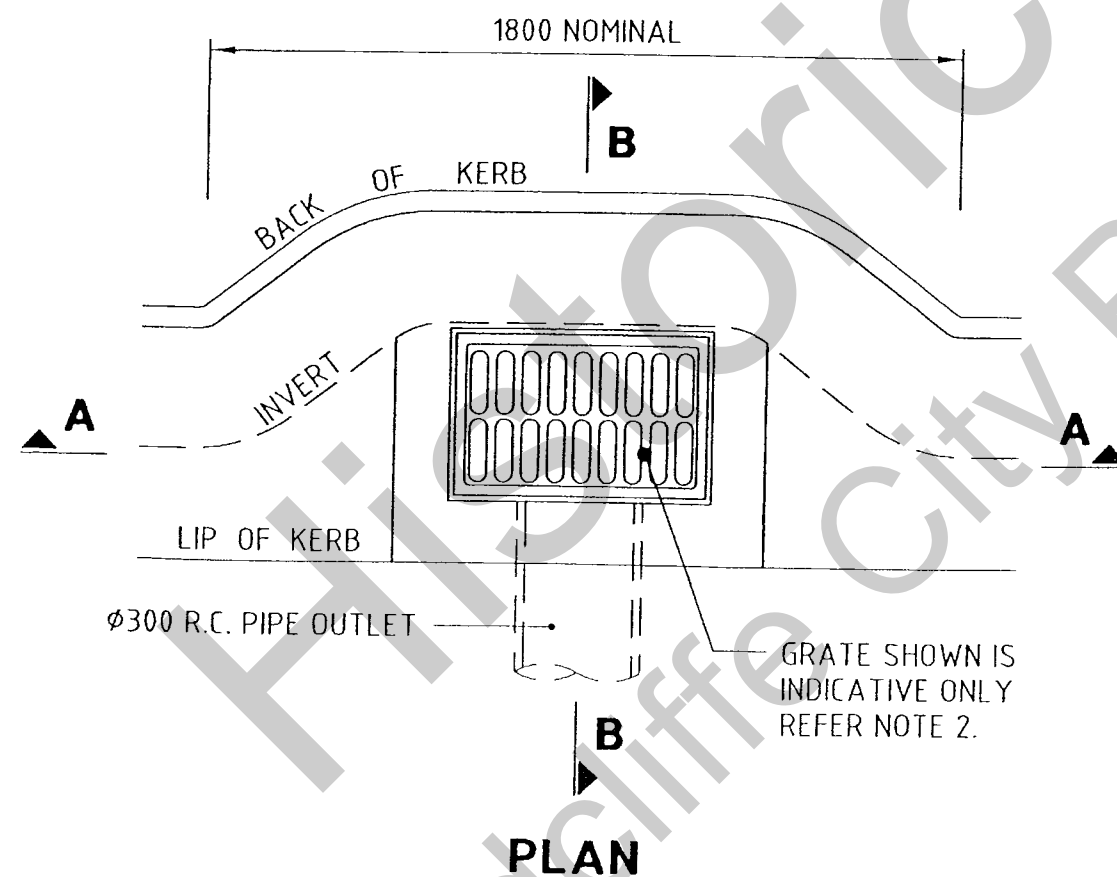
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES			BY	DATE	DATUM	SCALE	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING		
	FILE NAME	DATE	BACKUP LOCATION	DATE		A	ORIGINAL ISSUE								STORMWATER MANHOLE		
			G:\Standard Drawings\RC\Stormwater												1050 Dia TO 1500 Dia ROOF SLABS		
															SHEET 1 of 1		
															59305		



SECTION A-A



SECTION B-B



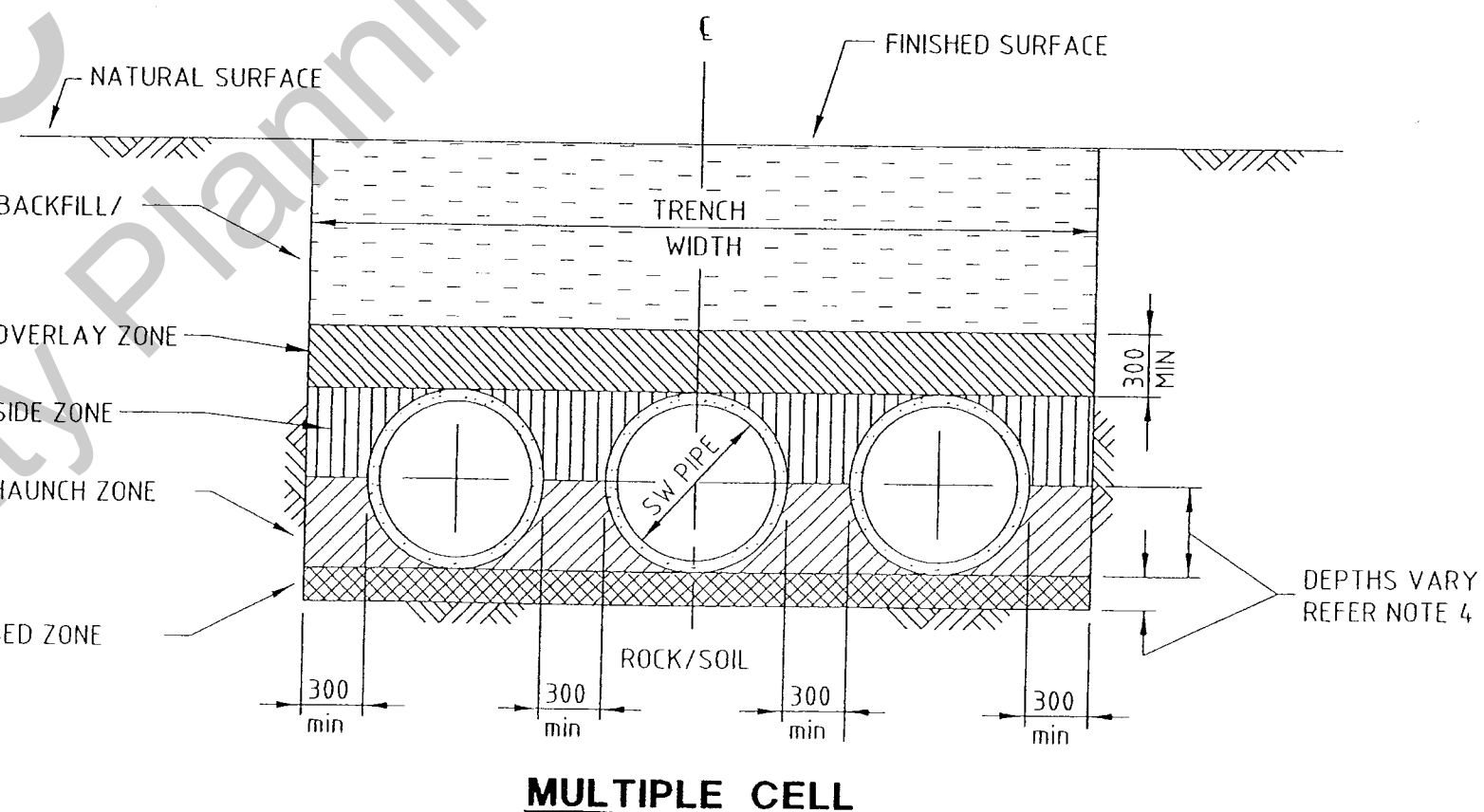
PLAN


NOTES:

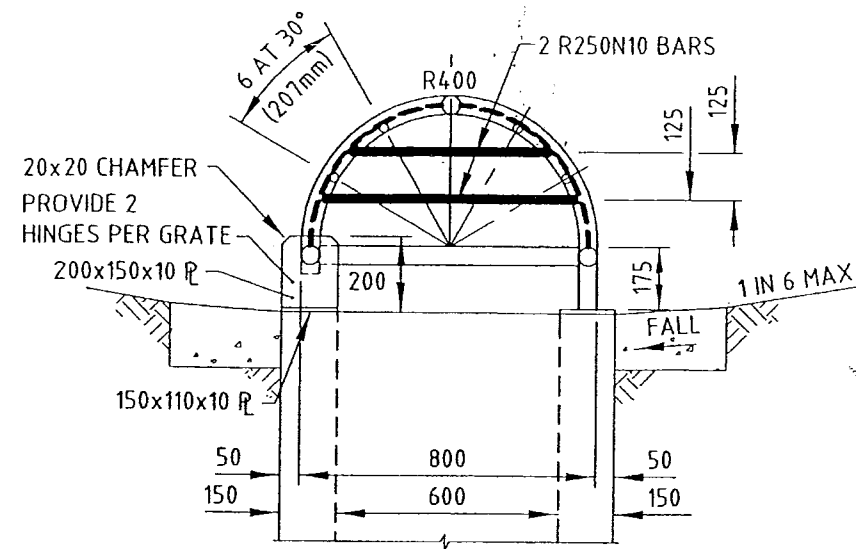
1. THE USE OF ANTI-PONDING GULLY PITS SHOULD BE AVOIDED WHEREVER POSSIBLE.
2. THE GULLY GRATE SHOWN IS INDICATIVE ONLY. GRATES SHALL COMPLY WITH COUNCILS STANDARD SPECIFICATION SS5.
3. CONCRETE TO BE GRADE N25.
4. KERB LEVELS SHALL BE AS PER GRADING ON LONGITUDINAL SECTION OR TURNOUT DETAILS.
5. PIPE INVERT LEVELS AS PER DRAINAGE DETAILS.
6. ADDITIONAL SEEPAGE DRAIN INLETS TO BE PROVIDED IN WATER CHARGED GROUND AS DIRECTED BY THE COUNCIL'S REPRESENTATIVE.
7. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES	BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING ANTI-PONDING GULLY PIT			
	FILE NAME	DATE	BACKUP LOCATION	DATE											
			G:\Standard Drawings\RCC\Stormwater		A	ORIGINAL ISSUE			SCALE	As Shown		A	SHEET 1 of 1	59307	
									SURV'D.	CHK'D.					
									DRN.	APP'D.					

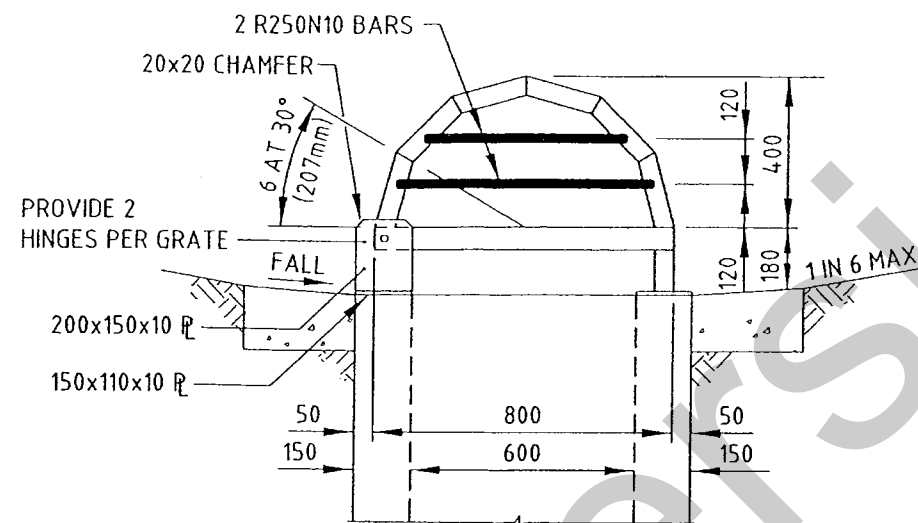
1. REFER TO STANDARD SPECIFICATION SS5 FOR GRADING, COMPACTION AND SPECIFICATION FOR BACKFILL, OVERLAY ZONE, HAUNCH ZONE AND BED ZONE MATERIALS.
2. ALL MATERIAL IN THE ABOVE ZONES TO BE COMPACTED OVER THE FULL WIDTH OF THE TRENCH.
3. IN AREAS OF POOR GROUND CONDITIONS OR HIGH WATER TABLES ALTERNATIVE BEDDING REQUIREMENTS MAY BE REQUIRED AS DIRECTED BY THE SUPERINTENDENT.
4. FOR TRENCH WIDTH, BED AND HAUNCH ZONE DEPTHS, REFER TO A.S. 3725. PIPES ARE TO BE DESIGNED AND INSTALLED TO THE REQUIREMENTS OF AS 3725 WITH RESPECT TO THEIR STRENGTH CLASS FOR ALL CONSTRUCTION LOADS, DEAD LOADS AND IN SERVICE LOADS.
5. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.



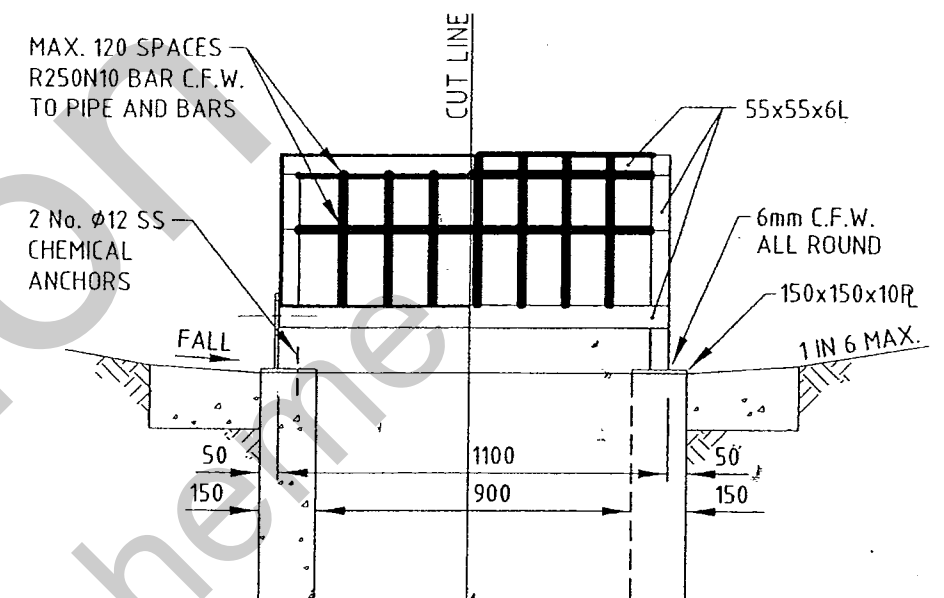
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING EXCAVATION & BEDDING OF STORMWATER PIPES						
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE			SCALE	As Shown										
			G:\Standard Drawings\RCC\Stormwater						SURV'D..	CHK'D..										
									DRN..	APP'D..										
														A					SHEET 1 of 1	59309



SECTION A-A



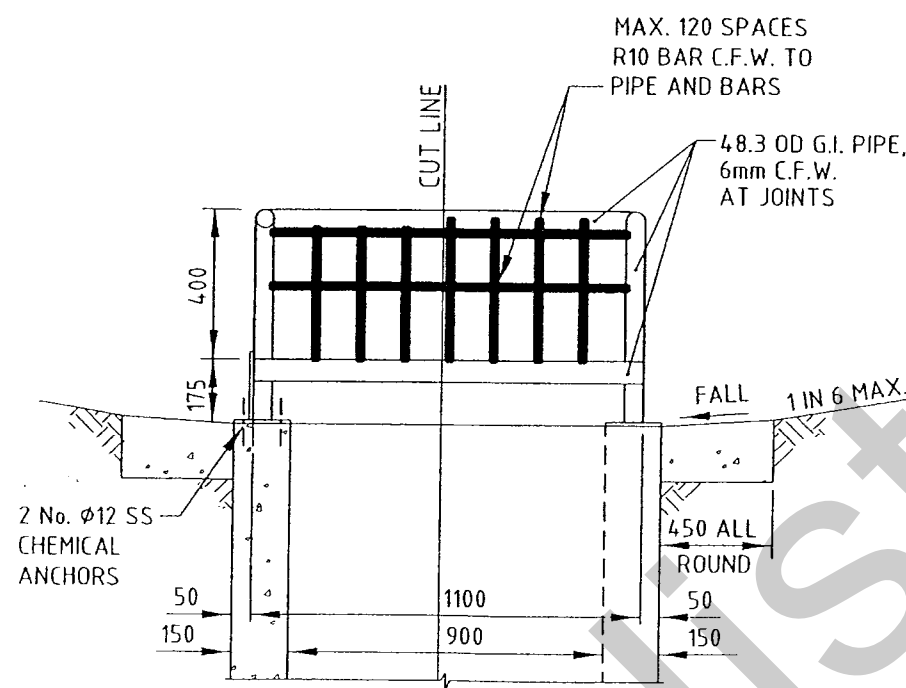
SECTION A-A



SECTION B-B

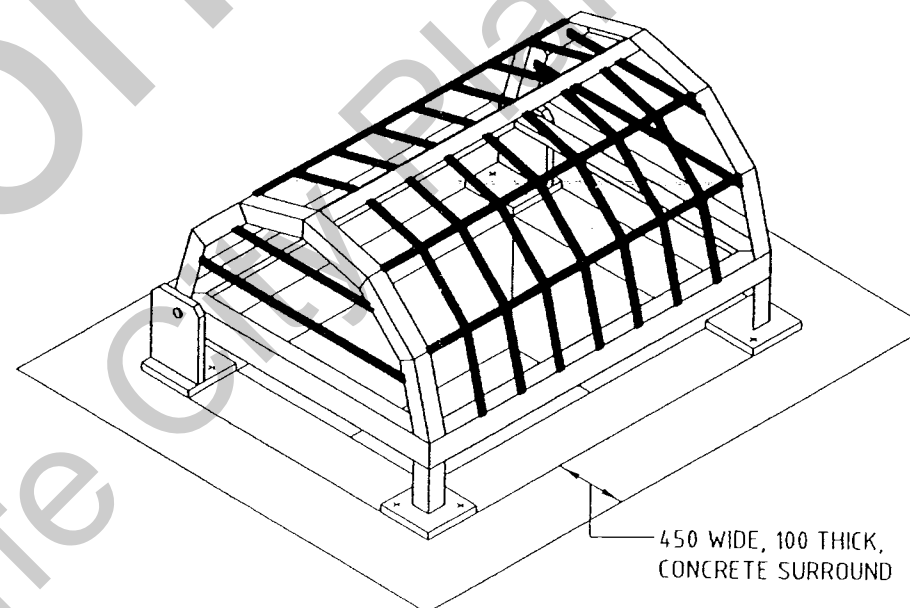
NOTES:

1. CONCRETE TO BE GRADE N25.
2. GRATE AND HINGES TO BE HOT DIPPED GALVANISED TO AS/NZS 4680 AFTER FABRICATION.
3. THE ISOMETRIC VIEW IS SIMILAR IN TYPE 1 AND TYPE 2.
4. PIPE INVERT LEVELS AS PER DRAINAGE DETAILS.
5. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

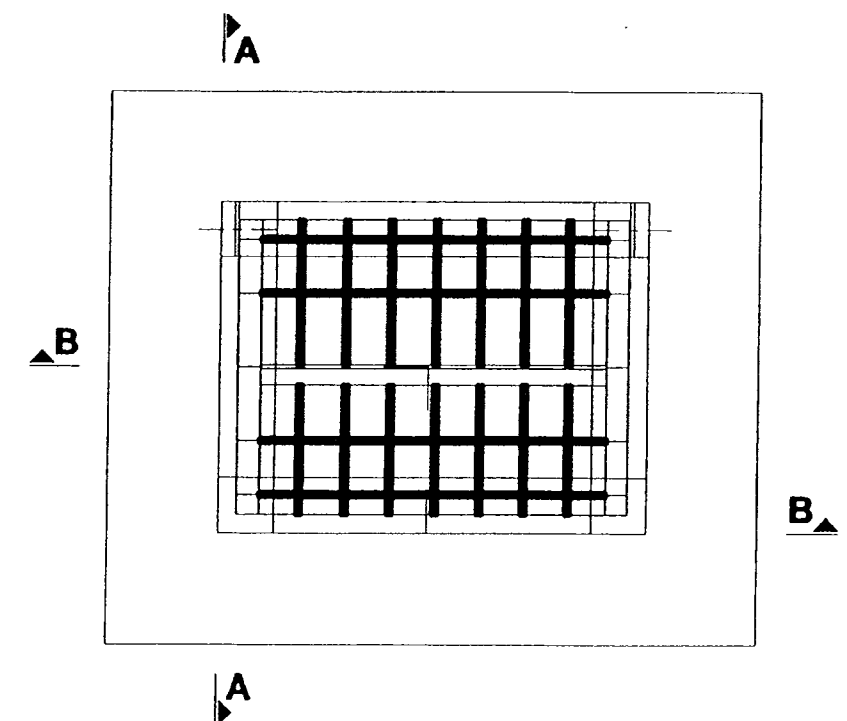


SECTION B-B

TYPE 1 - PIPE CONSTRUCTION



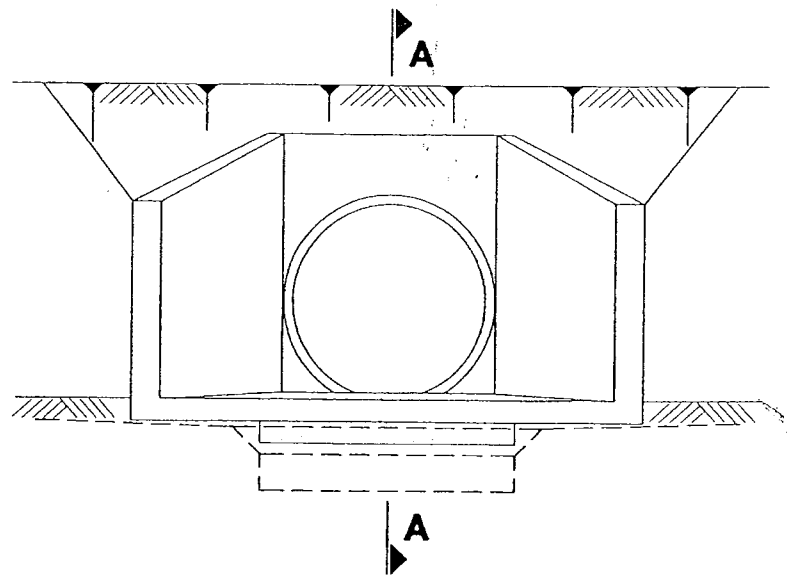
ISOMETRIC VIEW



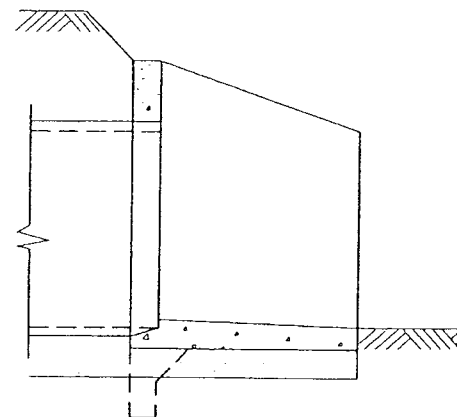
PLAN

TYPE 2 - ANGLE CONSTRUCTION

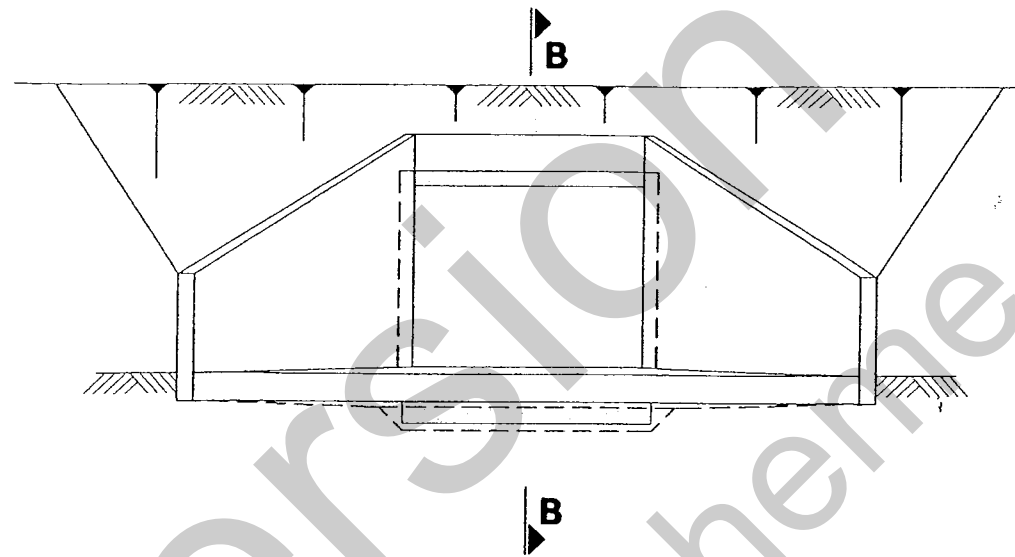
COMPUTER DETAILS				AMENDMENTS AND ISSUES				BY		DATE		DATUM		A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING			
FILE NAME	DATE	BACKUP LOCATION	DATE	No.	ORIGINAL ISSUE							SCALE	As Shown				FIELD INLET PIT			
		G:\Standard Drawings\REC\Stormwater		A								SURV'D.	CHK'D.				DOMED TOP COVER			
												DRN.	APP'D.				SHEET 1 of 1			
																A				59310



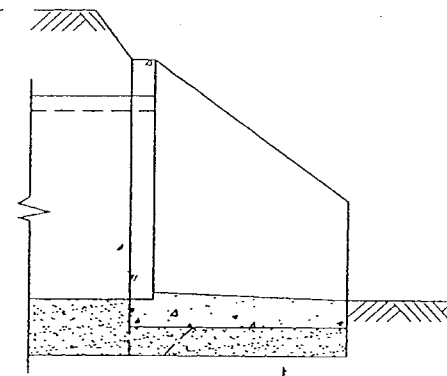
ELEVATION



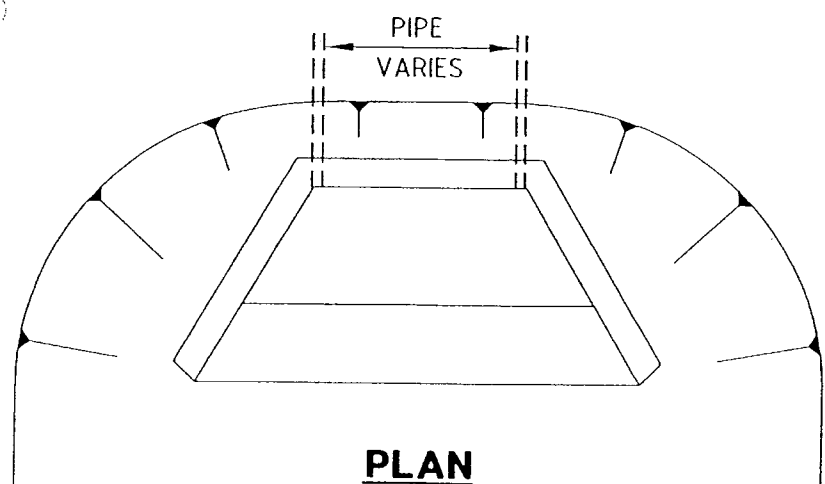
SECTION A-A



ELEVATION

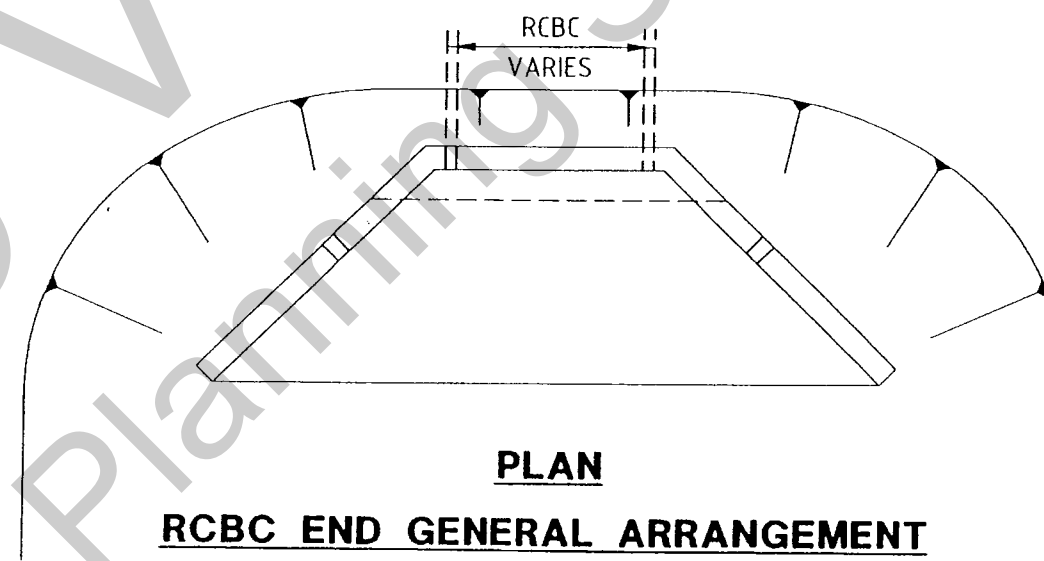


SECTION B-B



PLAN

**PIPE CULVERT, PRECAST CONCRETE
HEADWALL GENERAL ARRANGEMENT**



PLAN

RCBC END GENERAL ARRANGEMENT

NOTES:

1. PRECAST HEADWALLS SHALL BE PROPRIETARY PRODUCTS APPROVED BY COUNCIL.
2. IN FILL LOCATIONS PRIOR TO PLACING THE BED ZONE MATERIAL THE FILL SHALL BE COMPACTED TO THE STANDARD SPECIFIED IN SPECIFICATION SS5.
3. THE BED ZONE MATERIAL UNDER THE PIPE SHALL BE CONTINUED TO THE END OF THE HEADWALL APRON; MINIMUM THICKNESS 50mm.
4. TRANSITION UNIFORMLY FROM CONCRETE APRON TO OPEN CHANNEL OVER 5m TO 10m.
5. PROVIDE DOWNSTREAM SILTATION DEVICES AND/OR ROCK SCOUR PROTECTION AS DIRECTED BY THE SUPERINTENDENT.
6. FOR ENDS TO PIPE CULVERTS REFER TO MAIN ROADS STANDARD DRAWING Nos.1304, 1305, AND 1306.
7. FOR RCBC ENDS AND BASE SLAB DETAILS REFER TO MAIN ROADS STANDARD DRAWING Nos. 1174, 1303, 1316, 1317, 1318, 1319, AND 1320.
8. ALL PIPE AND RCBC ENDS SHALL HAVE HEADWALLS WINGWALLS AND APRONS.
9. ALL HEADWALLS TO HAVE FENCING WHERE VERTICAL DROP EXCEEDS 900mm.

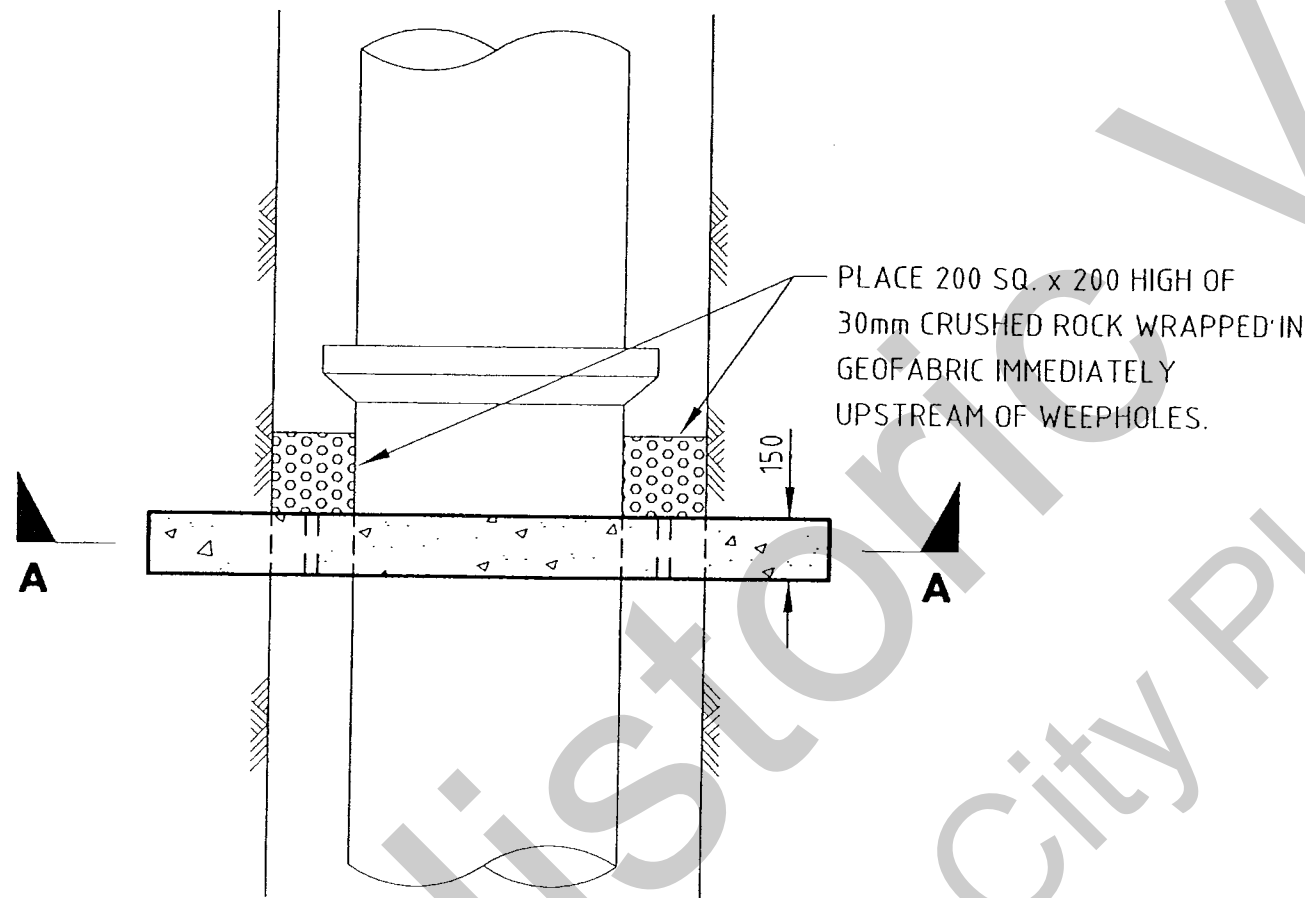
LEGEND

- FINISHED SURFACE LEVEL
- PIPE BED ZONE LAYER
- BATTER

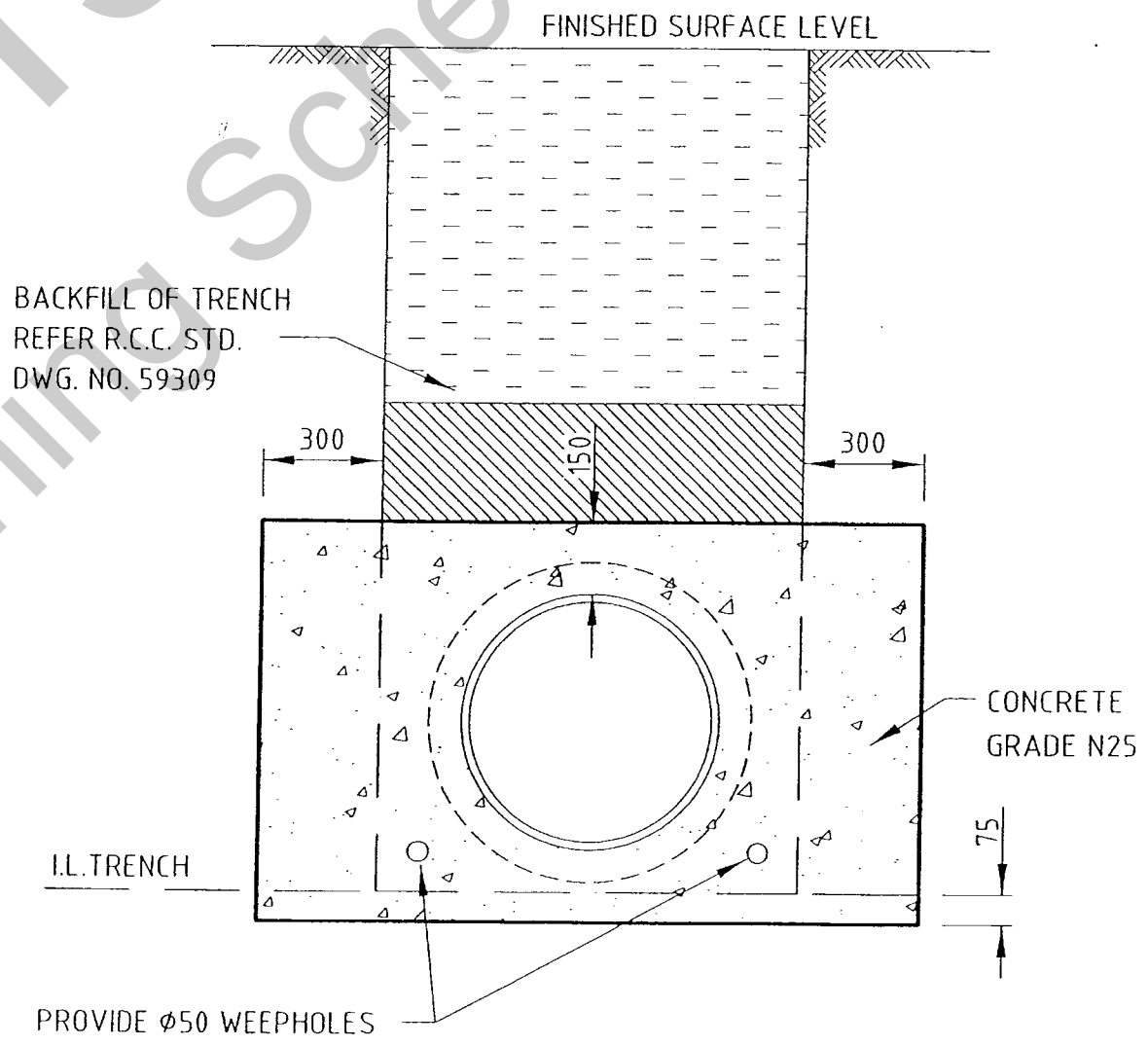
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING CONCRETE HEADWALL GENERAL ARRANGEMENT			
	FILE NAME	DATE	BACKUP LOCATION	DATE													
			G:\Standard Drawings\RCC\Stormwater		A	ORIGINAL ISSUE				SCALE	As Shown						
										SURV'D.	CHK'D.						
										ORN.	APP'D.						

NOTES:

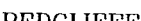
- 1. CONCRETE BULKHEADS TO BE LOCATED AT MAXIMUM INTERVALS OF 10m WHERE PIPE GRADES EXCEED 15%.
- 2. WHERE SPECIFIED SCOUR BULKHEADS TO EXTEND TO THE TOP OF THE TRENCH.
- 3. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

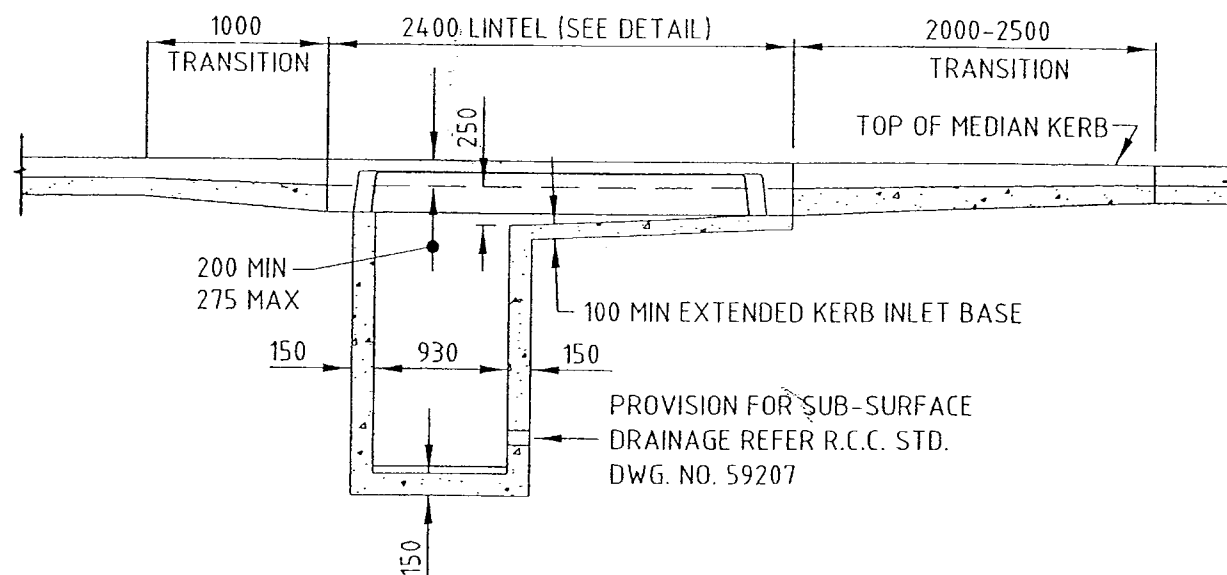


PLAN

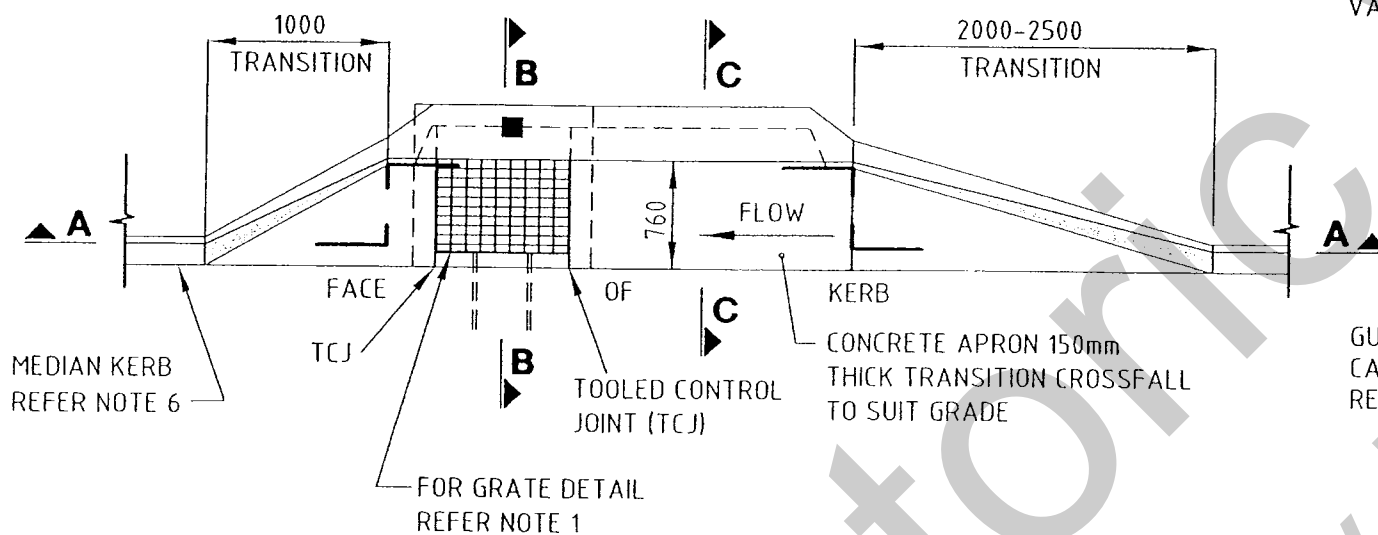


SECTION A-A

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	STANDARD DRAWING							
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			SCOUR PROTECTION BULKHEAD							
			G:\Standard Drawings\RCC\Stormwater								SURV'D.	CHK'D.									
											DRN.	APP'D.									
													A					SHEET 1 of 1		59312	



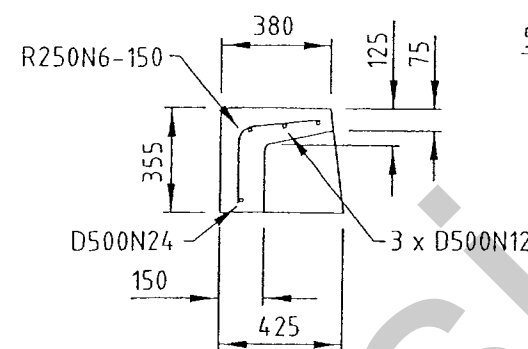
SECTION A-A



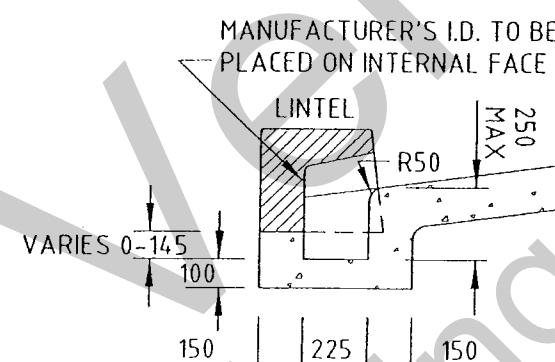
PLAN TYPICAL MEDIAN GULLY (TYPE M)

■ LINTEL NOTE

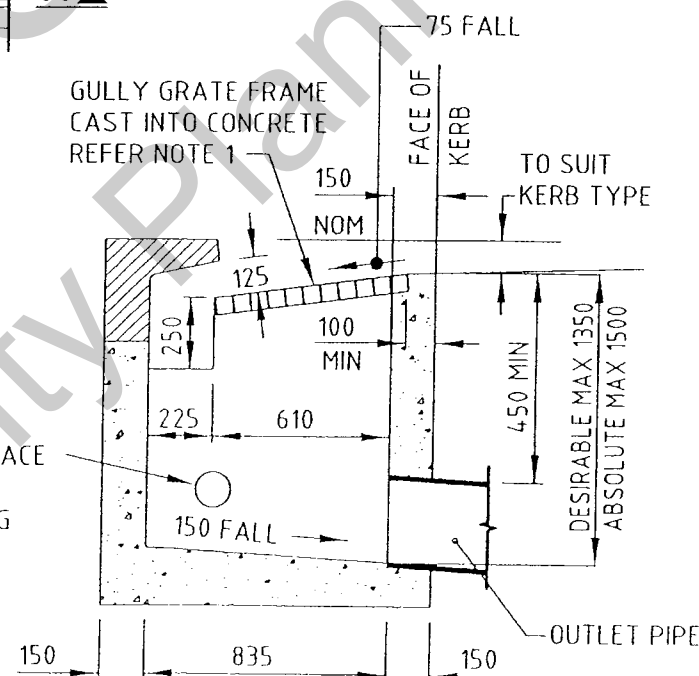
PROTECT OUR WATERWAYS - FLOWS TO THE OCEAN
TEXT 40 HIGH - LETTERS IMPRINTED 5 INTO CONCRETE
FACING FOOTPATH



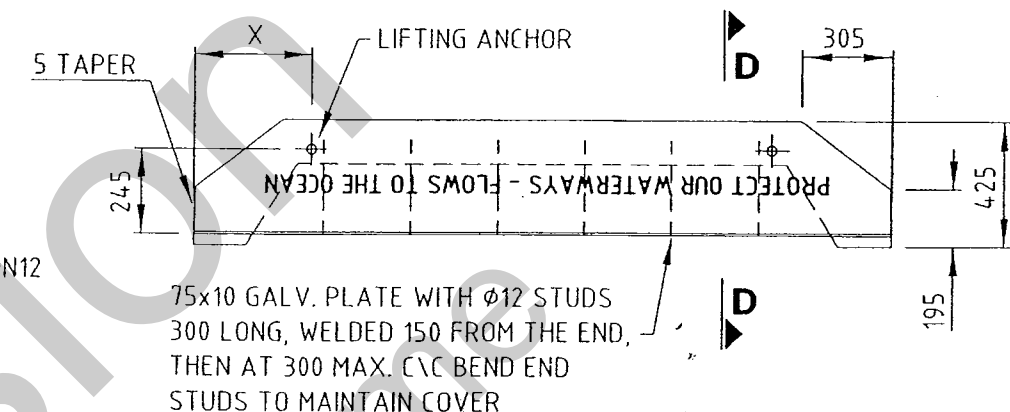
SECTION D-D



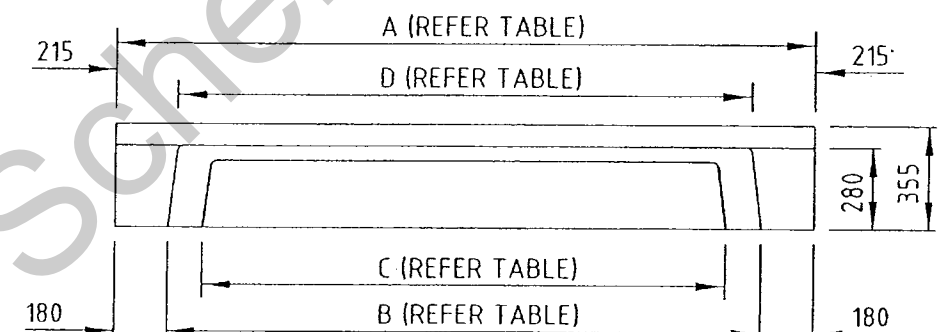
SECTION C-C



SECTION B-B



PLAN



ELEVATION

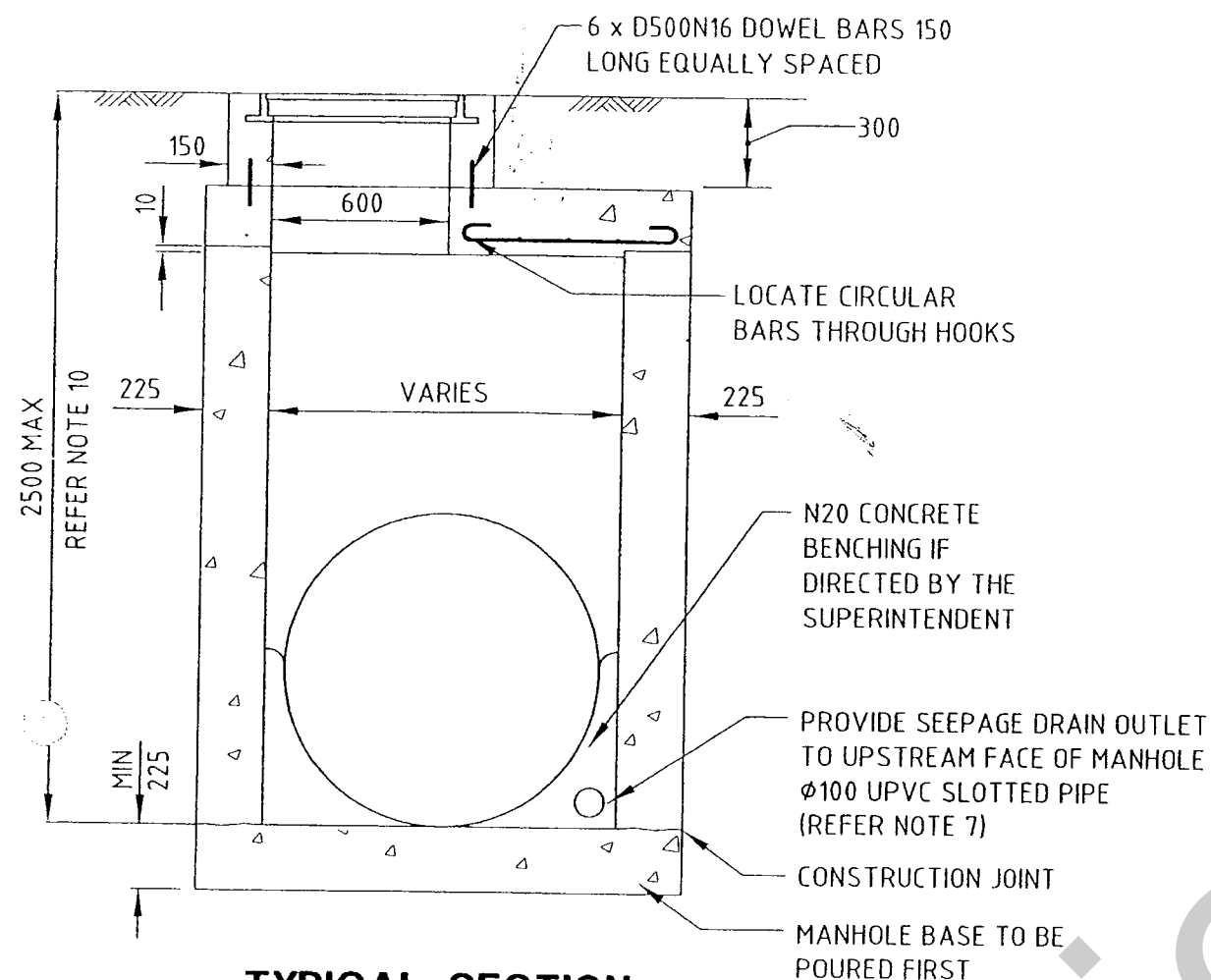
TYPE	DIMENSIONS				
	A	B	C	D	X
SMALL (S)	2400	2040	1800	1970	400

LINTEL TABLE

NOTES

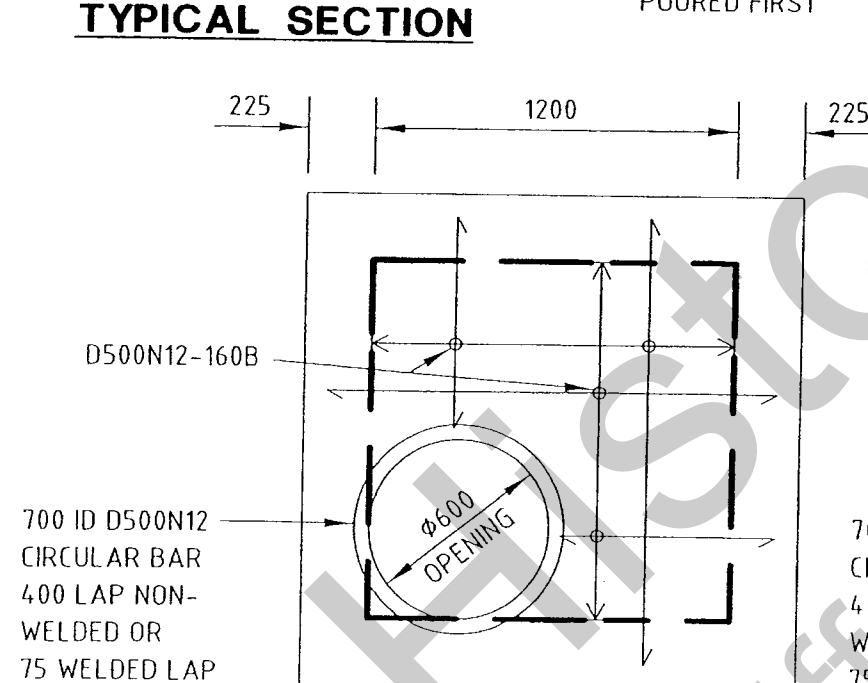
1. THE GULLY GRATE SHOWN IS TYPICAL ONLY. GRATES TO COMPLY WITH COUNCIL'S STANDARD SPECIFICATION SS5.
2. CONCRETE IN PRECAST LINTELS TO BE GRADE N32.
3. CAST IN-SITU CONCRETE TO BE GRADE N25.
4. REINFORCING BARS TO AS/NZS 4671:2001 PLACED CENTRALLY, 40 MIN. END COVER.
5. LIFTING ANCHORS TO BE "SWIFTLIFT" OR EQUIVALENT 1.3 TONNE GALVANISED TO AS/NZS 4680 AND FITTED TO MANUFACTURERS SPECIFICATION.
6. MEDIAN KERB PROFILES SHOWN ARE TYPICAL ONLY. ACTUAL PROFILES REFER R.C.C. STD DWG 59206.
7. FOR DETAILS ON SUB-SURFACE DRAINAGE CONNECTIONS REFER R.C.C. STD DWG 59207.
8. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

COMPUTER DETAILS				AMENDMENTS AND ISSUES				A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING			
FILE NAME	DATE	BACKUP LOCATION	DATE	No.	BY	DATE	DATUM	SCALE	As Shown		MEDIAN GULLY			
		G:\Standard Drawings\RCC\Stormwater		A			SCALE				CAST IN-SITU DETAILS			
							SURV'D.		CHK'D.		SHEET 1 of 1			
							DRN.		APP'D.		59313			

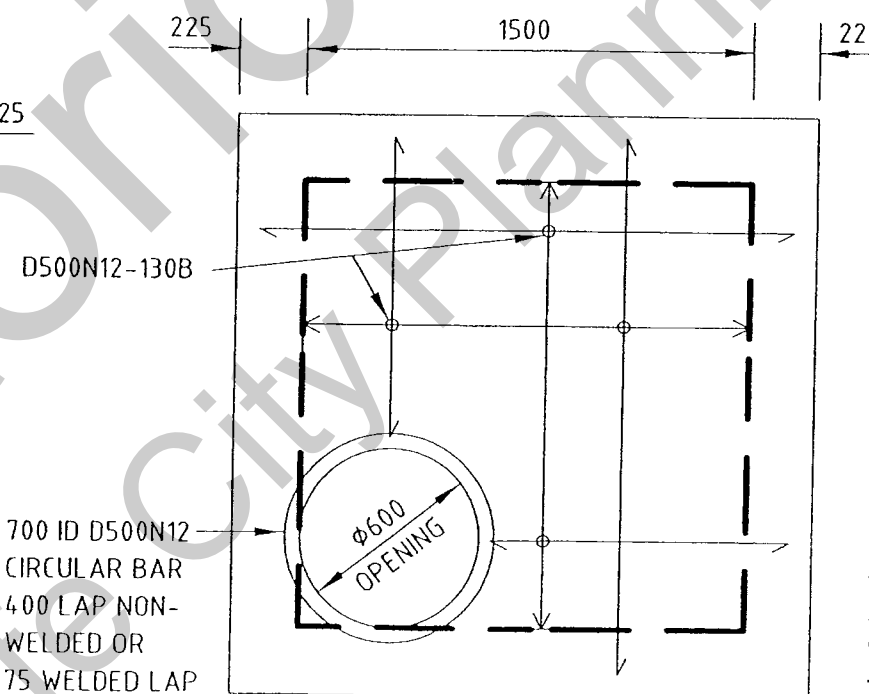


- ## NOTES

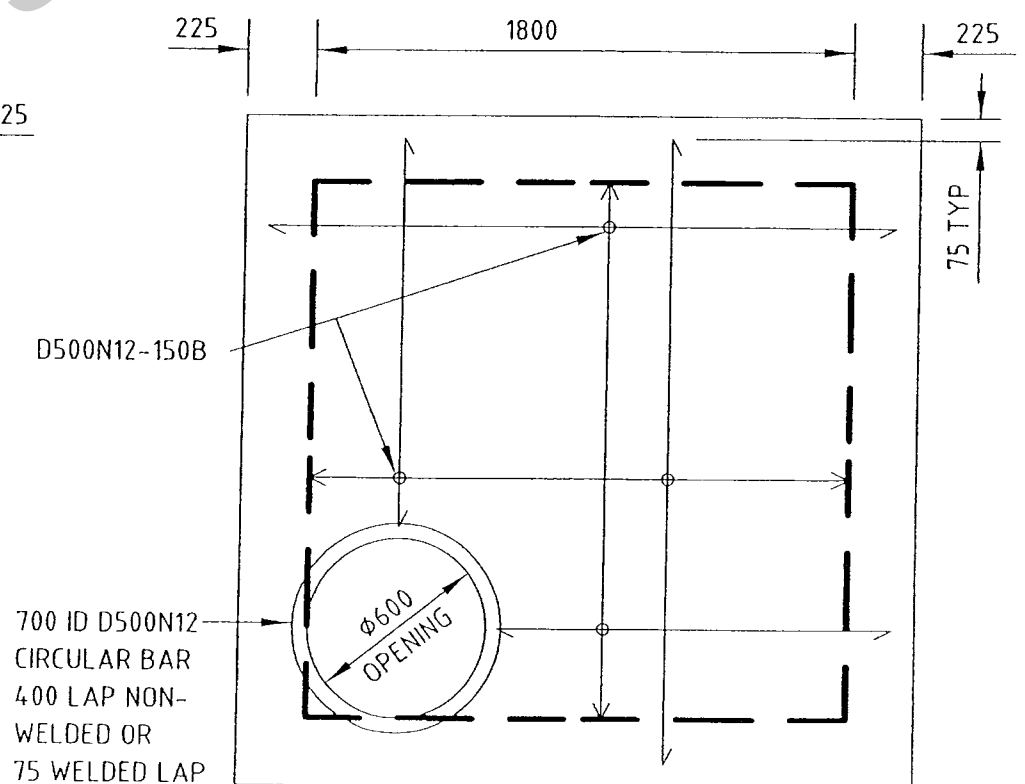
1. THE MANHOLE COVER AND FRAME IS TYPICAL ONLY. COVERS AND FRAMES SHALL COMPLY WITH COUNCIL'S STANDARD SPECIFICATION SS5.
2. ALL CONCRETE WALLS AND FLOOR TO BE GRADE N25 ALL ROOF SLABS TO BE GRADE N40 IN ACCORDANCE WITH AS 1379 AND AS 3600.
3. ALL REINFORCING BARS IN THE TOP SLAB SHALL BE PLACED WITH 40 COVER TO THE UNDERSIDE OF THE SLAB.
4. UNLESS NOTED OTHERWISE ALL REINFORCING BARS SHALL BE HOOKED AT EACH END AND CONFORM WITH AS/NZS 4671:2001.
5. ROOF SLAB DESIGN BASED ON AUSTRROADS BRIDGE CODE W7.
6. MINIMUM 30 LONGITUDINAL FALL THROUGH MANHOLE.
7. ADDITIONAL SEEPAGE DRAIN OUTLETS TO BE PROVIDED IN WATER CHARGED GROUND AS DIRECTED BY THE SUPERINTENDENT.
8. SANDBAGS MAY BE USED FOR EXTERNAL WALLS ONLY AS APPROVED BY THE SUPERINTENDENT.
9. REFER R.C.C. DWG. NO. 59304 FOR MANHOLE COVER AND FRAME DETAILS.
10. MANHOLES DEEPER THAN 2500 REQUIRE INDIVIDUAL DESIGN AND CERTIFICATION.
11. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.




1200 SQUARE
200 THICK SLAB

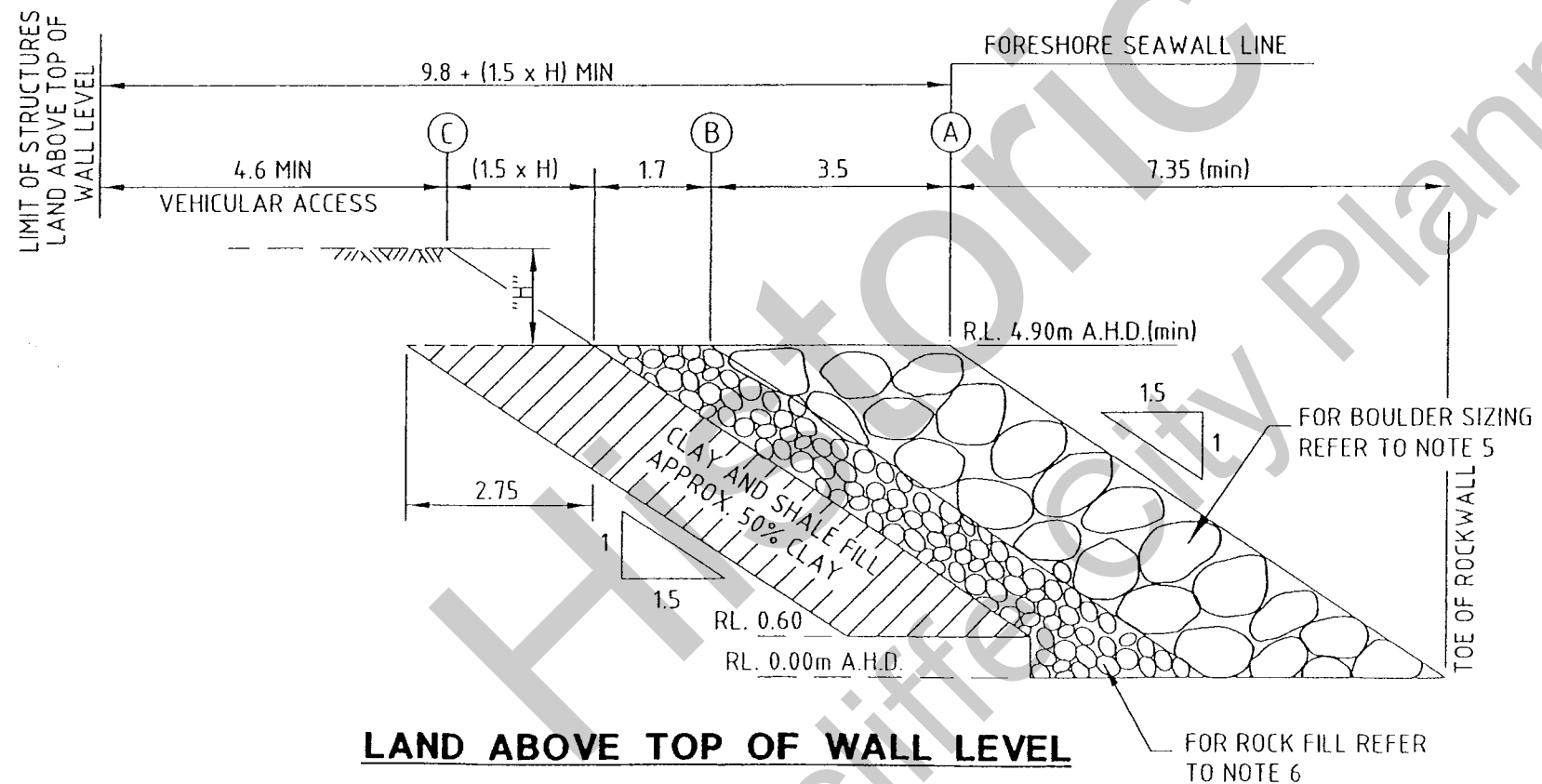
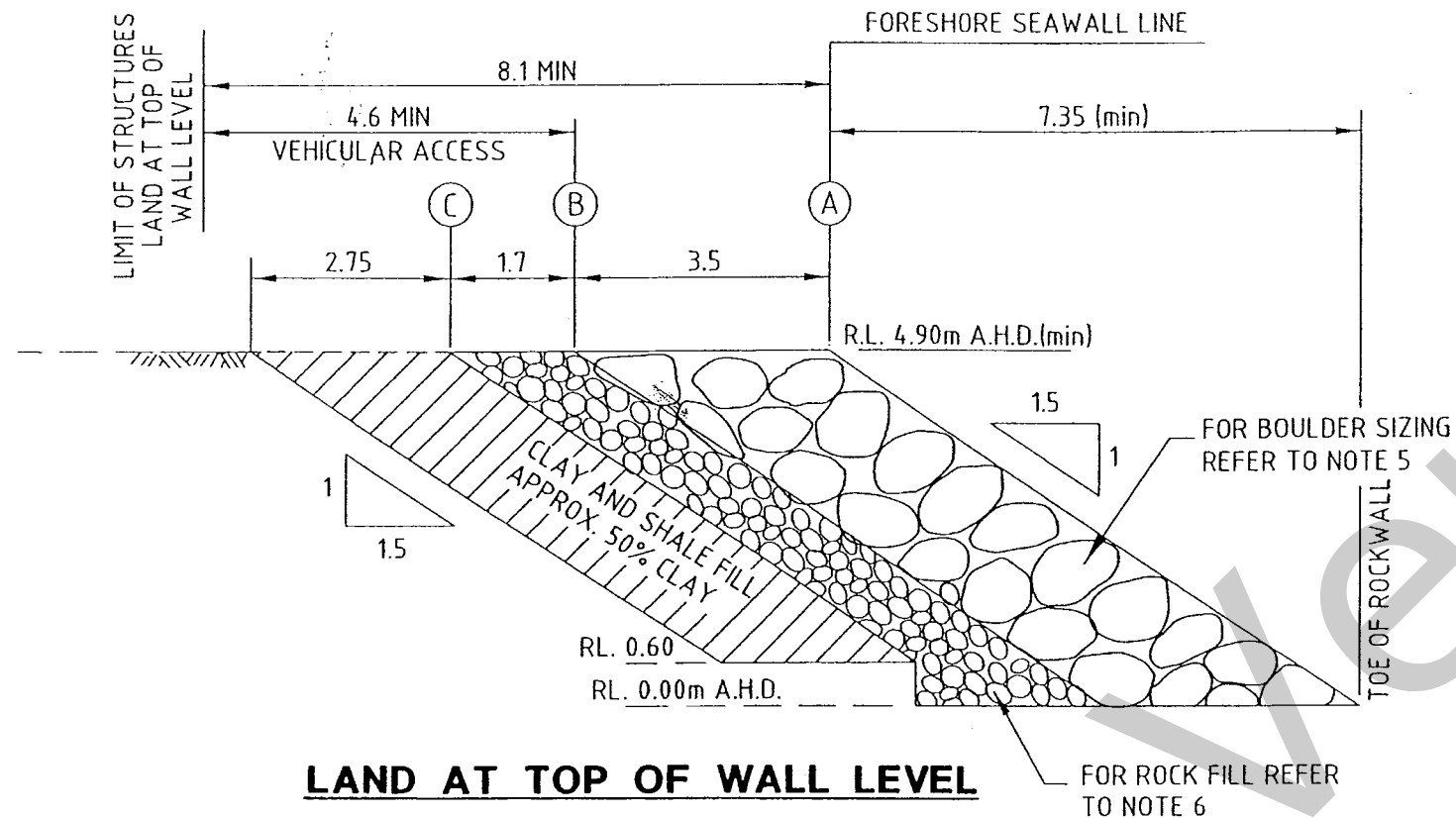


1500 SQUARE
200 THICK SLAB



1800 SQUARE
225 THICK SLAB

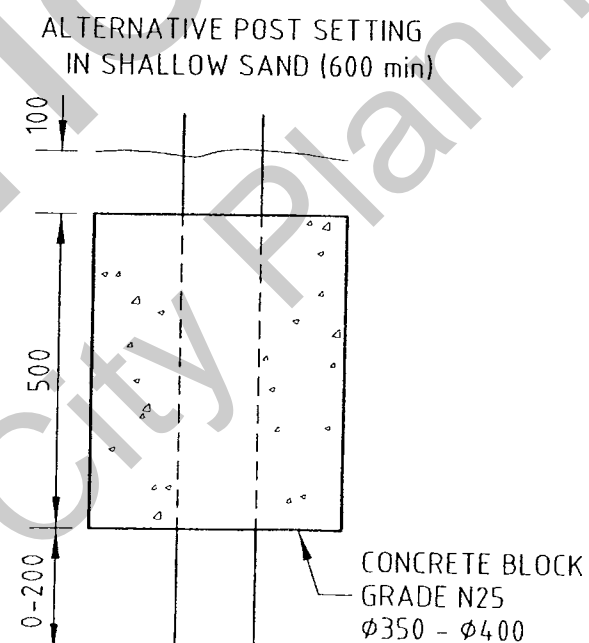
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING STORMWATER MANHOLES 1200, 1500 AND 1800 SQUARE					
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE			SCALE	As Shown									
			G:\Standard Drawings\RCC\Stormwater						SURV'D.:	CHK'D.:									
									DRN.:	APP'D.:									
													A					SHEET 1 of 1	59314



NOTES


1. THE TYPE 1 WALL, INCORPORATING A CLAY/SHALE LAYER, SHALL BE USED EXCEPT WHERE THE CERTIFYING ENGINEER DIRECTS THE USE OF THE TYPE 2 WALL..
2. CROSS SECTION PROFILES ARE BASED ON COORDINATOR GENERAL'S DEPARTMENT DRAWINGS.
3. ALL SAND TO BE SIEVED THROUGH A 50mm SIEVE PRIOR TO BACKFILLING.
4. SAND SHALL BE WASHED INTO WALL TO FILL THE VOIDS BETWEEN BOULDERS AT THE CONCLUSION OF THE ROCK WORK. ANY EXCESS SAND FROM EXCAVATIONS SHOULD BE PLACED SEAWARD OF THE WALL.
5. BOULDERS SHALL BE SOUND IGNEOUS OR METAMORPHIC ROCKS CLEAN AND FREE OF TOPSOIL AND ORGANIC MATTER AS FOLLOWS:
 - SIZE 1.5 TO 4 TONNE
 - 50% OVER 3 TONNE
6. ROCK FILL SHALL BE OF SOUND IGNEOUS OR METAMORPHIC ROCKS CLEAN AND FREE OF TOPSOIL AND ANY ORGANIC MATTER AS FOLLOWS:
 - SIZE 90 - 360KG.
 - 50% OVER 270KG.
7. THE AREA BEHIND THE LEADING EDGE OF THE SEAWALL (ie LANDWARD) IS SUBJECT TO WAVE OVERTOPPING.
8. THE FORESHORE SEAWALL LINE 'A' IS AS SHOWN ON THE FORESHORE SEAWALL MAP REFERRED TO IN THE CITY OF GOLD COAST PLANNING SCHEME.
9. ALL BUILDINGS AND OTHER STRUCTURES SHALL BE SET BACK FROM THE FORESHORE SEAWALL, LINE 'A' (A-LINE), TO GIVE A 4.6m (min) FLAT AREA BETWEEN THE STRUCTURES AND THE BACK OF THE BOULDERS, (POINT B), TO PROVIDE ACCESS FOR CONSTRUCTION VEHICLES, CLEAR OF PERMANENT STRUCTURES, DURING AN EMERGENCY.
10. WHERE THE LEVEL OF THE LAND IS THE SAME AS THE TOP OF WALL LEVEL, THE 4.6m SETBACK IS MEASURED FROM POINT B RESULTING IN A MINIMUM SET BACK DISTANCE OF 8.1m FROM THE A-LINE.
11. WHERE THE LEVEL OF THE LAND IS HIGHER THAN THE TOP OF WALL LEVEL, THE 4.6m SETBACK IS MEASURED FROM POINT C (TOP OF BATTER). THIS RESULTS IN A MINIMUM SET BACK DISTANCE, FROM THE A-LINE OF 9.8m PLUS 1.5 TIMES THE HEIGHT ABOVE THE TOP OF WALL.
12. BASEMENTS MAY BE ALLOWED TO PROTUDE INTO THE CLAY/SHALE LAYER ONLY. THE BASEMENT ROOF SHALL BE DESIGNED TO WITHSTAND ALL LOADS GENERATED DURING THE MAINTENANCE OF THE WALL, INCLUDING WALL CONSTRUCTION TRAFFIC.
13. DIMENSIONS ARE IN METRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES	BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING FORESHORE SEAWALL TYPE 1 (CLAY AND SHALE)			
	FILE NAME	DATE	BACKUP LOCATION	DATE											
			G:\Standard Drawings\RCC\Foreshore		A	ORIGINAL ISSUE			SCALE	As Shown					
									SURV'D.	CHK'D.					
									ORN.	APP'D.					

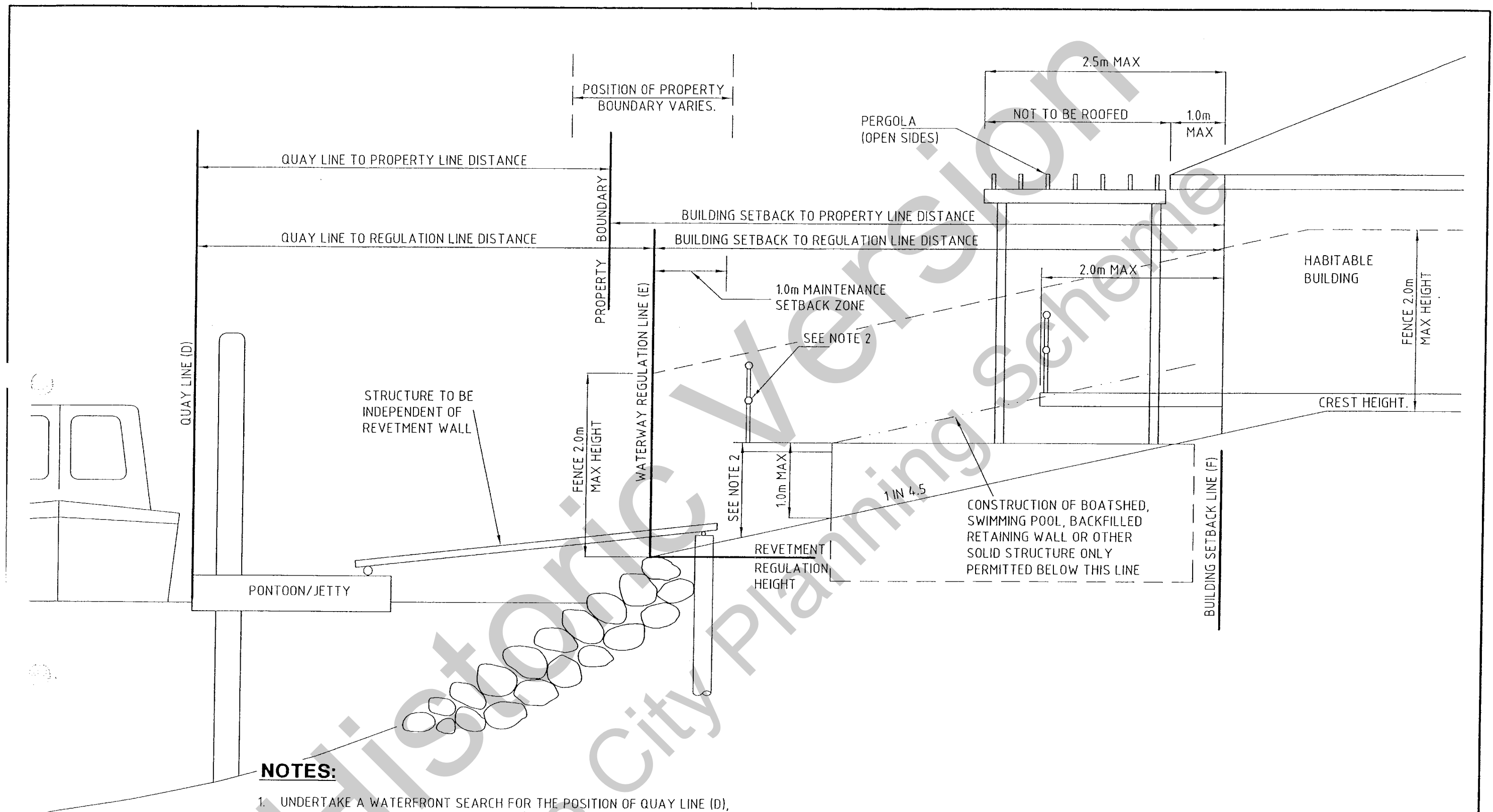


DETAIL 2

1. STAPLES SHALL BE LOCATED AT 90° TO THE TIMBER GRAIN AND NOT DRIVEN HARD AGAINST THE PLASTIC COATED WIRE.
2. KNITTED GREEN SHADE FABRIC SHALL BE LOCATED AND STAPLED ON THE SEAWARD SIDE OF THE FENCE.
3. ALL DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING DUNE PROTECTION FENCE						
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE					SCALE	As Shown								
			G:\Standard Drawings\RCC\Foreshore								SURV'D.	CHK'D.								
											DRN.	APP'D.								
														A					SHEET 1 of 1	59403

Historic Version
Redcliffe City Planning Scheme



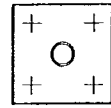
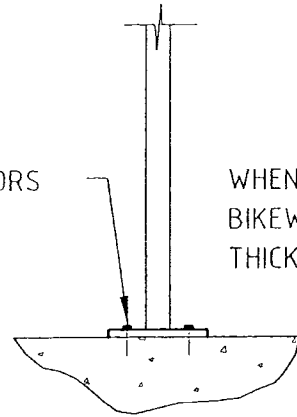
NOTES:

1. UNDERTAKE A WATERFRONT SEARCH FOR THE POSITION OF QUAY LINE (D), WATERWAY REGULATION LINE (E) AND BUILDING SETBACK LINE (F).
2. CANTILEVERED DECKS TO SWIMMING POOLS MAY EXTEND UP TO 1.2m ABOVE NOMINATED GROUND SURFACE.
3. SWIMMING POOL FENCING ABOVE THE 1.2m LIMIT MUST BE OF AN APPROVED OPEN NATURE.
4. ALL DIMENSIONS ARE IN METRES UNLESS NOTED OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES	BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING WATERWAY DEVELOPMENT CROSS SECTION		SHEET 1 of 1	59404
	FILE NAME	DATE	BACKUP LOCATION	DATE											
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									SURV'D.	CHK'D.					
									DRN.	APP'D.					

CONCRETE ANCHORS
REFER NOTE 12.

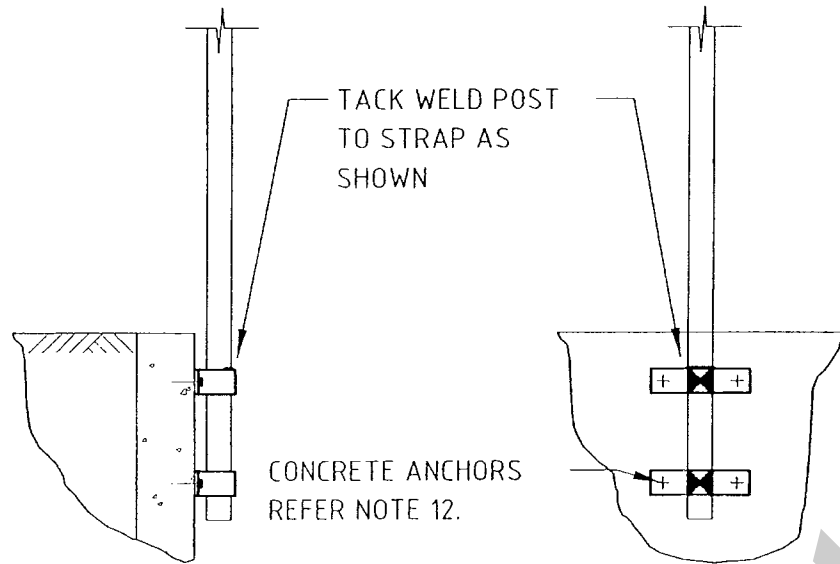
WHEN BOLTING TO PATHWAYS
BIKEWAYS ETC LOCALLY
THICKEN CONCRETE TO SUIT



TYPE 2

TACK WELD POST
TO STRAP AS
SHOWN

CONCRETE ANCHORS
REFER NOTE 12.



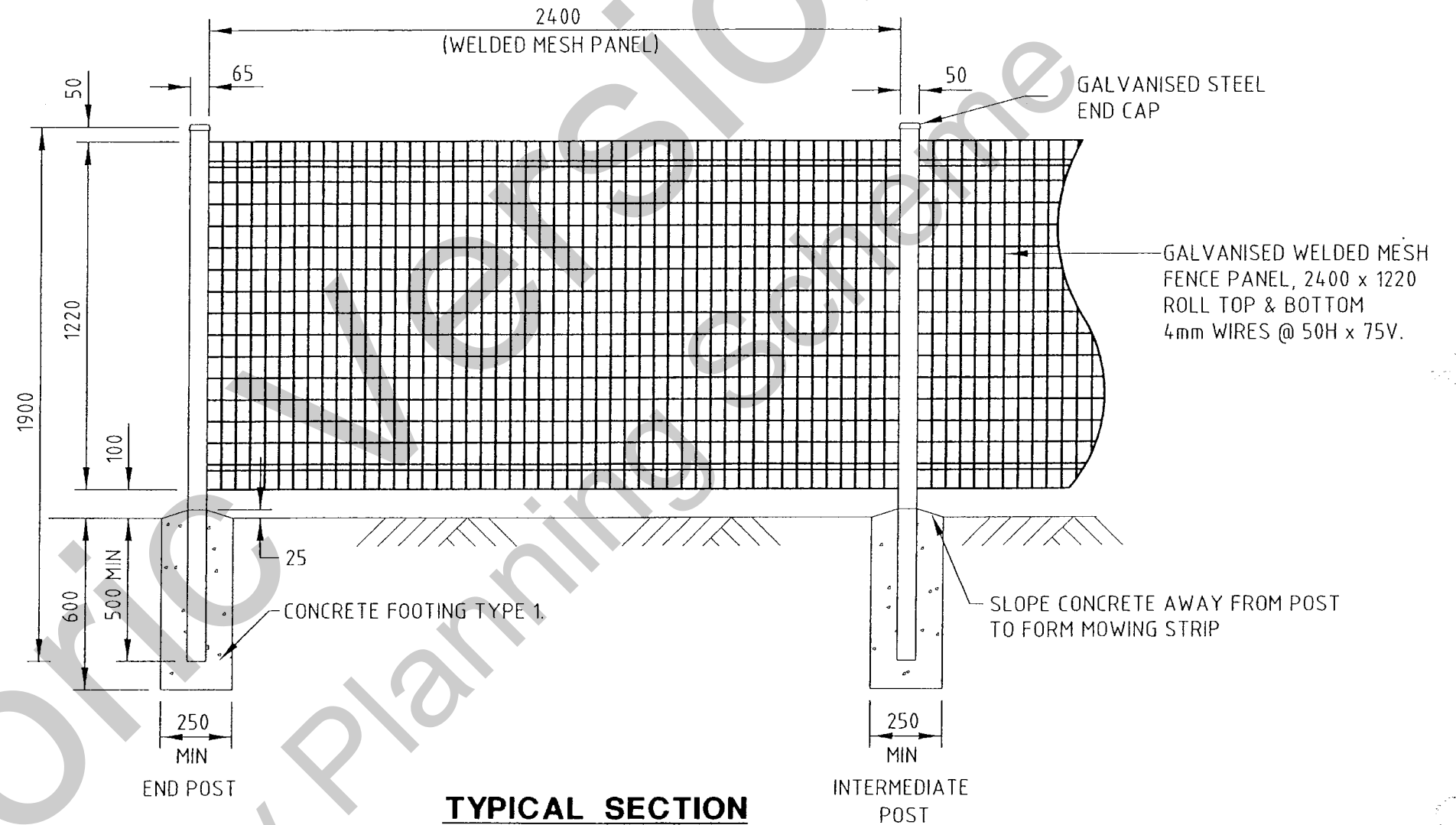
TYPE 3

ALTERNATIVE FOOTING DETAILS

NOTES:


1. GATE AND END POSTS TO BE 65x65x2 GALVANISED R.H.S. (REFER AS 1163)
2. INTERMEDIATE POSTS TO BE 50x50x2 GALVANISED R.H.S. (REFER AS 1163)
3. PANELS TO BE FIXED TO POSTS IN ACCORDANCE WITH MANUFACTURER'S SPECIFICATION.
4. WELDED MESH PANELS TO BE ARC "ACADIA" OR EQUIVALENT MANUFACTURED IN ACCORDANCE WITH AS 3902.
5. ALL GALVANISING TO BE IN ACCORDANCE WITH AS/NZS 4680.
6. COLOURED POWDER COATING MAY BE USED SUBJECT TO COUNCIL APPROVAL.

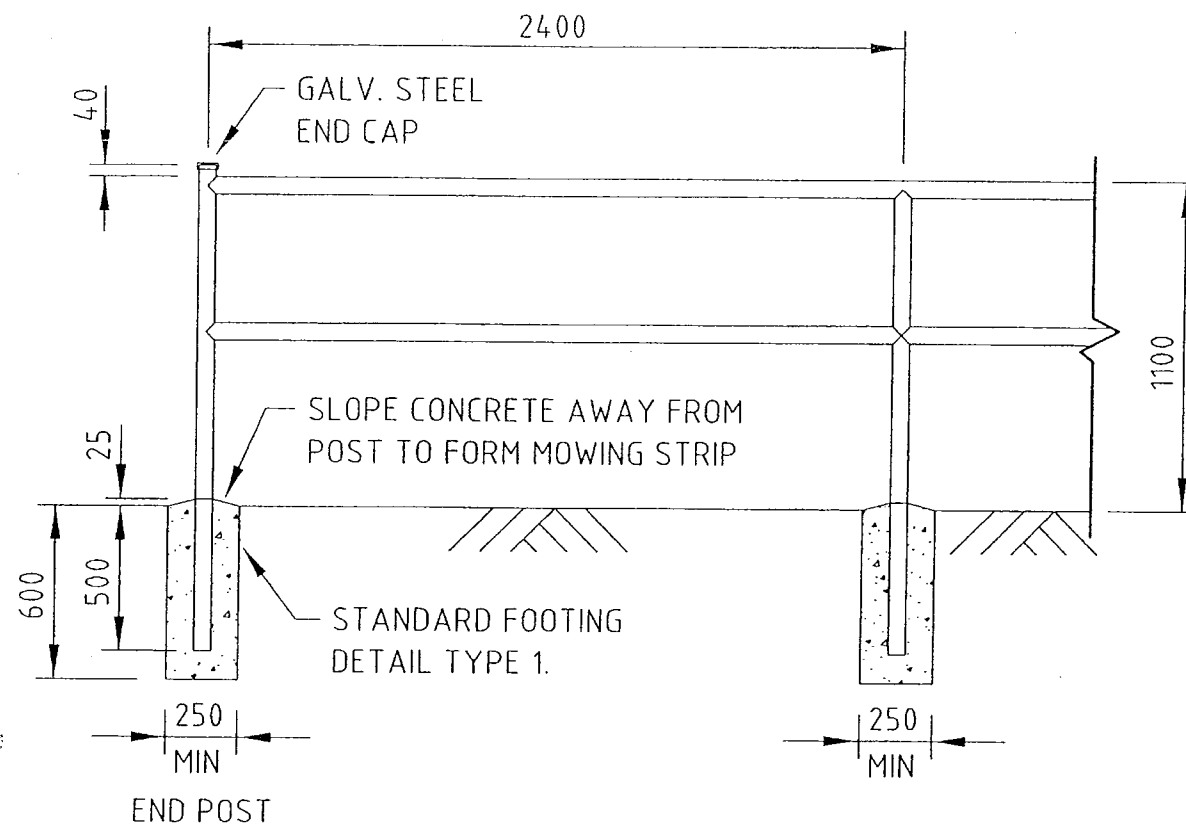
2400
(WELDED MESH PANEL)



TYPICAL SECTION

7. POSTS ARE TO BE SET VERTICALLY IN CONCRETE GRADE N25.
8. RAKED PANELS ARE AVAILABLE FOR SLOPES UP TO 10° (1 IN 6).
9. NUTS TO BE SPOT WELDED TO BOLTS AND COLD GALVANISED AS AN ANTI-THEFT DETERENT.
10. THESE FENCES ARE INTENDED AS A PEDESTRIAN BARRIER AND ARE NOT TO BE USED IN SITUATIONS WHERE MOTOR VEHICLES REQUIRE RESTRAINT.
11. TYPE 2 AND 3 DETAILS ARE INDICATIVE ONLY. ENGINEER'S DETAILS TO BE SUBMITTED FOR COUNCIL APPROVAL.
12. CONCRETE ANCHORS TO TYPE 2 AND 3 DETAILS SHALL BE STAINLESS STEEL CHEMICAL ANCHORS.
13. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING					
	FILE NAME	DATE	BACKUP LOCATION	DATE		A	ORIGINAL ISSUE				SCALE			As Shown		PEDESTRIAN BARRIER			
			G:\Standard Drawings\RCC\Footpaths								SURV'D.:			CHK'D.:		GALVANISED WELDED MESH FENCING			
											DRN.:			APP'D.:		SHEET 1 of 1			
												APP'D.:		59501					

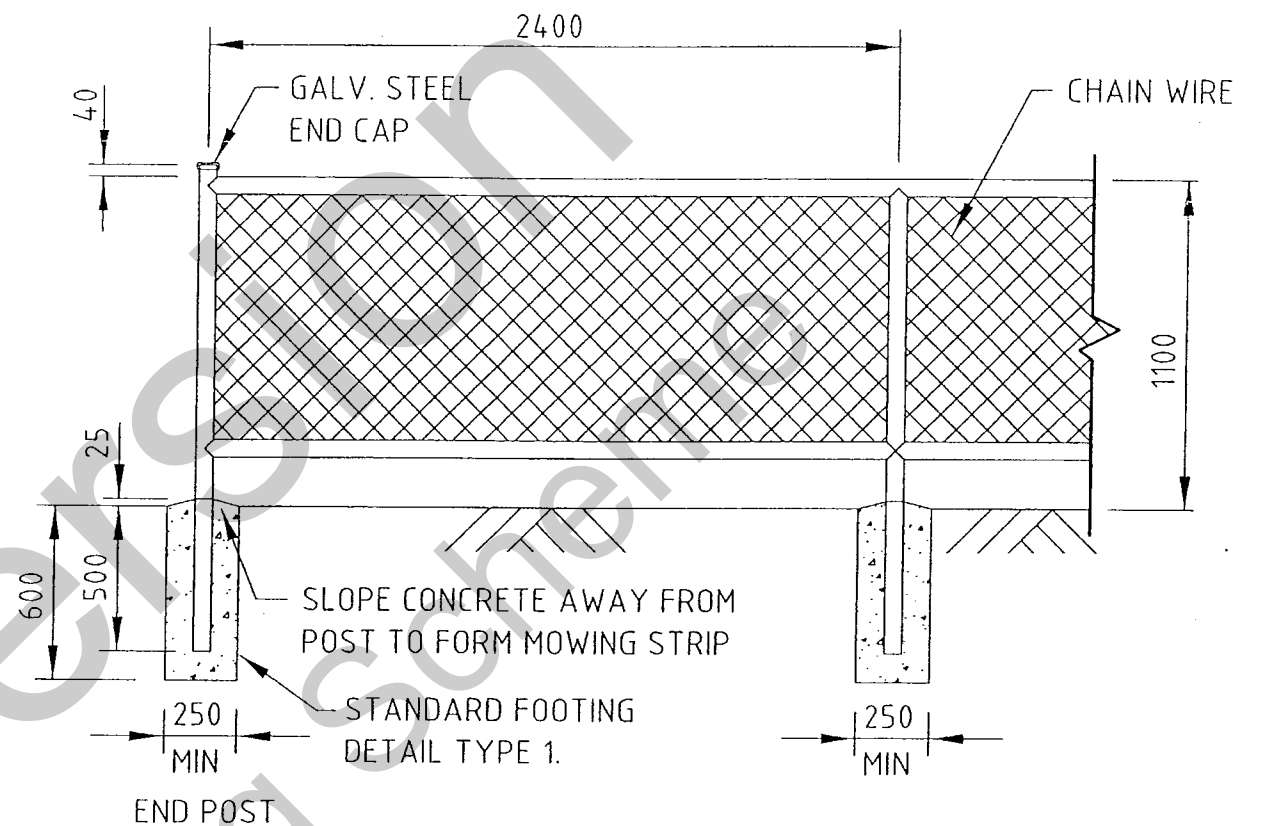


GENERAL PURPOSE

GALVANISED TUBULAR HANDRAIL

NOTES:

1. GATE AND END POSTS TO BE CONTINUOUS LENGTHS 50 NB (60.3 OD 3.6 THICK) GALVANISED STEEL TUBE. (AS 1163 REFERS)
2. INTERMEDIATE POSTS TO BE CONTINUOUS LENGTHS 40 NB (48.3 OD 3.2 THICK) GALVANISED STEEL TUBE. (AS 1163 REFERS)
3. RAILS TO BE 40 NB (48.3 OD, 3.2 THICK) GALVANISED STEEL TUBE. (AS 1163 REFERS)
4. STANDARD COUPLINGS MAY BE USED PROVIDED THEY ARE SPOT WELDED TO POSTS OR RAILS.
5. ALL WELDS TO BE 6 C.F.W. (CONTINUOUS FILLET WELDS) TO AS 1554.1 WITH COLD GALVANISING TREATMENT TO COMPLETED WELDS.
6. CHAIN WIRE TO BE 900 HIGH x 3.15 THICK x 50 MESH HEAVY GALVANISED IN ACCORDANCE WITH AS 2423.

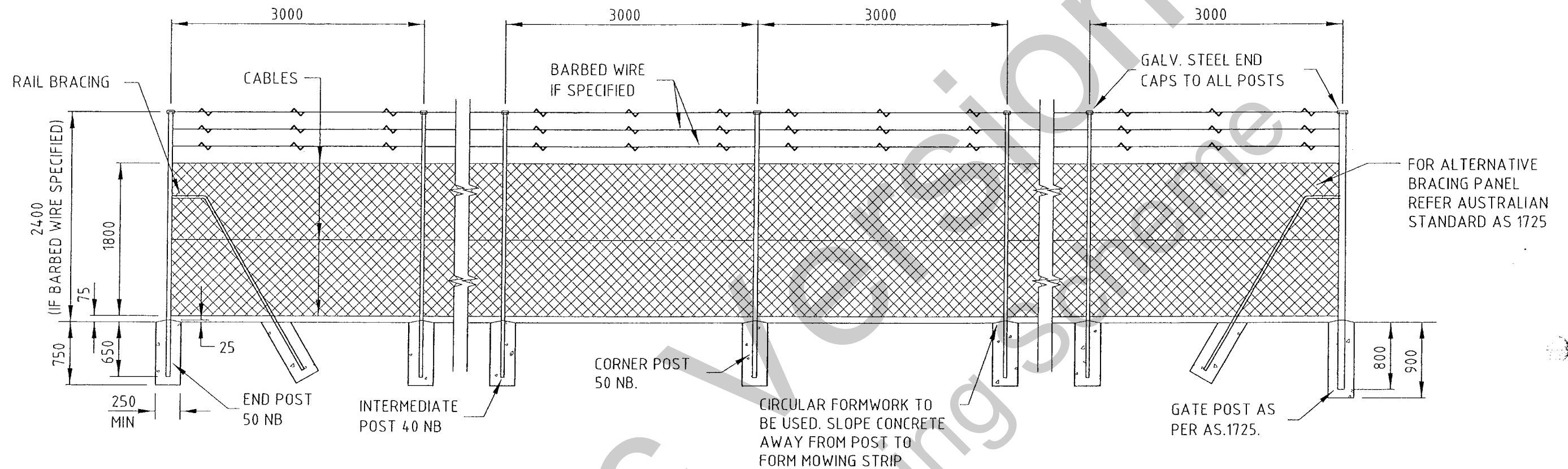


GALVANISED TUBULAR HANDRAIL

WITH CHAIN WIRE

7. CHAIN WIRE TO BE FIXED USING 1.6 THICK HEAVY GALVANISED WIRE, TIED TO POSTS AT 2 LOCATIONS AND CONTINUOUSLY LACED TO RAILS.
8. POSTS TO BE SET VERTICALLY AND ACCURATELY ALIGNED IN CONCRETE GRADE N25.
9. GALVANISED TUBULAR HANDRAILS TO BE SPLAYED 45° AT ENDS IN SITUATIONS OF POSSIBLE VEHICLE IMPACT.
10. ALL GALVANISING IS TO BE IN ACCORDANCE WITH AS/NZS 4680.
11. THESE FENCES SHALL NOT BE USED WITHIN 5 METRES OF THE EDGE OF A MOVING TRAFFIC LANE.
12. REFER DWG 59501 FOR ALTERNATIVE FOOTING DETAILS.
13. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

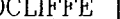
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM		REDCLIFFE CITY COUNCIL	STANDARD DRAWING PEDESTRIAN BARRIER GALVANISED TUBULAR FENCING			
	FILE NAME	DATE	BACKUP LOCATION	DATE						A.H.D.	As Shown					
			G:\Standard Drawings\RCC\Footpaths		A	ORIGINAL ISSUE										
										SURV'D.	CHK'D.					
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															SHEET 1 of 1	59502

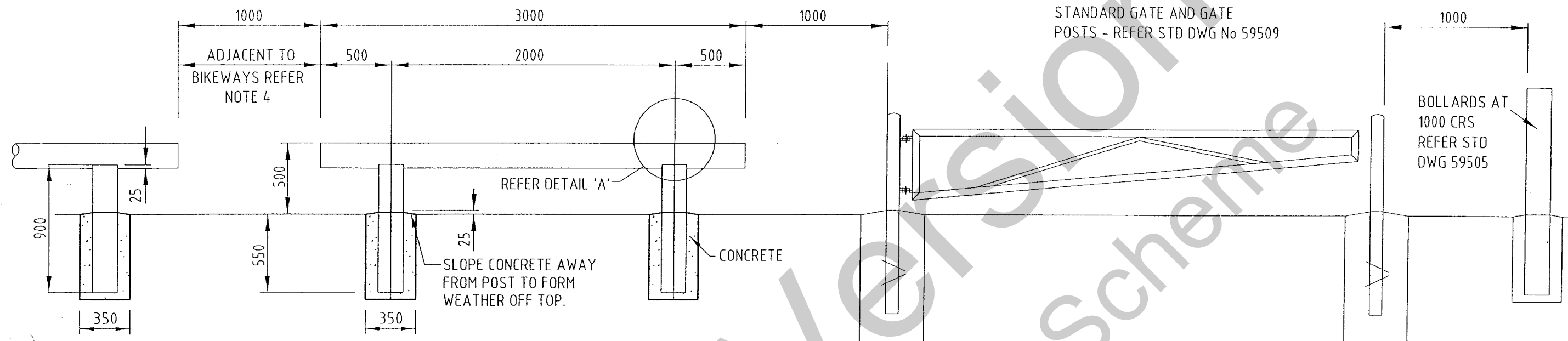


TYPICAL SECTION

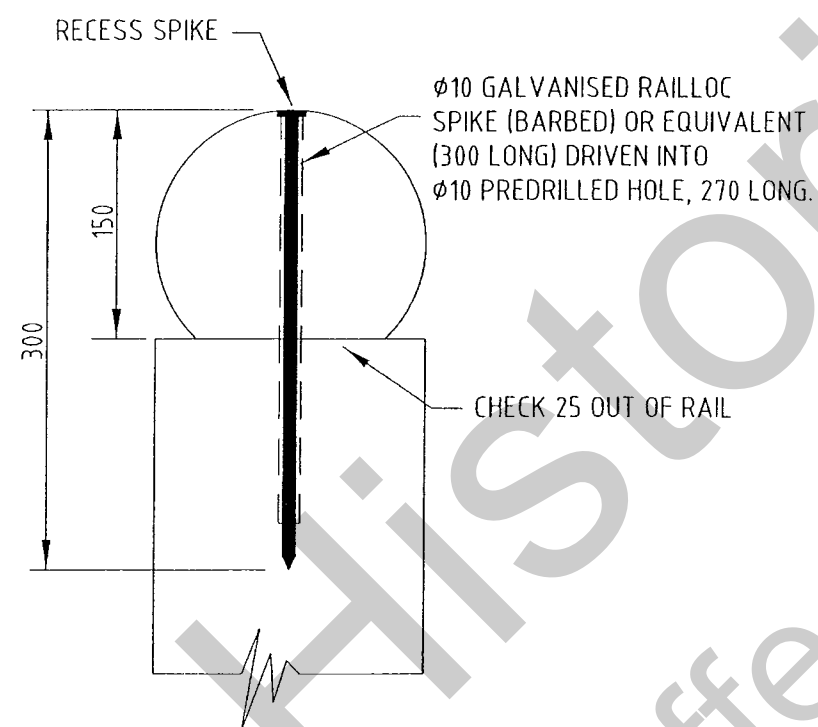
NOTES:

- GATE POSTS TO BE CONTINUOUS LENGTHS GALVANISED STEEL TUBE TO AS.1725.
- CORNER AND END POSTS TO BE CONTINUOUS LENGTHS 50 NB (60.3 OD, 2.3 THICK.) GALVANISED STEEL TUBE. (AS.1163 REFERS)
- INTERMEDIATE POSTS TO BE CONTINUOUS LENGTHS 40 NB (48.3 OD, 2.3 THICK.) GALVANISED STEEL TUBE. (AS.1163 REFERS)
- STANDARD COUPLINGS MAY BE USED FOR ALL CONNECTIONS.
- GALVANISED STEEL END CAPS TO BE PROVIDED TO ALL POSTS.
- CORNER POSTS ARE TO BE ADOPTED AT CHANGE IN DIRECTION.
- 1800 CHAIN WIRE TO BE HEAVY GALVANISED 2.5 THICK x 50 MESH TO AS.2423. BARB TOP, KNUCKLED BOTTOM.
- RAIL BRACING TO BE 32 NB (42.2 OD, 2.0 THICK.) STEEL TUBE. (AS.1163 REFERS)
- POSTS ARE TO BE SET VERTICALLY IN CONCRETE GRADE N25.
- CABLES ARE TO BE FORMED FROM TWO $\phi 3.15$ WIRES TWISTED TOGETHER OR ONE STRAND 4 THICK HEAVY GALVANISED SPIRAL.
- ALL POSTS, STAYS AND CABLES ARE TO BE GALVANISED IN ACCORDANCE WITH AS/NZS 4680.
- CHAIN WIRE TO BE FIXED USING HEAVY GALVANISED 1.6 WIRE TIES OR EQUIVALENT AS FOLLOWS:
 - INTERMEDIATE POSTS AT 3 LOCATIONS.
 - END POSTS AT 3 LOCATIONS.
 - HORIZONTAL CABLE AT 375 CENTRES TO TOP CABLE.
 - HORIZONTAL CABLE AT 600 CENTRES TO MIDDLE CABLE.
 - HORIZONTAL CABLE AT 450 CENTRES TO BOTTOM CABLE.
- BRACING PANELS TO BE PROVIDED AT ALL CHANGES IN DIRECTION AND EVERY 150m ON STRAIGHT ALIGNMENTS.
- 900mm, 1200mm, 2400mm & 2800mm HEIGHTS MAY BE USED SUBJECT TO COUNCIL APPROVAL.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	STANDARD DRAWING				
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			CHAIN WIRE FENCING				
			G:\Standard Drawings\RCC\Footpaths							SURV'D.	CHK'D.			1.8m HIGH				
										DRN.	APP'D.			A				
														SHEET 1 of 1		59503		




SECTIONAL ELEVATION

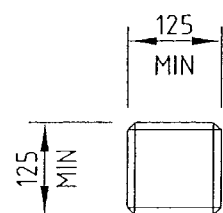
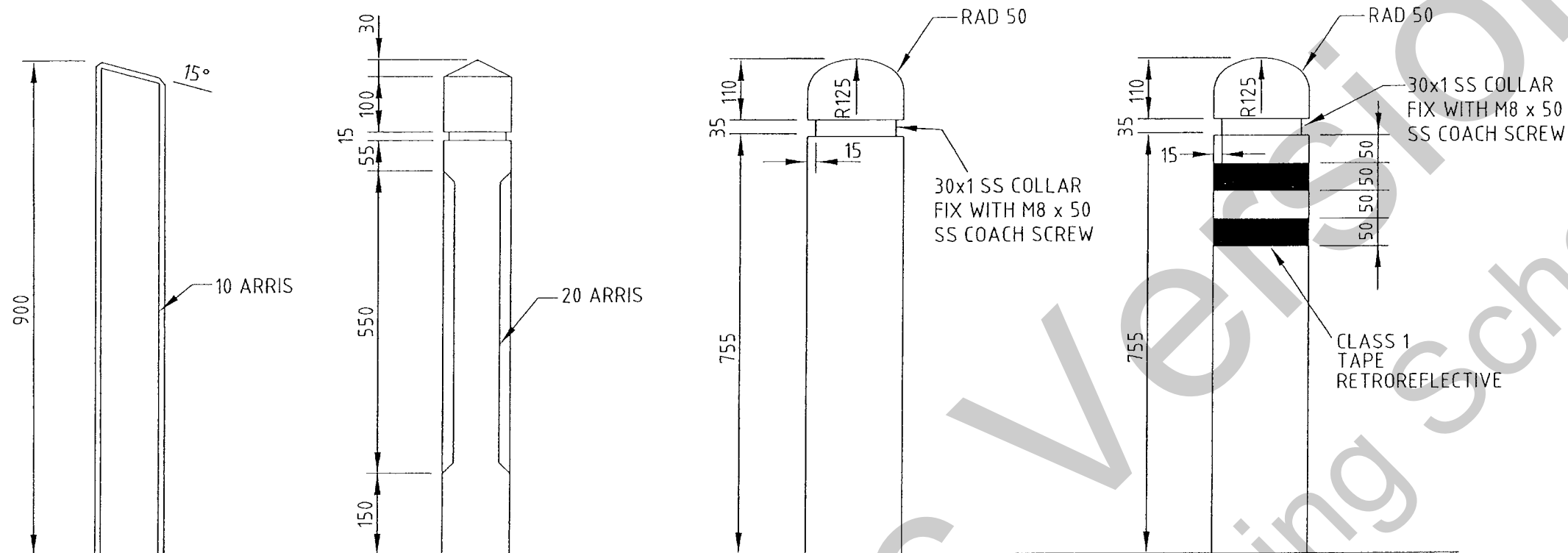


DETAIL 'A'

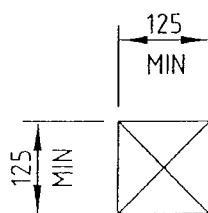
NOTES:

1. ALL CONCRETE TO BE GRADE N25.
2. LOG BARRIERS INCLUDING POSTS TO BE 175 DIAMETER. (OR TO MATCH EXISTING AS DIRECTED BY COUNCIL)
3. PAINT ALL CUT TIMBER SURFACES WITH CUPRINOL OR EQUIVALENT.
4. AT BIKEWAY SLOWDOWN DEVICES, A CONTINUOUS RAIL SHALL BE PROVIDED.
5. ALL TIMBER TO BE CCA TREATED TO LEVEL H4 (AS1604).
6. CHECK FOR ANY SERVICE LOCATIONS PRIOR TO BORING POST HOLES.
7. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

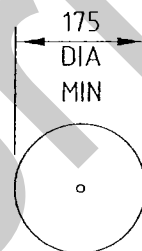
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	STANDARD DRAWING				
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			LOW PROFILE LOG BARRIER FENCING				
			G:\Standard Drawings\REC\Roads											500 HIGH				
											SURV'D.:	CHK'D.:						
											DRN.:	APP'D.:						
													A				SHEET 1 of 1	59504



TYPE A



TYPE B



TYPE C




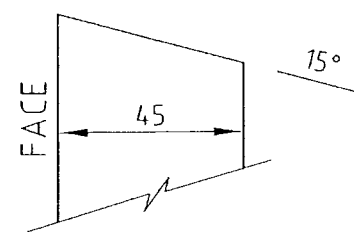
TYPE D

BOLLARDS

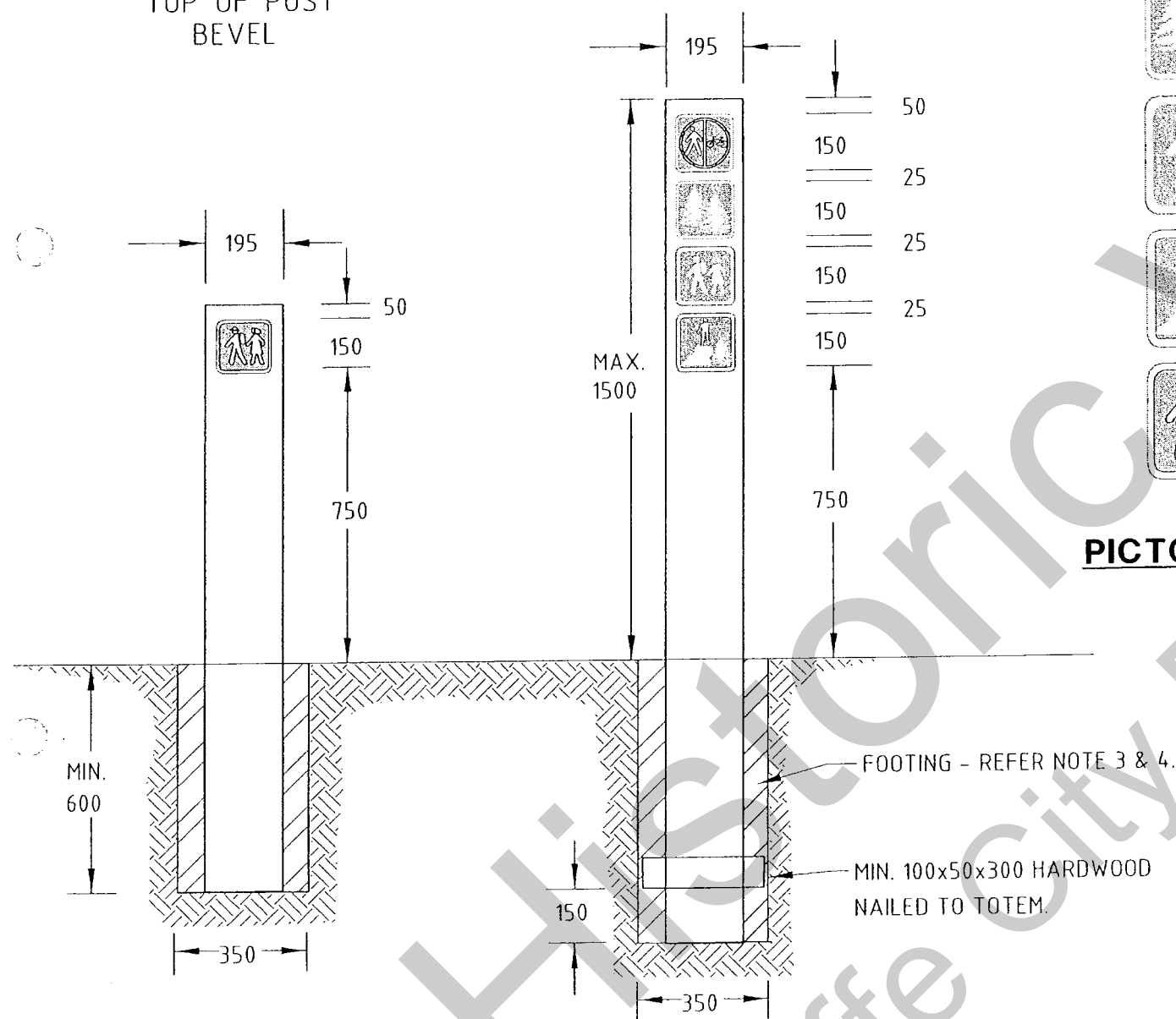
NOTES:

- BOLLARDS TO BE PAINTED WITH TWO COATS OF TWO PACK 125 MICRON MINIMUM TOTAL THICKNESS (eg WATTYL PARACRYL OR EQUIVALENT PROCESS). COLOUR TO MATCH COLORBOND "MIST GREEN".
- TIMBER TO BE MINIMUM ROUGHER HEADER FINISH, CCA TREATED TO H4 (AS1604) CLASS 1 APPEARANCE GRADE.
- BOLLARDS TO BE 1400 MINIMUM LENGTH WITH 500 TO BE IN GROUND.
- POST HOLES TO BE 350 DIA AND 500 MIN DEPTH.
- FOOTING IN SAND - N25 CONCRETE WITH WEATHER OFF TOP.
- FOOTING IN CLAY - N25 CONCRETE WITH WEATHER OFF TOP OR RAMMED EARTH.
- BOLLARDS ARE FOR VISUAL GUIDE POSTING OR FENCING ONLY AND HAVE NOT BEEN DESIGNED FOR VEHICLE IMPACT PROTECTION.
- VARIATION TO TYPE MUST BE APPROVED BY COUNCIL'S INFRASTRUCTURE OWNER.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	STANDARD DRAWING					
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			TIMBER BOLLARDS					
			G:\Standard Drawings\RCC\Parks								SURV'D.:	CHK'D.:							
											DRN.:	APP'D.:							



TOP OF POST
BEVEL



TOTEM POST

SAMPLE
ONLY



PICTOGRAMS

NOTES:

1. POST TO BE PAINTED WITH TWO COATS OF TWO PACK 125 MICRON MINIMUM THICKNESS (eg WATTYL PARACRYL OR EQUIVALENT PROCESS). COLOUR TO MATCH COLORBOND "MIST GREEN".
2. POSTS TO BE 195x45 ROUGHER HEADER FINISH, CCA TREATED TO LEVEL H4 (AS1604), CLASS 1, APPEARANCE GRADE.
3. FOOTING IN SAND - N25 CONCRETE WITH WEATHER OFF TOP.
4. FOOTING IN CLAY - N25 CONCRETE WITH WEATHER OFF TOP OR RAMMED EARTH.
5. PICTOGRAMS TO BE 150x150x6 THICK, ALUMINIUM SHEETING WITH 10 RADIUS CORNERS, CORNERS FIXED TO POSTS WITH LIQUID NAILS AND ANTI-VANDAL SCREWS MAX 4 SIGNS PER POST FACE.
6. SYMBOLS TO BE FROM THE INTERNATIONAL SYMBOL RANGE, COLOUR BLUE & WHITE IN SIGN QUALITY.
7. THE PRINTED IMAGE IS TO BE EMBEDDED IN THE ANODIC LAYER (NOT SCREEN PRINTED ON METAL SURFACE) TO PROVIDE SCRATCH RESISTANCE.
8. THE IMAGE IS NOT TO BE EFFECTED BY MOST INDUSTRIAL SOLVENTS (EMBEDDED IN ANODIC LAYER), AND THEREBY GRAFFITI PROOF.
9. THE PRINTED METAL FACE IS TO BE ANODISED ALUMINIUM WITH A CLEAR ANODIC COATING FOR THE FOLLOWING METAL THICKNESSES:-

0.3mm AND 0.5mm METAL	15-18 MICRONS
1.0, 1.5, 2.0, AND 3.0mm METAL	18-20 MICRONS.

SURVEY
BOOKS

COMPUTER DETAILS

FILE NAME	DATE	BACKUP LOCATION	DATE
		G:\Standard Drawings\RCC\Parks	

No.

AMENDMENTS AND ISSUES

A

ORIGINAL ISSUE

BY

DATE

DATUM

A.H.D.

SCALE

As Shown

SURV'D.

CHK'D.

DRN.

APP'D.

REDCLIFFE

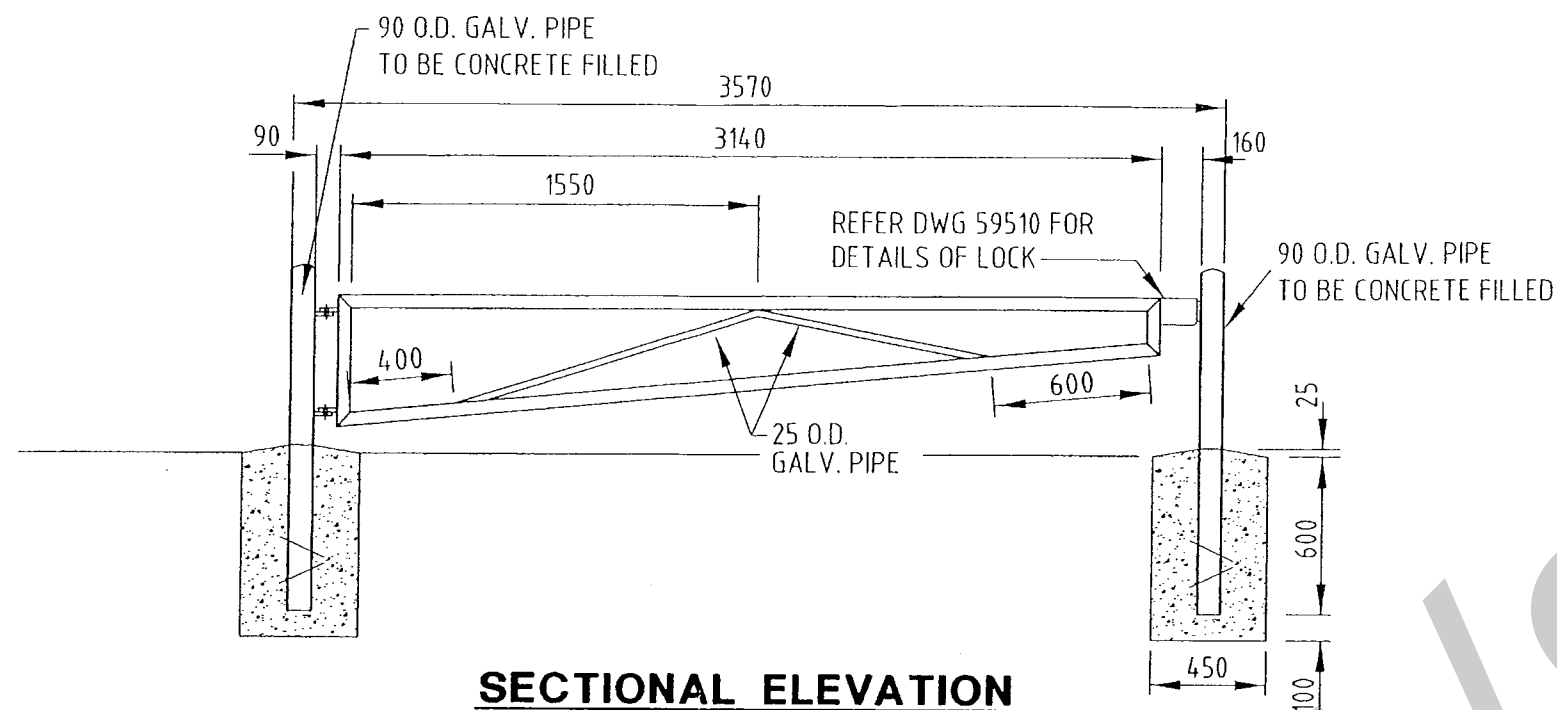
CITY COUNCIL

STANDARD DRAWING
TOTEM POST AND PICTOGRAMS

A

SHEET 1 of 1

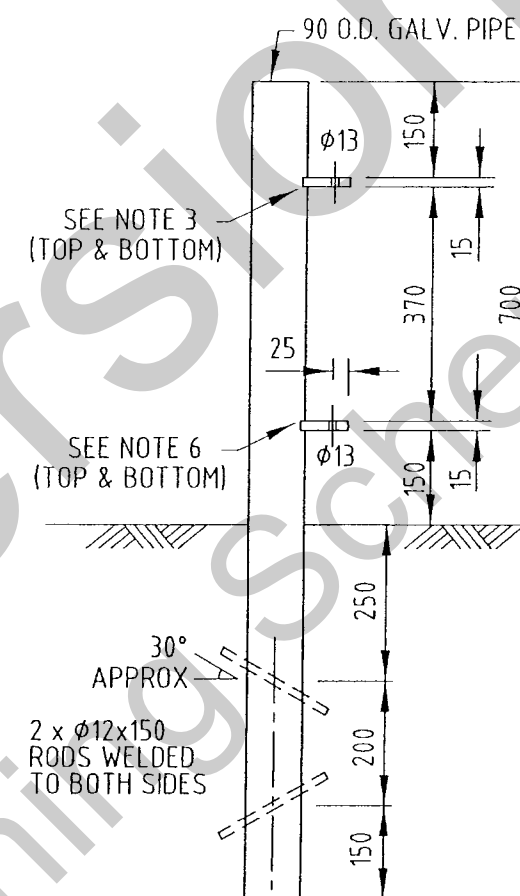
59506



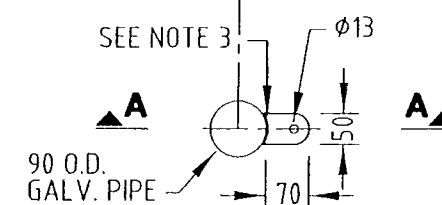
SECTIONAL ELEVATION

NOTES:

1. ALL CONCRETE TO BE GRADE N25.
2. GATE TO BE MOUNTED TO POST WITH TWO M12 GALVANISED STEEL BOLTS 40 LONG SUITABLY BURRED AFTER ERECTION.
3. HINGE LUGS TO BE 6 FILLET WELDED TO POST AND GATE PRIOR TO ERECTION.
4. ALL END AND MITRE JOINTS TO BE BUTT WELDED ALL AROUND.
5. ALL PIPES TO BE MEDIUM GAUGE HEAVY GALVANISED FINISHED WITH TWO COATS OF TWO PACK 125 MICRON MINIMUM TOTAL THICKNESS (eg WATTYL PARACRYL OR EQUIVALENT PROCESS). COLOUR TO MATCH COLORBOND "CAULFIELD GREEN".
6. ALL WELDS AND BARE METAL TO BE THOROUGHLY CLEANED AND PAINTED WITH COLD GALVANISING PRIMER PRIOR TO FINISH COAT.
7. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

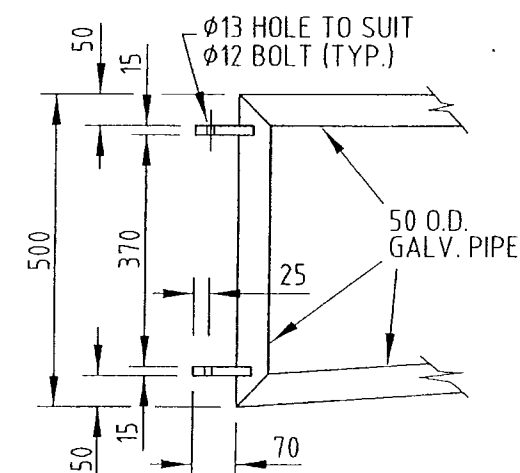


SECTION A-A

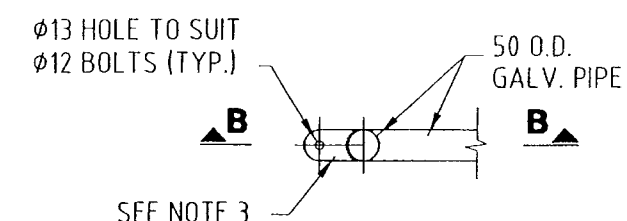


PLAN

POST HINGE DETAILS




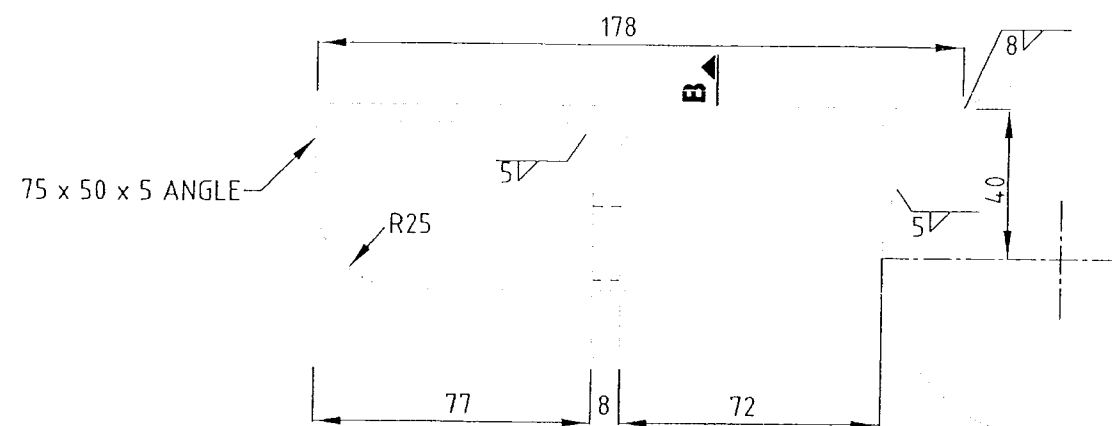
SECTION B-B



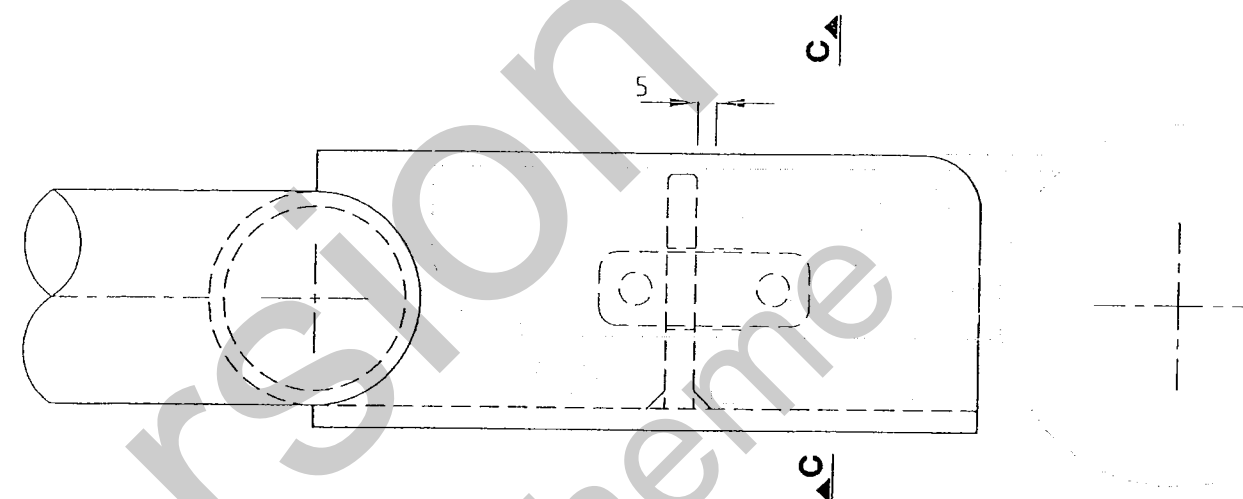
PLAN

GATE HINGE DETAILS

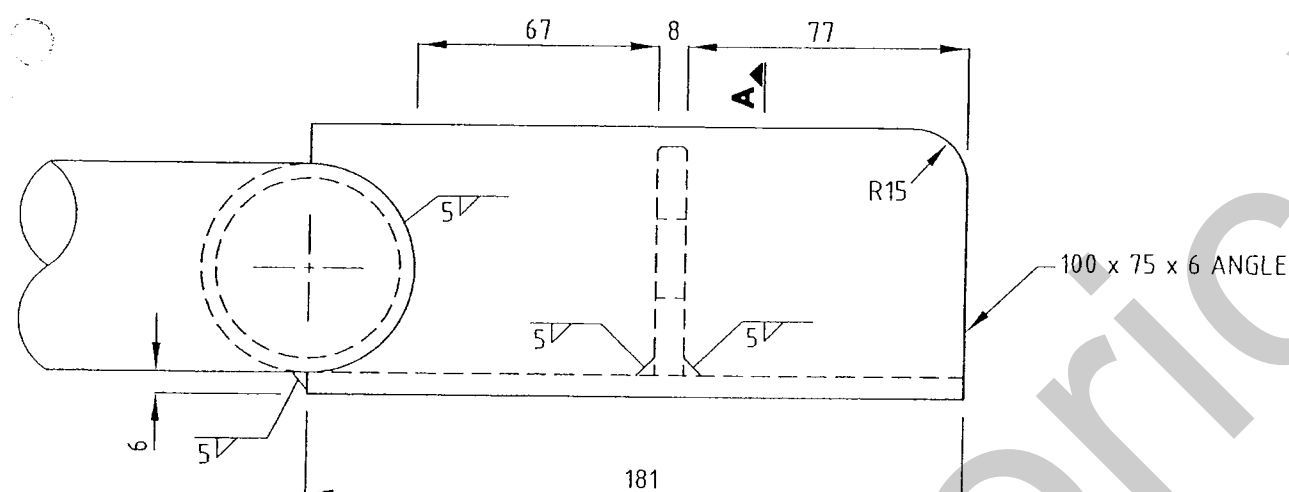
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING					
	FILE NAME	DATE	BACKUP LOCATION		DATE	A	ORIGINAL ISSUE			SCALE	As Shown			PARK GATE					
			G:\Standard Drawings\REC\Parks							SURV'D.:	CHK'D.:								
										DRN.:	APP'D.:								
													A					SHEET 1 of 1	59509



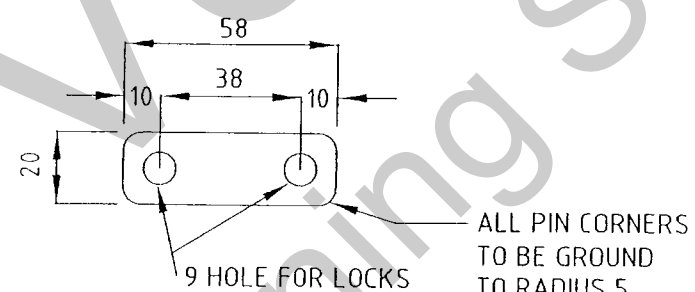
PLAN - POST MOUNTING



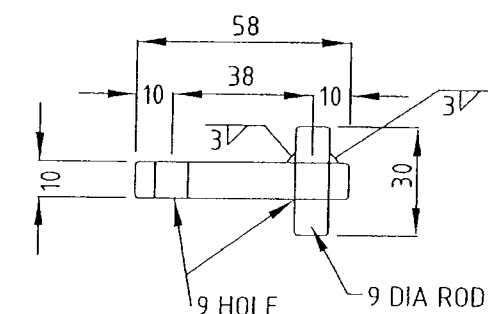
PLAN - GATE CLOSED



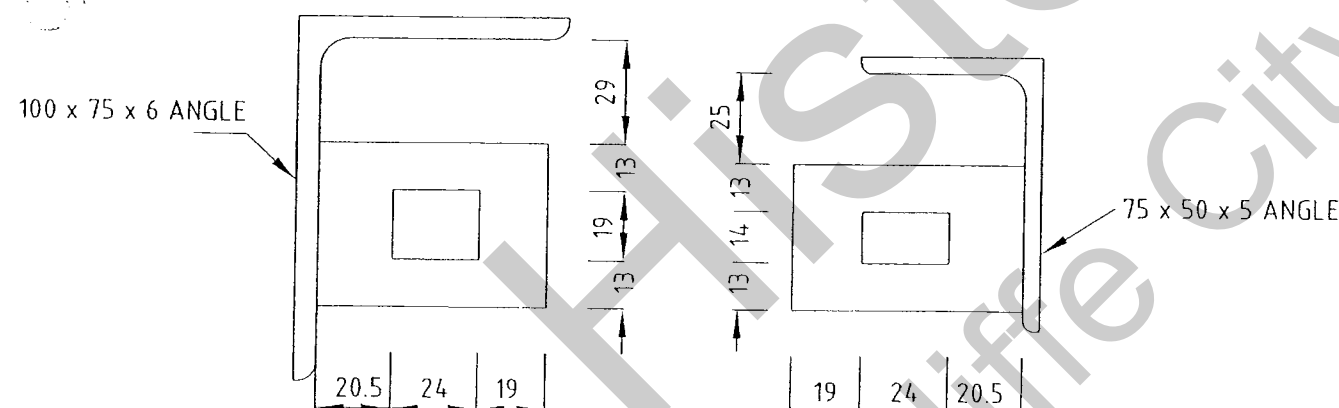
PLAN - GATE MOUNTING



PLAN - LOCK PIN - DOUBLE

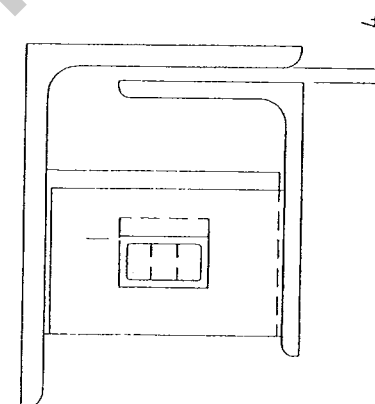


ELEVATION - LOCK PIN - SINGLE



SECTION A-A

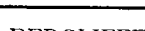
SECTION B-B

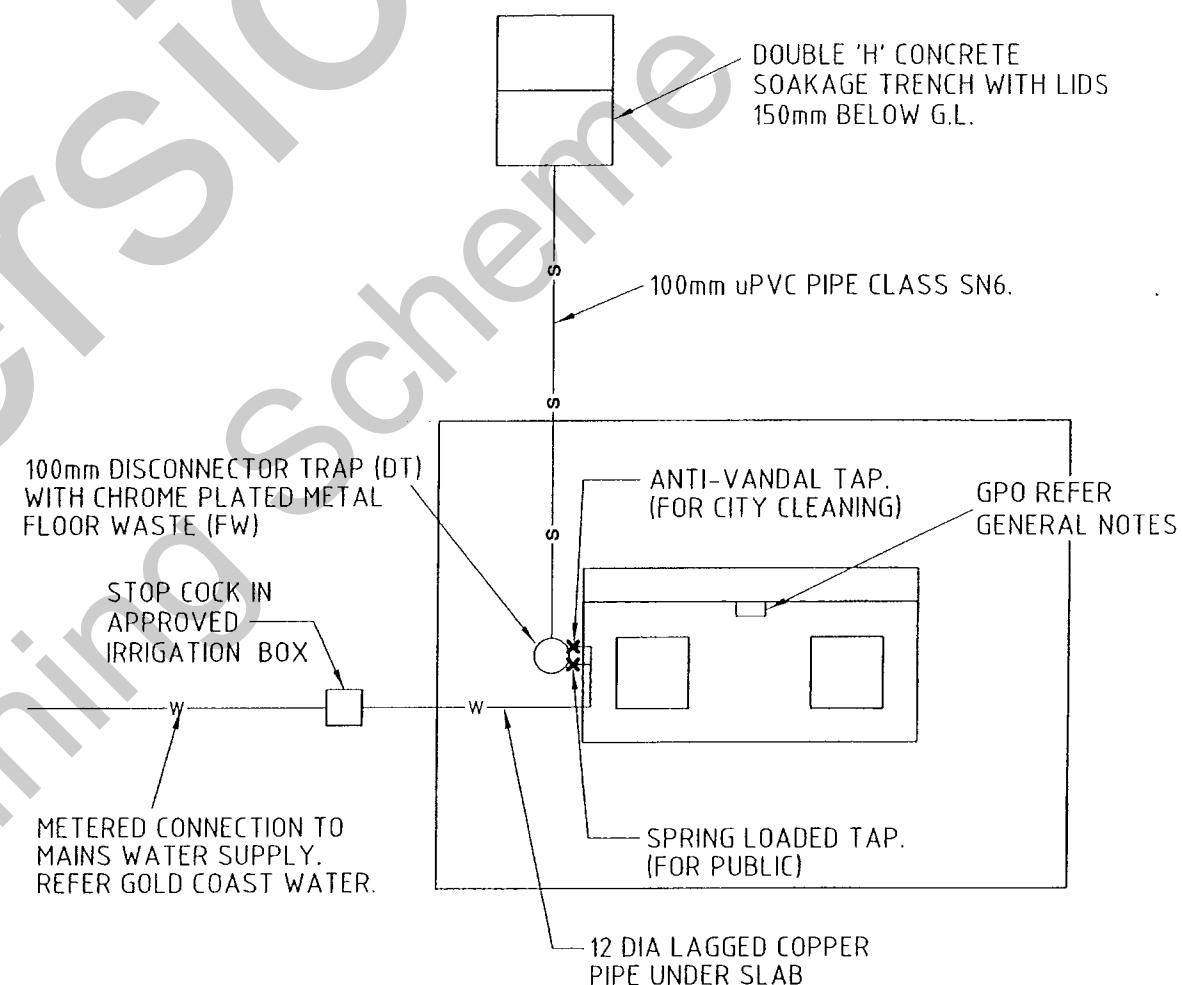


SECTION C-C

NOTES

1. ALL WELDS AND BARE METAL TO BE THOROUGHLY CLEANED AND PAINTED WITH COLD GALVANISING.
2. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.
3. ALL MATERIALS TO BE GALVANISED MILD STEEL.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING						
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			LOCKING DEVICE FOR						
			G:\Standard Drawings\RCC\Park							SURV'D.:	CHK'D.:			PARK GATE DUAL LOCKS						
										DRN.:	APP'D.:									
														A					SHEET 1 of 1	59510



GENERAL NOTES


- S.S. SWITCHBOARD SIMILAR TO B&R 1M/ECB AS DIRECTED AND CONNECTION TO MAINS POWER SUPPLY.
- D A CHRISTIE BBQ MODEL No. 005/15PB OR APPROVED EQUIVALENT WITH GALVANISED FRAME AND DOOR INCLUDING FAT TRAY.
- S.S. BENCH TOP D A CHRISTIE MODEL No. SSBT/2 WITH TURNED UP REAR OR APPROVED EQUIVALENT.
- WEATHERPROOF DOUBLE GPO ON EXTERNAL BRICKWORK WITH RCD E.G. CLIPSAL 56C310 RC OR APPROVED EQUIVALENT.

CONCRETE SLAB DETAILS

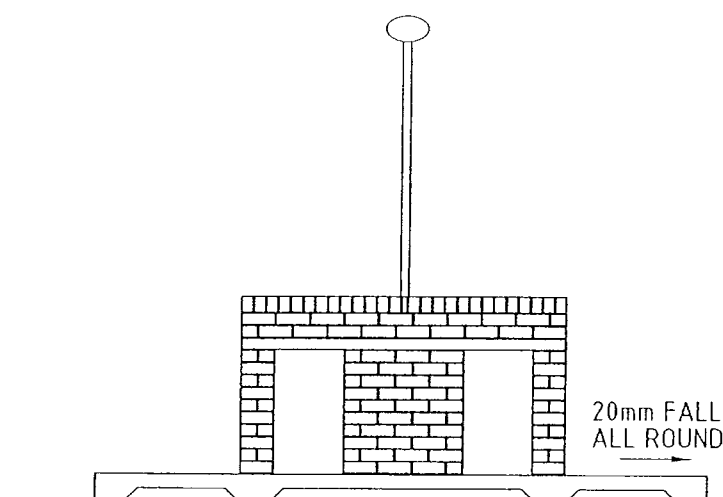
- CONCRETE SLAB 100mm MIN. THICK - F72 MESH - CENTRAL.
- 200mm MIN. THICKENING UNDER BRICKWORK AND EDGE OF SLAB..
- FALL CONCRETE TO FLOOR WASTE (FW) - MIN. 1:20 AND AWAY FROM BBQ.
- FINISH SLAB ABOVE GROUND LEVEL AND LANDSCAPE TO FALL GROUND AWAY FROM BBQ.

PLUMBING AND DRAINAGE PLAN

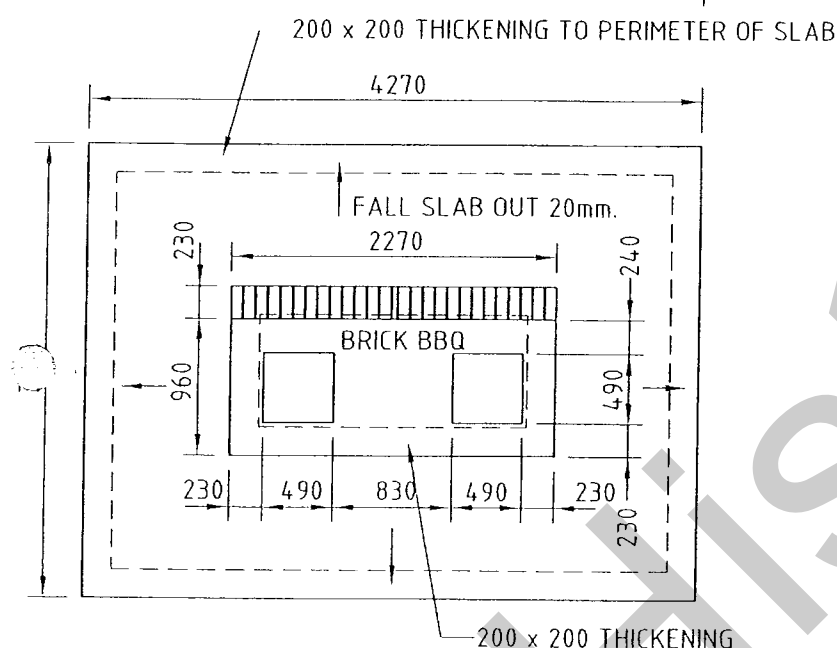
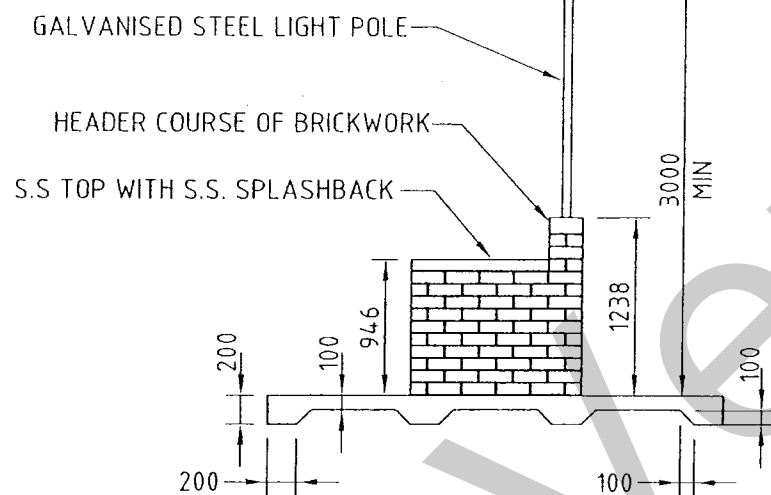
- ALL PIPEWORK IN ACCORDANCE WITH A.S.3500 NATIONAL PLUMBING CODE.
- PLACE WHIZ-BANGER THROUGH BRICKWORK.
- CLIP PIPEWORK TO INSIDE OF WALL.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING				
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			BRICK BARBEQUE				
			G:\Standard Drawings\RRCC\Parks							SURV'D.	CHK'D.			SINGLE PLATE				
										DRN.	APP'D.							
													A				SHEET 1 of 1	59511

PLAN



FRONT ELEVATION

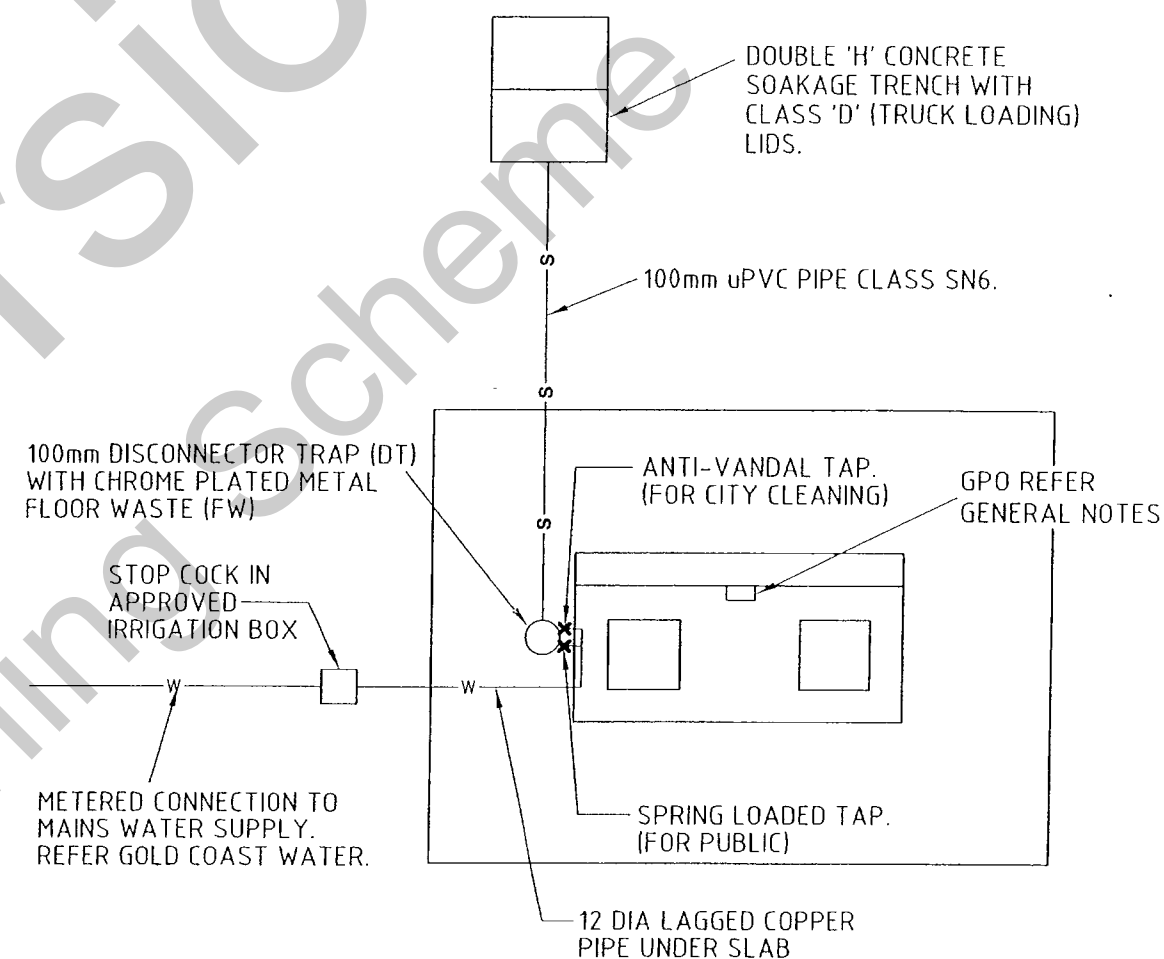
SYLVANIA B2001 LIGHT FITTING _____
125 WATT MERCURY VAPOUR WITH P.E. CELL

END ELEVATION

GENERAL NOTES

- S.S. SWITCHBOARD SIMILAR TO B&R 1M/ECB AS DIRECTED AND CONNECTION TO MAINS POWER SUPPLY.
- D A CHRISTIE BBQ MODEL No. 005/15PB OR APPROVED EQUIVALENT WITH GALVANISED FRAME AND DOOR INCLUDING FAT TRAY.
- S.S. BENCH TOP D A CHRISTIE MODEL No. SSBT/2 WITH TURNED UP REAR OR APPROVED EQUIVALENT.
- WEATHERPROOF DOUBLE GPO ON EXTERNAL BRICKWORK WITH RCD E.G. CLIPSAL 56C310 RC OR APPROVED EQUIVALENT.
- LIGHT POLE TO BE HEAVY GALVANISED AND FINISHED WITH TWO COATS OF TWO PACK 125 MICRON MINIMUM TOTAL THICKNESS (eg WATTYL PARACRYL OR EQUIVALENT PROCESS). COLOUR TO MATCH COLORBOND "MIST GREEN".

NOTE: DO NOT INSTALL SOAKAGE TRENCHES IN VEHICULAR TRAFFIC AREAS.




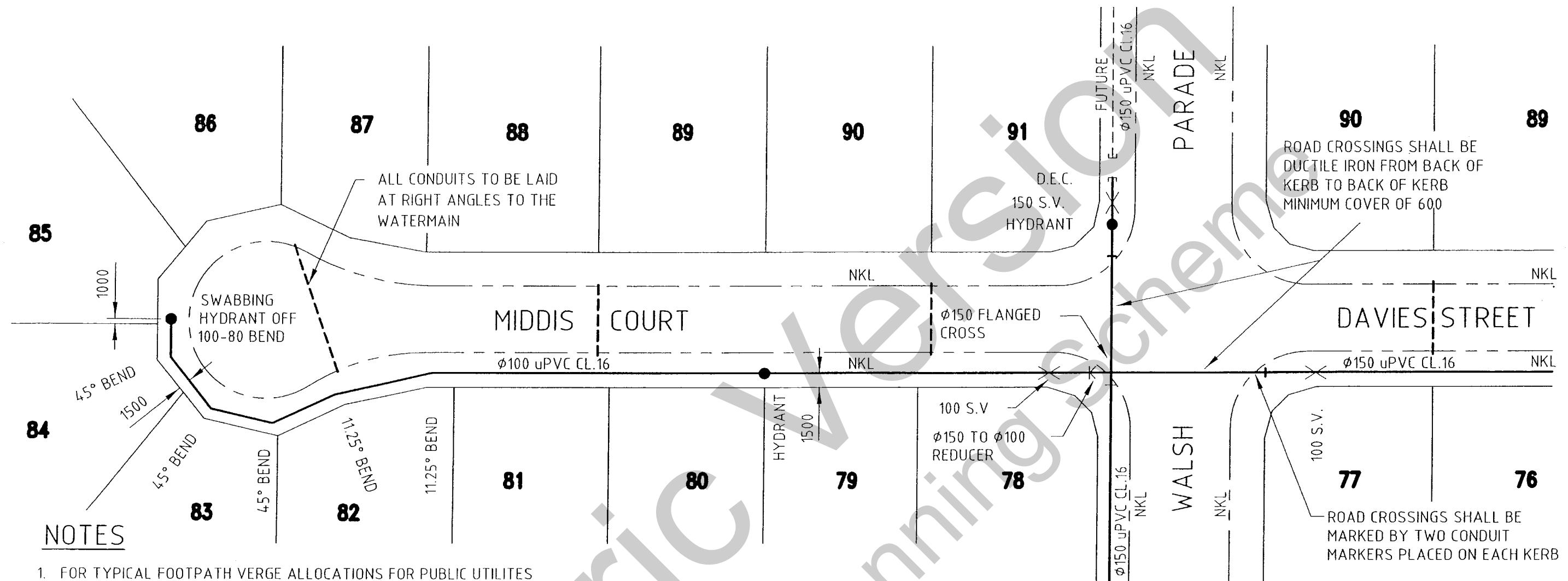
PLUMBING AND DRAINAGE PLAN

- ALL PIPEWORK IN ACCORDANCE WITH A.S.3500 NATIONAL PLUMBING CODE.
- PLACE WHIZ-BANGER THROUGH BRICKWORK.
- CLIP PIPEWORK TO INSIDE OF WALL.

CONCRETE SLAB DETAILS

- CONCRETE SLAB 100mm MIN. THICK - F72 MESH - CENTRAL.
- 200mm MIN. THICKENING UNDER BRICKWORK AND EDGE OF SLAB..
- FALL CONCRETE TO FLOOR WASTE (FW) - MIN. 1:20 AND AWAY FROM BBQ.
- FINISH SLAB ABOVE GROUND LEVEL AND LANDSCAPE TO FALL GROUND AWAY FROM BBQ.

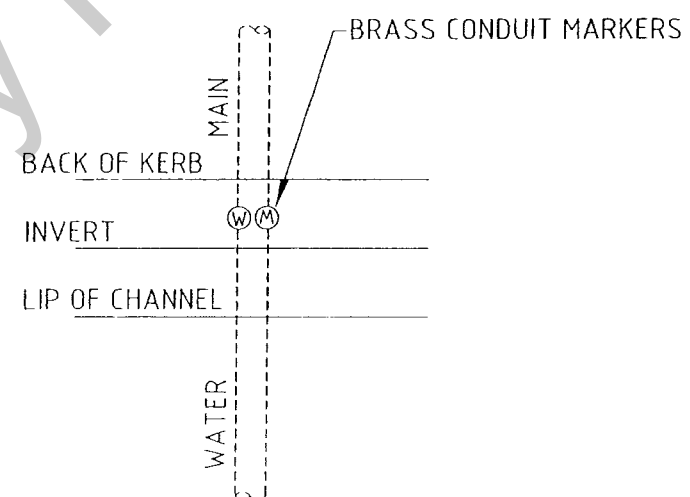
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	STANDARD DRAWING					
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE			SCALE	As Shown									
			G:\Standard Drawings\REC\Parks						SURV'D.	CHK'D.									
									DRN.	APP'D.									
													A					SHEET 1 of 1	59512



TYPICAL LAYOUT PLAN

NOTES

- FOR TYPICAL FOOTPATH VERGE ALLOCATIONS FOR PUBLIC UTILITIES REFER TO G.C.C.C. STD. DWG. NO. 59205.
- THE MAXIMUM DISTANCE BETWEEN HYDRANTS SHALL BE 80m.
- A HYDRANT SHALL BE PROVIDED AT THE END OF ALL LINES OTHER THAN FUTURE TAKE OFF POINTS. FOR HYDRANT DETAILS REFER R.C.C. STD. DWG. NO'S 59607 AND 59609.
- STOP VALVES SHALL BE LOCATED AT THE TANGENT POINTS OF PROPERTY BOUNDARY TRUNCATIONS AND WHERE INDICATED ON THE APPROVED ENGINEERING DRAWINGS UNLESS DIRECTED OTHERWISE BY THE SUPERINTENDENT.
- SECTION VALVES SHALL BE PROVIDED IN LOCATIONS DETERMINED BY COUNCIL TO SUIT STAGED CONSTRUCTION.
- PRIOR TO COMMENCING WORK ON SITE THE CONTRACTOR SHALL DETERMINE THE LOCATION OF ALL EXISTING PUBLIC UTILITIES.
- THE CONTRACTOR SHALL ENSURE THAT THE WORKS ARE CARRIED OUT IN ACCORDANCE WITH ALL REQUIREMENTS OF ACTS, REGULATIONS AND LOCAL LAWS.
- FOR TYPICAL PROPERTY SERVICE INSTALLATION DETAILS REFER R.C.C. STD. DWG. NO. 59605.
- FOR CONSTRUCTION TOLERANCES REFER COUNCIL'S STANDARD SPECIFICATION SS2.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

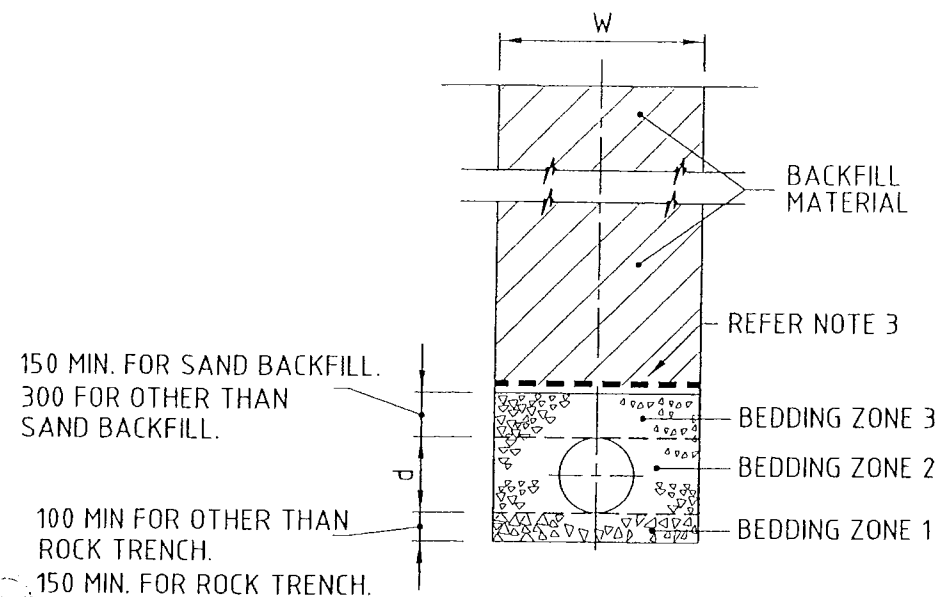


ROAD CROSSING MARKING

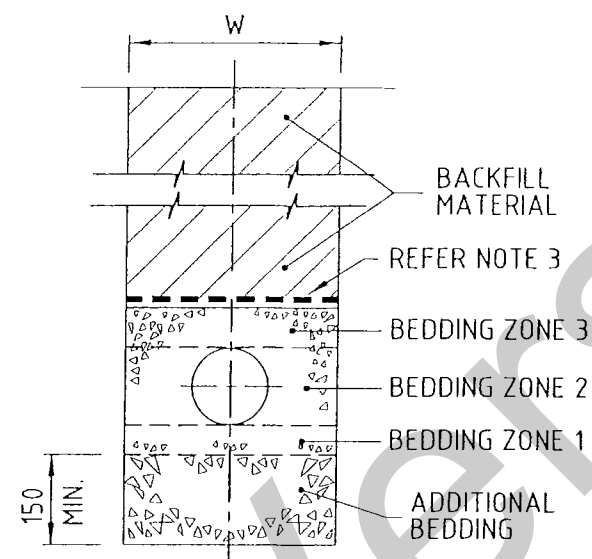
LEGEND

100Ø u.P.V.C. CL.16	WATER MAIN
150	FIRE HYDRANT
100	SERVICE CONDUIT
150	STOP VALVE
100	REDUCER PIPE
Ø150	DEAD END CAP
NKL	NOMINAL KERB LINE

SURVEY BOOKS	COMPUTER DETAILS				AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING			
	FILE NAME	DATE	BACKUP LOCATION	DATE	No.	ORIGINAL ISSUE				SCALE	As Shown		WATER RETICULATION			
			G:\Standard Drawings\RCC\Water										TYPICAL ARRANGEMENT DETAILS			
													SHEET 1 of 1			
													59601			

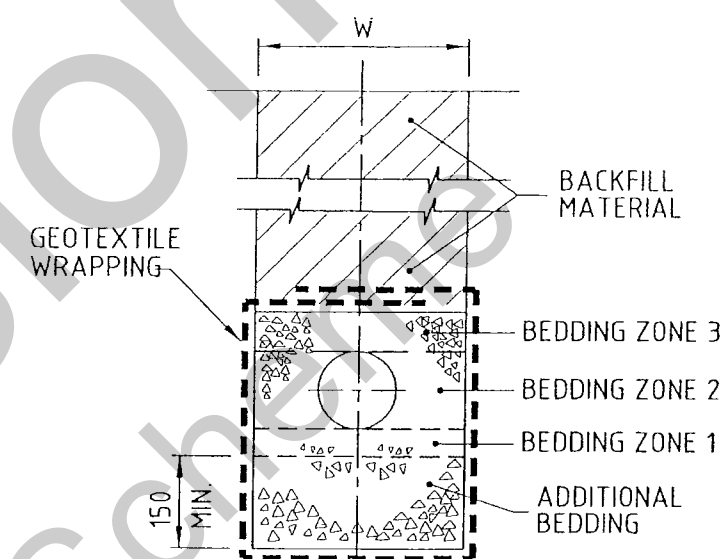


TYPE 1 CONSTRUCTION



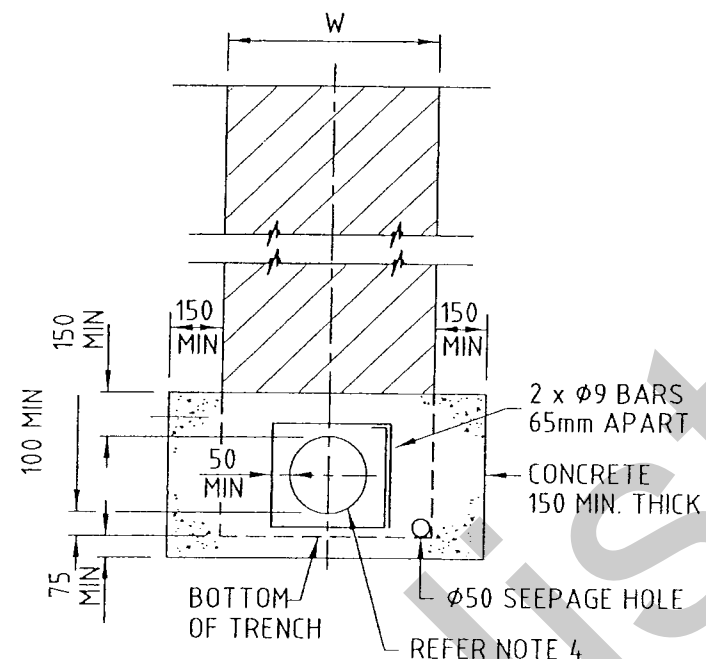
TYPE 2 CONSTRUCTION

FOR DETAILS OF BEDDING ZONES 1, 2 AND 3
REFER TO TYPE 1 CONSTRUCTION.



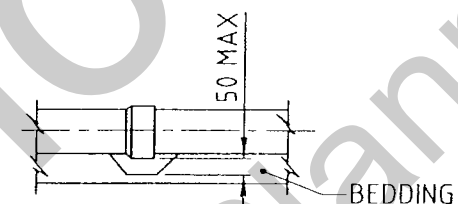
TYPE 3 CONSTRUCTION

FOR DETAILS OF BEDDING ZONES 1, 2 AND 3
REFER TO TYPE 1 CONSTRUCTION.



**CONCRETE BULKHEADS
MAINS AND TAPERS**

REFER NOTE 2



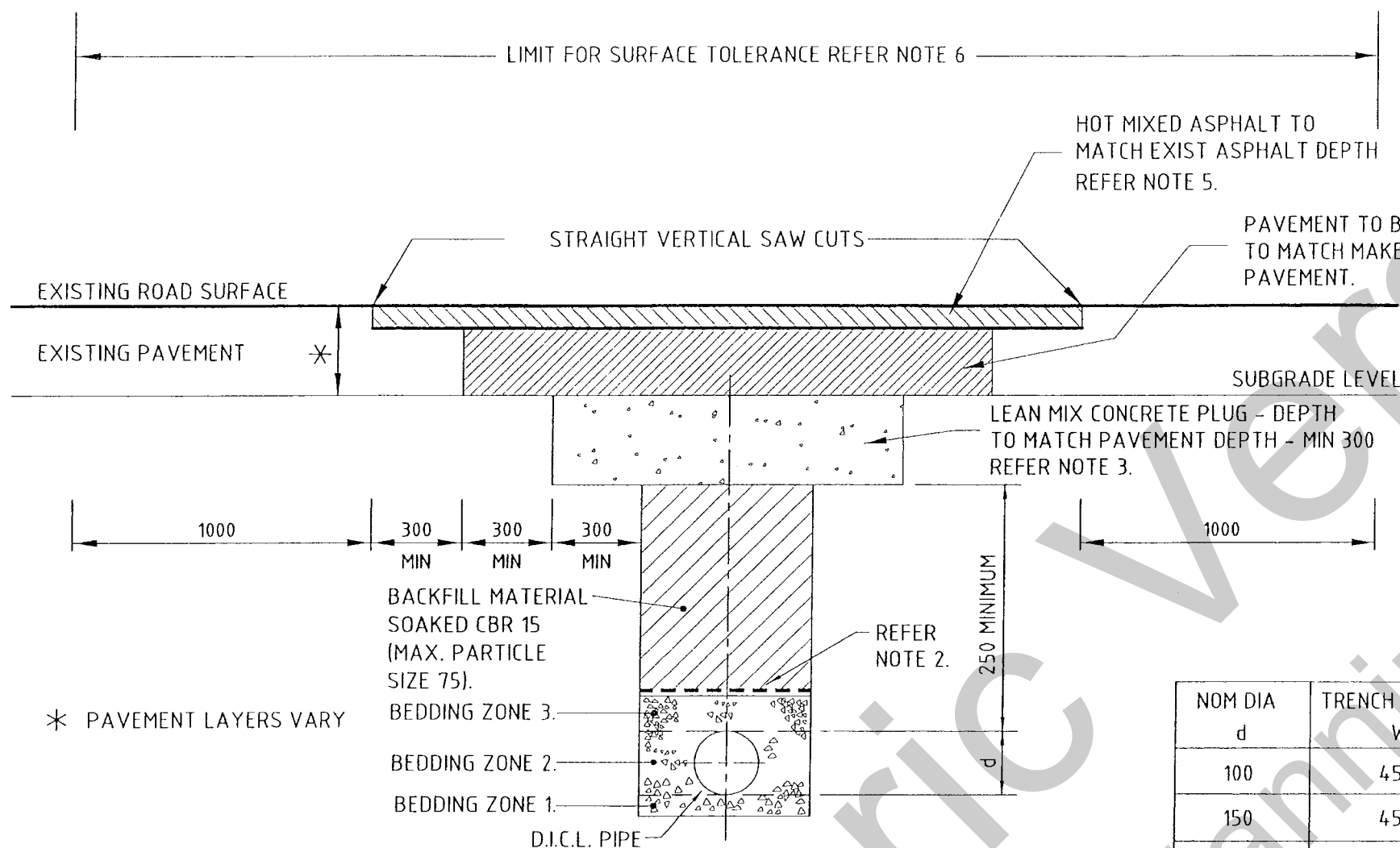
HAND HOLES

NOM. DIA d	TRENCH WIDTH W
100	450
150	450
225	600
300	750

NOTES:

- FOR EXCAVATION, BEDDING AND BACKFILL REQUIREMENTS REFER COUNCIL'S STANDARD SPECIFICATION SS2.
- CONCRETE BULKHEADS SHALL BE SPACED AT:-
(A) 6m INTERVALS FOR Ø100 TO Ø300 PIPES WITH GRADES BETWEEN 15% AND 29%.
(B) WHERE GRADES EXCEED 29%, THE SPACING IN METRES, SHALL BE CALCULATED BY DIVIDING 100 BY THE GRADE (%).
- CONCRETE IN BULKHEADS IS TO BE GRADE N20.
- WHERE BACKFILL IS CLASSIFIED AS SAND (BY THE SUPERINTENDENT) A GEOTEXTILE BARRIER SHALL BE PROVIDED AT THE INTERFACE OF BEDDING ZONE 3 AND BACKFILL.
- THE PIPE SHALL BE PROVIDED WITH A 12 THICK COMPRESSIBLE MEMBRANE FOR THE EXTENT OF THE CONCRETE SURROUND.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

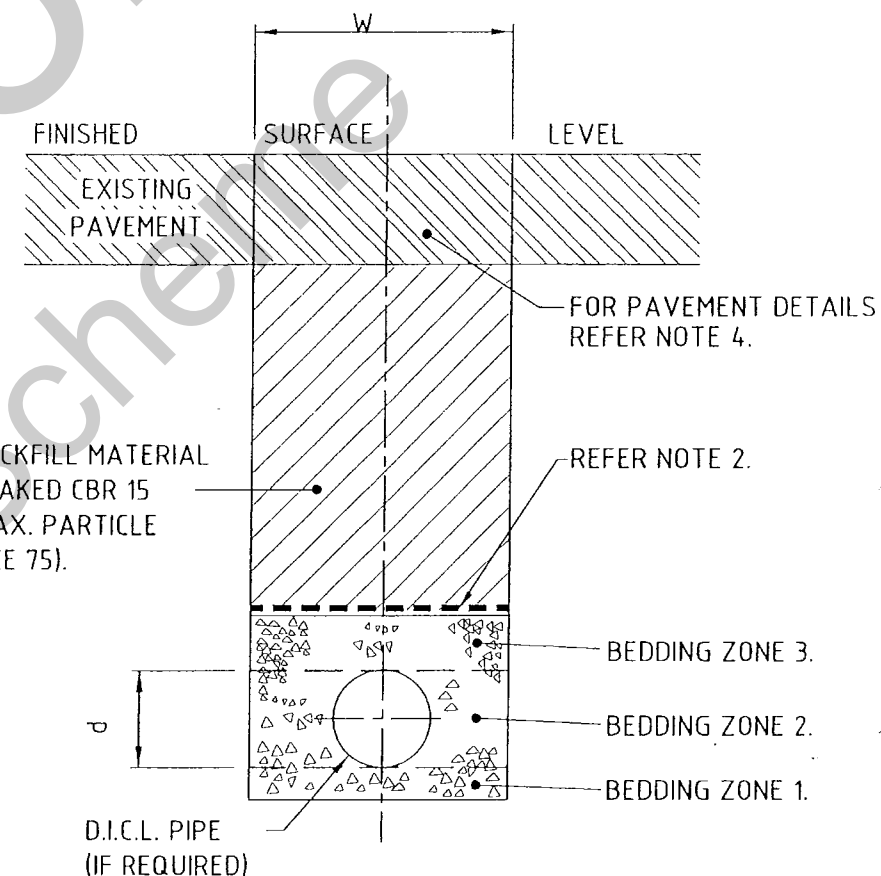
SURVEY BOOKS	COMPUTER DETAILS				No. A	AMENDMENTS AND ISSUES	BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING WATER PRESSURE MAIN GENERAL TRENCH AND BEDDING DETAILS				
	FILE NAME	DATE	BACKUP LOCATION	DATE												
			G:\Standard Drawings\RCC\Water													
												A			SHEET 1 of 1	59602



TYPE 4 CONSTRUCTION PAVEMENT CROSSING

FOR DETAILS OF BEDDING ZONES 1, 2 AND 3
REFER TO TYPE 1 CONSTRUCTION.

NOM DIA d	TRENCH WIDTH W
100	450
150	450
225	600
300	750



TYPE 5 CONSTRUCTION ALONG UNSEALED ROAD SHOULDERS

FOR DETAILS OF BEDDING ZONES 1, 2 AND 3
REFER TO TYPE 1 CONSTRUCTION.

NOTES:

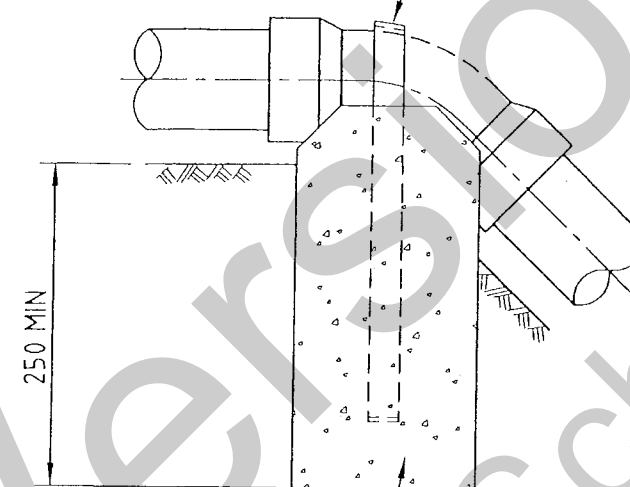
- FOR EXCAVATION, BEDDING AND BACKFILL REQUIREMENTS REFER COUNCILS STANDARD SPECIFICATION SS2.
- WHERE BACKFILL MATERIAL IS CLASSIFIED AS SAND (BY THE SUPERINTENDENT) A GEOTEXTILE BARRIER SHALL BE PROVIDED AT THE INTERFACE OF BEDDING ZONE 3 AND BACKFILL.
- THE SLAB SHALL BE GRADE N15 CONCRETE (ZERO SLUMP) PLACED IN 100 LAYERS AND COMPACTED.
- FOR PAVEMENT DETAILS REFER COUNCIL STANDARD SPECIFICATION SS7.
- THE ASPHALT SURFACING SHALL COMPLY WITH COUNCILS STANDARD SPECIFICATION SS8.
- THE DEVIATION FROM A STRAIGHT EDGE PARALLEL TO THE CENTRE LINE OF THE EXISTING ROAD SHALL NOT EXCEED 5 MILLIMETRES.
- FOR STATE CONTROLLED ROADS THE BEDDING ZONES 1, 2 AND 3 SHALL COMPLY WITH THE DETAILS ON THIS DRAWING. BACKFILL AND PAVEMENT SHALL COMPLY WITH REQUIREMENTS OF MAIN ROADS.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No. A	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING			
	FILE NAME	DATE	BACKUP LOCATION	DATE		ORIGINAL ISSUE					As Shown			WATER PRESSURE MAIN			
	G:\Standard Drawings\RCC\Water													TRENCH AND BEDDING DETAILS WITHIN EXISTING ROADS			
														SHEET 1 of 1			
												59603					

PIPE DIA.	FITTING	MAX. THRUST IN KN	THRUST BLOCK HEIGHT	SOFT CLAY 50 KPa.	MEDIUM CLAY SANDY LOAM 100KPa.	SAND & GRAVEL HARDCLAY 150KPa.	SAND & GRAVEL CEMENTED WITH CLAY 200KPa.	ROCK
100	90° BEND	22.3	400	1150	●	●	●	●
	60° BEND	15.8		800	●	●	●	●
	45° BEND	12.1		650	●	●	●	●
	22.5° BEND	6.15		●	●	●	●	●
	11.25° BEND	3.09		●	●	●	●	●
	TEE OR CLOSED END	15.8		800	●	●	●	●
150	90° BEND	47.1	450	SPECIAL DESIGN	1050	700	●	●
	60° BEND	33.3		1500	750	●	●	●
	45° BEND	25.5		1150	●	●	●	●
	22.5° BEND	13.0		●	●	●	●	●
	11.25° BEND	6.53		●	●	●	●	●
	TEE OR CLOSED END	33.3		1500	750	●	●	●
225	90° BEND	100.7	600	SPECIAL DESIGN	SPECIAL DESIGN	1150	850	700
	60° BEND	71.2		SPECIAL DESIGN	1200	800	●	●
	45° BEND	54.5		SPECIAL DESIGN	950	650	●	●
	22.5° BEND	27.8		950	●	●	●	●
	11.25° BEND	14.0		●	●	●	●	●
	TEE OR CLOSED END	71.2		SPECIAL DESIGN	1200	800	●	●
300	90° BEND	175	700	SPECIAL DESIGN	SPECIAL DESIGN	1700	1250	1050
	60° BEND	124		SPECIAL DESIGN	1800	1200	900	750
	45° BEND	95		SPECIAL DESIGN	1350	900	700	●
	22.5° BEND	48		1400	700	●	●	●
	11.25° BEND	24		700	●	●	●	●
	TEE OR CLOSED END	124		SPECIAL DESIGN	1800	1200	900	750
● INDICATES BLOCK LENGTH OF 600				THRUST BLOCK DIMENSIONS				

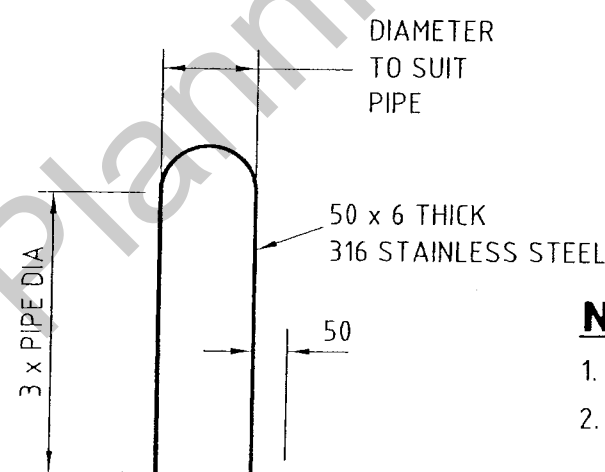
THRUST BLOCK DIMENSIONS

STAINLESS STEEL STRAP WITH 3 THICK INSERTION RUBBER BETWEEN STRAP AND BEND

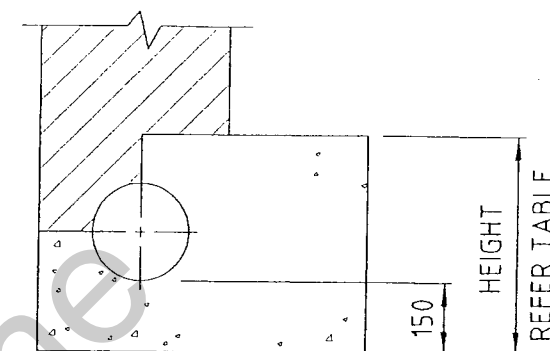


CONCRETE TO EXTEND 150 MIN INTO EACH TRENCH WALL

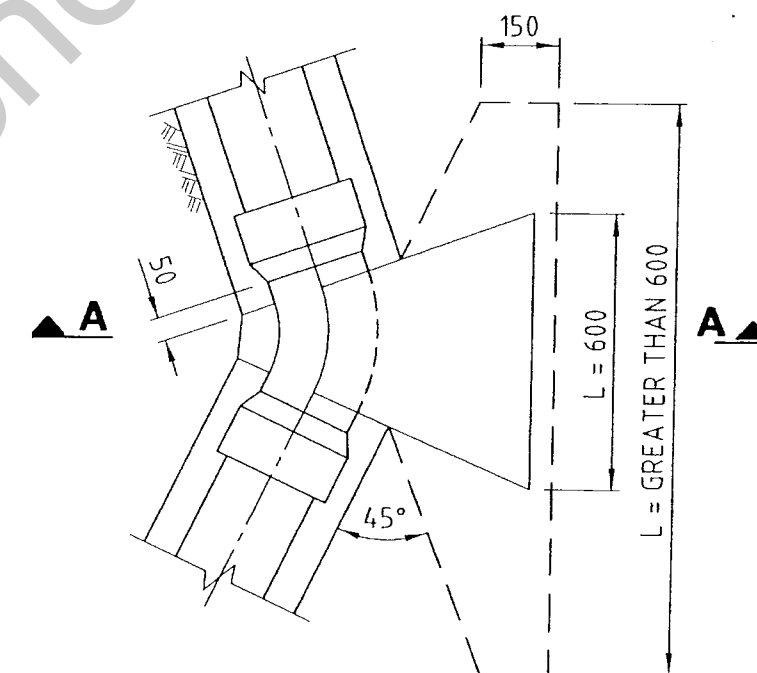
VERTICAL BENDS



SS STRAP



SECTION A-A



PLAN

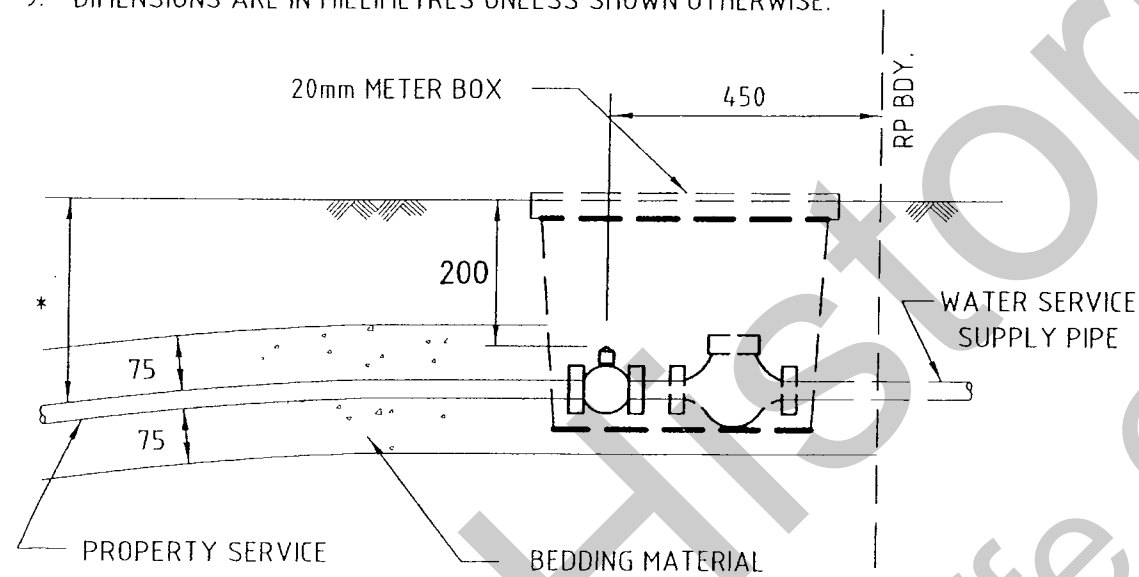
NOTES:

1. ALL CONCRETE TO BE GRADE N20.
2. THRUST BLOCKS SHALL BE CAST AGAINST THE UNDISTURBED SIDE OF THE TRENCH. KEEP CONCRETE CLEAR OF SOCKETS, FLANGES & BOLTS.
3. THE TABLE OF DIMENSIONS ASSUME A TEST PRESSURE OF 1350KPa. (135m HEAD) VARIATION FROM THE DIMENSIONS SHOWN WILL BE SUBJECT TO JUSTIFICATION BY CALCULATIONS
4. WHERE THRUST BLOCKS FOR TAPERS ARE REQUIRED REFER R.C.C. STD DWG No. 59602, CONCRETE BULKHEADS.
5. POLYETHYLENE SLEEVING SHALL COMPLY WITH THE REQUIREMENTS OF COUNCIL'S STANDARD SPECIFICATION SS2.
6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No. A	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING WATER PRESSURE MAIN THRUST BLOCK DETAILS		
	FILE NAME	DATE	BACKUP LOCATION	DATE		ORIGINAL ISSUE	SCALE				As Shown					
			G:\Standard Drawings\RCC\Water				SURV'D.				CHK'D.					
						DRN.	APP'D.									
														SHEET 1 of 1		59604

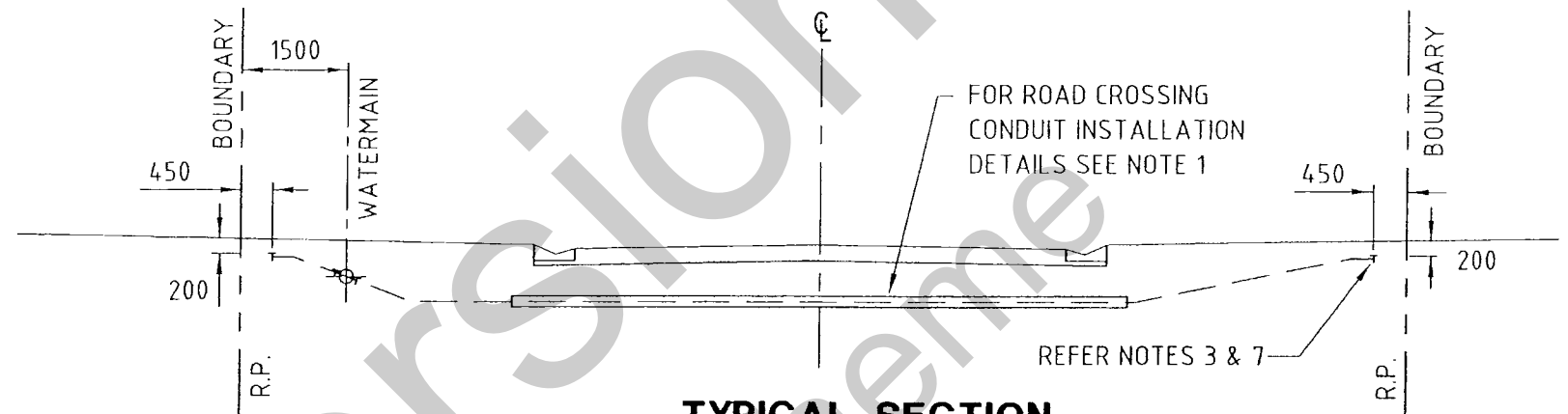
NOTES:

1. FOR PROPERTY SERVICE CONDUIT MARKER, CLASS AND INSTALLATION DETAILS REFER R.C.C. STD. DWG. NO. 59212.
2. THE PROPERTY SERVICE PRESSURE PIPE SHALL BE POLYETHYLENE TO AS/NZS 4130 SERIES 1 DN25 PN16 SDR9 PE80B.
3. BLUE MARKER TAPE SHALL BE ATTACHED TO THE WATER METER BALL VALVE. THE MARKER TAPE SHALL BE BROUGHT VERTICALLY TO THE SURFACE AND LEFT CLEARLY VISIBLE.
4. PROPERTY SERVICE STAMPED IDENTIFICATION TAG (35 MIN DIA) TAG MAY BE EITHER BRASS OR STAINLESS STEEL AND MAY BE RETAINED BY A STAINLESS STEEL PIN.
5. PROPERTY SERVICE PIPE, BALL VALVES, DUCTILE IRON PRE-TAPPED PROPERTY SERVICE FITTING AND ASSOCIATED FITTINGS SHALL BE JOINTED IN ACCORDANCE WITH THE MANUFACTURERS RECOMMENDATIONS.
6. THE MAIN TAP BALL VALVE SHALL BE LEFT IN THE FULLY OPEN POSITION.
7. THE WATER METER BALL VALVE SHALL BE LEFT IN THE FULLY CLOSED POSITION.
8. THE PROPERTY SERVICE PIPE INCLUDING THE BALL VALVE SHALL BE PERPENDICULAR TO THE FRONT RP BOUNDARY FOR THE LAST 300 OF THE PIPE.
9. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

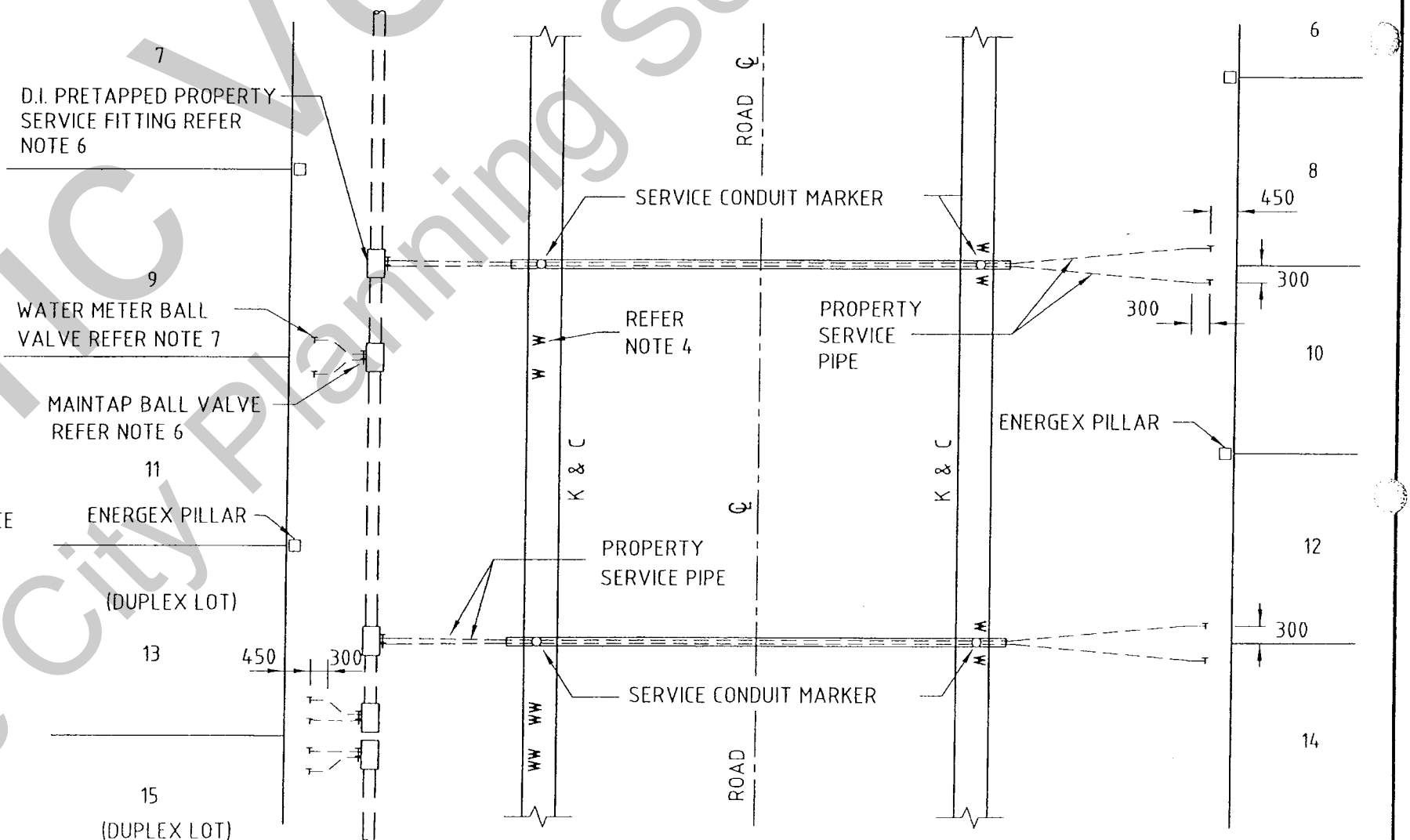


**TYPICAL 20mm WATER METER
(INSTALLATION OF BOX AND METER BY COUNCIL)**

* GRADE DOWN TO MAIN



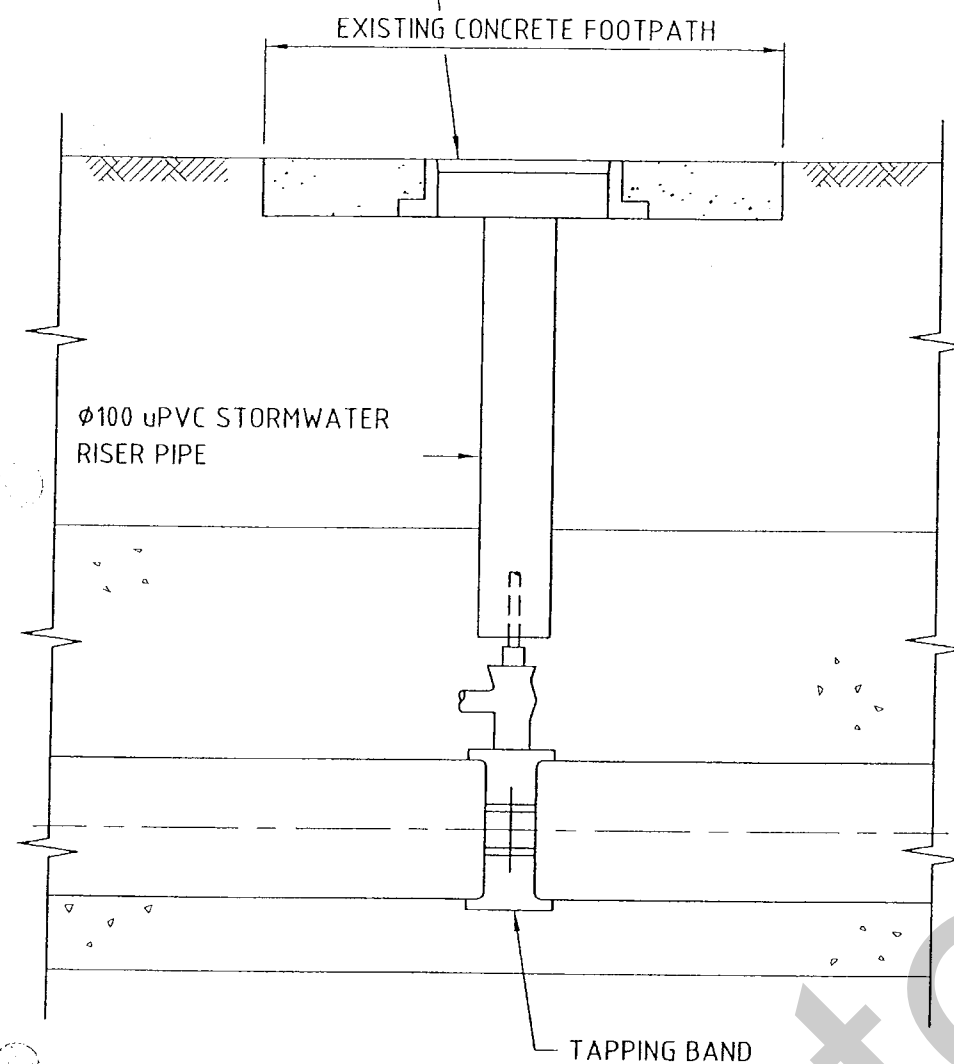
TYPICAL SECTION



PLAN

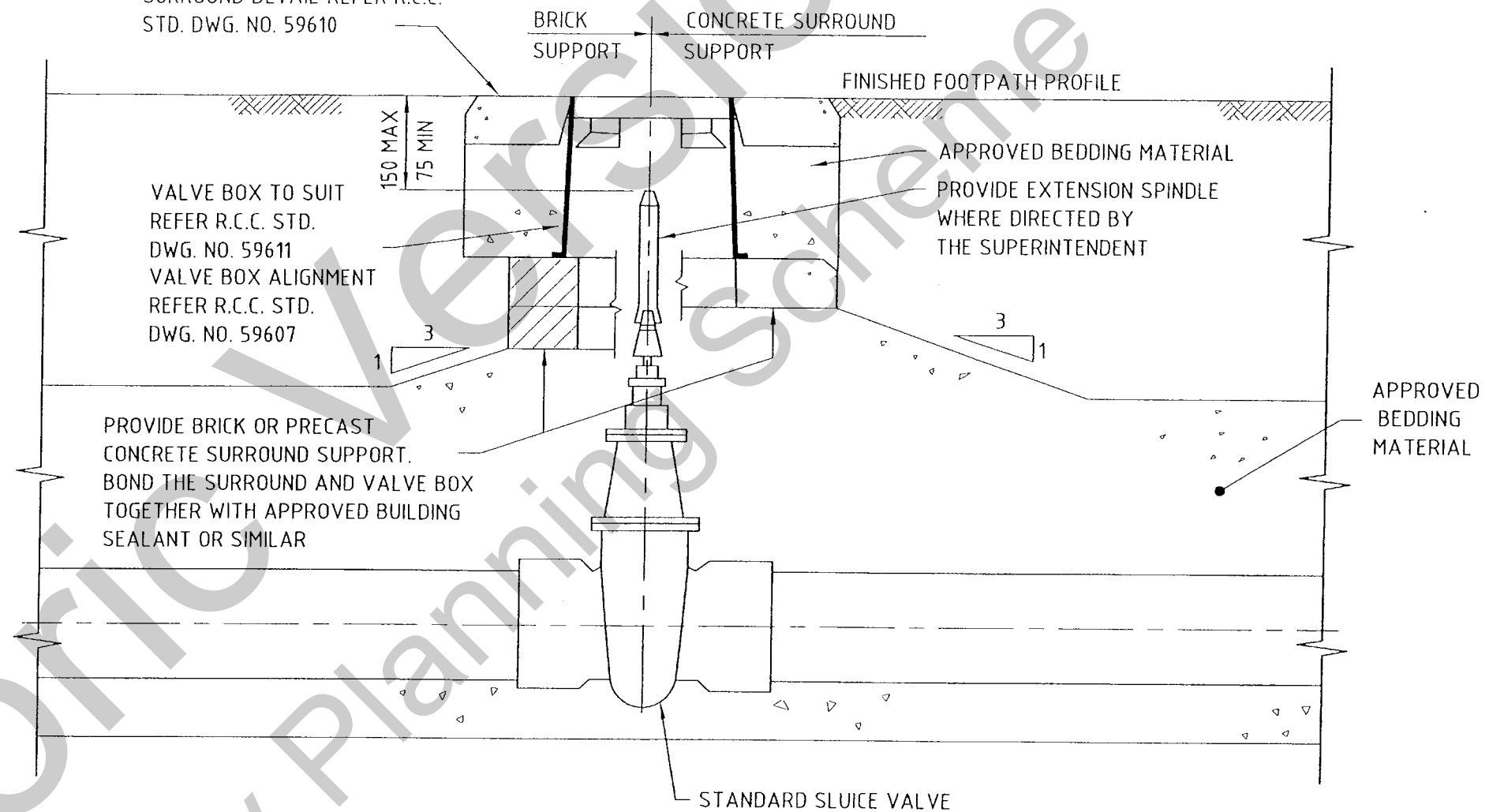
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div>CITY COUNCIL</div>	STANDARD DRAWING TYPICAL PROPERTY SERVICE INSTALLATION			
	FILE NAME	DATE	BACKUP LOCATION	DATE													
			G:\Standard Drawings\RCC\Water		A	ORIGINAL ISSUE				SCALE	As Shown						
										SURV'D.	CHK'D.						
										DRN.	APP'D.						
														A		SHEET 1 of 1	59605

FOR PATH BOX DETAIL
REFER G.C.C.C. STD.
DWG. NO. 59611



**EXISTING MAIN
TAPPING BAND CONNECTION
BY COUNCIL**

FOR PRECAST CONCRETE
SURROUND DETAIL REFER R.C.C.
STD. DWG. NO. 59610

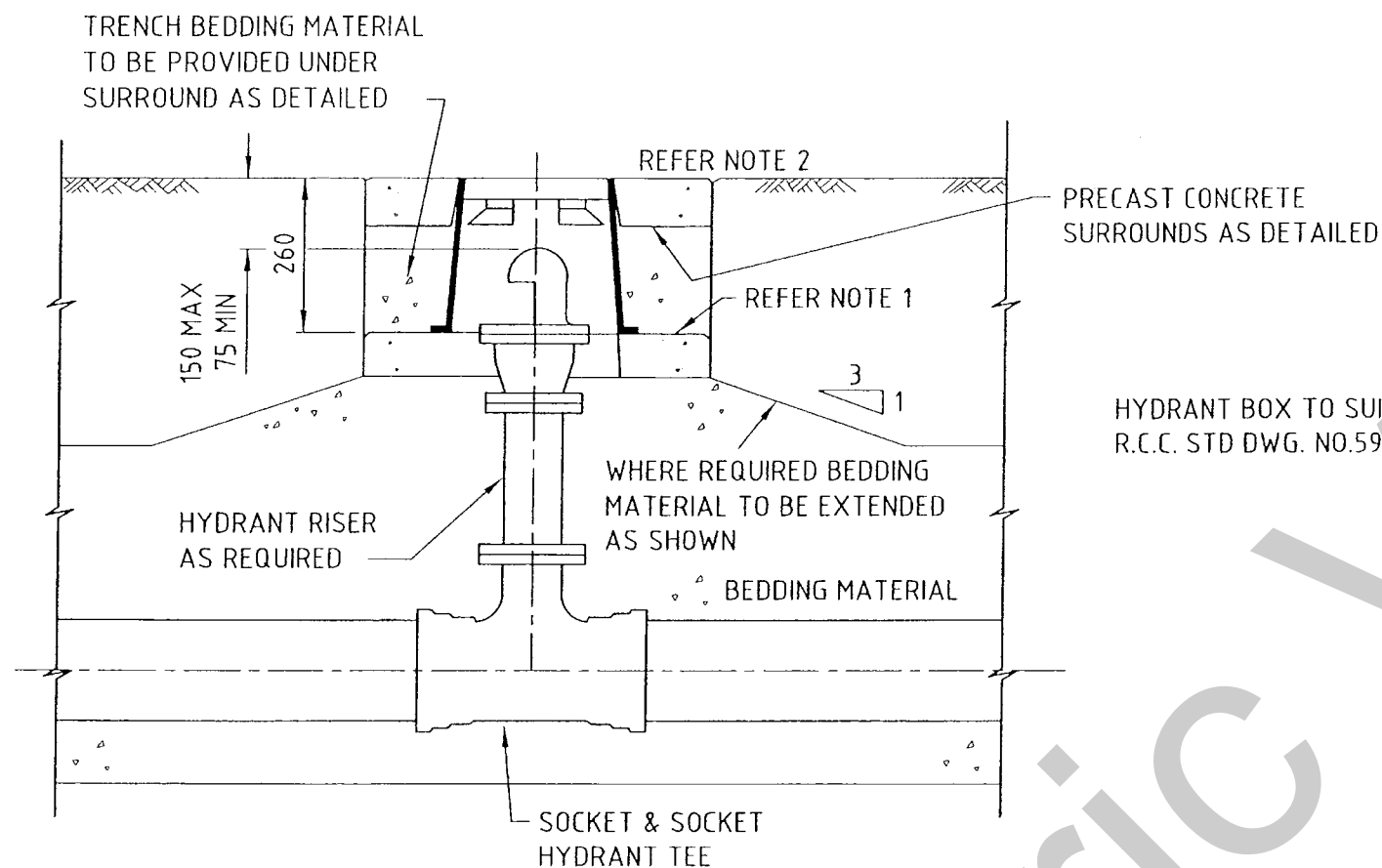


SLUICE VALVE ON LINE

NOTES:

1. ALL CONCRETE SURROUNDS AND SUPPORTS SHALL BE INSTALLED FLUSH WITH THE FINISHED FOOTPATH PROFILE.
2. COUNCIL APPROVED ALTERNATIVES MAY BE UTILISED FOR THE CONCRETE SURROUND/SUPPORT AND FOR THE VALVE BOX.
3. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

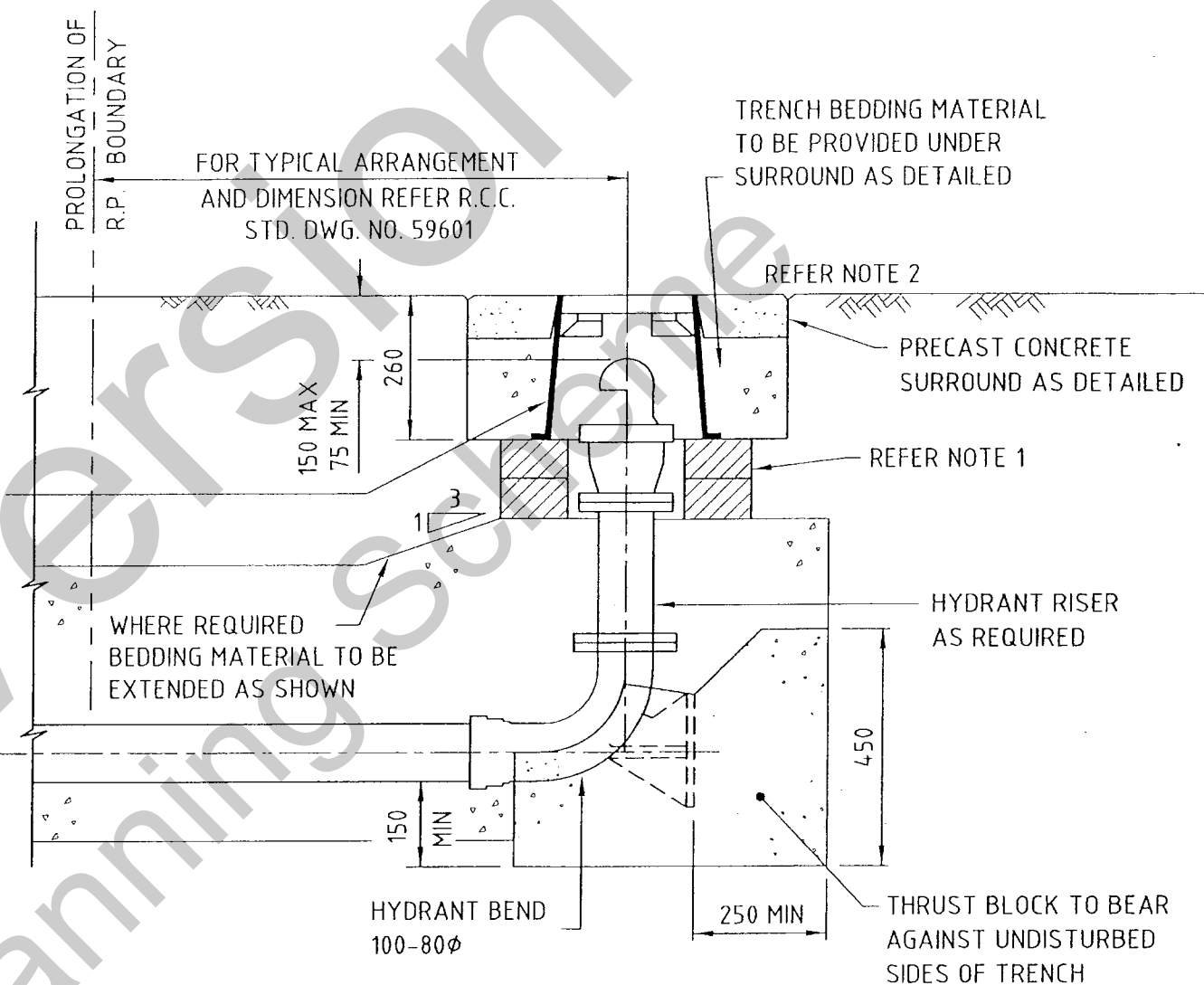
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES	BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING STANDARD SLUICE VALVE DETAILS			
	FILE NAME	DATE	BACKUP LOCATION	DATE												
			G:\Standard Drawings\RCC\Water		A	ORIGINAL ISSUE			SCALE	As Shown						
									SURV'D.	CHK'D.						
									DRN.	APP'D.						
													A		SHEET 1 of 1	59606



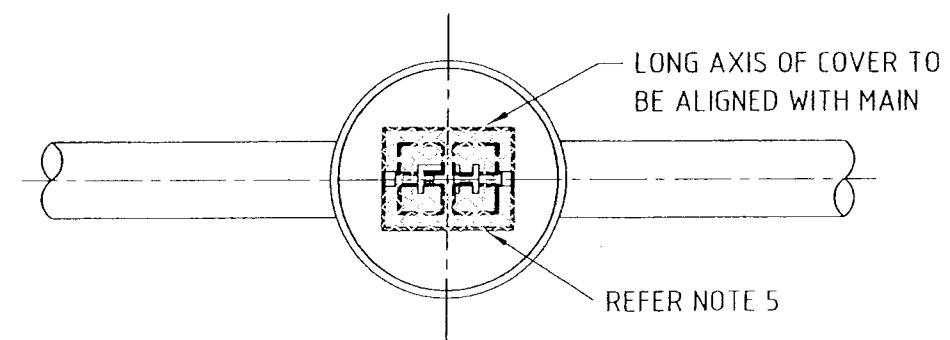
STANDARD HYDRANT ON LINE

NOTES:


1. BOTH PRECAST CONCRETE SURROUNDS/SUPPORTS AND BRICK SUPPORT DETAILS SHOWN ARE ACCEPTABLE.
2. ALL CONCRETE SURROUNDS SHALL BE LAID TO THE FINISHED PROFILE OF THE FOOTPATH VERGE.
3. FOR PRECAST CONCRETE SURROUND/SUPPORT AND BRICK SUPPORT DETAILS REFER R.C.C. STD. DWG. NO. 59610.
4. FOR TYPICAL HYDRANT ARRANGEMENT REFER R.C.C. STD. DWG. NO. 59601.
5. BOX COVERS FOR SWABBING HYDRANTS SHALL HAVE "SH" MARKED ON TOP.
6. COUNCIL APPROVED ALTERNATIVES MAY BE UTILISED FOR THE CONCRETE SURROUND/SUPPORT AND FOR THE HYDRANT BOX.
7. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

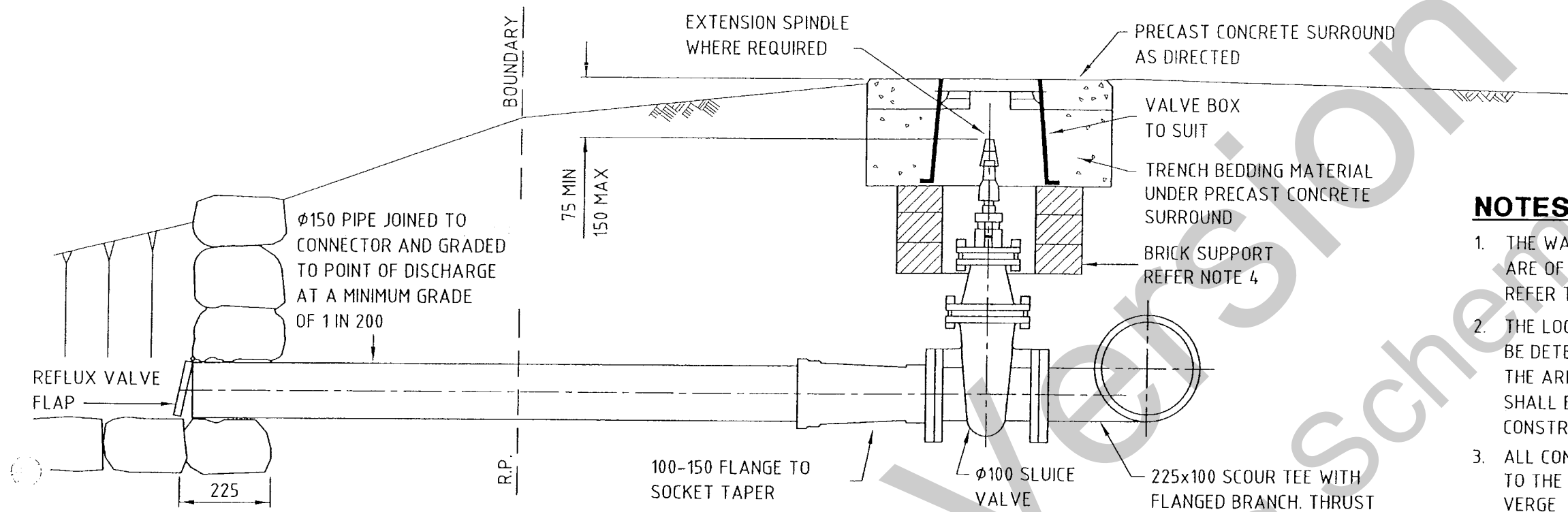


SWABBING HYDRANT AT END OF LINE
AND HEAD OF CUL-DE-SAC



HYDRANT & VALVE BOX ALIGNMENT

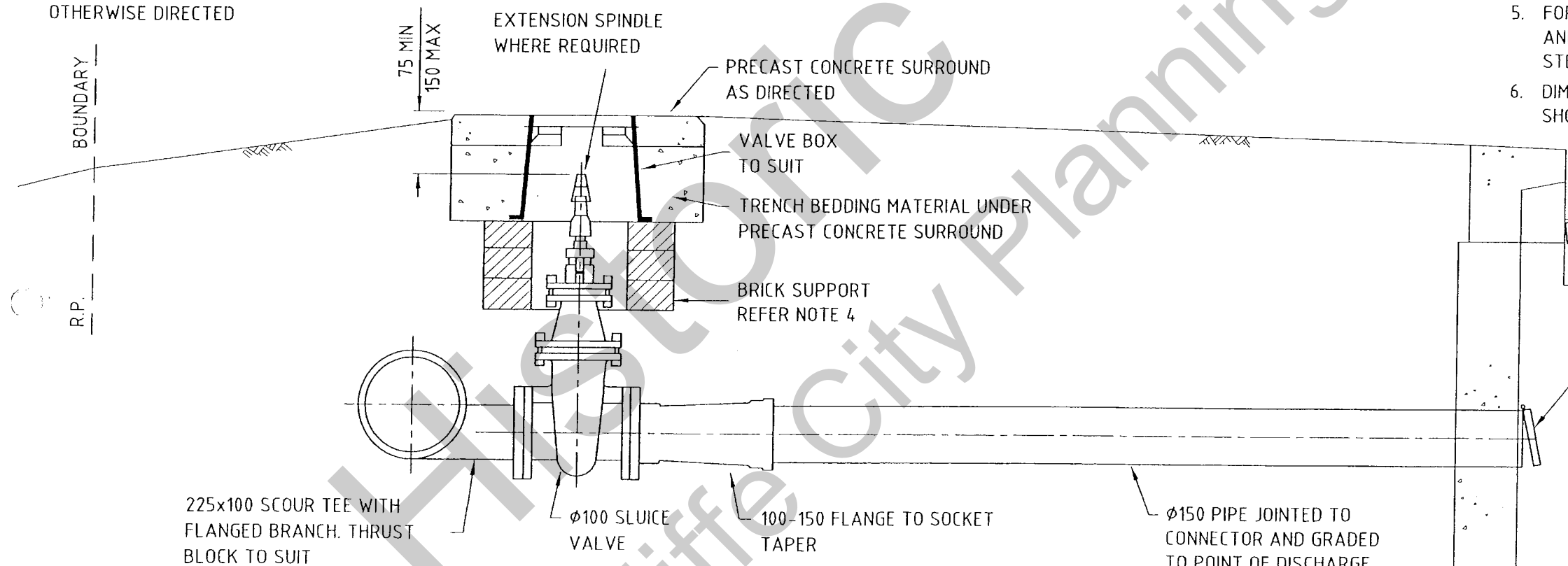
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	STANDARD DRAWING				
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE			SCALE	As Shown								
			G:\Standard Drawings\RCC\Water						SURV'D.:	CHK'D.:								
									DRN.:	APP'D.:								
													A				SHEET 1 of 1	59607



SCOUR TABLE		
MAIN	SCOUR	OUTLET
225	100	150
300	100	150

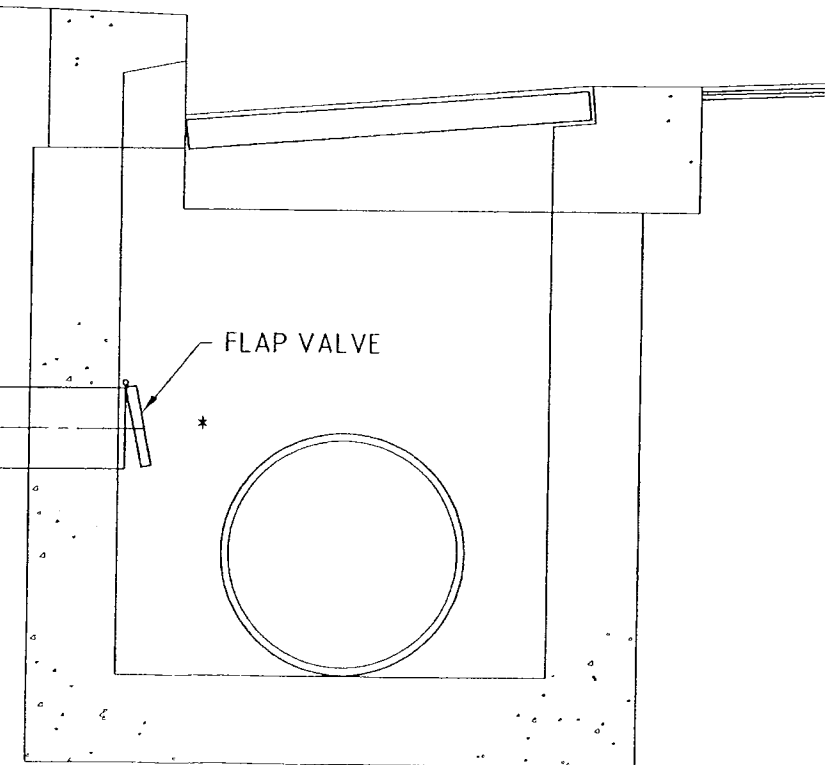
- NOTES:**
1. THE WATERMAIN DETAILS ON THIS DRAWING ARE OF A Ø225. FOR OTHER MAIN SIZES REFER TO THE SCOUR TABLE ABOVE.
 2. THE LOCATION OF SCOURING POINTS SHALL BE DETERMINED BY THE SUPERINTENDENT. THE ARRANGEMENT AND DISCHARGE LOCATION SHALL BE CONFIRMED BY COUNCIL PRIOR TO CONSTRUCTION.
 3. ALL CONCRETE SURROUNDS SHALL BE LAID TO THE FINISHED PROFILE OF THE FOOTPATH VERGE
 4. BOTH PRECAST CONCRETE SURROUND/SUPPORT AND BRICK SUPPORT ARE ACCEPTABLE.
 5. FOR PRECAST CONCRETE SURROUND/SUPPORT AND BRICK SUPPORT DETAILS REFER R.C.C. STD. DWG. NO. 59610.
 6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

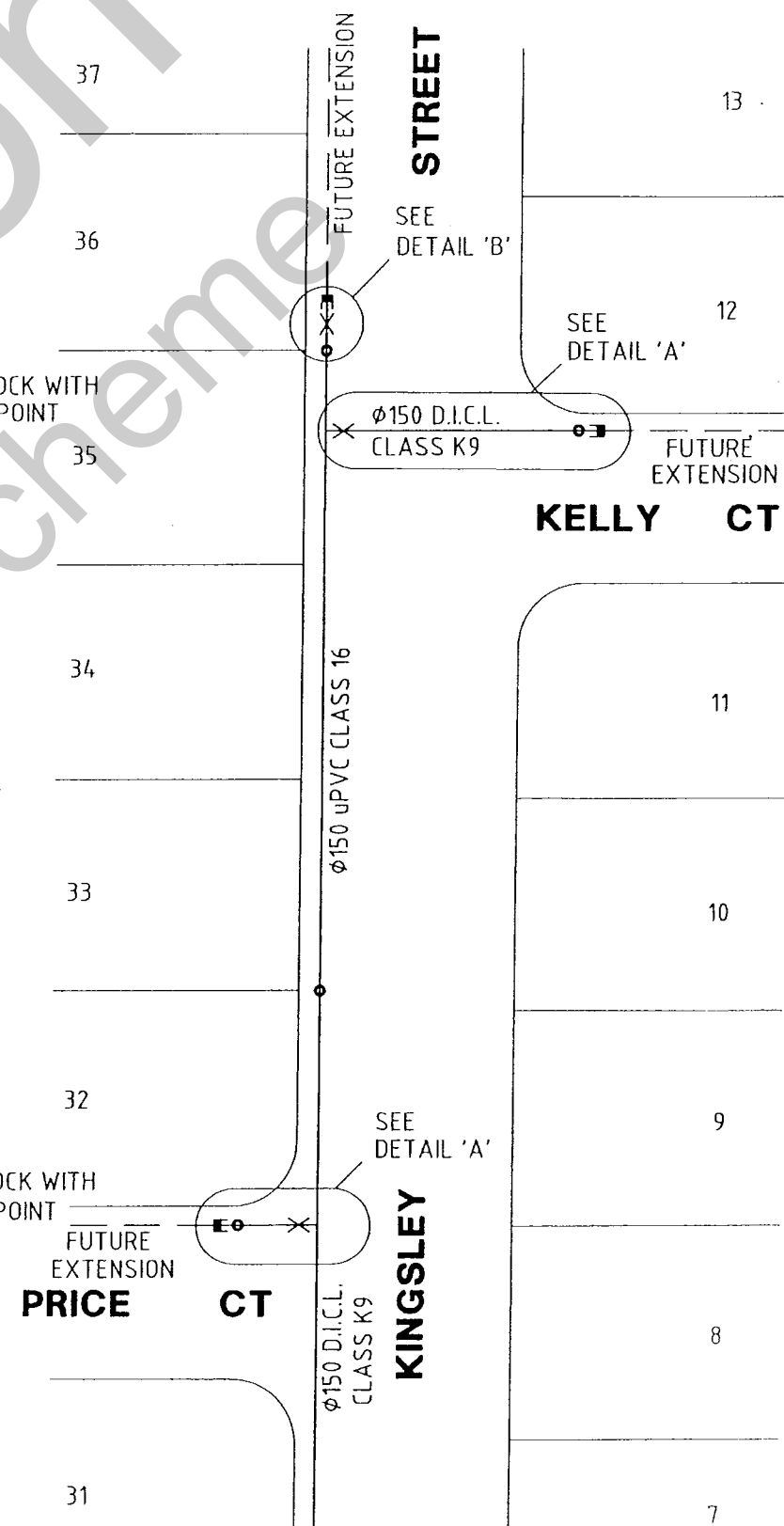
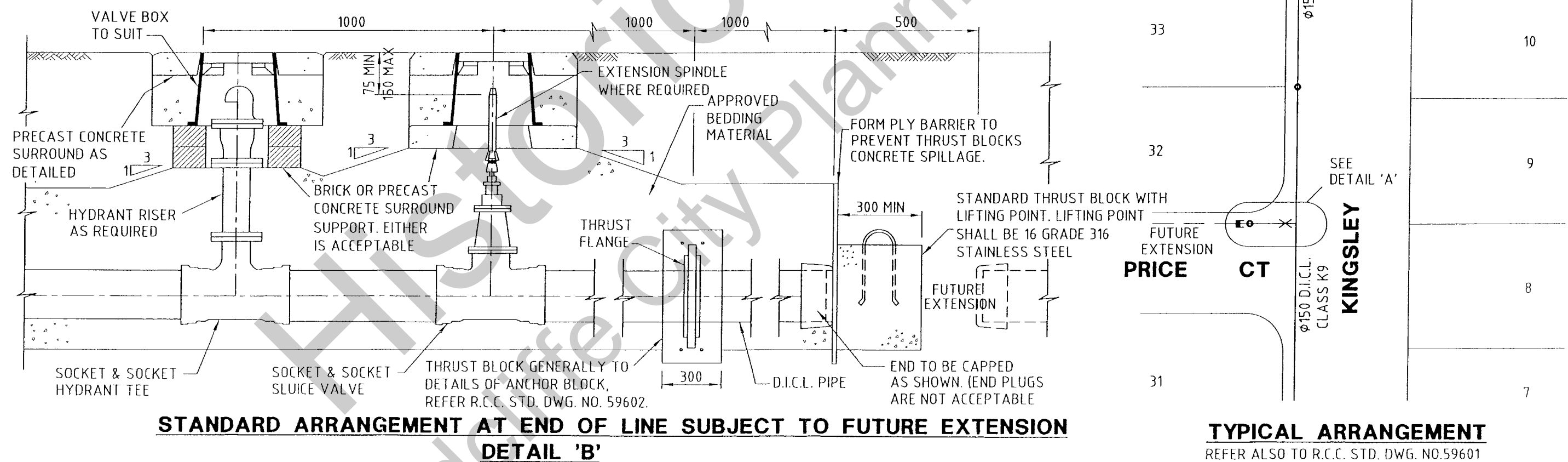
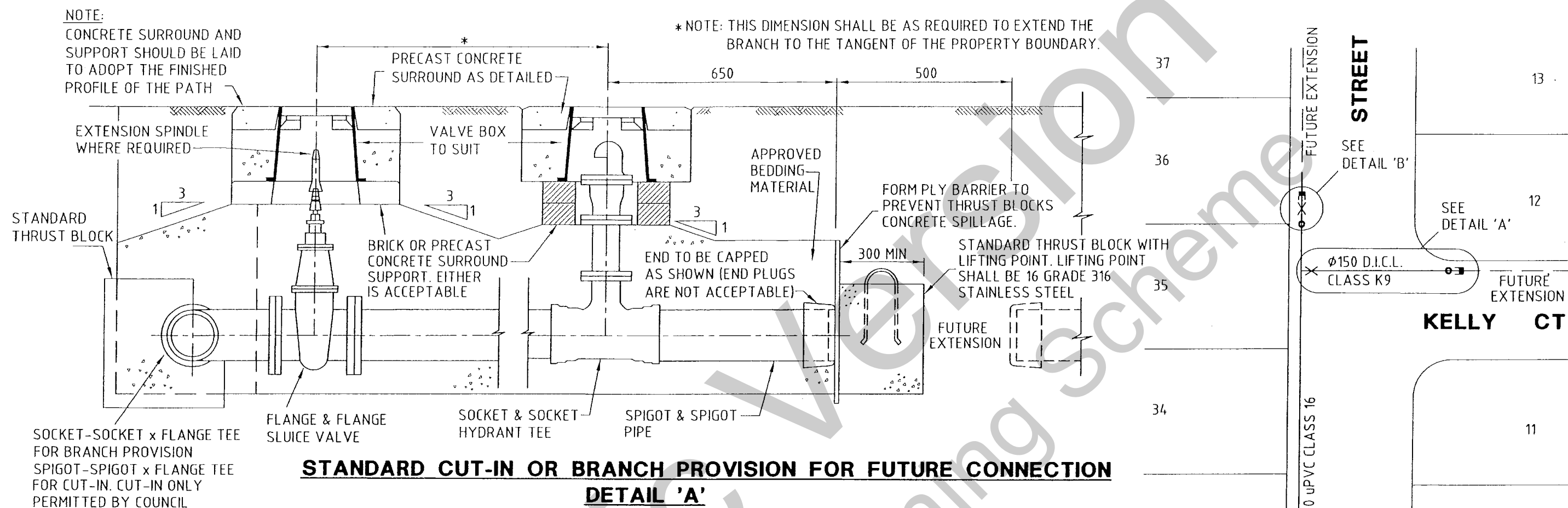
SCOUR VALVE WITH OUTLET TO OPEN CHANNEL




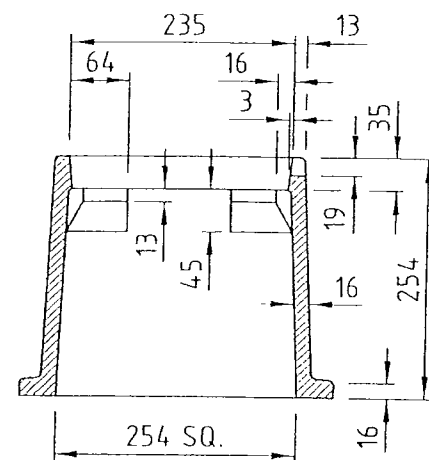
SCOUR VALVE WITH OUTLET TO STORMWATER SYSTEM

* THIS DETAIL DRAWN FOR DISCHARGE TO GULLY PIT.
DISCHARGE TO MANHOLE SIMILAR.

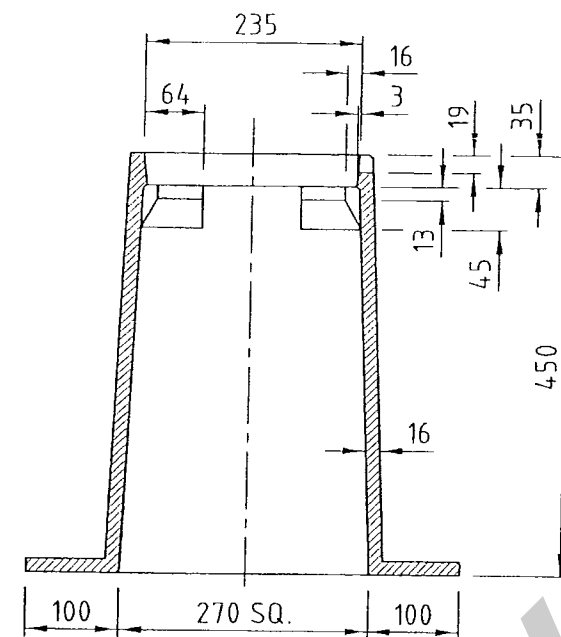




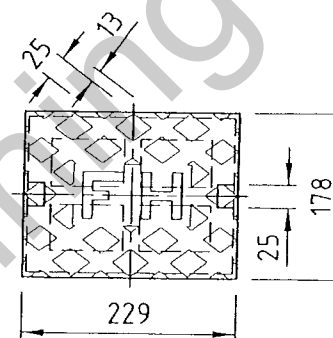
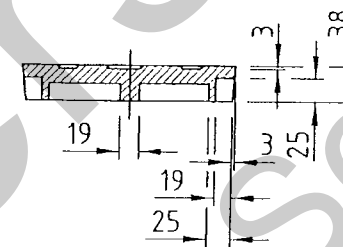
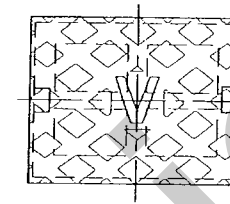
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING				
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			STANDARD PROVISION FOR				
			G:\Standard Drawings\RCC\Water							SURV'D.:	CHK'D.:			FUTURE WATER RETICULATION EXTENSIONS				
										DRN.:	APP'D.:			A				
														SHEET 1 of 1				
													59609					



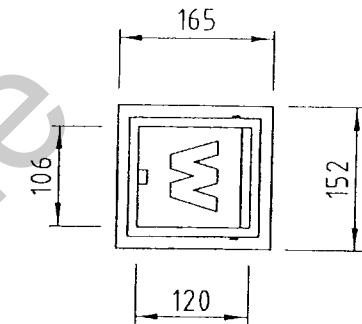
ELEVATION



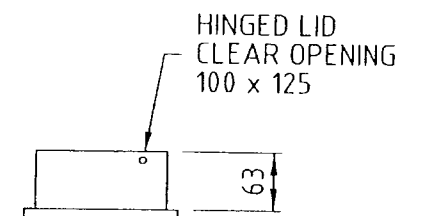
ELEVATION



COVERS

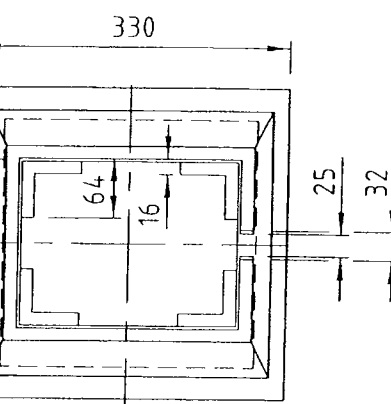


PLAN

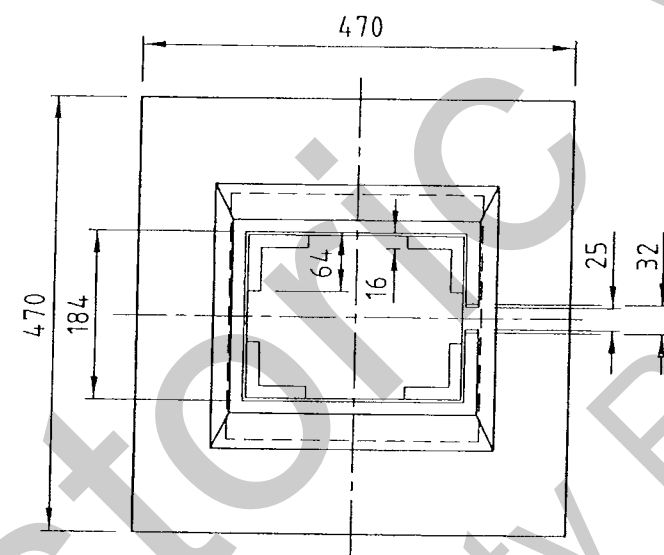


ELEVATION

PATH BOX



PLAN
TYPE 'A'
REFER NOTE 6.



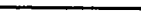
PLAN
TYPE 'B'

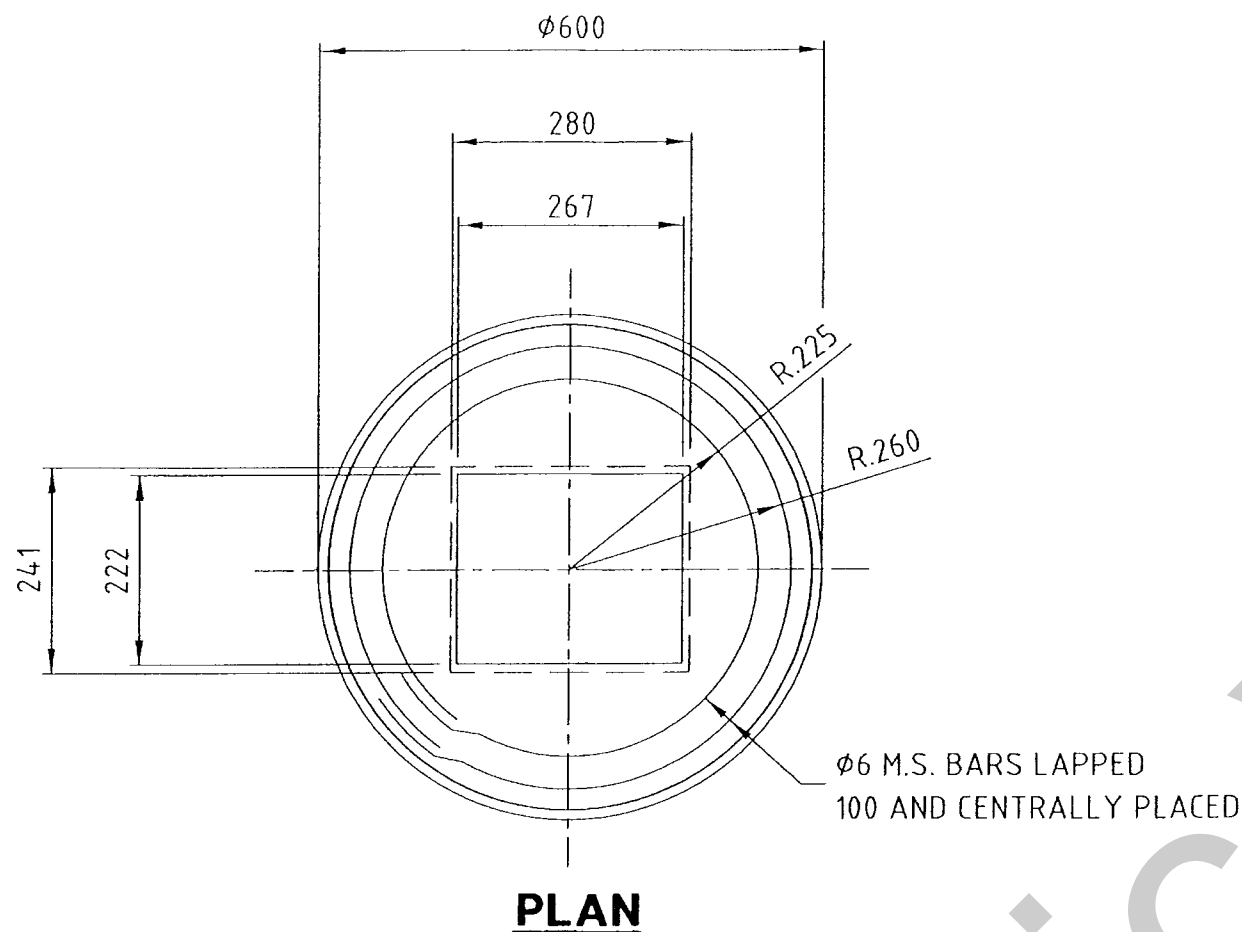
VALVE/HYDRANT BOX NOTES:

- ALL CAST IRON COMPONENTS SHALL COMPLY WITH AS.1830 AND SHALL BE GRADE T220.
- ALL DUCTILE IRON COMPONENTS SHALL COMPLY WITH AS.1831 GRADE 400/12.
- BOXES SHALL BE MANUFACTURED WITH A TOTAL MAXIMUM WEIGHT OF 50kg.
- TYPE 'A' BOXES SHALL BE PROVIDED AT FIRE HYDRANTS AND VALVE INSTALLATIONS UNLESS DIRECTED OTHERWISE BY THE SUPERINTENDENT.
- COUNCIL APPROVED ALTERNATIVES MAY BE UTILISED FOR THE TYPE 'A' BOX.
- A BITUMASTIC BASE MATERIAL SHALL BE APPLIED TO ALL BOXES AND COVERS WHEN THEY ARE IN CLEAN, DRY AND RUST FREE CONDITION. WHEN INSTALLED THE LID AND SURROUND OF THE BOX SHALL BE PAINTED TO THE DETAILS SHOWN IN COUNCIL'S STANDARD DRAWING NO. 59610.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

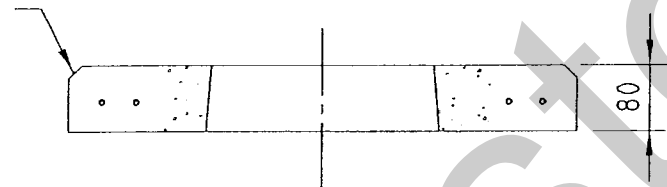
PATH BOX NOTES:

- SHALL BE MANUFACTURED FROM DUCTILE IRON, CAST-IRON OR GUNMETAL.
- THE SURFACE OF BOX TO BE CHEQUERED.
- THE SURFACE TO HAVE THE LETTER 'W' IN A RAISED PATTERN.
- LID SHALL BE HINGED WITH PINS NOT LESS THAN $\phi 6$ STAINLESS STEEL.

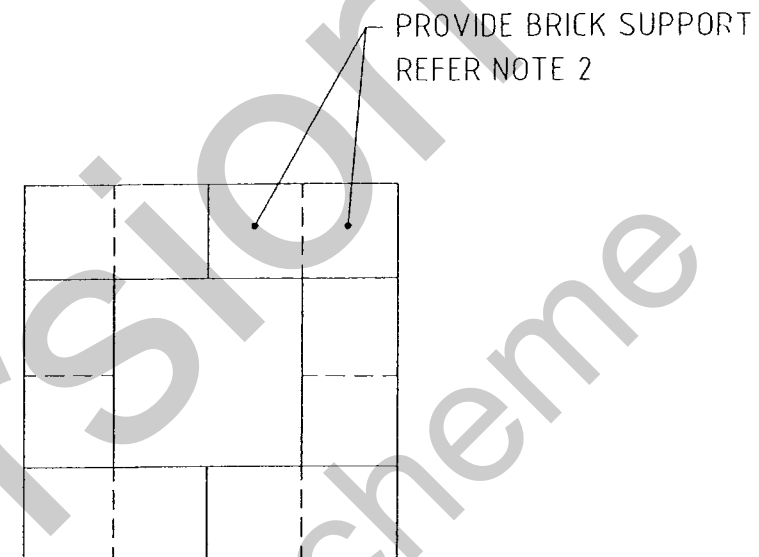
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING STANDARD FIRE HYDRANT, VALVE & BOX				
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown							
			G:\Standard Drawings\RCC\Water															
										SURV'D.	CHK'D.							
										DRN.	APP'D.							



15 SPLAYED EDGE



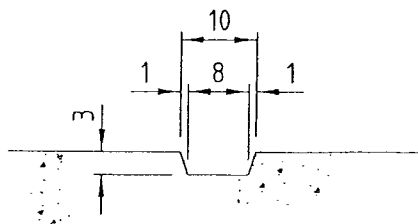
PRECAST CONCRETE SURROUND AND SUPPORT DETAILS



NOTES:

- BOTH PRECAST CONCRETE SURROUND AND BRICK SUPPORT DETAILS SHOWN ARE ACCEPTABLE.
- BRICK SUPPORTS SHALL BE A MINIMUM TWO COURSES AND LAID DRY OVER THE BEDDING MATERIAL. APPLY BUILDING SEALANT OR SIMILAR TO BOND BRICKS TO THE VALVE/HYDRANT BOX.
- FOR HYDRANTS THE CONCRETE SURROUND AND LID SHALL BE PAINTED WITH APPROVED YELLOW REFLECTIVE PAINT.
- FOR VALVES AND OTHER FITTINGS THE CONCRETE SURROUND AND LID SHALL BE PAINTED WITH APPROVED REFLECTIVE PAINT IN ACCORDANCE WITH THE COLOUR CODE SHOWN ON COUNCIL'S STANDARD DRAWING NO. 59612.
- CONCRETE TO BE GRADE N25.
- COUNCIL APPROVED ALTERNATIVES MAY BE UTILISED FOR THE SURROUND AND SUPPORT.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

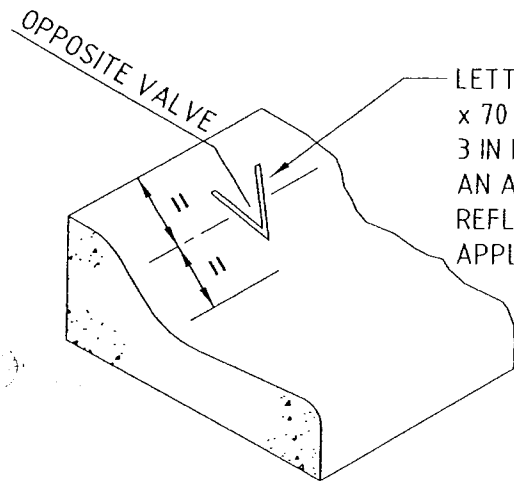
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES	BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING VALVE AND HYDRANT BOX SUPPORT AND SURROUND DETAILS			
	FILE NAME	DATE	BACKUP LOCATION	DATE						SCALE	As Shown					
			G:\Standard Drawings\RCC\Water		A	ORIGINAL ISSUE				SURV'D.:	CHK'D.:					
										DRN.:	APP'D.:					



SECTION THROUGH LETTER RECESS

COLOUR CODES

WHITE	- VALVES, SCOUR VALVES, SWABBING CHAMBERS, AIR VALVES
YELLOW	- HYDRANTS
BLUE (RRPM)	- HYDRANTS
RED	- CLOSED ZONE VALVES
BLUE	- DIALYSIS VALVES



LETTERS SHALL BE 100 HIGH
x 70 WIDE x 10 AND RECESSED
3 IN KERB FACE. PAINT WITH
AN APPROVED COLOUR CODED
REFLECTIVE PAINT INCORPORATING
APPLIED GLASS BEADS.

VALVE

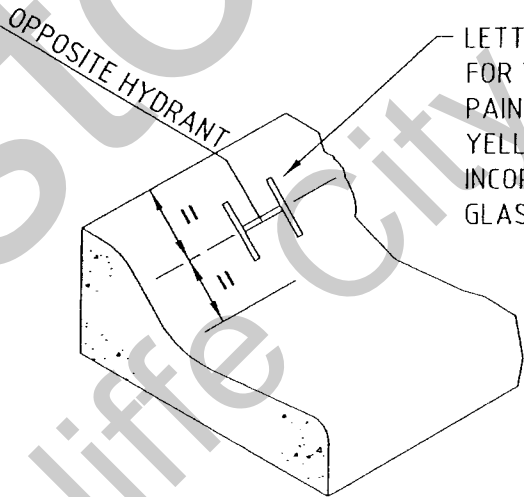
OTHER KERB & CHANNEL MARKINGS

SIZE OF LETTER AS FOR VALVES

AV - AIR VALVE	SV - SCOUR VALVE
SC - SWABBING CHAMBER	VB - VALVE BOX

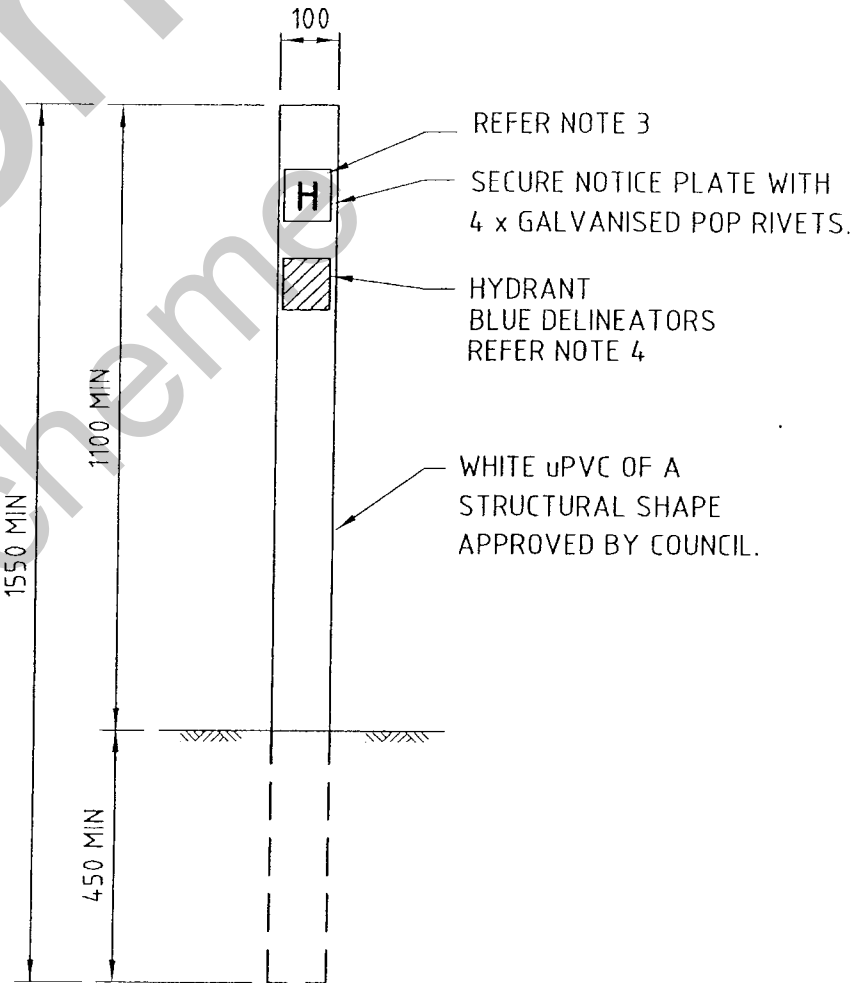
NOTES:

- ALL KERB MARKINGS SHALL BE COLOUR CODED AS SHOWN
- MARKER POSTS SHALL ONLY BE USED IN STREETS AND ROADS WHERE THERE IS NO KERB & CHANNEL AND SHALL BE POSITIONED AT THE FRONT OF PROPERTY BOUNDARY OPPOSITE THE FITTING.
- THE NOTICE PLATE SHALL BE REFLECTORIZED ALUMINIUM WITH BLACK LETTERING ON A WHITE BACKGROUND NOMINALLY 80x80.
- FOR COUNCIL CONTROLLED ROADS, IN ADDITION TO THE NOTICE PLATE MARKER, A BLUE DELINEATOR MARKER COMPLYING WITH MAIN ROADS SPECIFICATION ES126 SHALL BE INSTALLED AS DETAILED. FOR STATE CONTROLLED ROADS, DELINEATORS SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES.
- ALTERNATIVE POSTS MAY BE USED SUBJECT TO COUNCIL APPROVAL.
- THIS DRAWING SHOULD BE READ IN CONJUNCTION WITH THE PAVEMENT AND KERB MARKING DETAILS SHOWN ON R.C.C. STD. DWG. No 59613.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.



LETTER DIMENSION AS
FOR VALVE DETAIL.
PAINT WITH AN APPROVED
YELLOW REFLECTIVE PAINT
INCORPORATING APPLIED
GLASS BEADS

HYDRANT



SIDE ELEVATION

FRONT ELEVATION

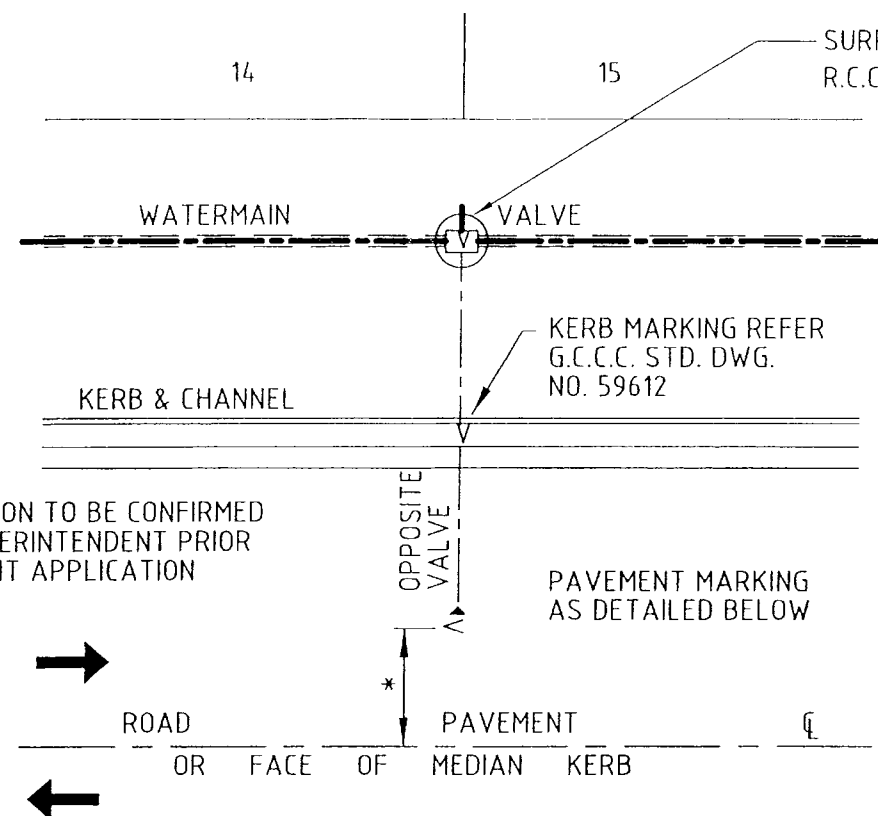
OTHER NOTICE PLATE MARKING

H - HYDRANT	S - SWABBING CHAMBER
V - VALVE	C - HIGH LEVEL MAIN
A - AIR VALVE	L - MID LEVEL MAIN
S - SCOUR VALVE	L - LOW LEVEL MAIN
V - VALVE BOX	
S - SWABBING HYDRANT	

KERBED STREETS / ROADS

NON KERBED STREETS / ROADS

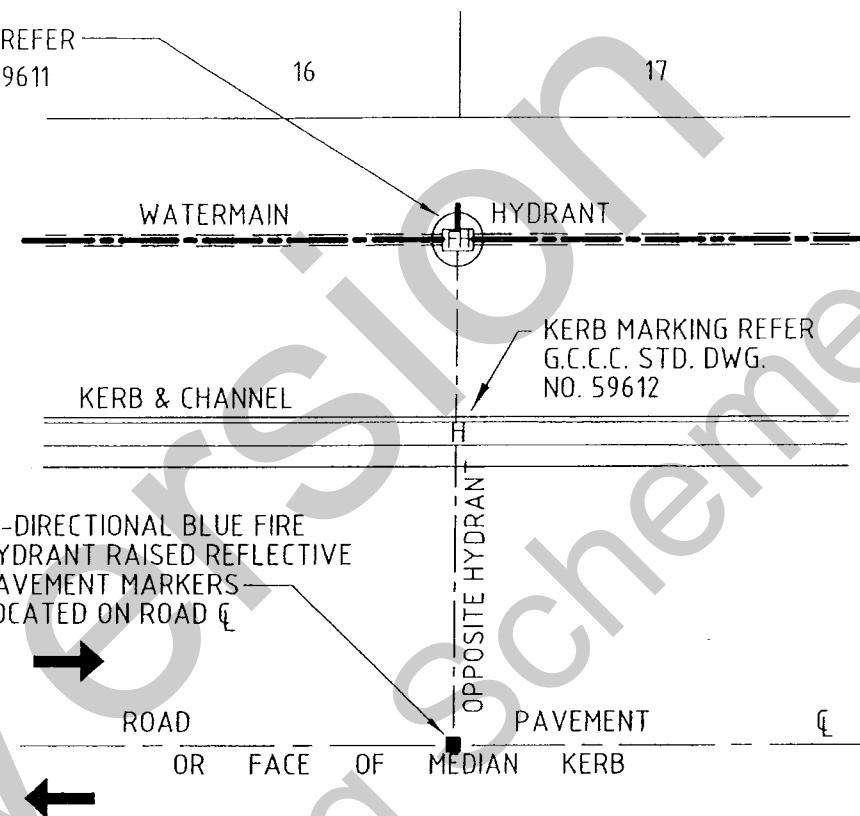
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING MARKING FOR LOCATION OF HYDRANTS, VALVES AND OTHER FITTINGS		SHEET 1 of 1	59612
	FILE NAME	DATE	BACKUP LOCATION	DATE												
			G:\Standard Drawings\NCC\Water		A	ORIGINAL ISSUE				SCALE	As Shown					
										SURV'D.	CHK'D.					
										DRN.	APP'D.					



KERBED STREETS/ROADS

TYPICAL PAVEMENT MARKING PLAN FOR VALVES

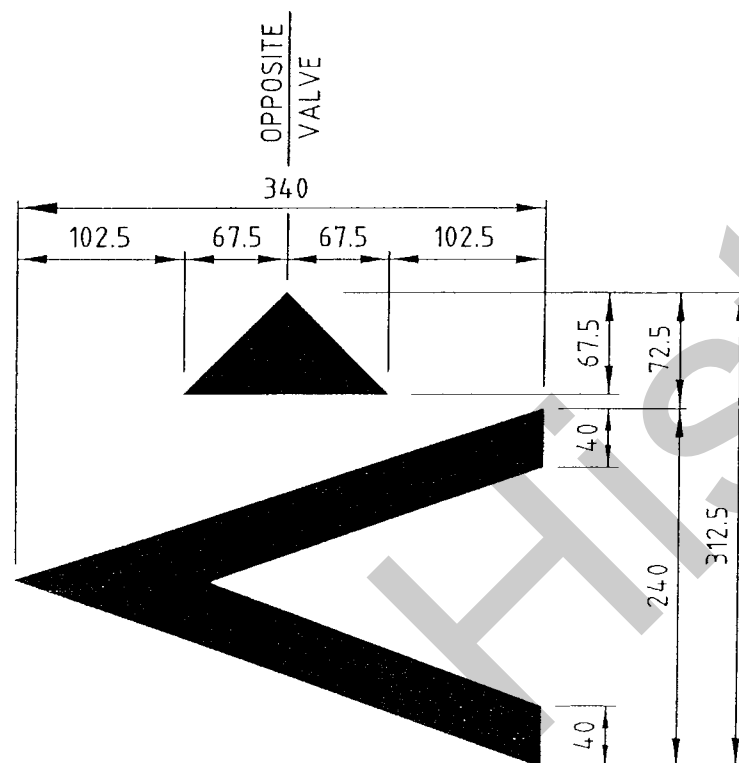
REFER NOTES



KERBED STREETS/ROADS

TYPICAL PAVEMENT MARKING PLAN FOR HYDRANTS

REFER NOTES



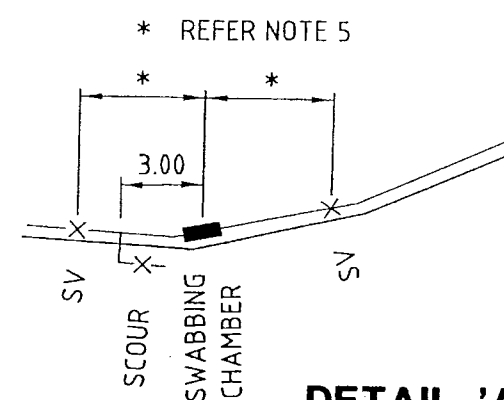
PAVEMENT MARKING FOR VALVES

REFER NOTE 5

NOTES:

1. PAVEMENT MARKING FOR VALVES SHALL BE OF AN APPROVED REFLECTIVE PAINT, INCORPORATING APPLIED GLASS BEADS, MANUFACTURED TO THE REQUIREMENTS OF MAIN ROADS. THE PAINT COLOUR SHALL BE AS DETAILED IN R.C.C. STD. DWG. NO. 59612.
2. PAVEMENT MARKING FOR VALVES SHALL BE LOCATED CLEAR OF THE PARKING LANE SO THAT TYRE WEAR IS MINIMISED. THE EXACT LOCATION SHALL BE DETERMINED BY THE SUPERINTENDENT FOLLOWING SITE INSPECTIONS.
3. FOR COUNCIL CONTROLLED ROADS, RAISED BLUE FIRE HYDRANT MARKERS SHALL GENERALLY CONFORM WITH THE REQUIREMENTS OF MAIN ROADS SPECIFICATION ES135.
4. FOR STATE CONTROLLED ROADS, RAISED BLUE FIRE HYDRANT MARKERS SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES.
5. PAVEMENT MARKING FOR VALVES MAY BE PROVIDED BY UTILISING A TWO WAY RAISED VALVE MARKER, STIMSONITE YELLOW 911-AY OR SIMILAR, THAT GENERALLY CONFORM WITH THE REQUIREMENTS OF MAIN ROADS SPECIFICATION ES135. WHERE USED THESE MARKERS SHALL BE LOCATED AS SHOWN ABOVE IN THE TYPICAL PAVEMENT MARKING PLAN FOR HYDRANTS OR FOR STATE CONTROLLED ROADS IN ACCORDANCE WITH THE MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES.
6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

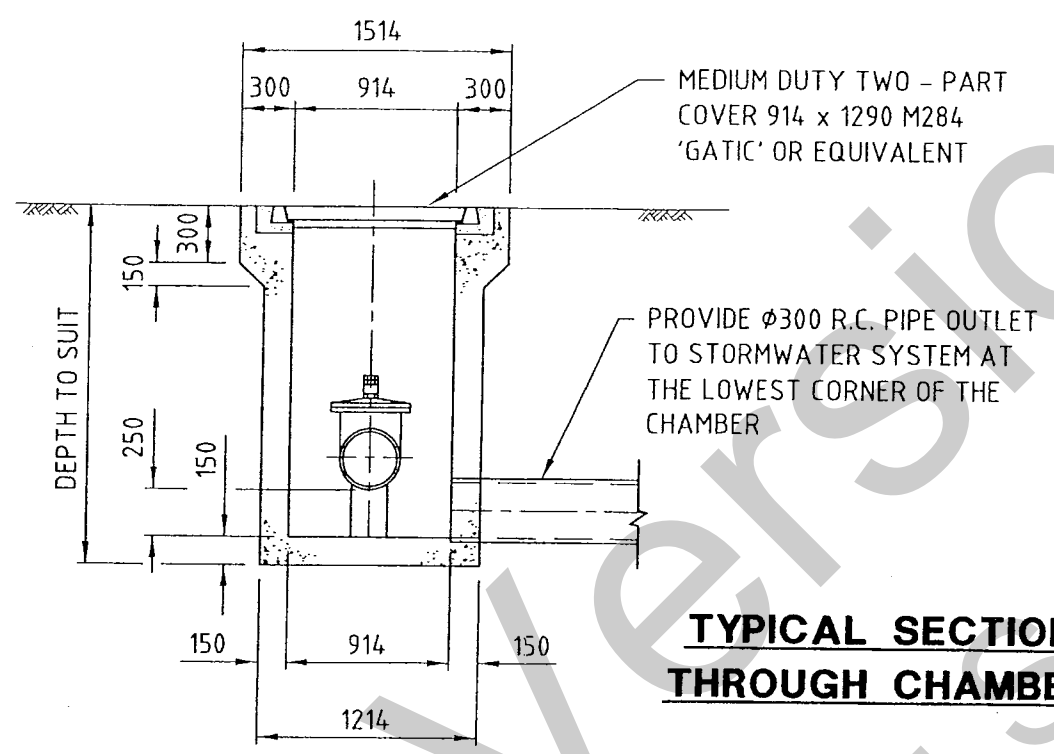
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING STANDARD PAVEMENT MARKING FOR LOCATING HYDRANTS AND SLUICE VALVES			
	FILE NAME	DATE	BACKUP LOCATION	DATE													
			G:\Standard Drawings\RCC\Water		A	ORIGINAL ISSUE				SCALE	As Shown						
										SURV'D.	CHK'D.						
										DRN.	APP'D.						
														A		SHEET 1 of 1	59613



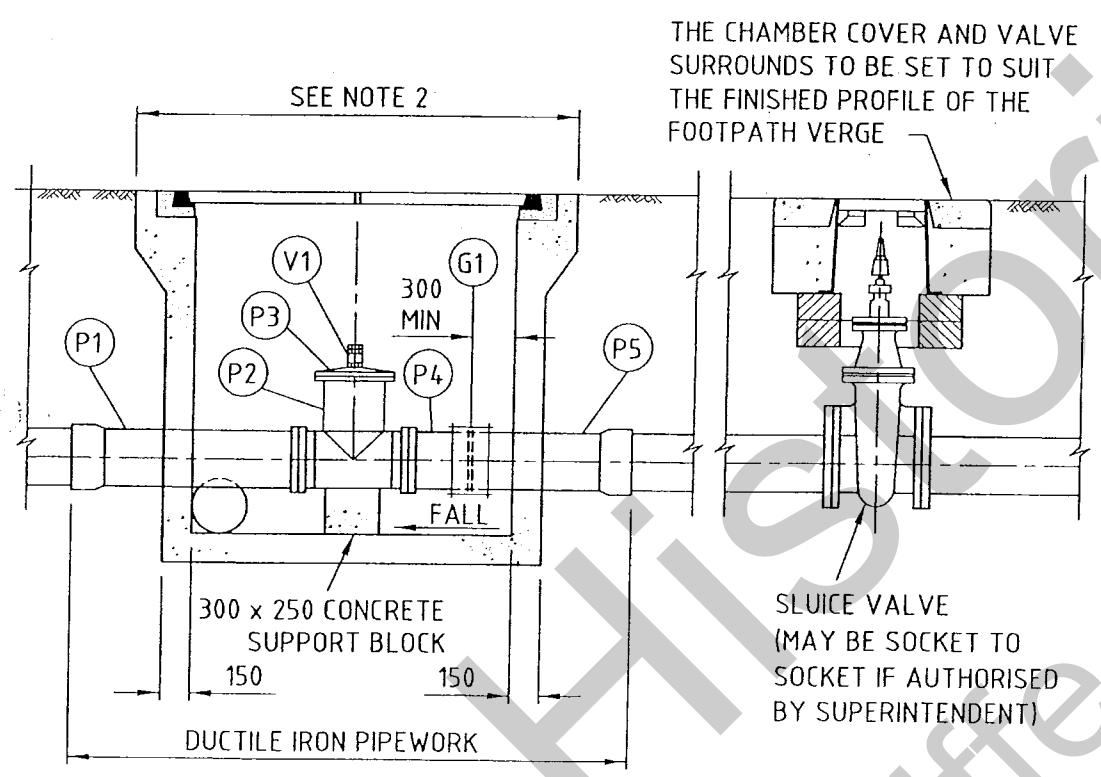
DETAIL 'A'

PIPEWORK SCHEDULE

ITEM	DESCRIPTION
P1	SOCKET/FLANGE PIPE x 1000 LONG
P2	FLANGE/FLANGE TEE WITH FLANGED BRANCH
P3	BLANK FLANGE TAPPED CENTRALLY Ø50 B.S.P.
P4	FLANGE/SPIGOT PIPE x 500 LONG
P5	SPIGOT/SOCKET PIPE
V1	SCREWED BALL VALVE WITH HEXAGONAL NIPPLES
G1	GIBALT JOINT ELONGATED



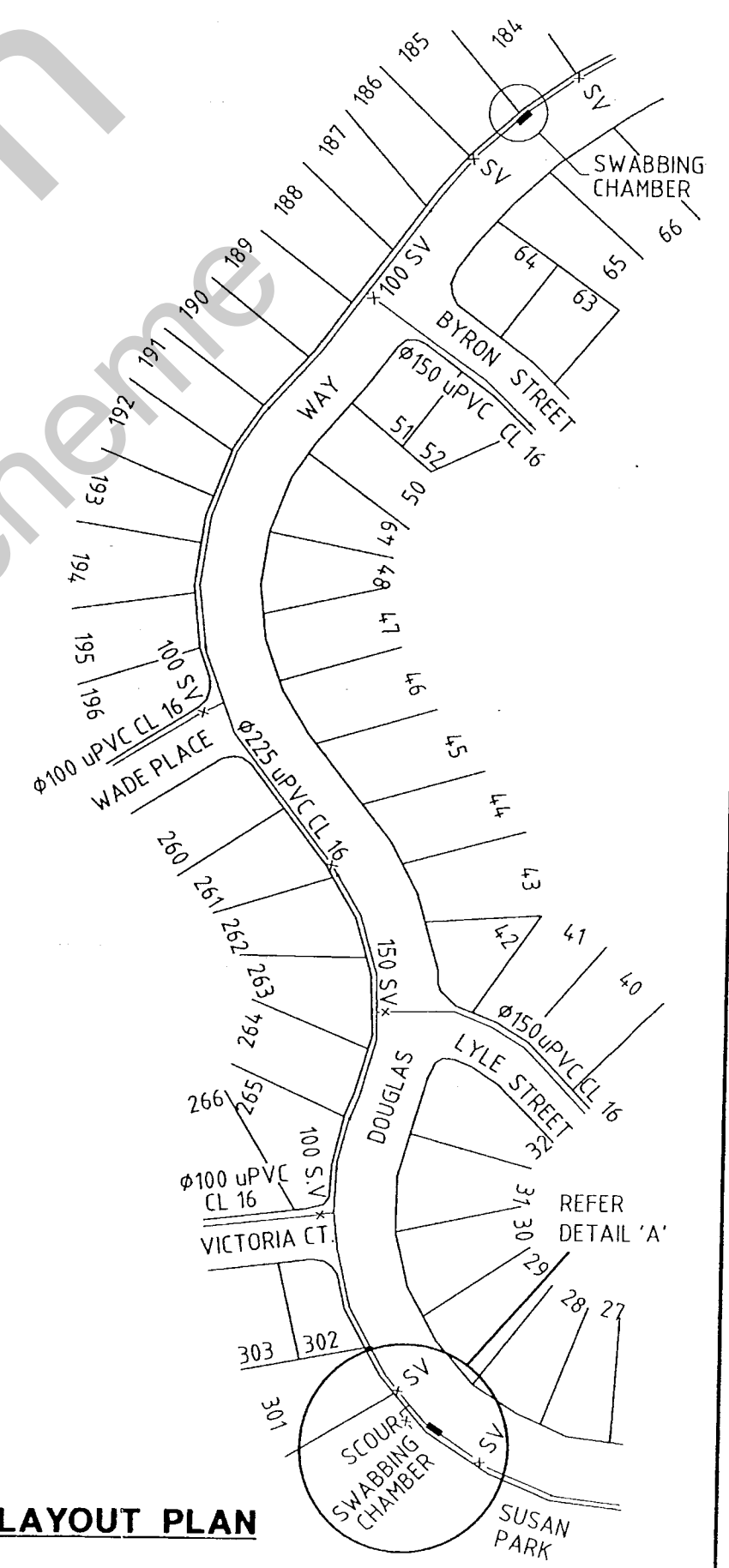
TYPICAL SECTION THROUGH CHAMBER



SECTION ALONG CHAMBER DETAIL

NOTES:

1. CONCRETE TO BE GRADE N25.
2. THE PIT LENGTH SHALL SUIT THE REQUIRED COMPONENTS AND PROVIDE ADEQUATE AREA FOR MAINTENANCE AS DIRECTED BY THE SUPERINTENDENT.
3. WHERE SWABBING CHAMBERS AND SCOURS ADJOIN EACH OTHER (ie AT LOW POINTS) A COMMON PIPE OUTLET MAY BE PROVIDED AS DETAILED ON THE APPROVED ENGINEERING DRAWINGS OR AS DIRECTED BY THE SUPERINTENDENT.
4. WHERE THE MAIN IS LAID DEEPER THAN THE STANDARD DEPTH, THE SWABBING CHAMBER STRUCTURAL CONSTRUCTION SHALL BE AS DETAILED ON THE APPROVED ENGINEERING DRAWINGS.
5. SLUICE VALVES SHALL GENERALLY BE LOCATED OPPOSITE COMMON PROPERTY BOUNDARIES BETWEEN 5m TO 25m EITHER SIDE OF THE SWABBING CHAMBER.
6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

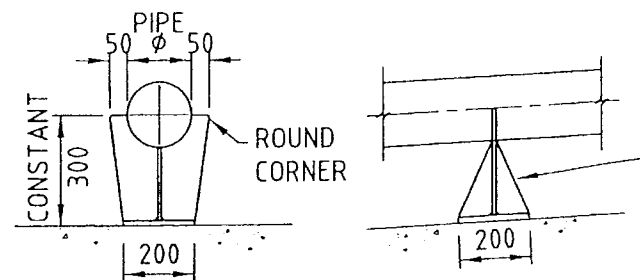


LAYOUT PLAN

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING TYPICAL ARRANGEMENT MAIN SWABBING CHAMBER				
	FILE NAME	DATE	BACKUP LOCATION	DATE		ORIGINAL ISSUE					As Shown							
			G:\Standard Drawings\RCC\Water															
											SURV'D.:	CHK'D.:						
											DRN.:	APP'D.:						
														A			SHEET 1 of 1	59614

MARK	DESCRIPTION	DIA	NO OF
1	FLANGE - FLANGE - FLANGE TEE PIECE		2
2	FLANGE - FLANGE 90° BEND		2
3	FLANGED ASSEMBLY JOINT		2
4	FLANGE PLAIN PIPE OF LENGTH TO SUIT		1
5	FLANGE & PLAIN PIPE 1200 LONG		1
6	FLANGE - FLANGE CONCENTRIC TAPER ϕ ϕ		4
7	FLANGE & PLAIN PIPE 700 LONG		2
8	THRUST FLANGE		2
9	FLANGE - FLANGE REFLUX VALVE *		2
10	FLANGE - FLANGE SLUICE VALVE		4
11	PUMP AS DETAILED		2
12	PRESSURE GAUGE (SEE NOTE 9)		2
13	25 ϕ AIR VALVE ATOP 25 ϕ BALL/GATE VALVE		2

* REFLUX VALVE TO INCORPORATE COUNTERWEIGHT AND EXTENDED SPINDLE



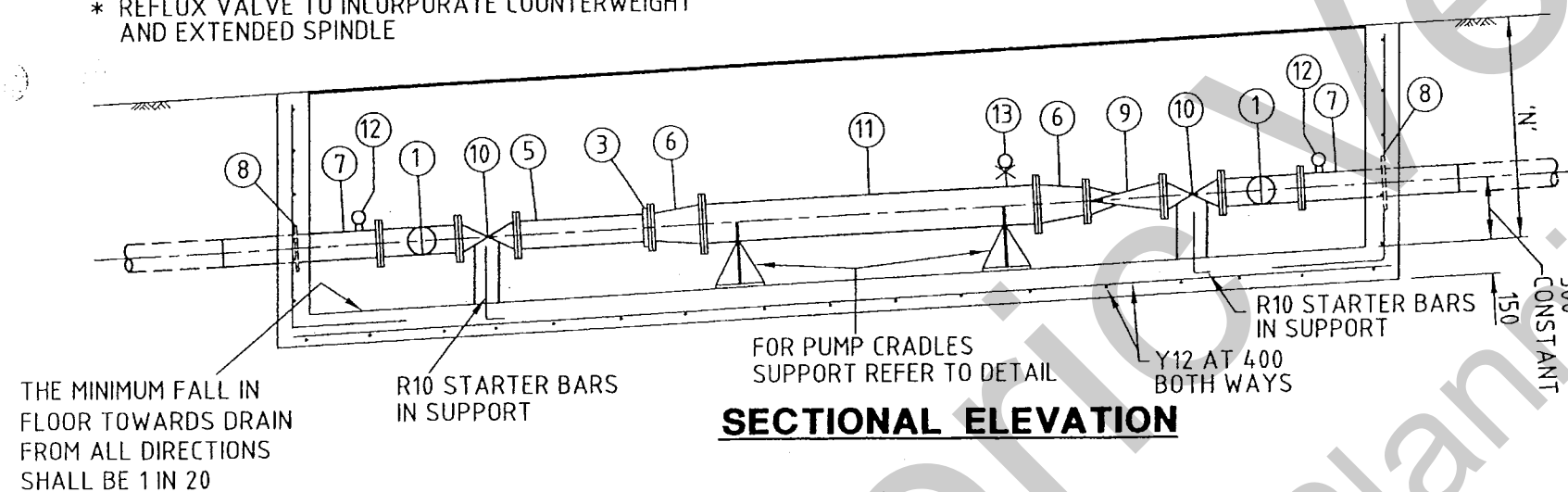
PUMP CRADLE SUPPORT DETAIL

FABRICATED SUPPORT CRADLE FROM 10 R. CONTINUOUS FILLET WELD. ALL COMPONENTS TO BE HOT DIP GALVANISED AFTER FABRICATION. 3 REINFORCED RUBBER BEARING PAD TO CRADLE SURFACE.

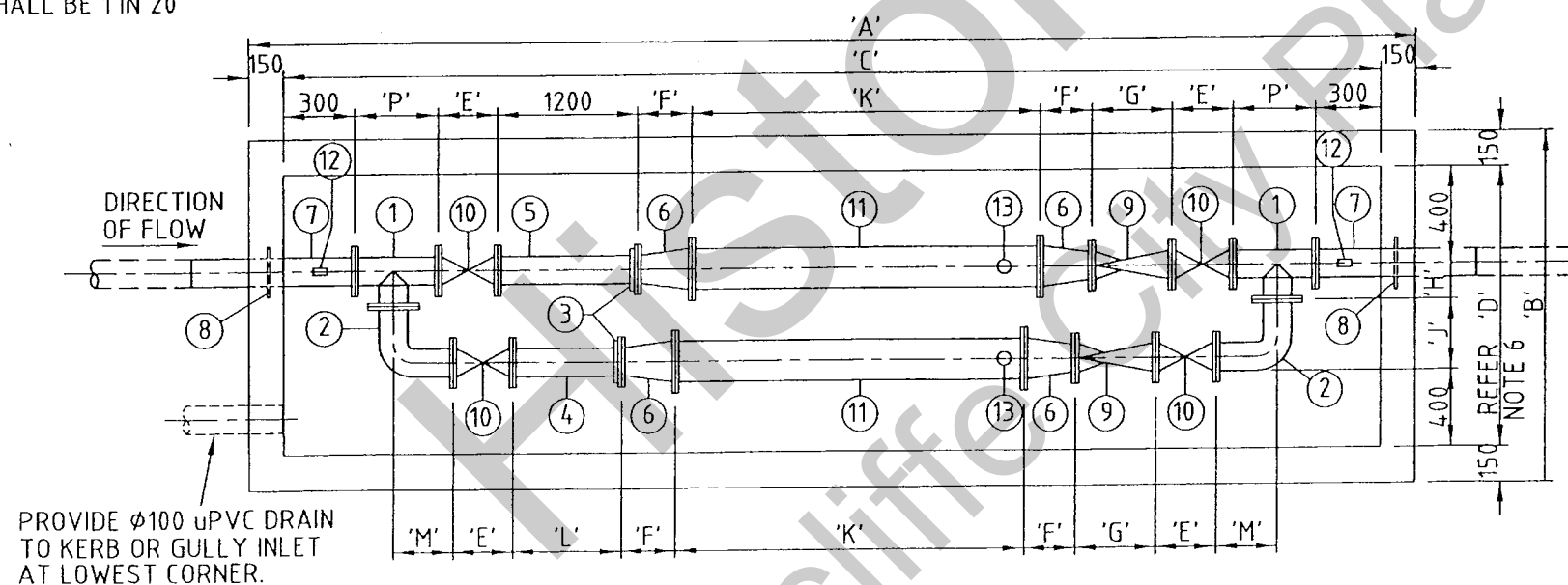
PUMP DESCRIPTION

LOCALITY PLAN

PUMP STATION _____
PUMP TYPE & MODEL _____
MOTOR RATING _____
ENCLOSURE TUBE DIAMETER _____
ENCLOSURE TUBE LENGTH _____
DUTY POINT.....l/s. ATm HEAD _____
WATER SUPPLY PUMP STATION NO. _____
ADDRESS : _____
FILE No. : _____



SECTIONAL ELEVATION



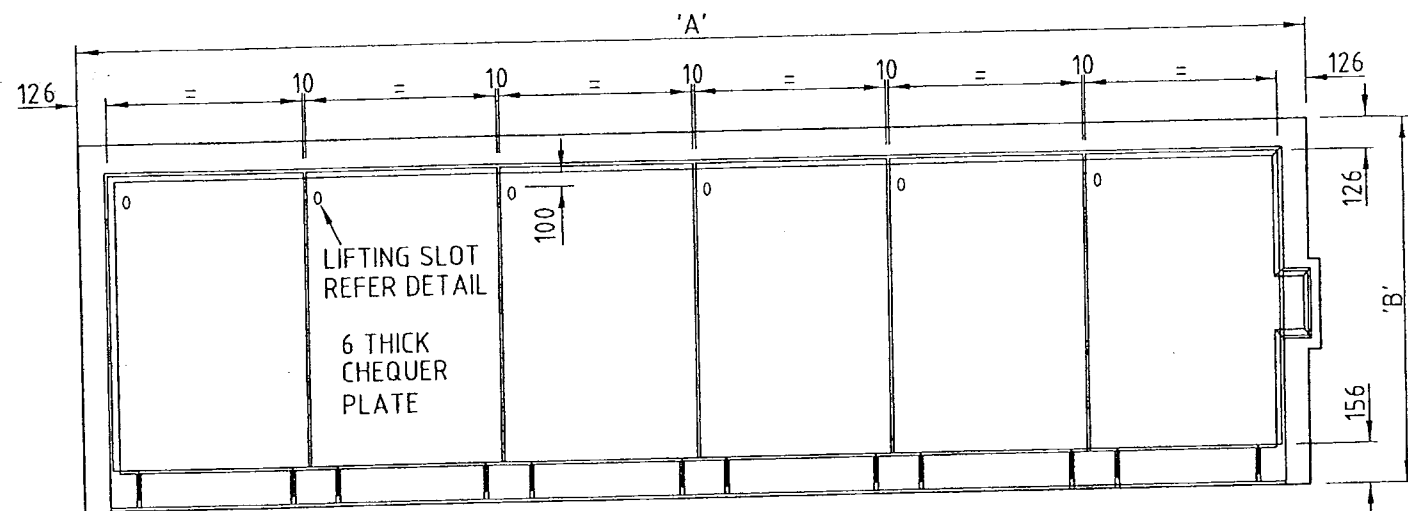
PLAN

NOTES:

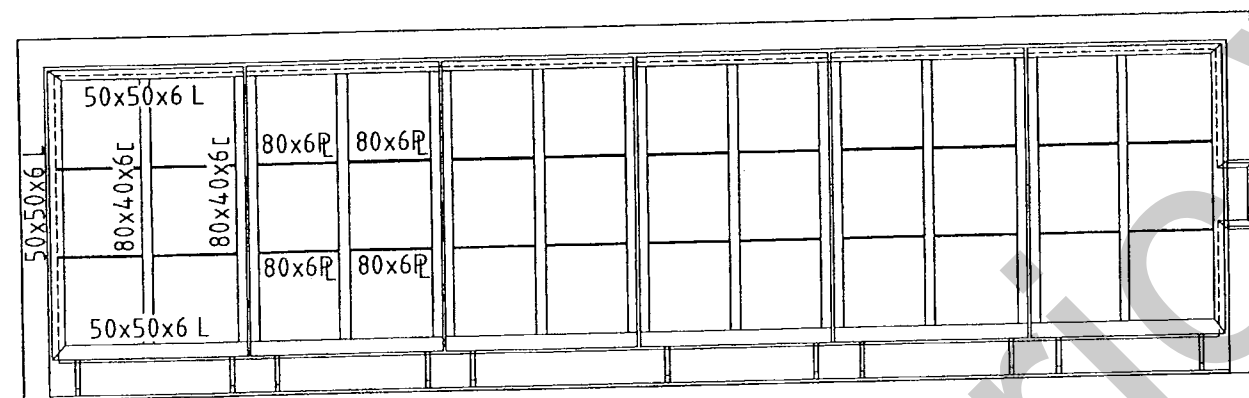
- THE CONSULTANT SHALL COMPLETE AND SUBMIT FOR APPROVAL TO THE COUNCIL ALL TABLES AND DIMENSIONS.
- ALL CAST INSITU CONCRETE TO BE GRADE N25.
- FOR LOCATION OF PUMP STATION CONTROL CUBICLE REFER R.C.C. STD. DWG. NO. 59618.
- FOR PUMP STATION COVER DETAILS REFER R.C.C. STD. DWG. NO'S 59617 TO 59619.
- ALL FLANGES TO BE DRILLED IN ACCORDANCE WITH R.C.C. STANDARD SPECIFICATION SS 2.
- MAXIMUM DIMENSION OF 1300 FOR 'D'.
- AIR VALVE TO BE AT HIGH POINT.
- FOR RESERVOIR DETAILS REFER R.C.C. STANDARD SPECIFICATION SS11.
- PROVIDE 25 ϕ BALL VALVE, PRESSURE GAUGE AND PRESSURE SWITCH.
- THIS DRAWING IS TO BE READ IN CONJUNCTION WITH R.C.C. STANDARD SPECIFICATION SS12 AND SS14.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

MARK	DIMENSION
'A'	
'B'	
'C'	
'D'	
'E'	
'F'	
'G'	
'H'	
'J'	
'K'	
'L'	
'M'	
'N'	
'P'	

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING STANDARD WATER SUPPLY PUMP STATION SHEET 1 OF 4 SHEETS	
	FILE NAME	DATE	BACKUP LOCATION	DATE		A	ORIGINAL ISSUE				As Shown				
			G:\Standard Drawings\RCC\Water								SURV'D.:	CHK'D.:			
											DRN.:	APP'D.:			
<div style="display: flex; justify-content: space-between;"> SHEET 1 of 4 59616 </div>															

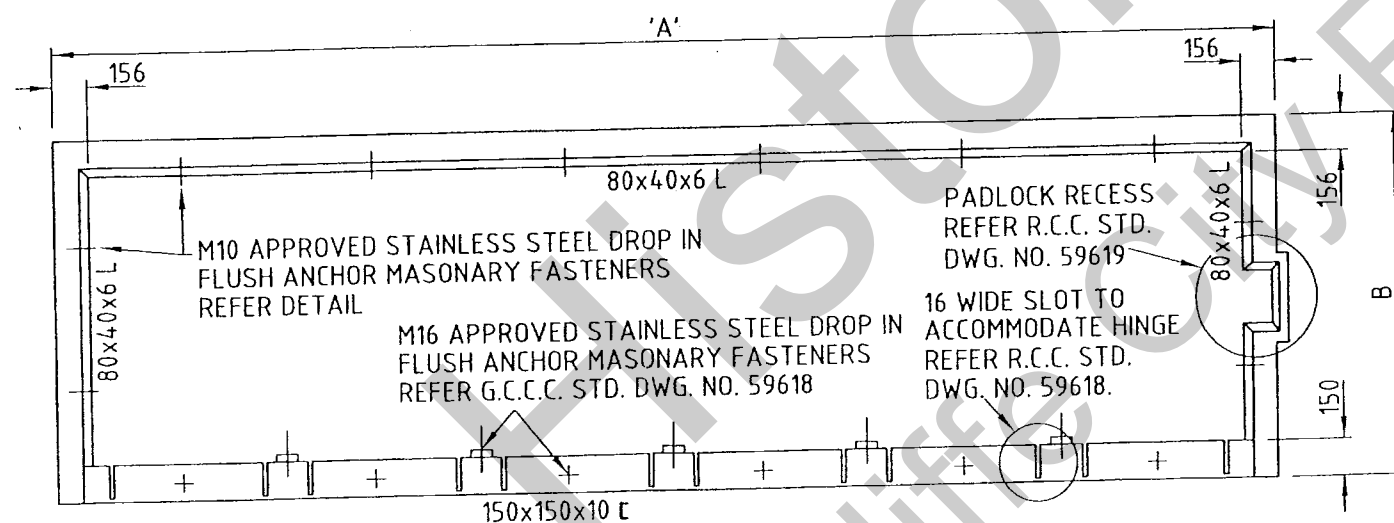


PLAN - COVERS IN PLACE

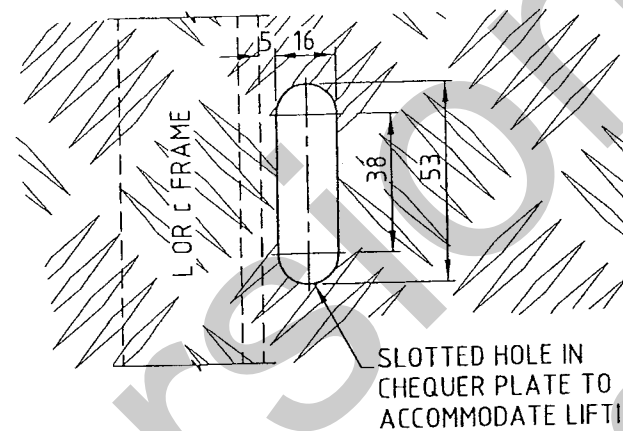


TYPICAL

PLAN - COVER FRAMES



EXTERNAL FRAME

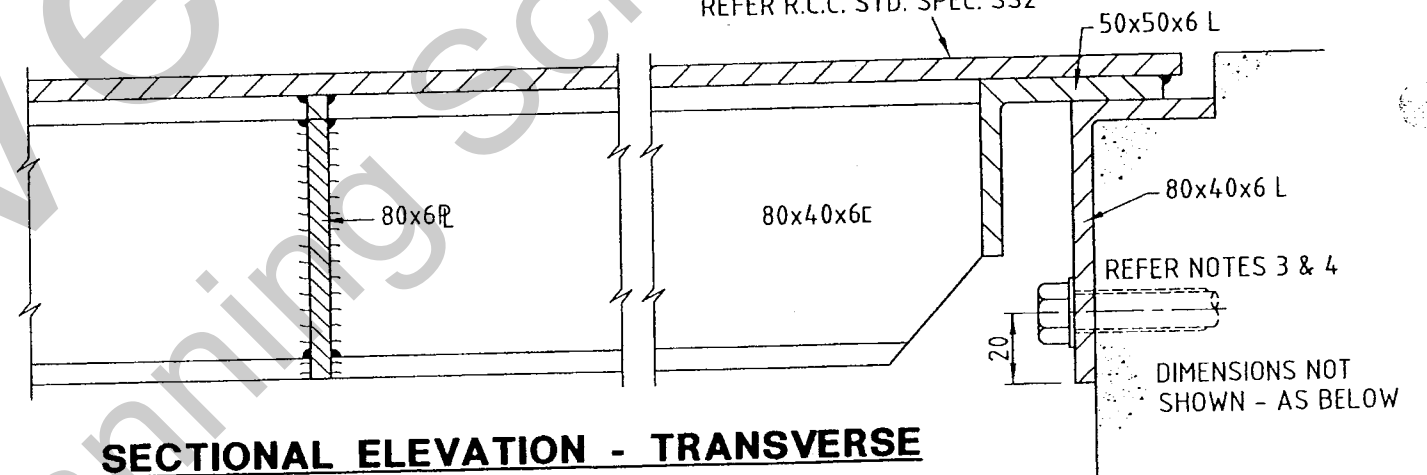


LIFTING SLOT DETAIL

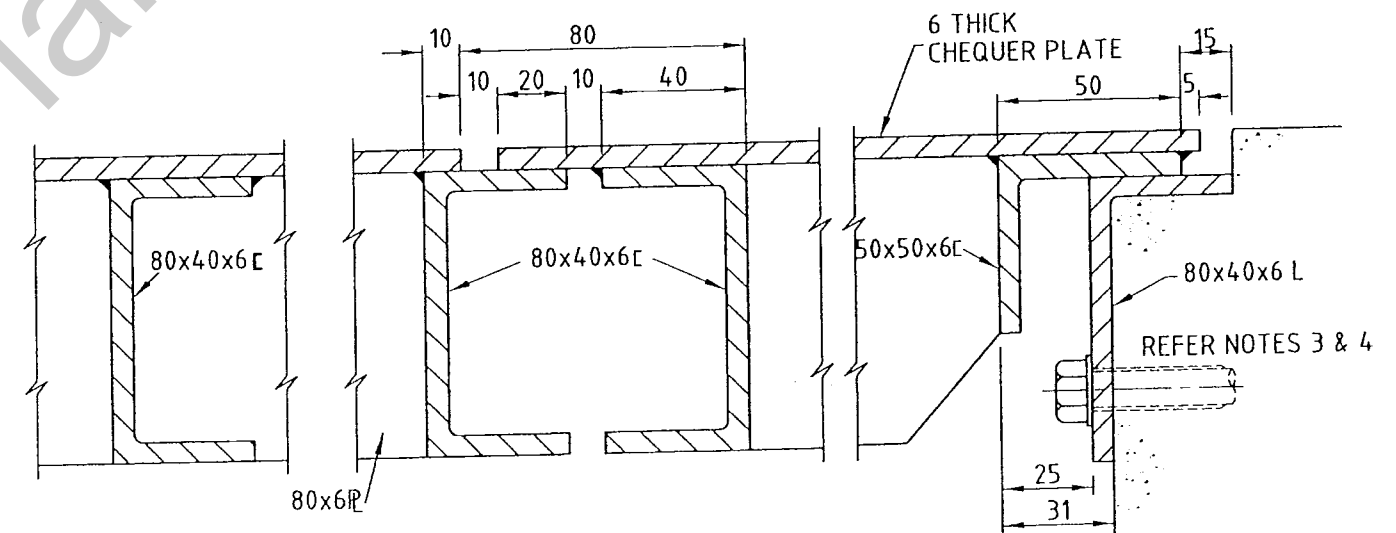
NOTES:

1. ALL COMPONENTS SHALL BE ALLUMINIUM ALLOY 6061-T1 UNLESS SHOWN OTHERWISE
2. ALL CONNECTIONS SHALL BE WELDED WITH 6mm CONTINUOUS FILLET OR FULL STRENGTH BUTT WELDS UNLESS SHOWN OTHERWISE
3. ISOLATE FASTENERS FROM FRAME AND CONCRETE STRUCTURE WITH A BITUMINOUS PAINT TO BOLT SHANK AND TO FRAME.
4. M10 STAINLESS STEEL DROP IN FLUSH ANCHOR MASONRY FASTENERS TO BE POSITIONED AS DETAILED
5. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

6 THICK CHEQUER PLATE WITH ANTI SLIP COATING TO EXTERNAL SURFACES, REFER R.C.C. STD. SPEC. SS2




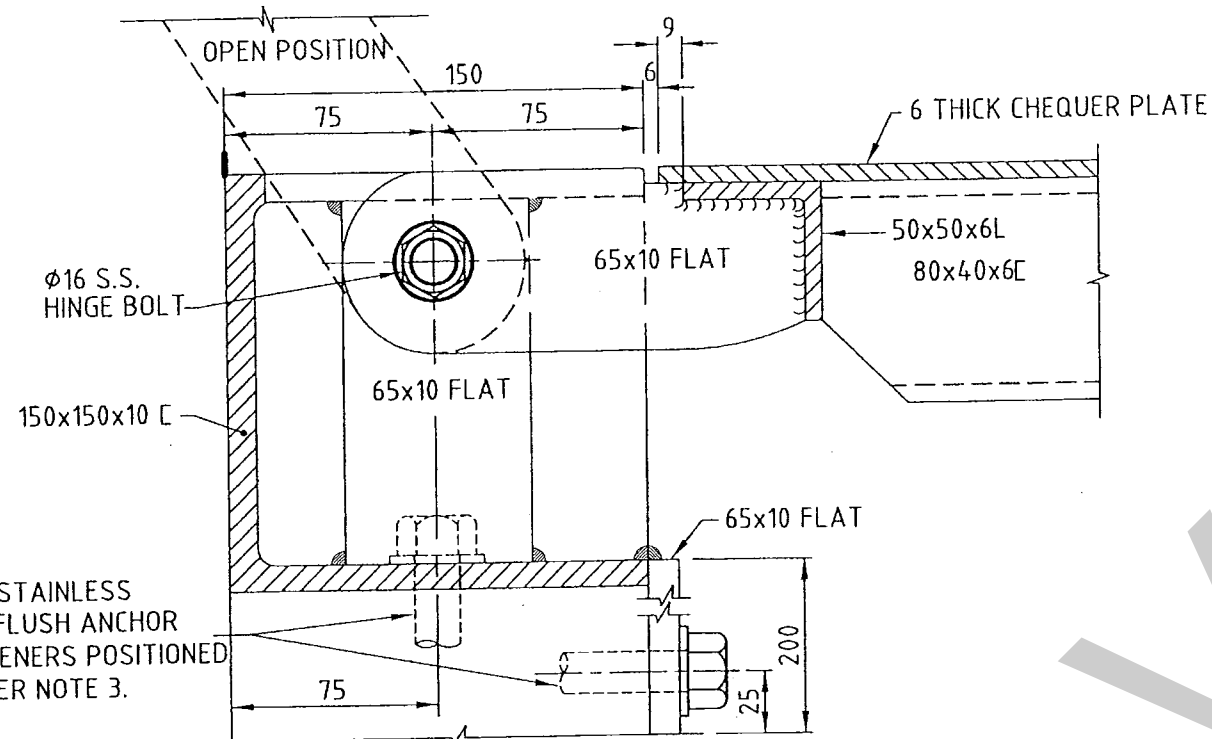
SECTIONAL ELEVATION - TRANSVERSE



SECTIONAL ELEVATION - LONGITUDINAL

COVER DETAILS

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	STANDARD DRAWING					
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			STANDARD WATER SUPPLY PUMP STATION					
														SHEET 2 OF 4 SHEETS					
														A				59617	
G:\Standard Drawings\RCC\Water																			



ELEVATION

16 S.S. HINGE BOLT COMPLETE WITH S.S. WASHERS AGAINST BOLT HEAD, NUT AND BETWEEN FIXINGS. NUT TO BE WELD FIXED TO BOLT

FABRICATE BOTH FIXINGS FROM 65x10 FLAT

SLOT TO TOP OF CHANNEL

150x150x10 C

FABRICATE BOTH FIXINGS FROM 65x10 FLAT

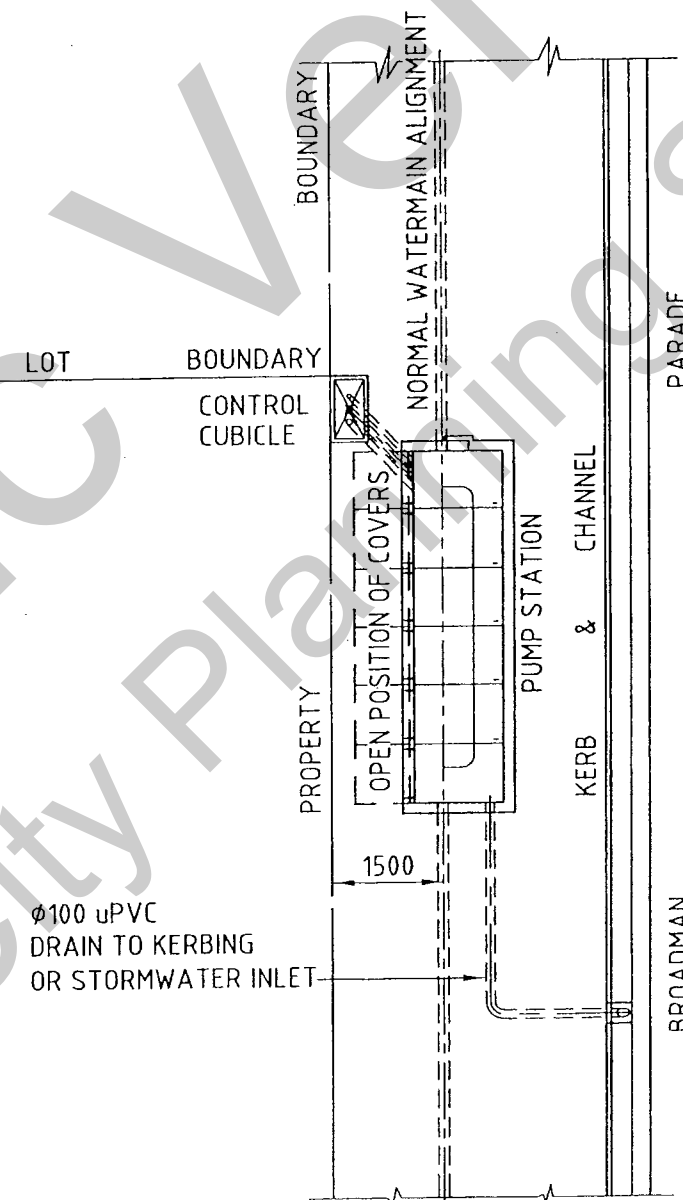
SLOT TO TOP OF CHANNEL

PLAN
RECESSED HINGE DETAIL

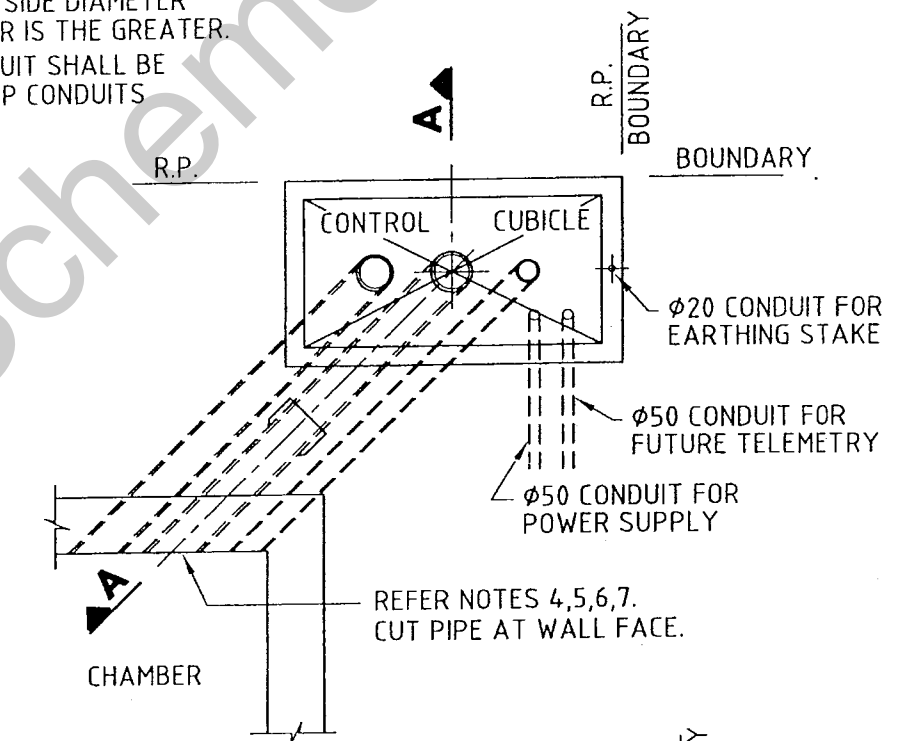
NOTES:

1. LOCATION OF PUMP STATION AND CONTROL CUBICLE SHALL BE AS SHOWN ON THE APPROVED ENGINEERING DRAWINGS.
2. PROVIDE ELECTRICAL CONDUIT TO PUMP STATION CUBICLE IN ACCORDANCE WITH ENERGEX REQUIREMENTS.
3. ALL ALLOY FACES IN CONTACT WITH CONCRETE SURFACES SHALL BE PAINTED WITH BITUMINOUS PAINT.
4. CONDUITS TO BE MINIMUM 63 NOMINAL DIAMETER FOR EACH PUMP AND MINIMUM 50 NOMINAL DIAMETER FOR CONTROL CABLES OR TWICE THE OUTSIDE DIAMETER OF THE INSTALLED CABLE WHICHEVER IS THE GREATER.
5. PUMP CONDUITS AND CONTROL CONDUIT SHALL BE SEPERATED BY A MINIMUM 300. PUMP CONDUITS SHALL BE SEPERATED BY 30.

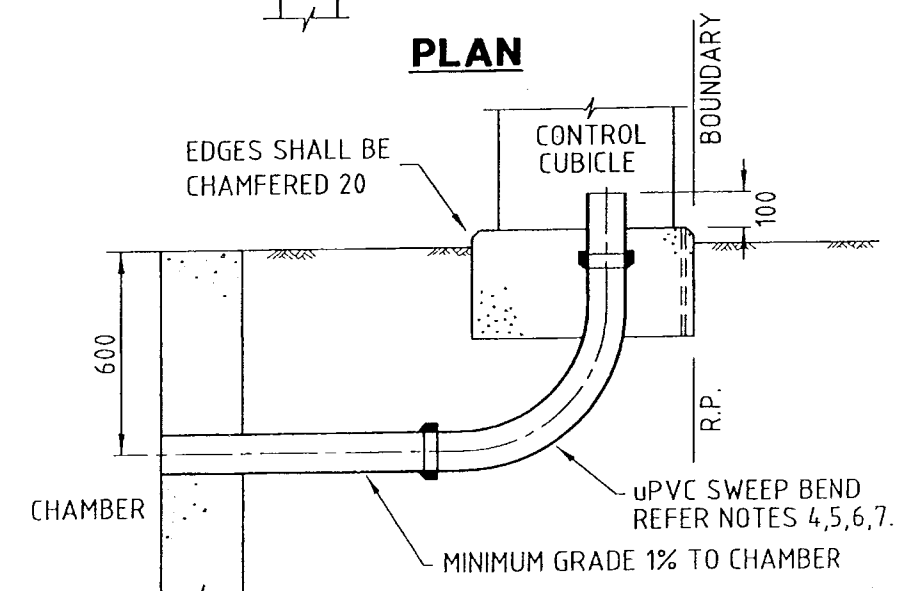
6. CONDUITS SHALL BE INSTALLED IN ACCORDANCE WITH AS/NZS 3000.
7. CONDUITS SHALL BE IN ACCORDANCE WITH AS.2053.
8. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.



TYPICAL ARRANGEMENT PLAN



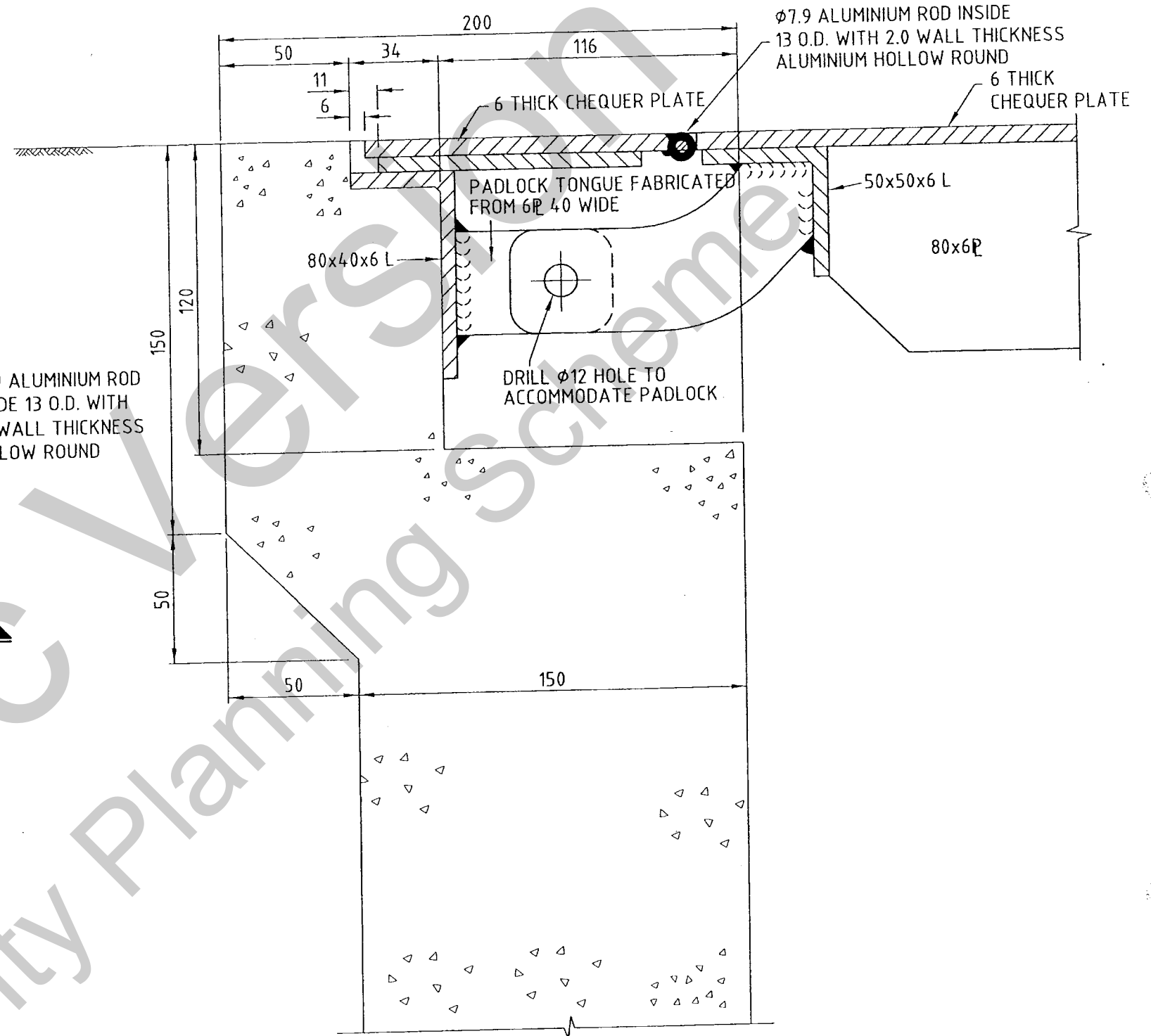
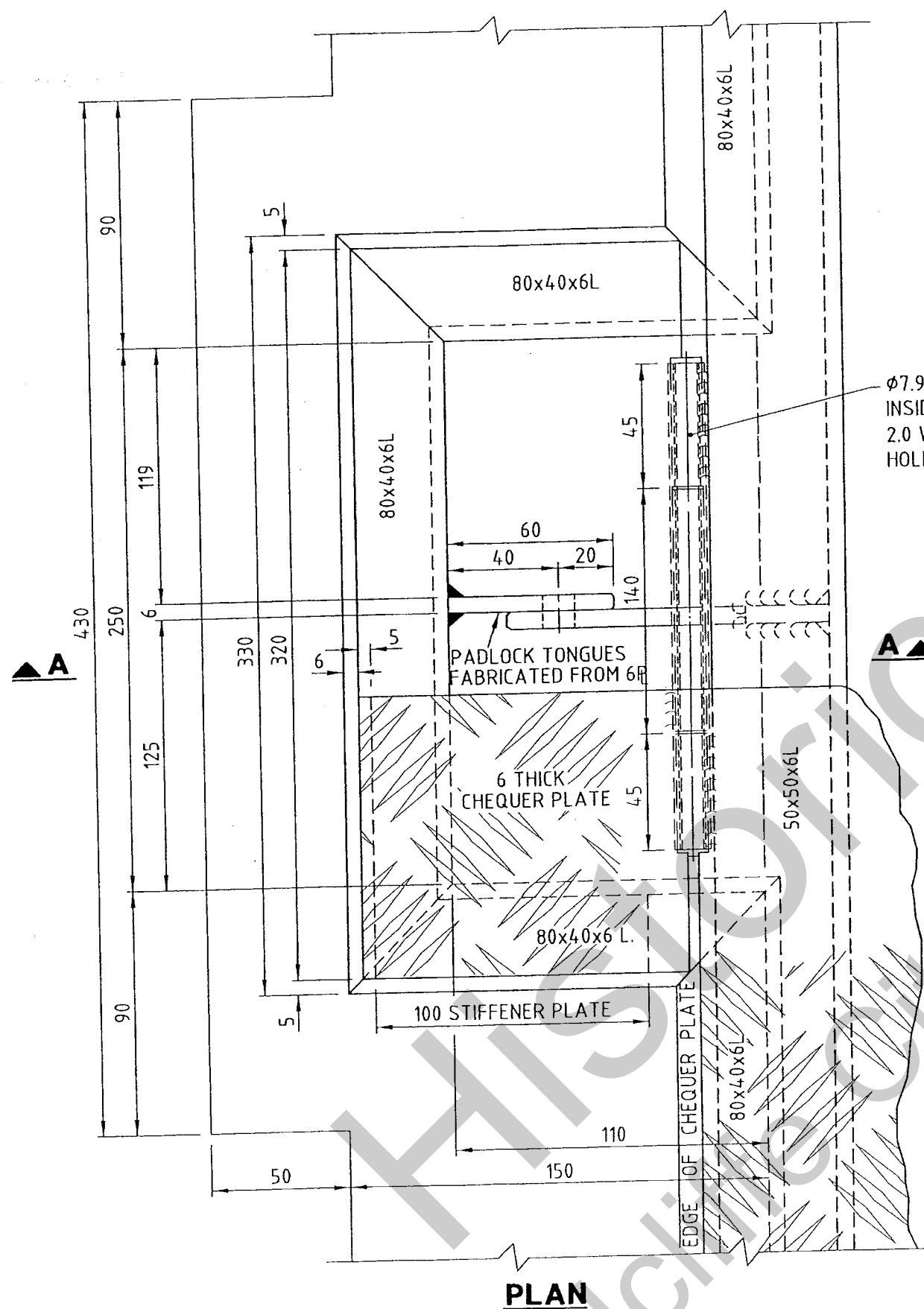
PLAN



SECTION A-A

CONTROL CUBICLE DETAILS

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING			
	FILE NAME	DATE	BACKUP LOCATION	DATE		ORIGINAL ISSUE					SCALE	As Shown		STANDARD WATER SUPPLY PUMP STATIONS			
			G:\Standard Drawings\RCC\Water								SURV'D.	CHK'D.		SHEET 3 OF 4 SHEETS			
											DRN.	APP'D.		A		SHEET 3 of 4	59618

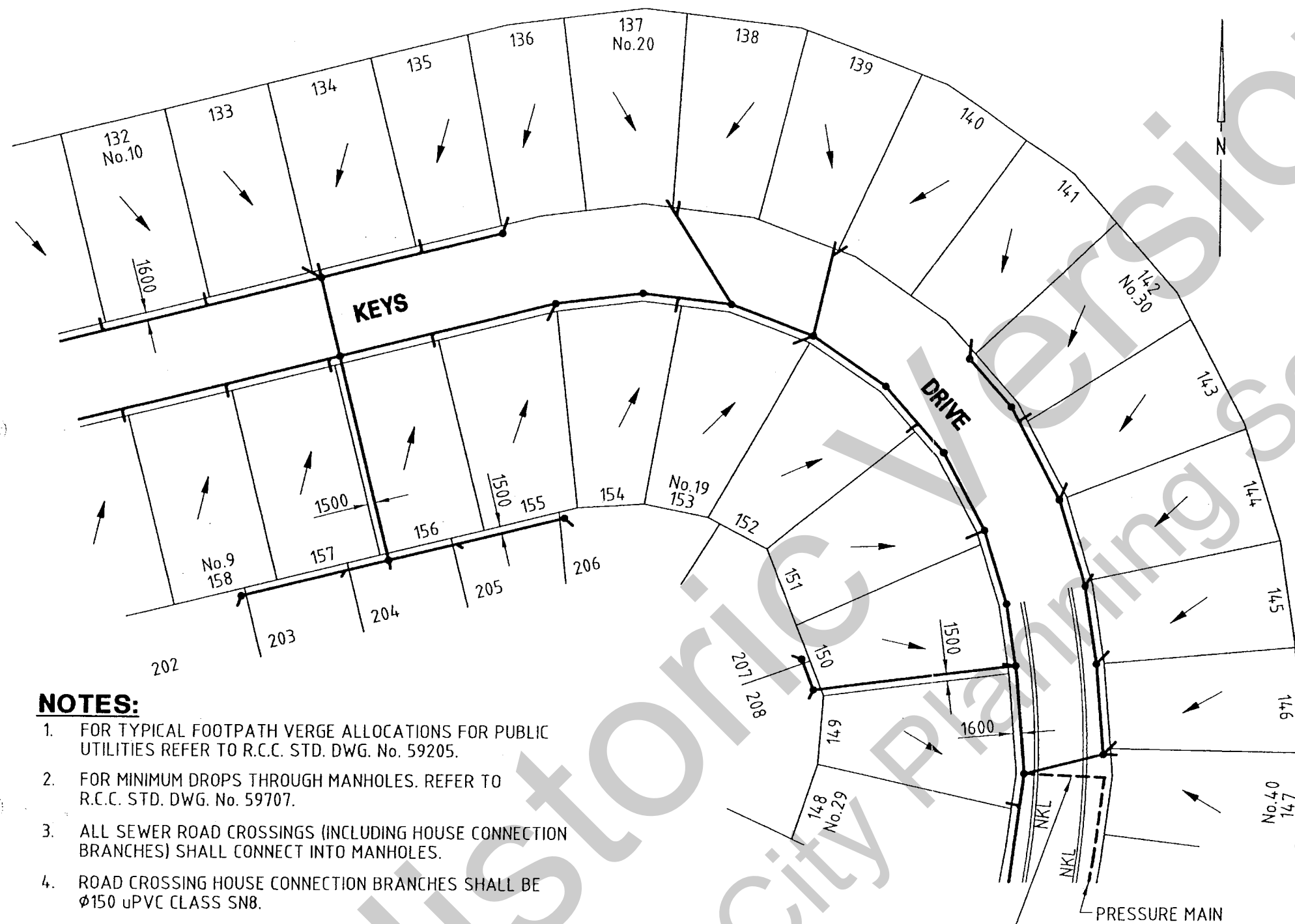


NOTES:

- ALL ALLOY FACES IN CONTACT WITH CONCRETE SURFACES SHALL BE PAINTED WITH BITUMINOUS PAINT.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

PADLOCK RECESS DETAIL

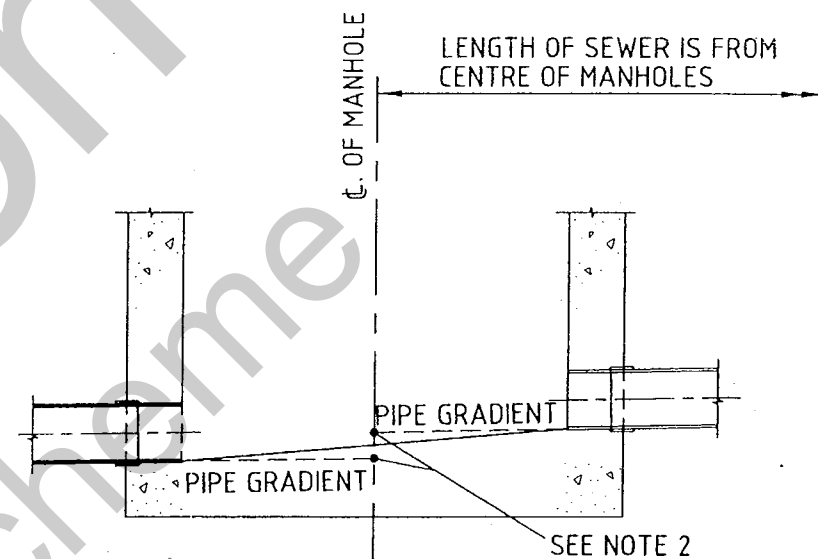
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING STANDARD WATER SUPPLY PUMP STATION SHEET 4 OF 4 SHEETS			
	FILE NAME	DATE	BACKUP LOCATION	DATE		A	ORIGINAL ISSUE				As Shown						
			G:\Standard Drawings\RCC\Water														



NOTES:

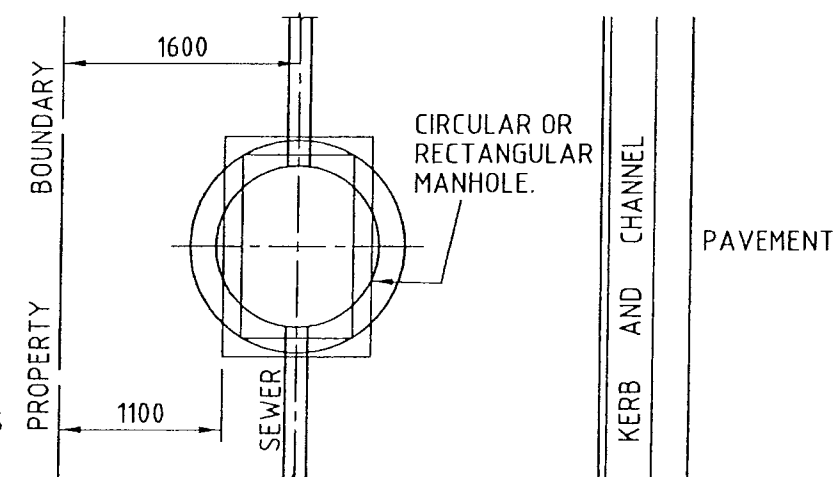
- FOR TYPICAL FOOTPATH VERGE ALLOCATIONS FOR PUBLIC UTILITIES REFER TO R.C.C. STD. DWG. No. 59205.
- FOR MINIMUM DROPS THROUGH MANHOLES. REFER TO R.C.C. STD. DWG. No. 59707.
- ALL SEWER ROAD CROSSINGS (INCLUDING HOUSE CONNECTION BRANCHES) SHALL CONNECT INTO MANHOLES.
- ROAD CROSSING HOUSE CONNECTION BRANCHES SHALL BE $\phi 150$ uPVC CLASS SN8.
- PRIOR TO COMMENCING WORK ON SITE THE CONTRACTOR SHALL DETERMINE THE LOCATION OF ALL EXISTING PUBLIC UTILITIES.
- THE CONTRACTOR SHALL ENSURE THAT THE WORKS ARE CARRIED OUT IN ACCORDANCE WITH THE REQUIREMENTS OF ALL CURRENT ACTS, REGULATIONS AND LOCAL LAWS.
- FOR CONSTRUCTION TOLERANCES REFER COUNCIL'S STANDARD SPECIFICATION SS1.
- ALL DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

TYPICAL LAYOUT PLAN



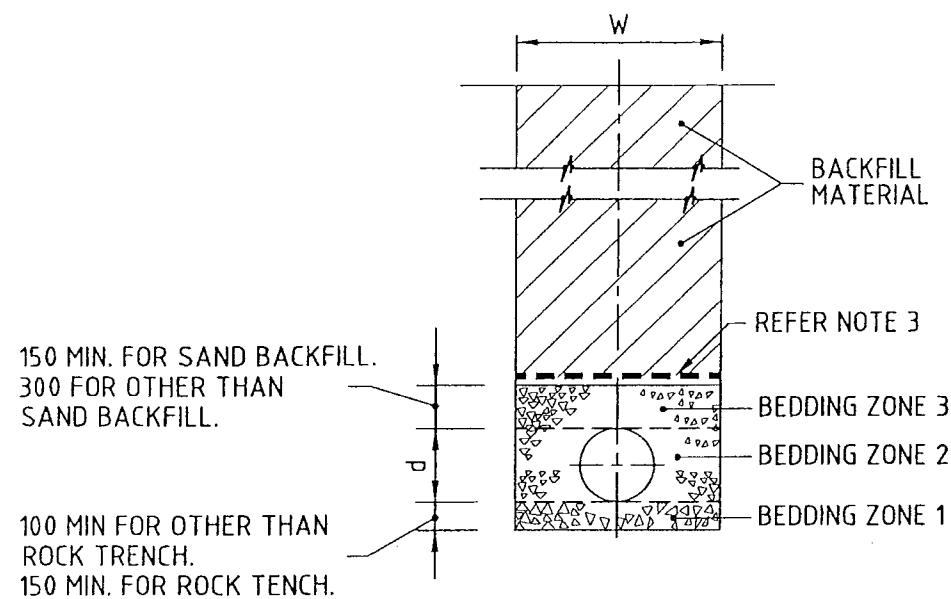
SETTING OUT DETAILS

ROAD CROSSING OF PRESSURE MAINS SHALL BE DUCTILE IRON FROM BACK OF KERB TO BACK OF KERB WITH MINIMUM COVER OF 600. MARKING SHALL BE CONDUIT MARKERS PLACED ON EACH KERB STATING "S" FOR SEWERAGE. WORK PERFORMED BY R.C.C. CONTRACTOR

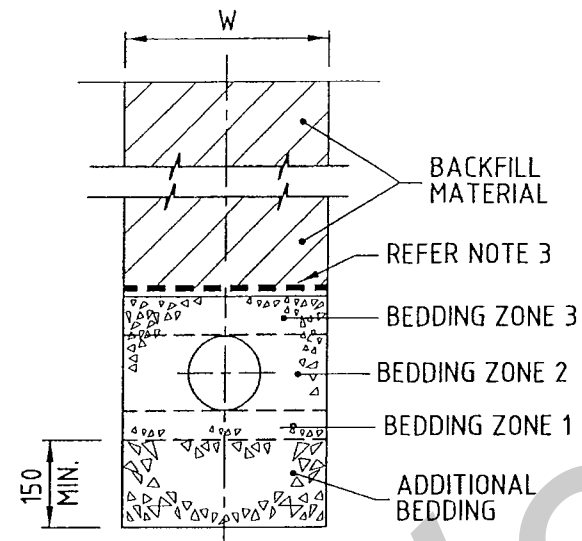


SEWER LOCATION IN FOOTPATH

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div>CITY COUNCIL</div>	<div>STANDARD DRAWING</div> <div>SEWERAGE RETICULATION</div> <div>TYPICAL ARRANGEMENT DETAILS</div> <div>SHEET 1 of 1</div> <div>59701</div>			
	FILE NAME	DATE	BACKUP LOCATION	DATE													
			G:\Standard Drawings\RCC\Sewage		A	ORIGINAL ISSUE				SCALE	As Shown						
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										DRN.	APP'D.						

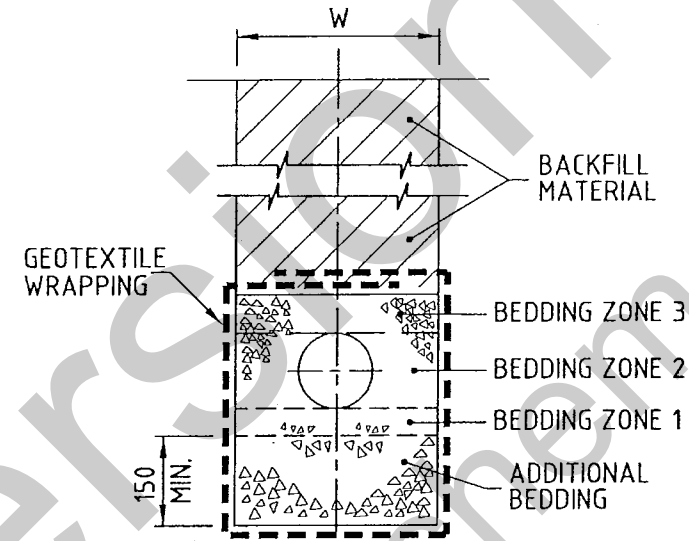


TYPE 1 CONSTRUCTION



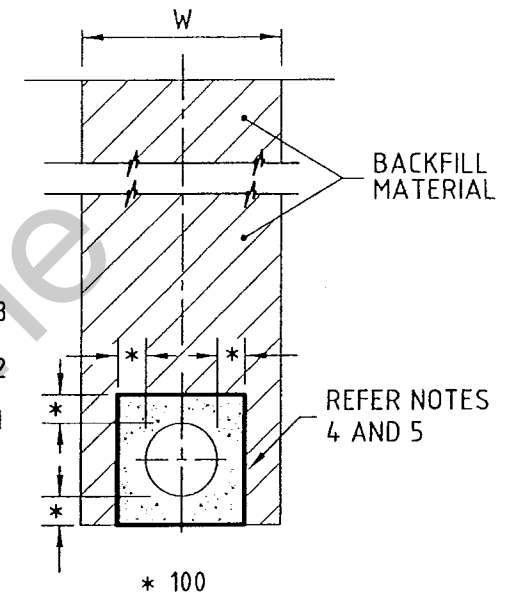
TYPE 2 CONSTRUCTION

FOR DETAILS OF BEDDING ZONES 1, 2 AND 3
REFER TO TYPE 1 CONSTRUCTION.

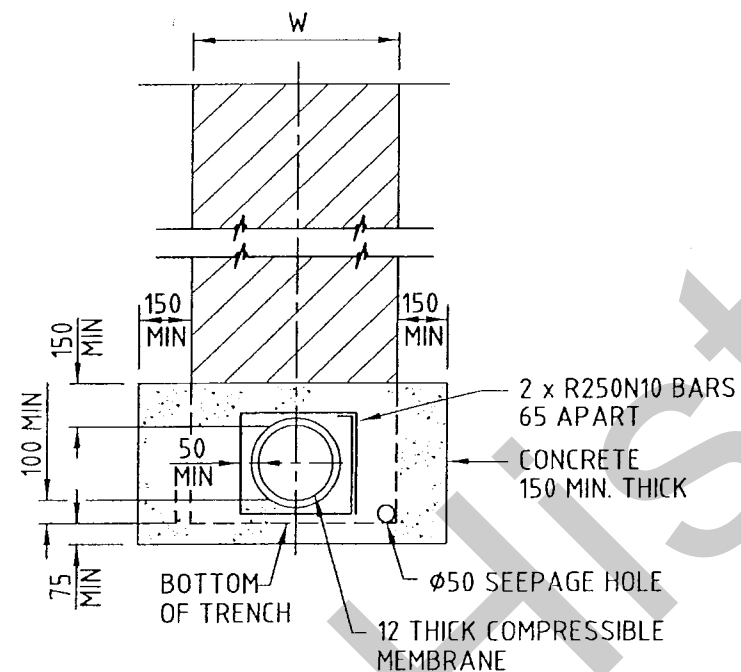


TYPE 3 CONSTRUCTION

FOR DETAILS OF BEDDING ZONES 1, 2 AND 3
REFER TO TYPE 1 CONSTRUCTION.



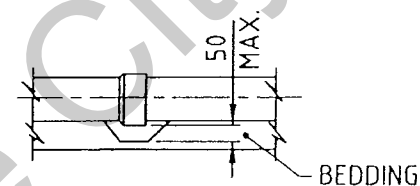
TYPE 4 CONSTRUCTION



CONCRETE BULKHEADS

REFER NOTE 2

PIPE NOM. DIA. d	GRAVITY & PRESSURE TRENCH WIDTH W
100	450
150	450
225	600
300	750

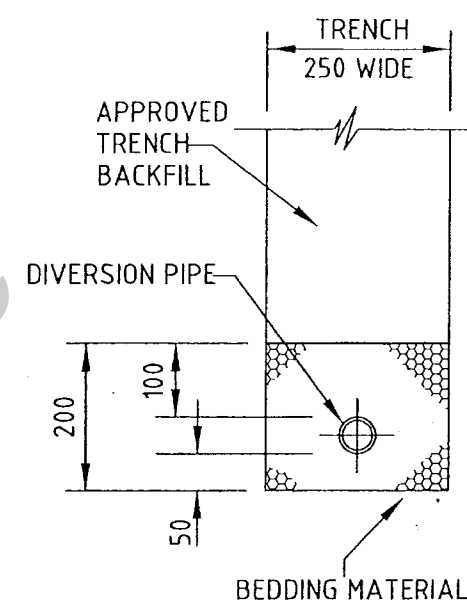
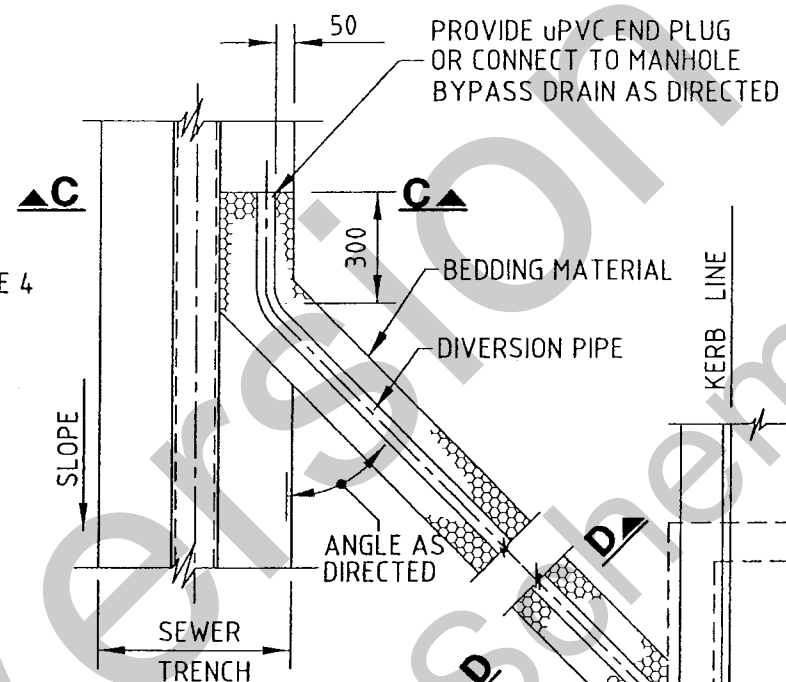
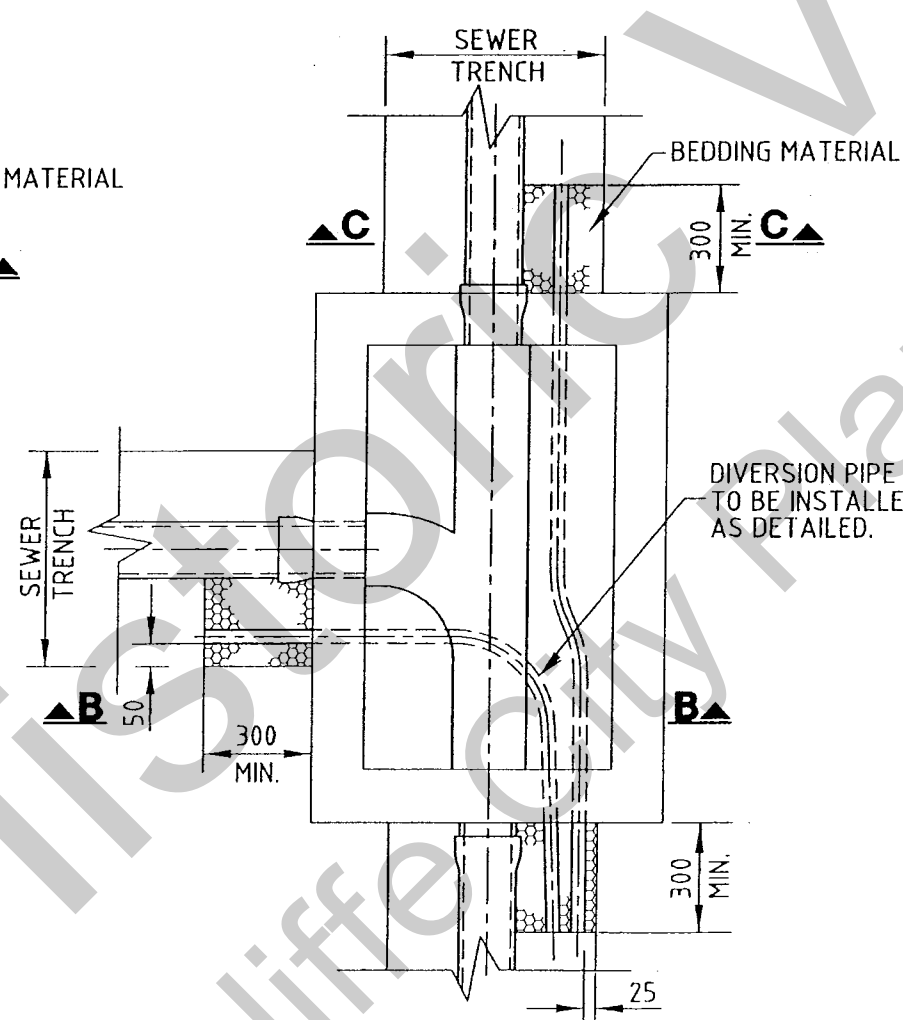


HANDHOLES

NOTES:

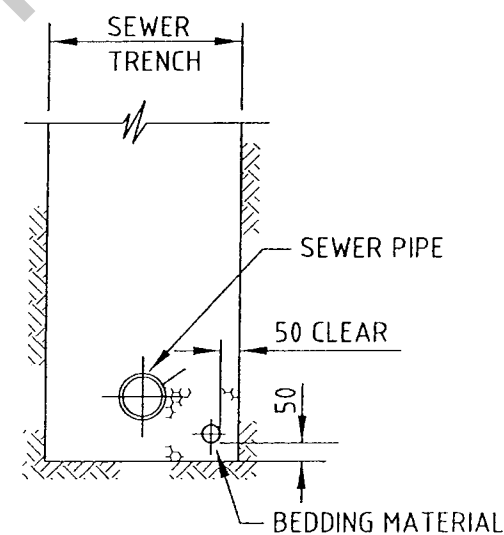
- FOR EXCAVATION, BEDDING AND BACKFILL REQUIREMENTS REFER COUNCIL'S STANDARD SPECIFICATION SS 1.
- CONCRETE BULKHEADS SHALL BE SPACED AT:-
(A) 6m INTERVALS FOR $\phi 100$ TO $\phi 300$ PIPES WITH GRADES BETWEEN 15% AND 29%.
(B) WHERE GRADES EXCEED 29%, THE SPACING IN METRES, SHALL BE CALCULATED BY DIVIDING 100 BY THE GRADE (%).
- CONCRETE IN BULKHEADS IS TO BE GRADE N20.
- WHERE BACKFILL IS CLASSIFIED AS SAND (BY THE SUPERINTENDENT) A GEOTEXTILE BARRIER SHALL BE PROVIDED AT THE INTERFACE OF BEDDING ZONE 3 AND BACKFILL.
- THE PIPE SHALL BE WRAPPED WITH DENSO TAPE OR SIMILAR OR UPVC SLEEVED AND TAPED FOR THE EXTENT OF CONCRETE SURROUND.
- A SHORT PIPE 500 LONG SHALL BE INSTALLED IMMEDIATELY UPSTREAM AND DOWNSTREAM OF THE ENCASED SECTION OF PIPELINE.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING SEWER AND HOUSE CONNECTION TRENCH AND BEDDING DETAILS				
	FILE NAME	DATE	BACKUP LOCATION	DATE		ORIGINAL ISSUE					As Shown							
			G:\Standard Drawings\Rcc\Sewage															
											SURV'D.	CHK'D.						
											DRN.	APP'D.						
														A			SHEET 1 of 1	59702



SECTION D-D
DIVERSION DRAIN
TRENCH



PLAN
DIVERSION DRAIN TO
STORMWATER OUTLET



SECTION C-C

NOTES

1. DIVERSION PIPES AND FITTINGS TO BE Ø50 SLOTTED POLYTHYLENE CLASS 400 TO A.S.2439.
2. FOR BEDDING MATERIAL REQUIREMENTS (GRADE 5/7) REFER COUNCIL'S STANDARD SPECIFICATION SS 1.
3. DIVERSION DRAINS ARE TO BE FITTED WITH A FILTER SLEEVE/sock AS DIRECTED BY THE SUPERINTENDENT.
4. VISQUEEN OR SIMILAR TO BE LAID UNDER THE LIMITS OF THE MANHOLE.
5. LOCATE THE DIVERSION PIPE CENTRALLY IN TRENCH 50 ABOVE TRENCH FLOOR. PROVIDE END CAPS AT ALL PIPE ENDS.
6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING STANDARD FOR DRAINAGE OF SEWER AND TRENCHES AND DIVERSION DRAINS								
	FILE NAME	DATE	BACKUP LOCATION		DATE	A	ORIGINAL ISSUE				SCALE	As Shown		 REDCLIFFE CITY COUNCIL	A					SHEET 1 of 1	59704	
			G:\Standard Drawings\Rcc\Sewage								SURV'D.:	CHK'D.:										
											DRN.:	APP'D.:										

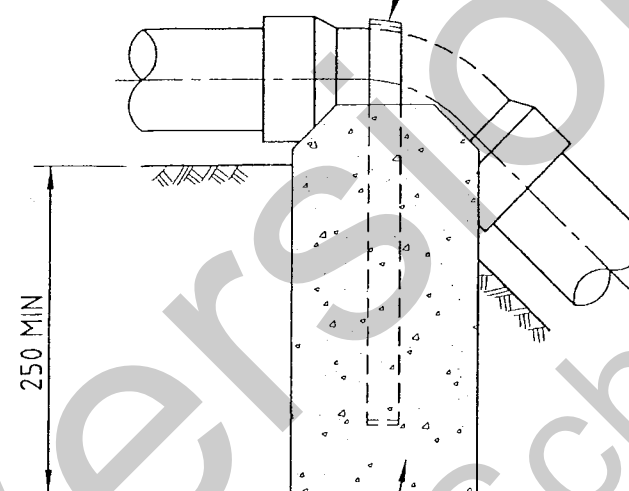
PIPE DIA	FITTING	MAX THRUST IN kN	THRUST BLOCK HEIGHT	SOFT CLAY 50 kPa	MEDIUM CLAY SANDY LOAM 100 kPa	SAND & GRAVEL HARD CLAY 150 kPa	SAND & GRAVEL CEMENTED WITH CLAY 200 kPa	ROCK 240 kPa
100	90° BEND	14.9	400	750	●	●	●	●
	60° BEND	10.5		●	●	●	●	●
	45° BEND	8.04		●	●	●	●	●
	22.5° BEND	4.10		●	●	●	●	●
	11.25° BEND	2.06		●	●	●	●	●
	TEE OR CLOSED END	10.5		●	●	●	●	●
150	90° BEND	31.4	450	1400	700	●	●	●
	60° BEND	22.2		1000	●	●	●	●
	45° BEND	17.0		800	●	●	●	●
	22.5° BEND	8.67		●	●	●	●	●
	11.25° BEND	4.36		●	●	●	●	●
	TEE OR CLOSED END	22.2		1000	●	●	●	●
225	90° BEND	67.1	600	SPECIAL DESIGN	1150	750	●	●
	60° BEND	47.5		1600	800	●	●	●
	45° BEND	36.3		1250	650	●	●	●
	22.5° BEND	18.5		650	●	●	●	●
	11.25° BEND	9.30		●	●	●	●	●
	TEE OR CLOSED END	47.5		1600	800	●	●	●
300	90° BEND	119.2	700	SPECIAL DESIGN	1700	1150	850	700
	60° BEND	84.0		SPECIAL DESIGN	1200	900	●	●
	45° BEND	64.3		SPECIAL DESIGN	950	●	●	●
	22.5° BEND	32.8		950	●	●	●	●
	11.25° BEND	16.5		●	●	●	●	●
	TEE OR CLOSED END	84.0		SPECIAL DESIGN	1200	900	●	●

● INDICATES BLOCK LENGTH OF 600

THRUST BLOCK LENGTHS

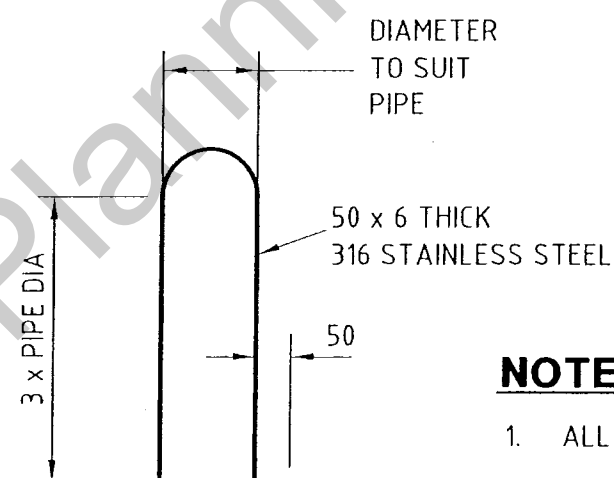
THRUST BLOCK DIMENSIONS

STAINLESS STEEL STRAP WITH 3 THICK INSERTION RUBBER BETWEEN STRAP AND BEND

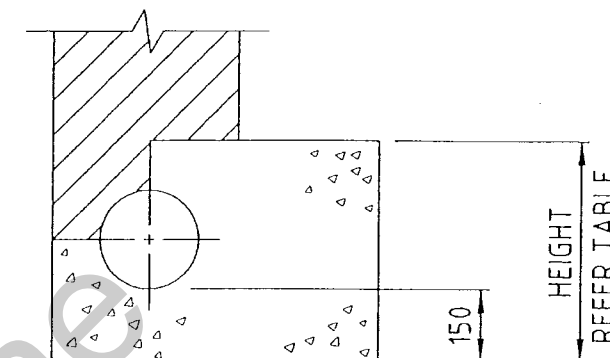


CONCRETE TO EXTEND 150 MIN INTO EACH TRENCH WALL

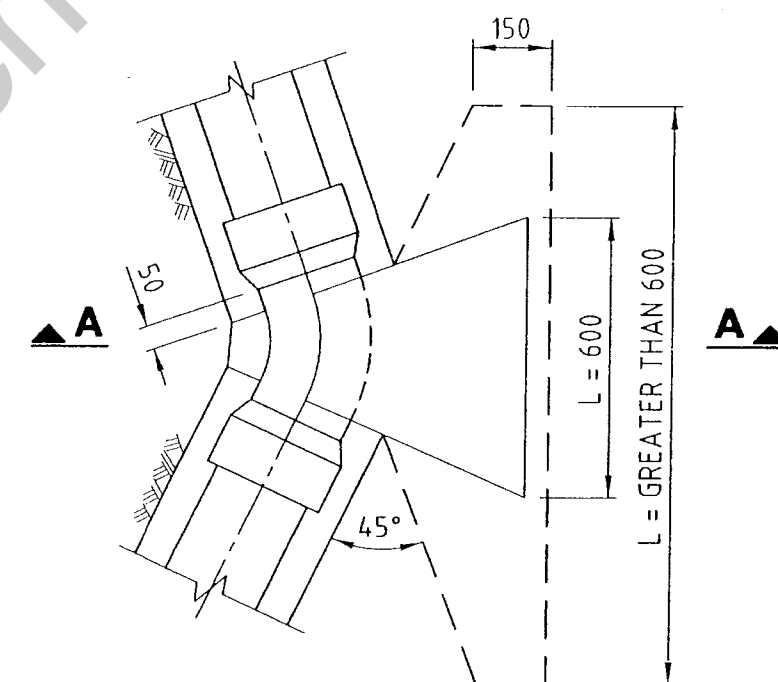
VERTICAL BENDS



SS STRAP




SECTION A-A



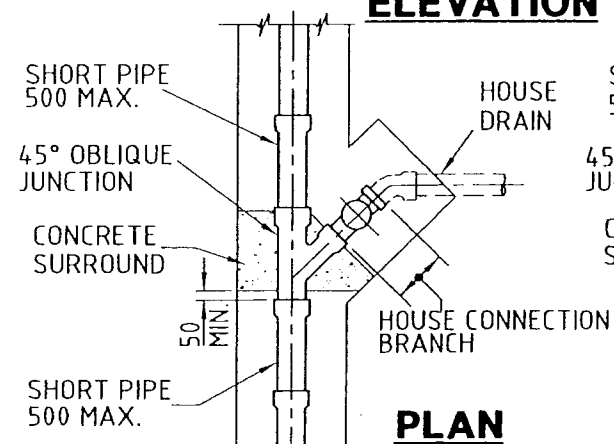
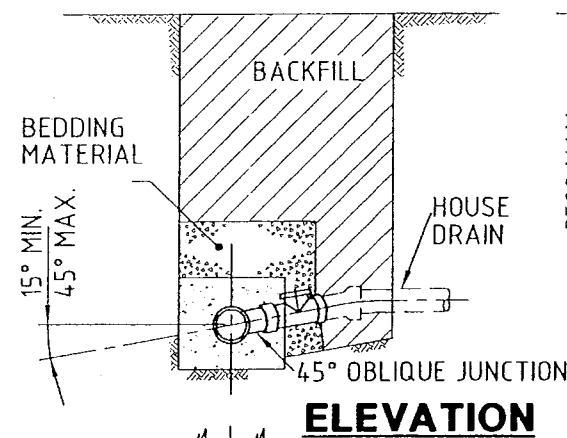
PLAN

NOTES:

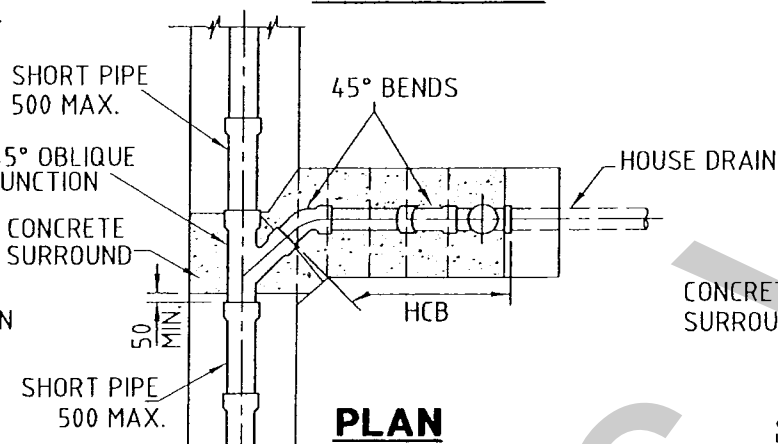
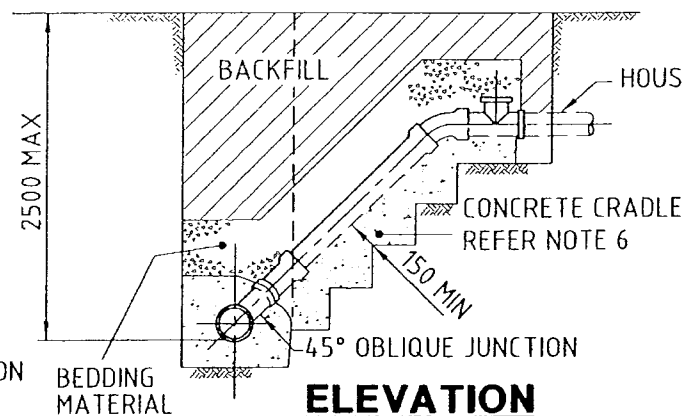
- ALL CONCRETE TO BE GRADE N20.
- THRUST BLOCKS SHALL BE CAST AGAINST THE UNDISTURBED SIDE OF THE TRENCH. KEEP CONCRETE CLEAR OF SOCKETS, FLANGES AND BOLTS.
- THE TABLE OF DIMENSIONS ASSUME A TEST PRESSURE OF 900 kPa. (90m HEAD). VARIATION FROM THE DIMENSIONS SHOWN WILL BE SUBJECT TO JUSTIFICATION BY CALCULATIONS.
- POLYETHYLENE SLEEVING SHALL COMPLY WITH THE REQUIREMENTS OF COUNCIL'S STANDARD SPECIFICATION SS1.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING				
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			SEWERAGE PRESSURE MAIN				
			G:\Standard Drawings\Rcc\Sewage							SURV'D.:	CHK'D.:			THRUST BLOCK DETAILS				
										DRN.:	APP'D.:			SHEET 1 of 1				
														59705				

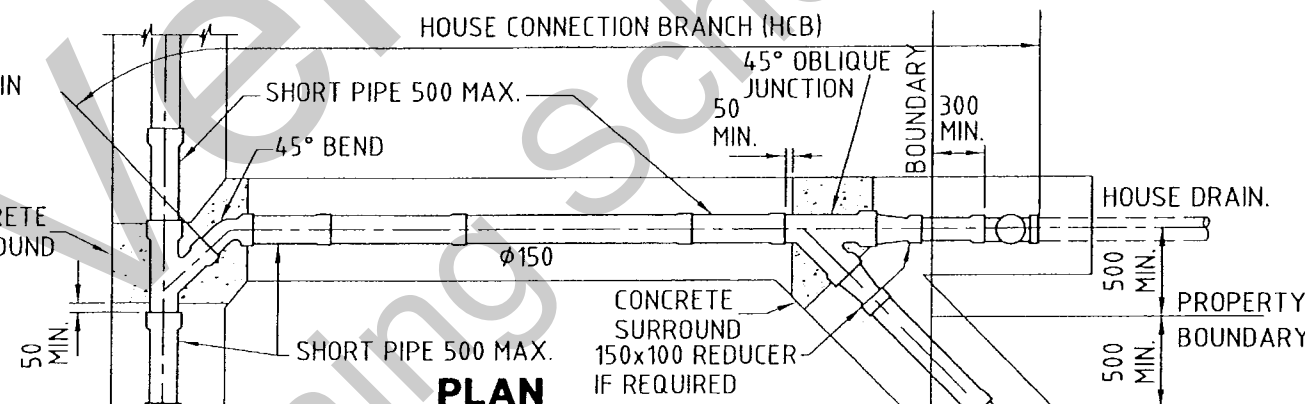
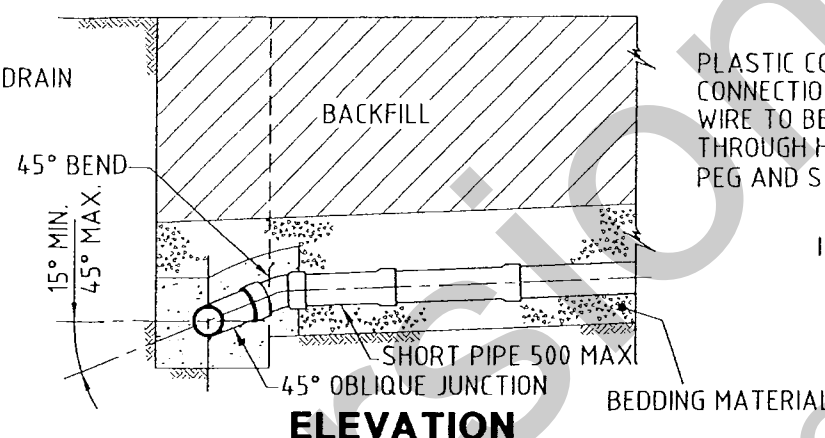
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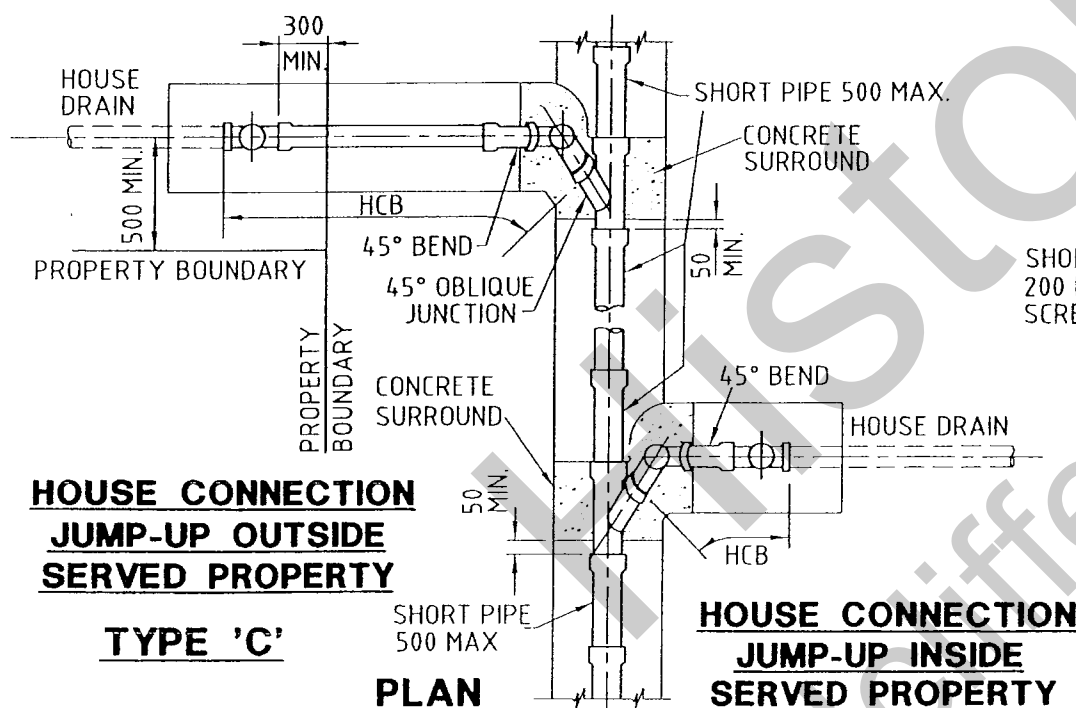
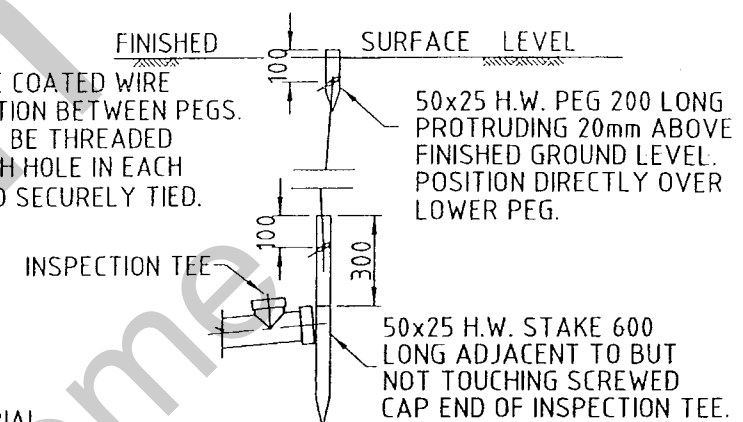
TYPE 'A'
HOUSE CONNECTION WITHIN PRIVATE PROPERTY



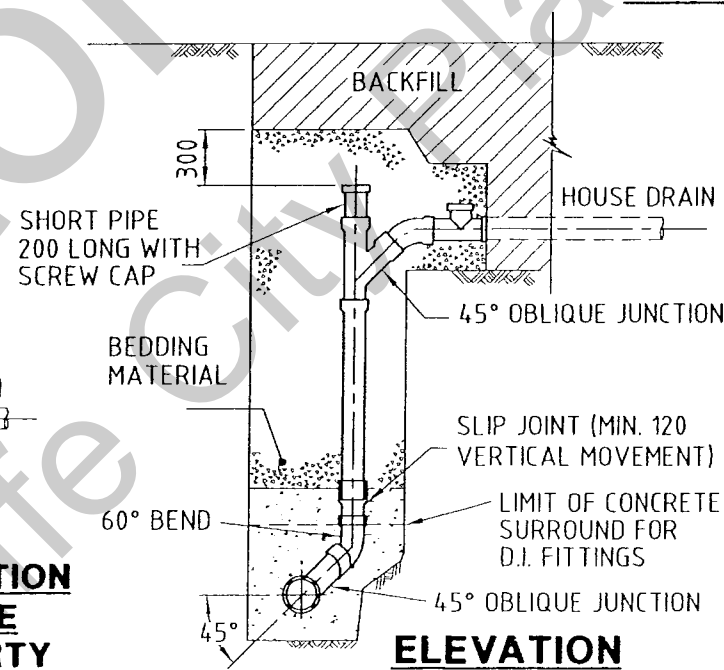
TYPE 'B'
HOUSE CONNECTION WITHIN PRIVATE PROPERTY SLOPE UP TYPE



DUAL HOUSE CONNECTION OUTSIDE PRIVATE PROPERTY NOT CROSSING ROAD



HOUSE CONNECTION JUMP-UP OUTSIDE SERVED PROPERTY
TYPE 'C'

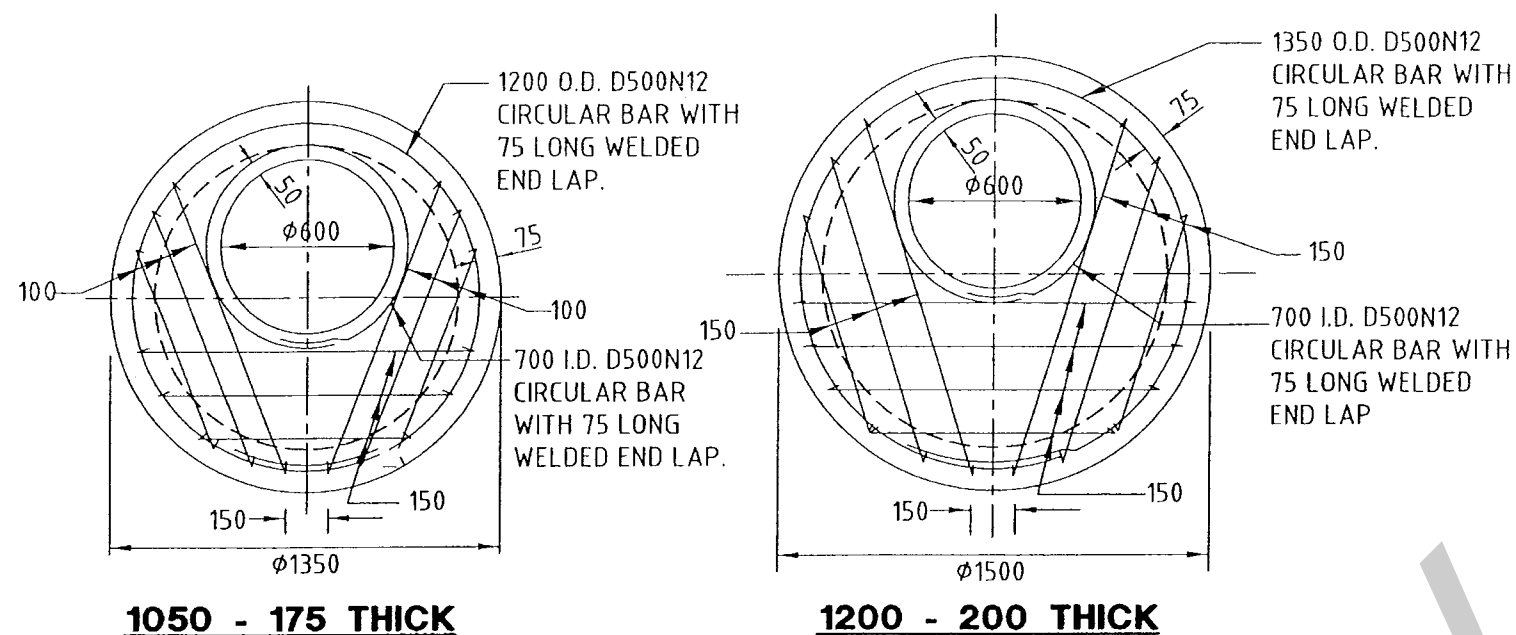


HOUSE CONNECTION JUMP-UP INSIDE SERVED PROPERTY

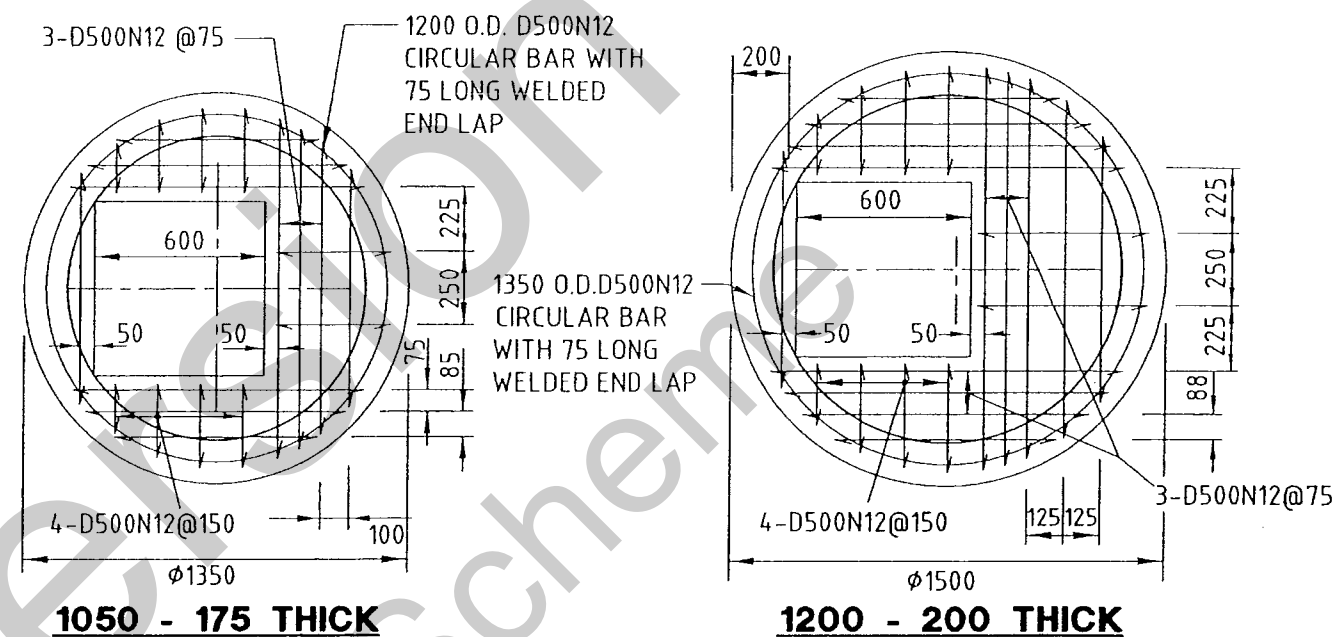
NOTES:

1. ALL HOUSE CONNECTION BRANCHES SHALL HAVE A MINIMUM GRADE OF 1 in 60 FOR $\phi 100$ AND 1 in 80 FOR $\phi 150$.
2. LIMIT OF WORKS - ALL HOUSE CONNECTION BRANCHES SHALL FINISH WITH AN INSPECTION TEE WITH THE END AND INSPECTION OPENING SCREW CAPPED TO THE INVERT LEVEL SHOWN ON THE DRAWINGS.
3. ALL HOUSE CONNECTION BRANCHES CROSSING ROADS SHALL CONNECT INTO MANHOLES.
4. SHOULD A TYPE 'C' HOUSE CONNECTION BE AT A DEPTH GREATER THAN 2500 (SURFACE LEVEL TO INVERT LEVEL), THE OBLIQUE JUNCTION AND ADJOINING BEND SHALL BE EITHER DUCTILE IRON WITH A FUSION BONDED EPOXY COATING OR G.R.P. DROP SEWER JUNCTION (JOINT COMMITTEE APPROVED) OR FACTORY ASSEMBLED FITTING APPROVED BY COUNCIL.
5. BEDDING MATERIAL SHALL COMPLY WITH THE REQUIREMENTS OF COUNCIL'S STANDARD SPECIFICATION SS1.
6. PROVIDE CONCRETE CRADLE IN LOCATIONS OTHER THAN SAND. BEDDING ZONE MATERIAL SHALL BE USED IN SAND LOCATIONS AS DIRECTED BY THE SUPERINTENDENT.
7. CONCRETE SURROUNDS AND CRADLES SHALL BE CONCRETE GRADE N20 FIRMLY PACKED TO SUPPORT OBLIQUE JUNCTION AND PIPES. THE SURROUNDS SHALL EXTEND FROM THE TRENCH WALLS AND FLOOR TO A MINIMUM 150 ABOVE PIPEWORK OR AS SHOWN.
8. ALL PIPE JOINTS SHALL CONFORM WITH COUNCIL'S STANDARD SPECIFICATION SS 1 AND THE MANUFACTURERS RECOMMENDATIONS.
9. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING SEWERAGE HOUSE CONNECTION CONSTRUCTION DETAILS		SHEET 1 of 1	59706
	FILE NAME	DATE	BACKUP LOCATION	DATE	No.	ORIGINAL ISSUE									
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									SURV'D.	CHK'D.					
									DRN.	APP'D.					

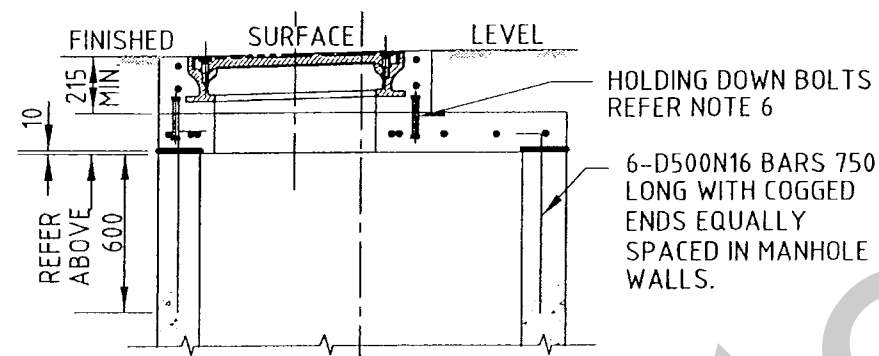


CIRCULAR CONVERTOR SLABS

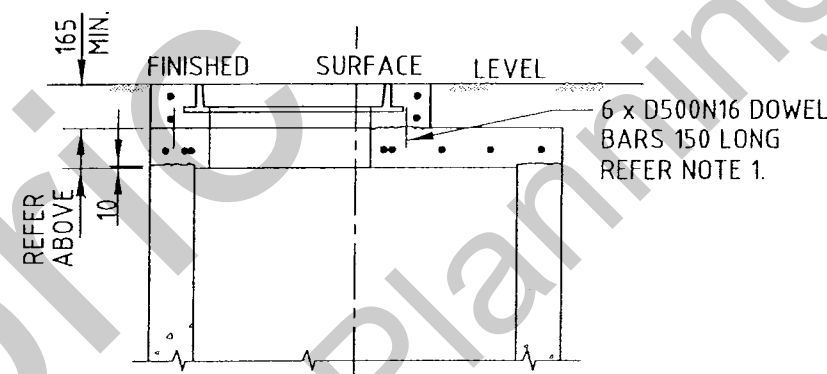


SQUARE CONVERTOR SLABS

CONVERTOR SLAB REINFORCEMENT FOR CIRCULAR MANHOLE DETAIL



WHERE CONVERTOR SLAB IS BELOW FLOOD LEVEL



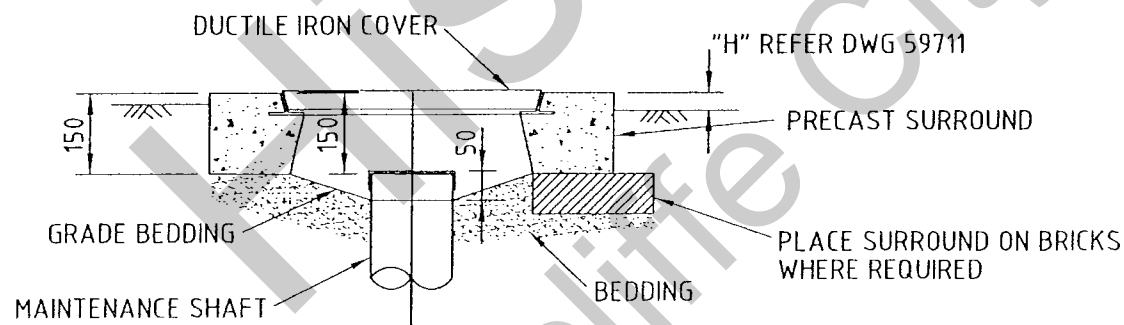
NORMAL CONDITIONS

850 O.D. 2 x D500N12 CIRCULAR BAR WITH 300 LONG END LAP.

POSITION OF DOWEL BARS EXTENDED FROM CONVERTOR SLAB

SURROUND REINFORCEMENT AND ATTACHMENT DETAIL

CONVERTOR SLAB & SURROUND FIXING DETAILS

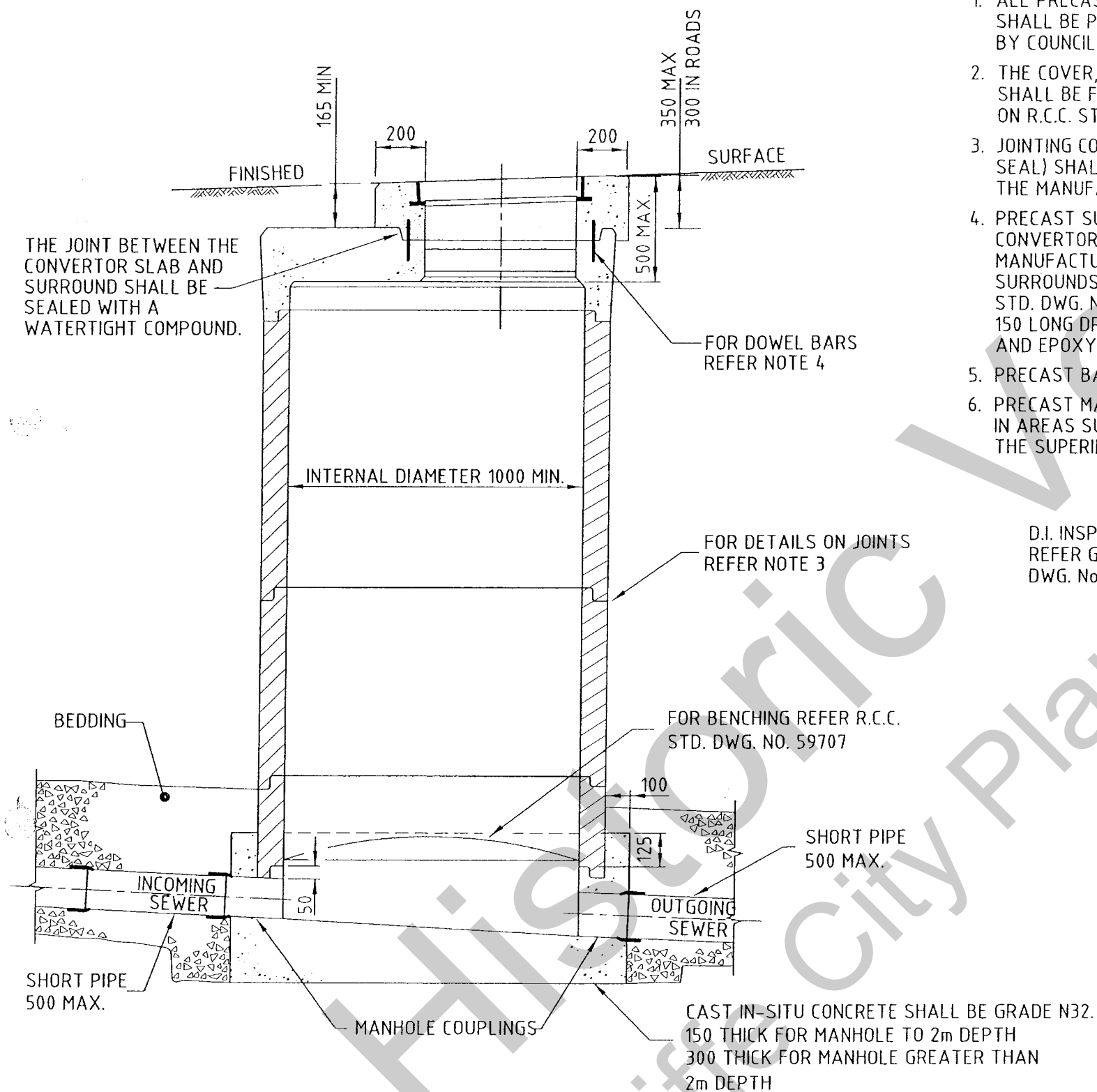


MAINTENANCE SHAFT SURROUND FIXING DETAIL

NOTES:

- THIS DRAWING SHOULD BE READ IN CONJUNCTION WITH R.C.C. STD. DWGS. 59707, 59710, 59711 & 59304.
- ALL INSITU CONCRETE SHALL BE GRADE N32.
- REINFORCING BARS TO BE TO AS/NZS 4671:2001 WITH 50 COVER BOTTOM FACE.
- SQUARE CONVERTOR SLABS SHALL BE CONSTRUCTED WHERE DEPTH OF MANHOLE IS LESS THAN 1200.
- ALL JOINT FACES SHALL BE WELL SCABBLED AND MADE WATERTIGHT.
- HOLDING DOWN BOLTS SHALL BE 4 X M16 BOLTS 150 LONG HEXAGONAL HEAD AND NUT. SHANKS TO PROJECT 50 ABOVE CONVERTOR SLAB.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING CIRCULAR SEWERAGE MANHOLES (SHEET 2 OF 2)		SHEET 2 of 2	59708
	FILE NAME	DATE	BACKUP LOCATION	DATE												
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										SURV'D.	CHK'D.					
										DRN.	APP'D.					



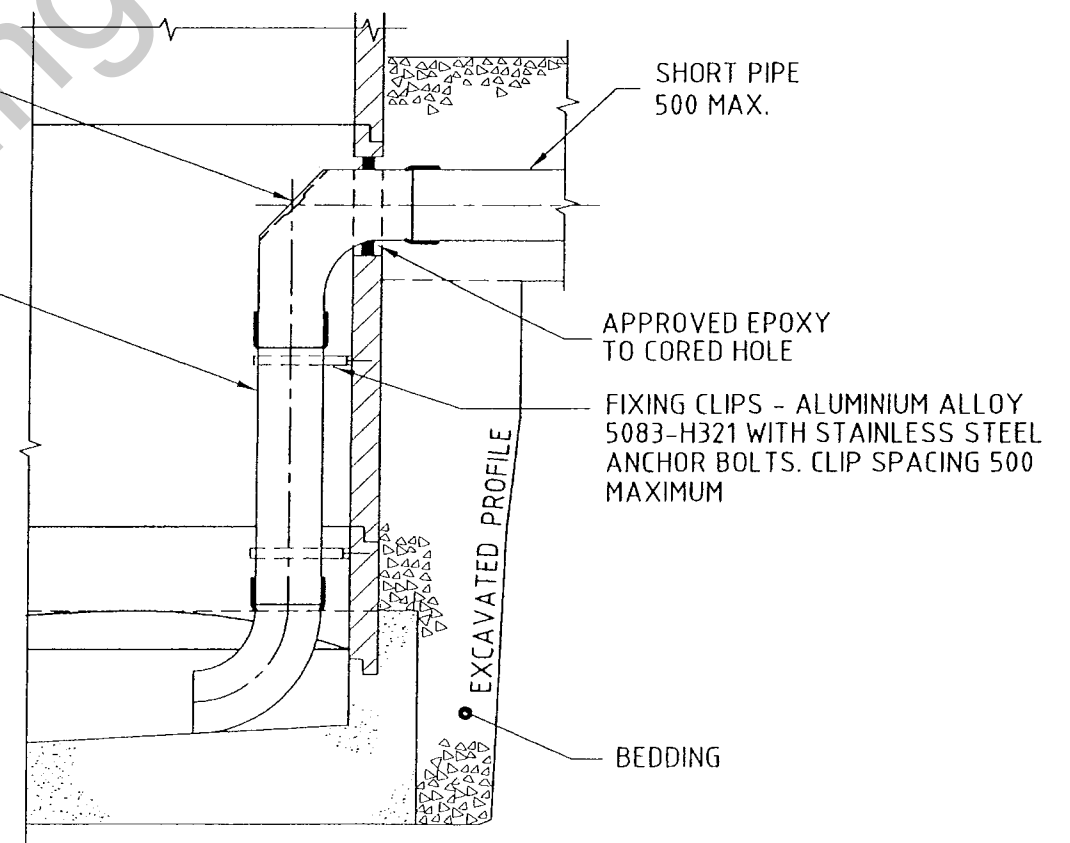
TYPICAL SECTIONAL ELEVATION

NOTES:

1. ALL PRECAST SEWER MANHOLE COMPONENTS SHALL BE PROPRIETARY PRODUCTS APPROVED BY COUNCIL AND MANUFACTURED TO A.S.4198.
2. THE COVER, FRAME AND CONCRETE SURROUND SHALL BE FINISHED TO THE DETAILS SHOWN ON R.C.C. STD. DWG. No. 59708.
3. JOINTING COMPONENTS (RUBBER RING & MASTIC SEAL) SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURERS RECOMMENDATIONS.
4. PRECAST SURROUNDS SHALL BE FIXED TO THE CONVERTOR SLAB IN ACCORDANCE WITH THE MANUFACTURERS RECOMMENDATIONS. CAST IN-SITU SURROUNDS SHALL BE IN ACCORDANCE WITH R.C.C. STD. DWG. NO. 59708 WITH 6 x D500N16 DOWEL BARS 150 LONG DRILLED 75 INTO THE CONVERTOR SLAB AND EPOXY GLUED IN PLACE.
5. PRECAST BASE UNITS ARE NOT APPROVED FOR USE.
6. PRECAST MANHOLES SHALL NOT BE CONSTRUCTED IN AREAS SUBJECT TO INUNDATION AS DIRECTED BY THE SUPERINTENDENT.
7. INLET SEWER ENTRIES SHALL BE DRILLED AS SPECIFIED AND SHALL NOT BE LOCATED AT SHAFT SECTION JOINTS. HOLES MADE BY IMPACT METHODS SHALL BE REJECTED.
8. INTERNAL DROPS ARE NOT PERMITTED WHERE THE SEWER GRADE EXCEEDS 1 IN 10 (10%).
9. WHERE MORE THAN ONE TYPE 'X' DROP IS REQUIRED THE MANHOLE SHALL BE 1200 DIAMETER.
10. EXTERNAL DROPS ARE NOT APPROVED FOR USE WITH PRECAST MANHOLES.
11. BOLT DOWN LIDS SHALL NOT BE USED WITH PRECAST MANHOLES.
12. MANHOLE DROPS TYPE 'X' SHALL NOT BE USED IN Ø300 SEWERS.
13. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

D.I. INSPECTION BEND
REFER G.C.C.C. STD.
DWG. No. 59712

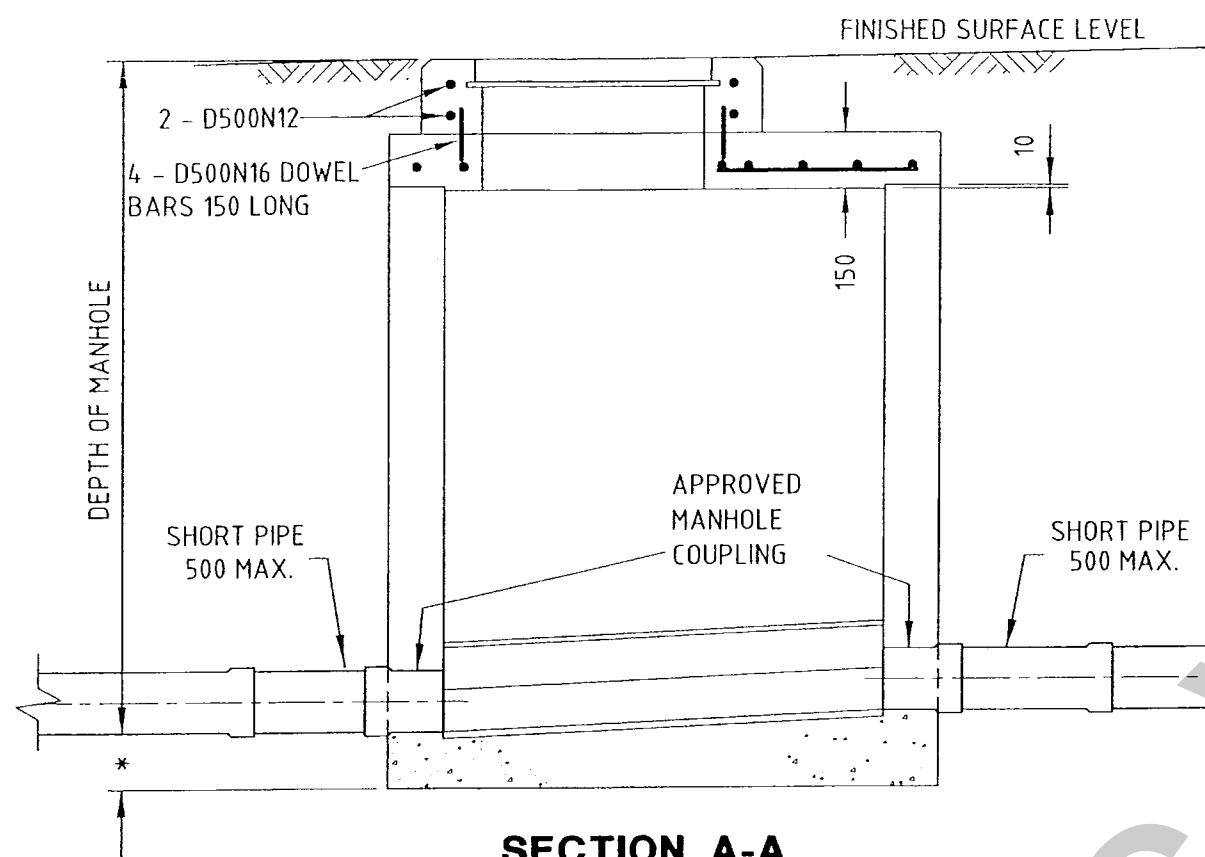
UPVC DROP
PIPE & BEND
WITH RUBBER
RING JOINT



**VARIATION WITH INTERNAL DROP
TYPE 'X'**

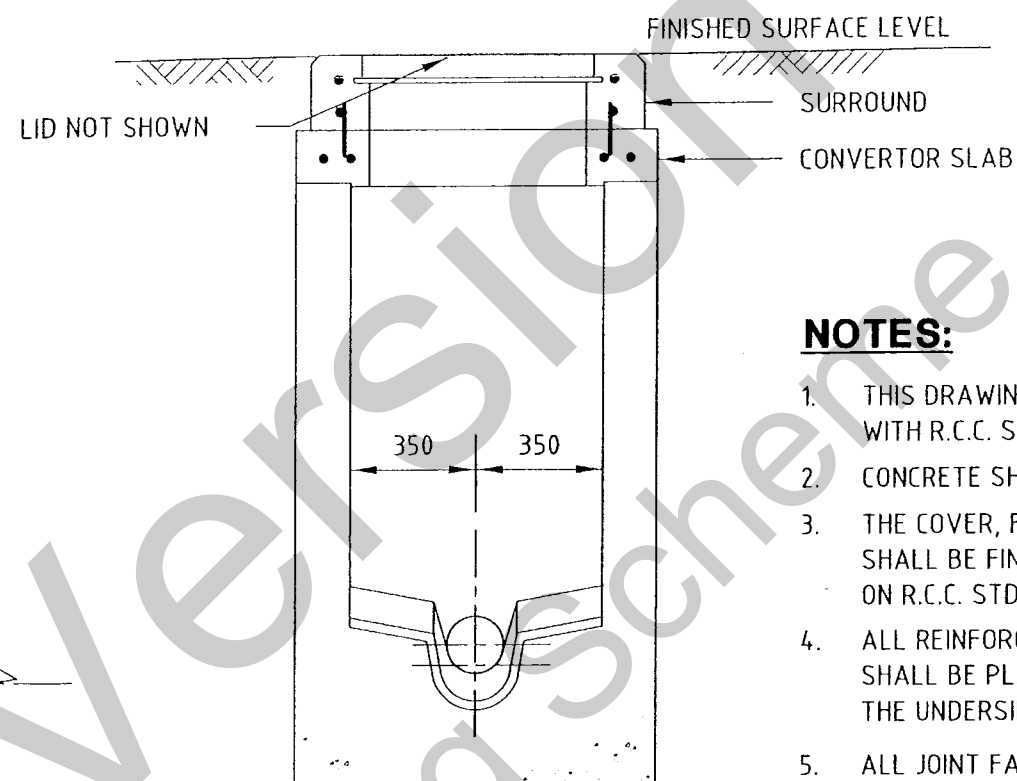
(REFER NOTE 7.)

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWINGS SEWERAGE MANHOLES USING PRECAST COMPONENTS				SHEET 1 of 1	59709
	FILE NAME	DATE	BACKUP LOCATION	DATE															
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										SURV'D.	CHK'D.								
										ORN.	APP'D.								



SECTION A-A

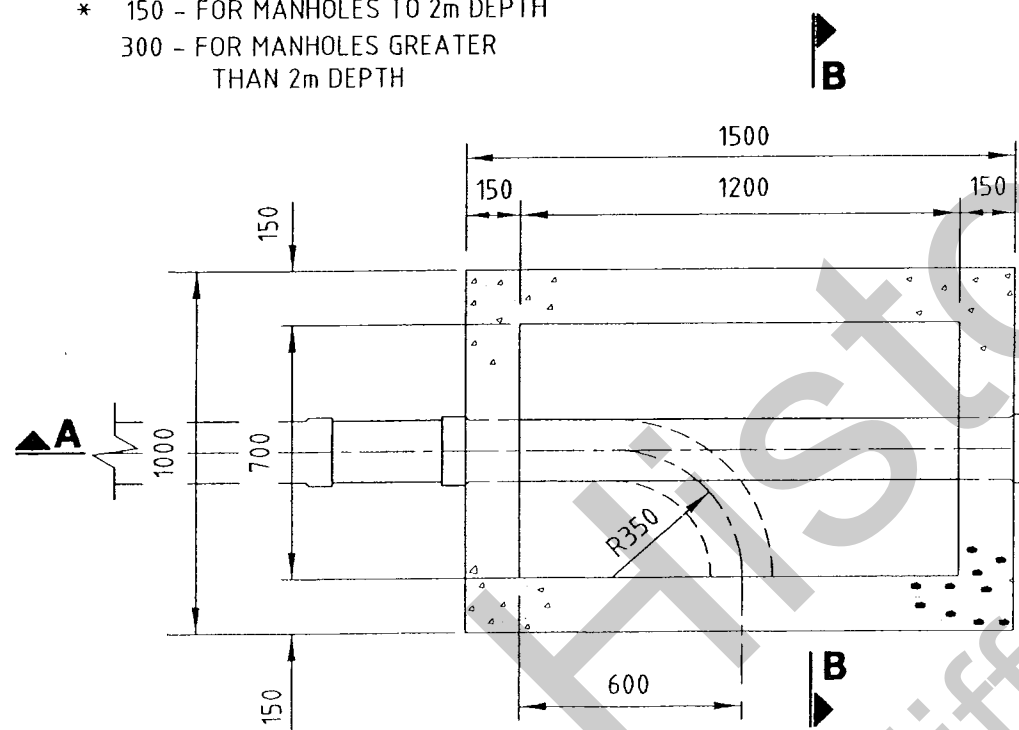
* 150 - FOR MANHOLES TO 2m DEPTH
300 - FOR MANHOLES GREATER THAN 2m DEPTH



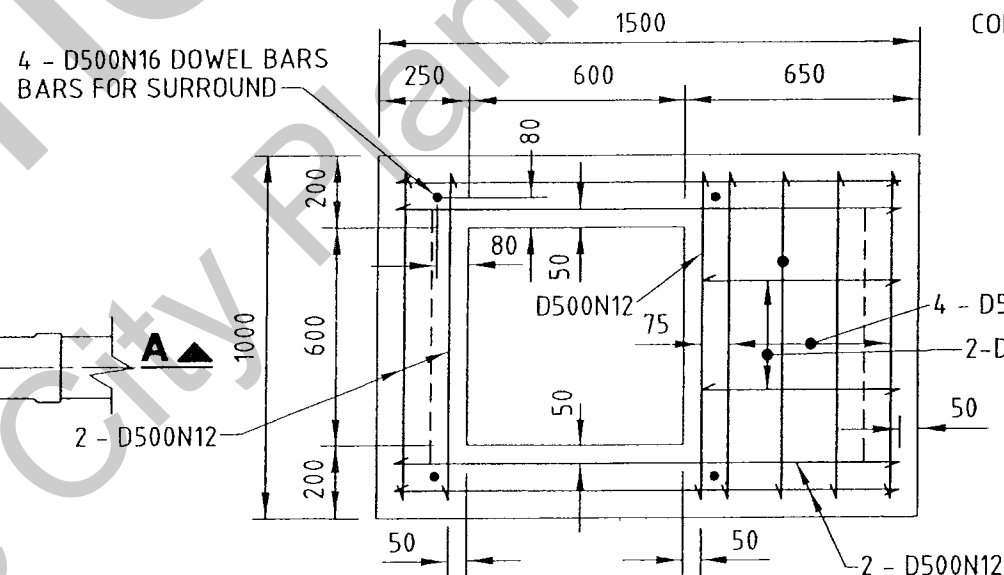
SECTION B-B

NOTES:

1. THIS DRAWING SHOULD BE READ IN CONJUNCTION WITH R.C.C. STD. NO.S 59707 & 59711.
2. CONCRETE SHALL BE GRADE N32.
3. THE COVER, FRAME AND CONCRETE SURROUND SHALL BE FINISHED TO THE DETAILS SHOWN ON R.C.C. STD. DWG. No. 59708.
4. ALL REINFORCING BARS IN THE TOP SLAB SHALL BE PLACED TO HAVE 50 COVER TO THE UNDERSIDE OF THE SLAB.
5. ALL JOINT FACES SHALL BE WELL SCABBLED TO ENSURE WATERTIGHT JOINTS.
6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

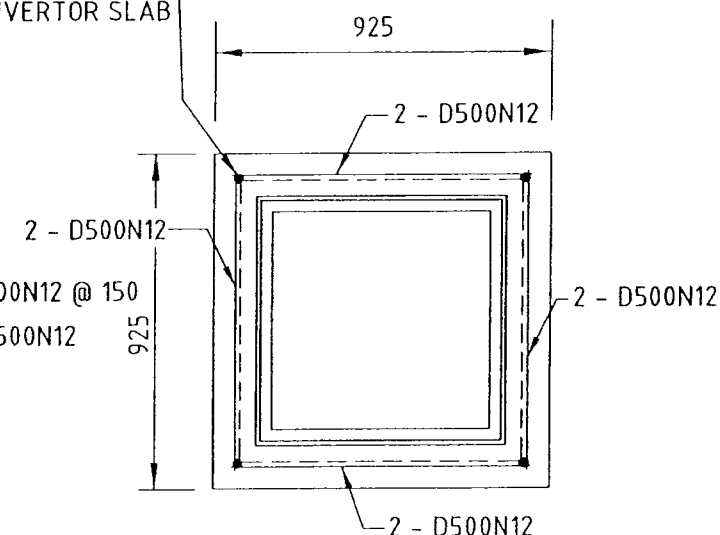


PLAN




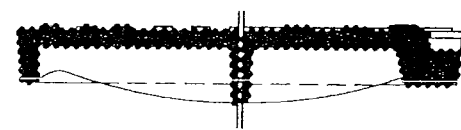
CONVERTOR SLAB REINFORCEMENT

POSITION OF DOWEL BARS
EXTENDED FROM
CONVERTOR SLAB

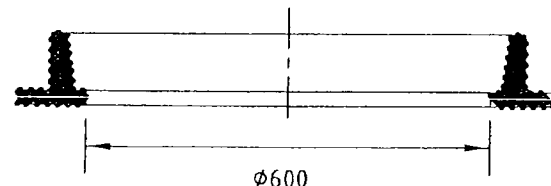


**SURROUND REINFORCEMENT
AND ATTACHMENT DETAIL**

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	STANDARD DRWINGS				
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			REGULAR SEWERAGE MANHOLE				
			G:\Standard Drawings\Rcc\Sewage							SURV'D.:	CHK'D.:			TYPE 'F'				
										DRN.:	APP'D.:			SHEET 1 of 1				
														59710				



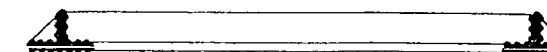
SECTION A-A



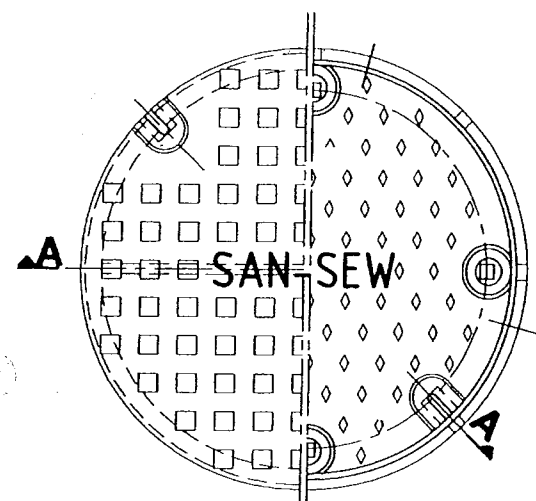
SECTION B-B



SECTION C-C

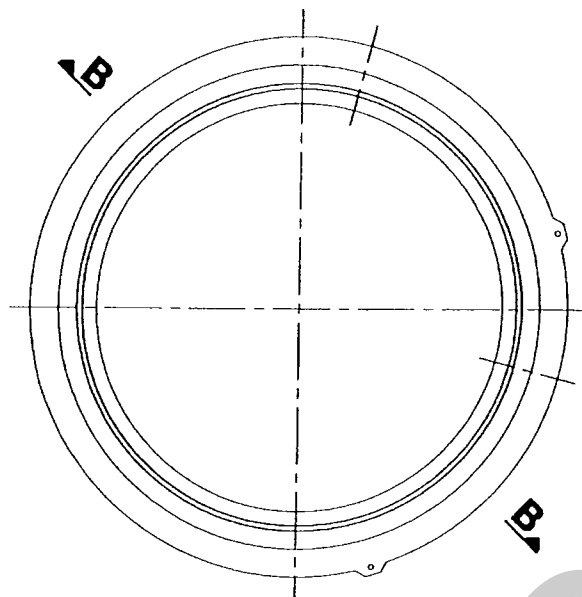


SECTION D-D



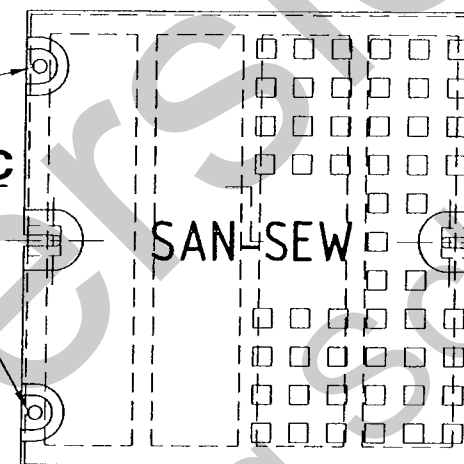
TYPE 'J'
STANDARD

TYPE 'M'
BOLT DOWN

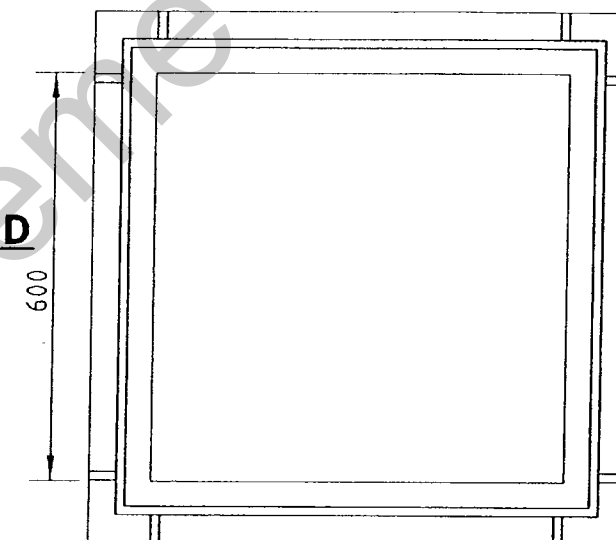


PLAN

FOR BOLT DOWN
COVERS REFER
NOTE 2



PLAN



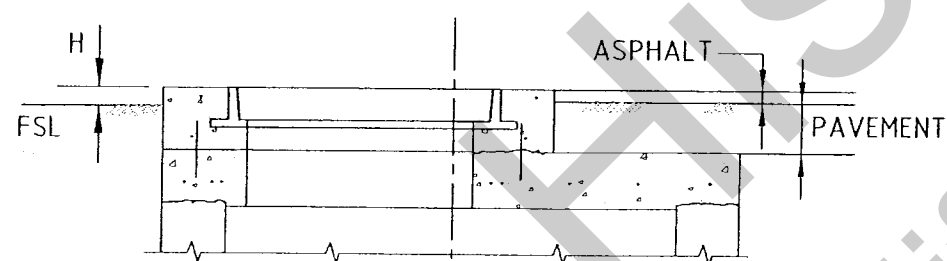
600

PLAN

DUCTILE IRON COVER & FRAME TYPES 'J' AND 'M'

BOLT DOWN COVER NOTES:

1. FOR TYPE 'M' COVERS PROVIDE A MINIMUM OF 2 x M10 (MINIMUM) 316 STAINLESS STEEL HOLD DOWN BOLTS WITH NYLON WASHERS.
2. FOR TYPE 'L' COVERS PROVIDE A MINIMUM OF 4 x M10 (MINIMUM) 316 STAINLESS STEEL HOLD DOWN BOLTS WITH NYLON WASHERS.
3. FOR TYPE 'M' COVERS PROVIDE 4 REGISTERS IN COVERS AND FRAMES AS DETAILED IN CLAUSE 1.4.2.7. OF AS3996.



NON PAVEMENT

PAVEMENT

TYPICAL SURROUND FINISH DETAILS

COVER USAGE

COVER & FRAME	LOCATION
CLASS B COVER	PRIVATE PROPERTY PUBLIC RESERVES FOOTPATH & VERGE
CLASS D COVER	STREET & ROAD CARRAGEWAYS INDUSTRIAL/COMMERCIAL DRIVEWAYS
BOLT DOWN COVER (CAST INSITU MANHOLES)	LOCATIONS SUBJECT TO FLOODING.

MANHOLE LOCATION	'H'
PAVEMENTS & FOOTPATHS	FLUSH
UNDEVELOPED AREAS	300
NEW SUBDIVISIONS	50
EXISTING DEVELOPED AREAS	25

SURROUND AND COVER FINISHED LEVELS

DUCTILE IRON COVER & FRAME TYPE 'L'

GENERAL NOTES:


1. ALL COVERS AND FRAMES SHALL BE PROPRIETARY PRODUCTS APPROVED BY COUNCIL AND CONFORMING WITH AS 3996.
2. ALL COVERS SHALL HAVE:-
 - 'SAN-SEW' OR 'SEWER' CAST ON THE TOP FACE IN 3 HIGH LETTERING (65 HIGH AND 40 WIDE)
 - THE CLASS, TYPE AND WEIGHT CAST ON THE TOP FACE IN LEGIBLE 3 HIGH LETTERING.
3. COVER TYPE 'M' SHALL BE USED IN ALL SITUATIONS WHERE THE TOP OF THE MANHOLE IS BELOW FLOOD LEVEL.
4. ALL DUCTILE IRON COMPONENTS SHALL COMPLY WITH AS.1831 GRADE 600/3
5. SURFACE FINISH SHALL BE SQUARED OR DIAMOND PATTERNED.
6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING SEWERAGE MANHOLE COVERS AND FRAMES		SHEET 1 of 1		59711			
	FILE NAME	DATE	BACKUP LOCATION	DATE		ORIGINAL ISSUE					SCALE									As Shown	
			G:\Standard Drawings\Rcc\Sewage								SURV'D.: CHK'D.:										
											DRN.: APP'D.:										



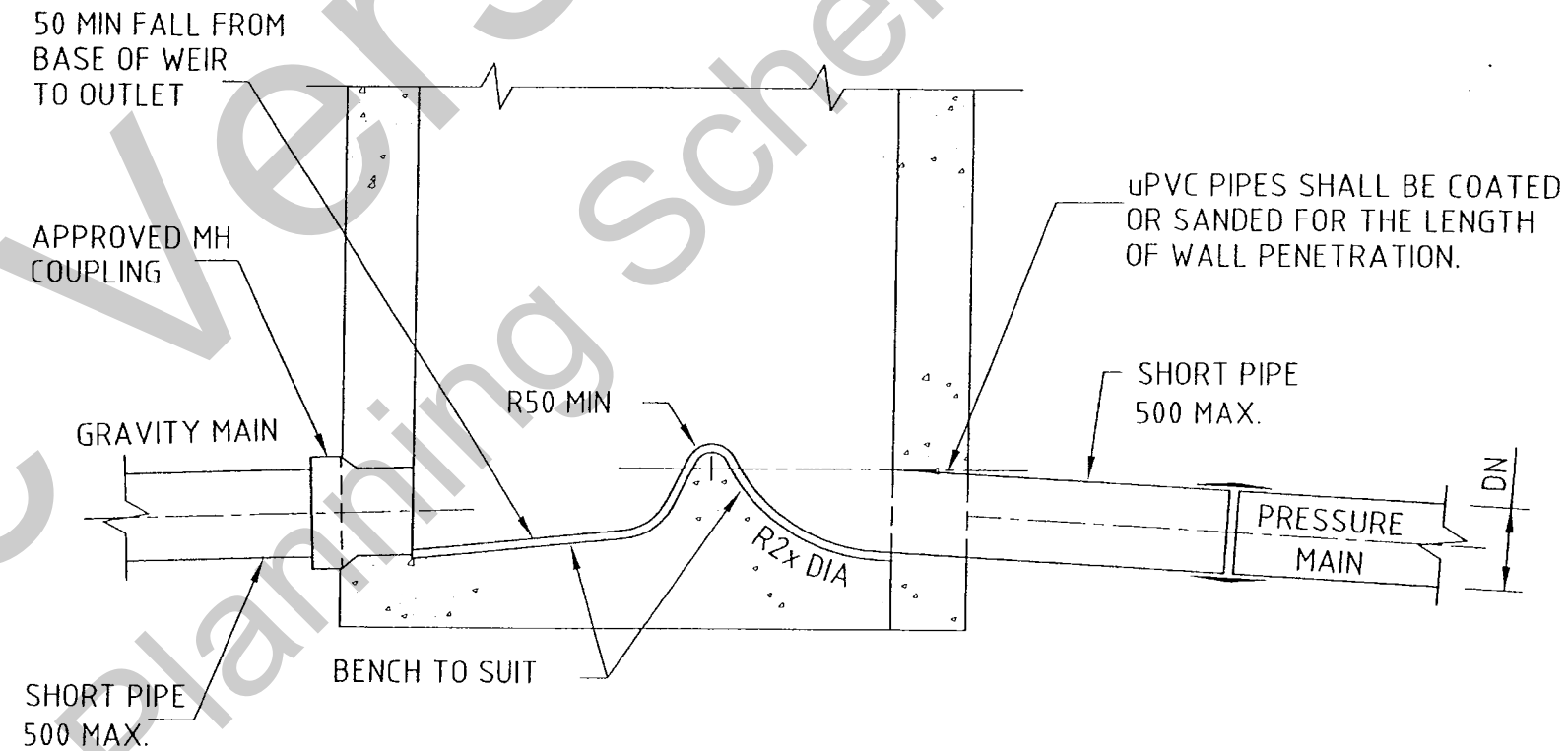
NOTES:

1. ALL SMALL RADII SHALL BE 5.
2. ALL FITTINGS FOR USE WITH u.P.V.C. DROP PIPES SHALL BE RUBBER RING JOINTED TO IN-COMING SEWER.
3. ALL FITTINGS FOR USE WITH V.C. PIPE/V.C. ADAPTOR PIPE SHALL BE RUBBER RING JOINTED TO IN-COMING SEWER.
4. ALL FITTINGS SHALL BE CAST SPHEROIDAL GRAPHITE IRON GRADE 500/320/7 TO COMPLY WITH AS.1831.
5. SLASH COVERS SHALL BE 3 THICK u.P.V.C. SHEET WITH M10 NYLON NUTS & BOLTS TO SUIT.
6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	<div>STANDARD DRAWING</div> <div>IRON INSPECTION BENDS FOR</div> <div>TYPE 'X' INTERNAL DROP PIPES IN SEWERAGE MANHOLES</div> <div>A<div><div></div><div></div><div></div><div></div><div></div></div>SHEET 1 of 1</div> <div>59712</div>					
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown								
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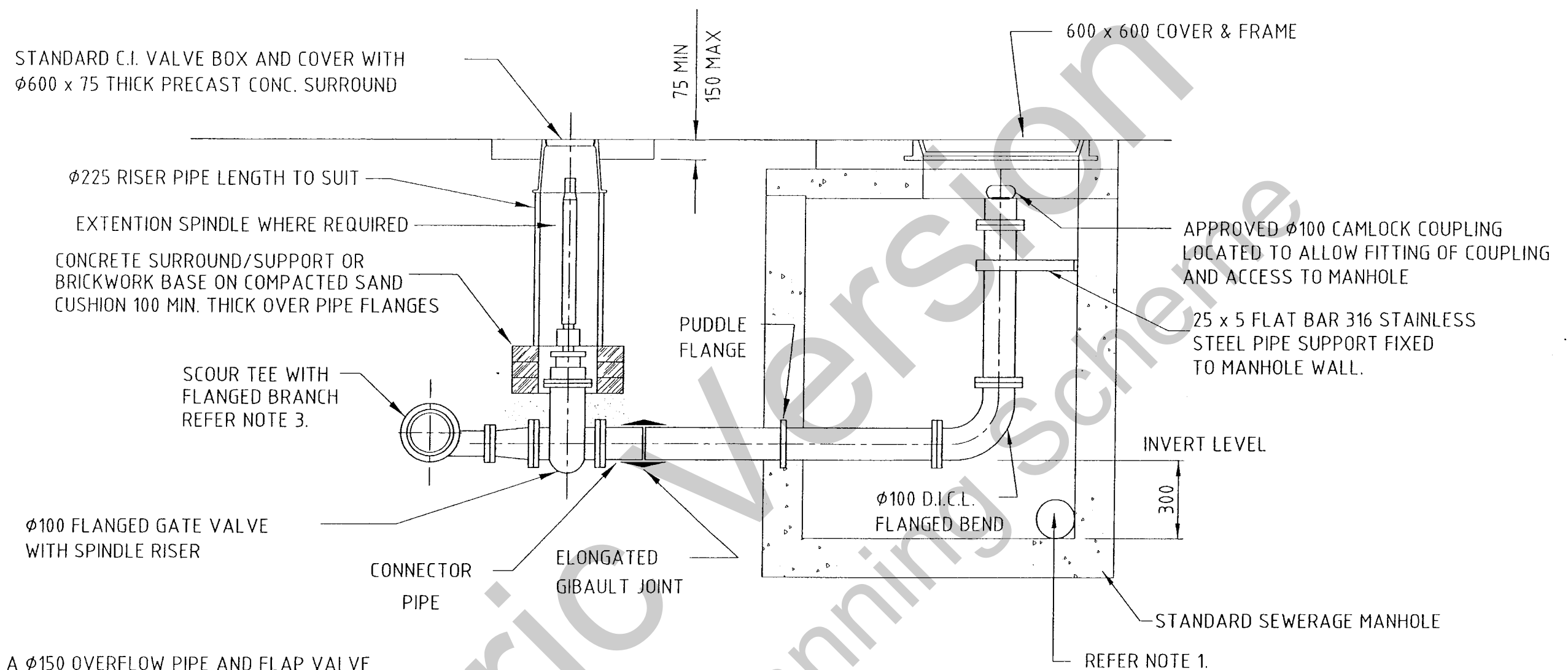
NOTES

- 1. BENCHING NOT SHOWN.
- 2. SEWERS DOWNSTREAM OF PRESSURE MAIN DISCHARGE MANHOLE SHALL BE OF NON-CORROSIVE PIPE FOR THE GREATER LENGTH OF 90m OR THE TOTAL LENGTH OF THE RUNS CONNECTING THE TWO MANHOLES DOWNSTREAM OF THE DISCHARGE MANHOLE.
- 3. THE DISCHARGE MANHOLE AND ANY MANHOLE DOWNSTREAM WITHIN 90m SHALL BE INTERNALLY COATED WITH A PROTECTIVE COATING.
- 4. FOR PROTECTIVE COATING REQUIREMENTS REFER TO COUNCIL'S STANDARD SPECIFICATION SS1.
- 5. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.



PART SECTIONAL ELEVATION
PRESSURE MAIN DISCHARGE MANHOLE

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING DETAIL OF SEWERAGE PRESSURE MAIN DISCHARGE TO GRAVITY SYSTEM			
	FILE NAME	DATE	BACKUP LOCATION	DATE													
			G:\Standard Drawings\Rcc\Sewage		A	ORIGINAL ISSUE				SCALE	As Shown						
										SURV'D.	CHK'D.						
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														A		SHEET 1 of 1	59713

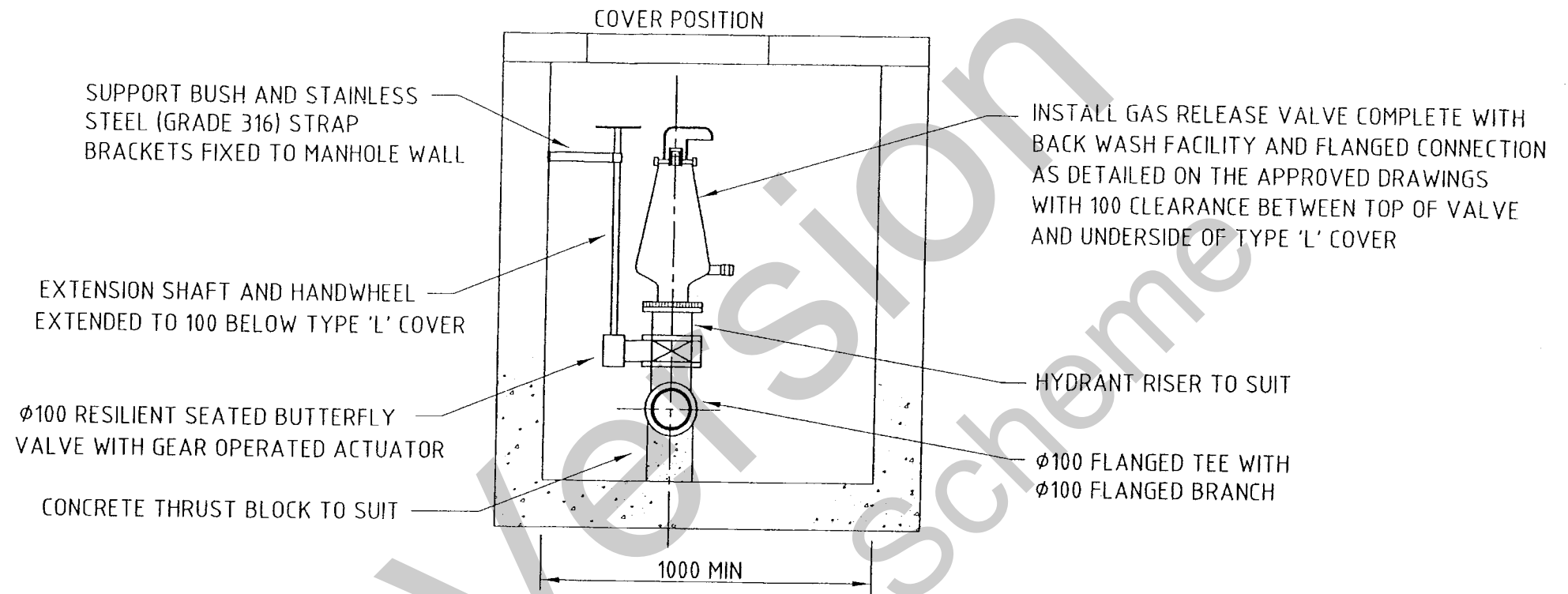


NOTES:

1. PROVIDE A Ø150 OVERFLOW PIPE AND FLAP VALVE TO SEWERAGE MANHOLE. REFER R.C.C. STD. DWG. No 59722. GRADE OVERFLOW DOWN TO MANHOLE.
2. THE DUCTILE IRON PIPE SHALL BE EXTENDED THROUGH CORED HOLE INTO MANHOLE. APPLY APPROVED EPOXY MORTAR TO HOLE.
3. THE ARRANGEMENT SHOWN IS FOR Ø100 AND Ø150 MAINS WITH 80 SCOUR TEES. MAINS Ø225 TO Ø300 DO NOT REQUIRE A TAPER FOR Ø100 SCOUR OUTLET.
4. CONCRETE SURROUND, BOX & MH COVER SHALL BE PAINTED WITH APPROVED DULUX MULBERRY PAINT.
5. FOR PAVEMENT AND KERB & CHANNEL MARKING DETAILS REFER R.C.C. STD. DWG. No. 59727.
6. FOR CONCRETE SURROUND, SUPPORT AND VALVE BOX DETAILS REFER R.C.C. STD. DWG. NOS. 59610 AND 59611.
7. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SECTIONAL ELEVATION

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING STANDARD PRESSURE MAIN SCOUR VALVE ARRANGEMENT			
	FILE NAME	DATE	BACKUP LOCATION	DATE													
			G:\Standard Drawings\Rcc\Sewage		A	ORIGINAL ISSUE				SCALE	As Shown					SHEET 1 of 1	59714
										SURV'D.:	CHK'D.:						
										DRN.:	APP'D.:						

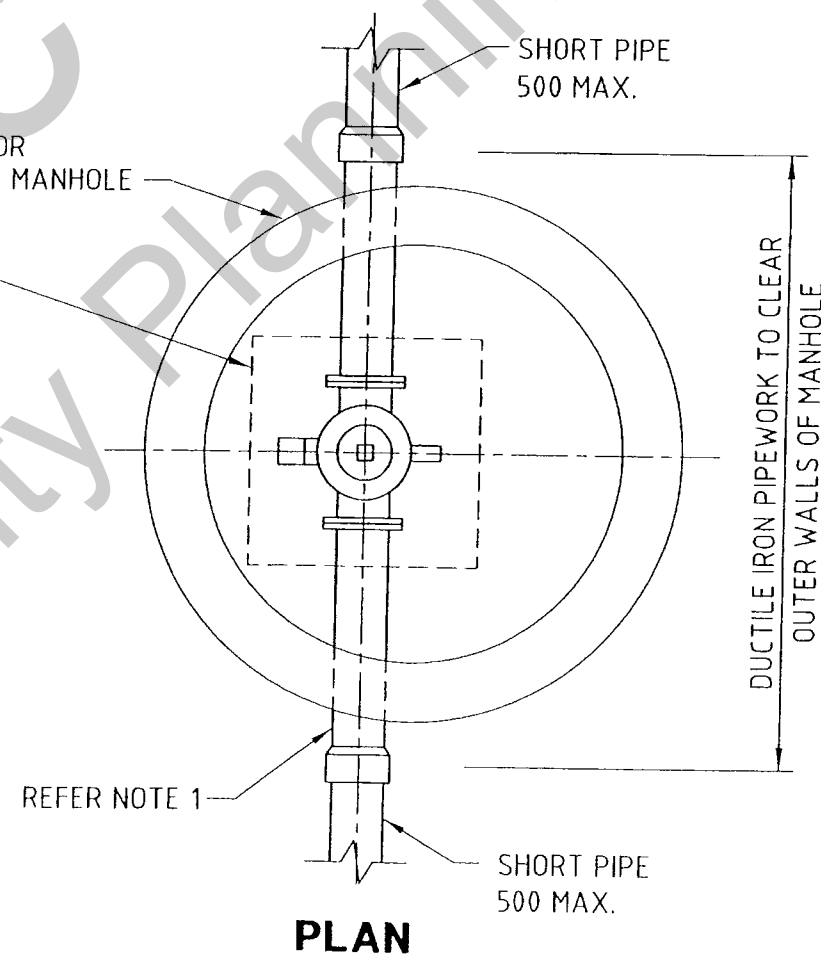


SECTIONAL ELEVATION

NOTE:

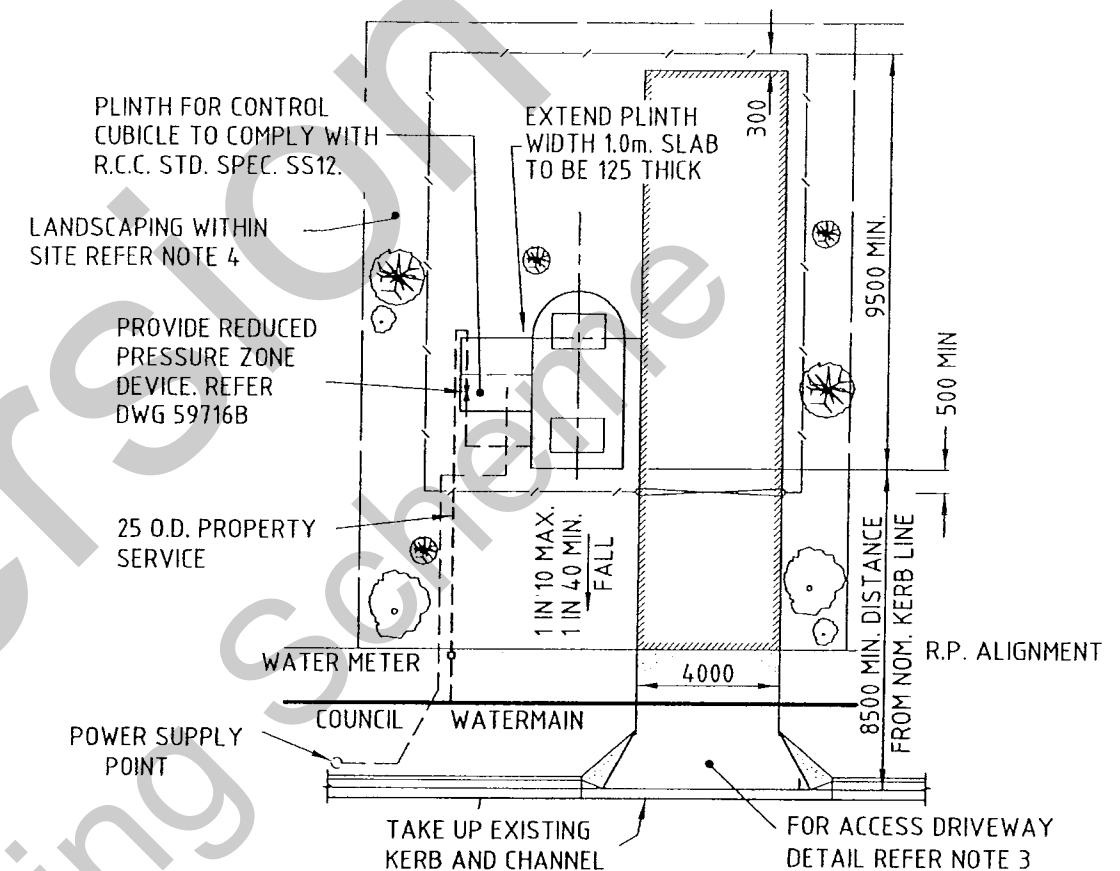
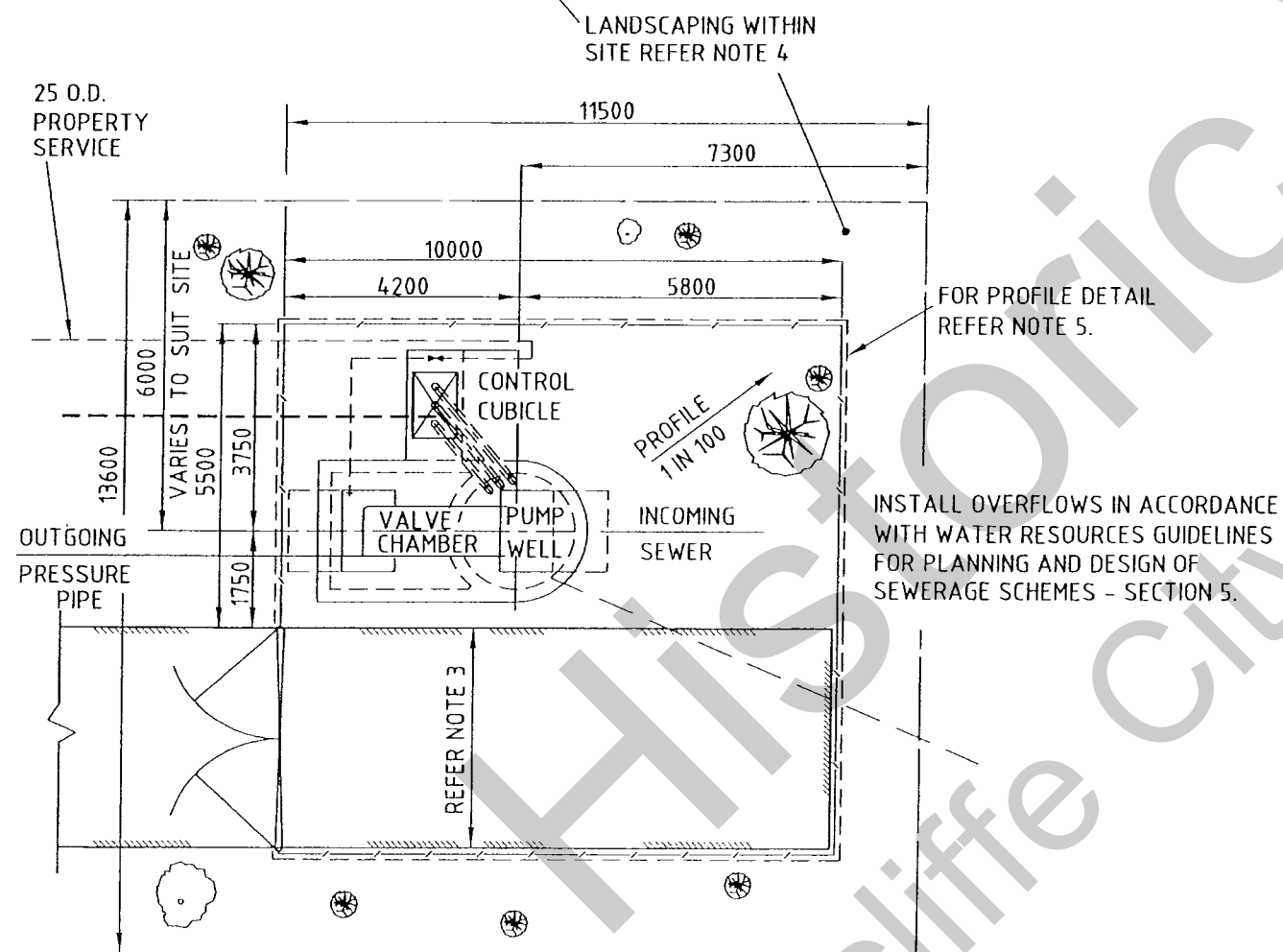
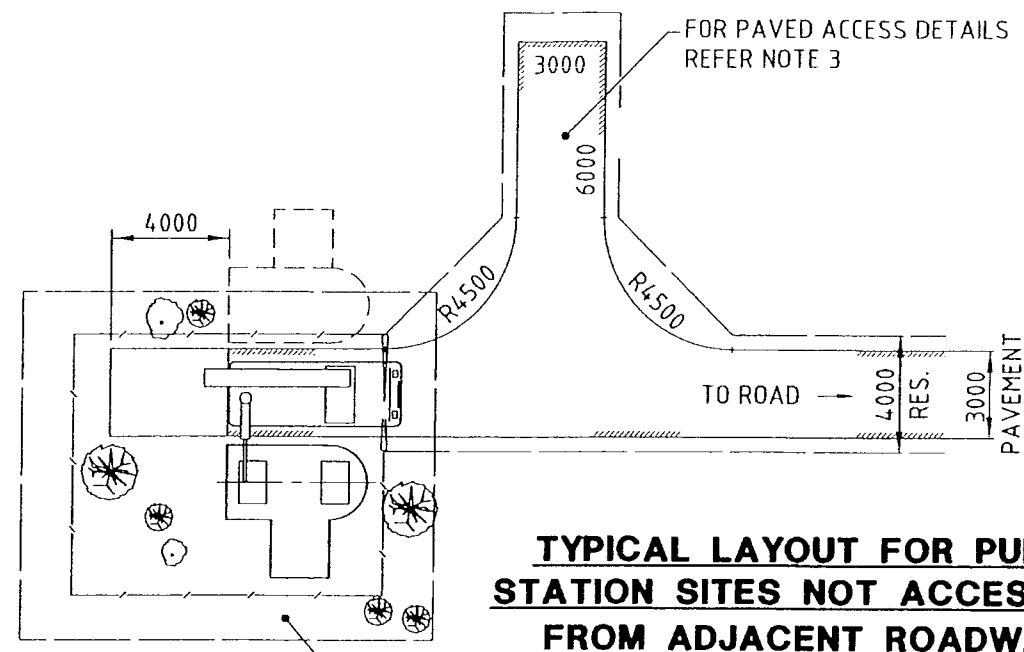
1. DETAILS SHOWN ARE FOR A BURIED 100Ø SEWERAGE PRESSURE MAIN.
2. FOR LARGER THAN Ø100 SEWERAGE PRESSURE MAINS A LARGER SEWERAGE MANHOLE MAY BE REQUIRED.
3. FOR LARGER THAN Ø100 SEWERAGE PRESSURE MAINS PROVIDE A Ø100 FLANGED BRANCH HYDRANT TEE.
4. CARE SHALL BE TAKEN TO ENSURE THAT ALL CONCRETE IS KEPT CLEAR OF THE FLEXIBLE AND FLANGED JOINTS.
5. FOR PAVEMENT AND KERB & CHANNEL MARKING DETAILS REFER R.C.C. STD. DWG. 59727.
6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

STANDARD 600 x 600 SQUARE TYPE 'L' COVER AND FRAME PAINTED WITH APPROVED DULUX MULBERRY PAINT. LOCATE COVER TO PROVIDE MAXIMUM PERSON ENTRY ACCESS AND ACCESS TO HANDWHEEL.



PLAN

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING TYPICAL GAS RELEASE VALVE ARRANGEMENT FOR SEWERAGE PRESSURE MAINS			
	FILE NAME	DATE	BACKUP LOCATION	DATE													
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										SURV'D.	CHK'D.						
										DRN.	APP'D.						




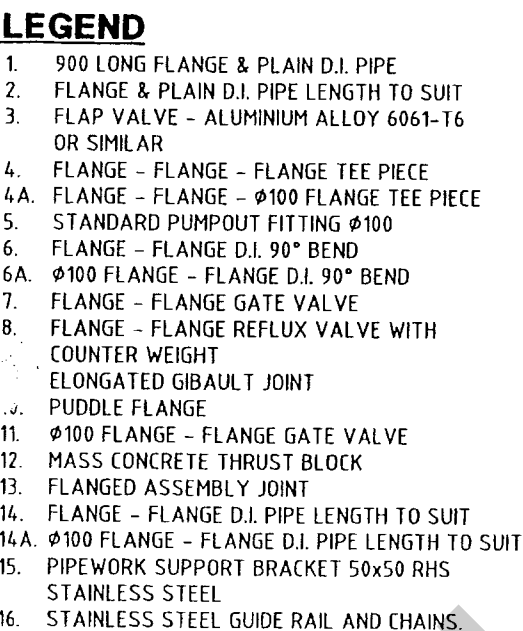
NOTES: GENERAL

1. THE DETAIL SHOWN ON THIS DRAWING IS TYPICAL ONLY. THE LOCATION OF ALL ITEMS WILL BE AS SHOWN ON THE APPROVED DRAWINGS.
 2. THIS DRAWING SHOULD BE READ IN CONJUNCTION WITH R.C.C. STD. DWG. NO'S. 59717 AND 59724.
 3. DRIVEWAY ACCESS TO ALL PUMP AND LIFT STATIONS SHALL BE PROVIDED AS FOLLOWS:
 - (a) LONGITUDINAL GRADE TO BE MAXIMUM 10%.
 - (b) LOCATED SO VEHICULAR TRAFFIC WILL NOT TRAVERSE THE COVERS.
 - (c) HEAVY VEHICLE ACCESS DRIVEWAYS AS PER G.C.C.C. STD. DWG. NO. 59218 AND APPROVED ENGINEERING DETAILS.
 4. THE PUMP AND LIFT STATION SITES WITHIN THE FENCED AREA SHALL BE A MIN.156.4m² AS DIRECTED. THE SURROUNDS SHALL BE LANDSCAPED AND GRASSED IN ACCORDANCE WITH THE APPROVED SITE PLAN.
 5. PUMP STATION PLATFORM SHALL BE PROFILED TO SLOPE 1 IN 100 AWAY FROM OPENINGS AND CONTROL CUBICLE PLINTH & THEN BATTER AT 1 IN 6 (MAX.) TO NATURAL SURFACE. BATTER TO COMMENCE 100 BEYOND THE FENCE ALIGNMENT.
 6. WHERE REQUIRED PROVIDE A 1.8m HIGH MANPROOF FENCE AND 4.0m WIDE DOUBLE LEAF LOCKABLE GATE AS DETAILED ON THE APPROVED DRAWINGS.
 7. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.
- ### **WATER METER**
1. COUNCIL SHALL INSTALL A 25 WATER METER AFTER AN APPLICATION STATING THE NUMBER AND NAME OF THE STATION AND THE PRESCRIBED FEES HAVE BEEN PAID. THE APPLICATION SHALL BE IN THE NAME OF COUNCIL.

WATER METER

1. COUNCIL SHALL INSTALL A 25 WATER METER AFTER AN APPLICATION STATING THE NUMBER AND NAME OF THE STATION AND THE PRESCRIBED FEES HAVE BEEN PAID. THE APPLICATION SHALL BE IN THE NAME OF COUNCIL.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING			
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE			SCALE	As Shown		PUMPING AND LIFTING STATIONS					
			G:\Standard Drawings\Rcc\Water						SURV'D.:	CHK'D.:		TYPICAL LAYOUT					
									DRN.:	APP'D.:		A					
												SHEET 1 of 1					
													59716A				



DETAIL 'G'

DIMENSION	A	B	C	D	E
ø100	1850	2080	600	775	600
ø150	2050	2280	650	888	650
ø225	REFER APPROVED DRAWINGS				

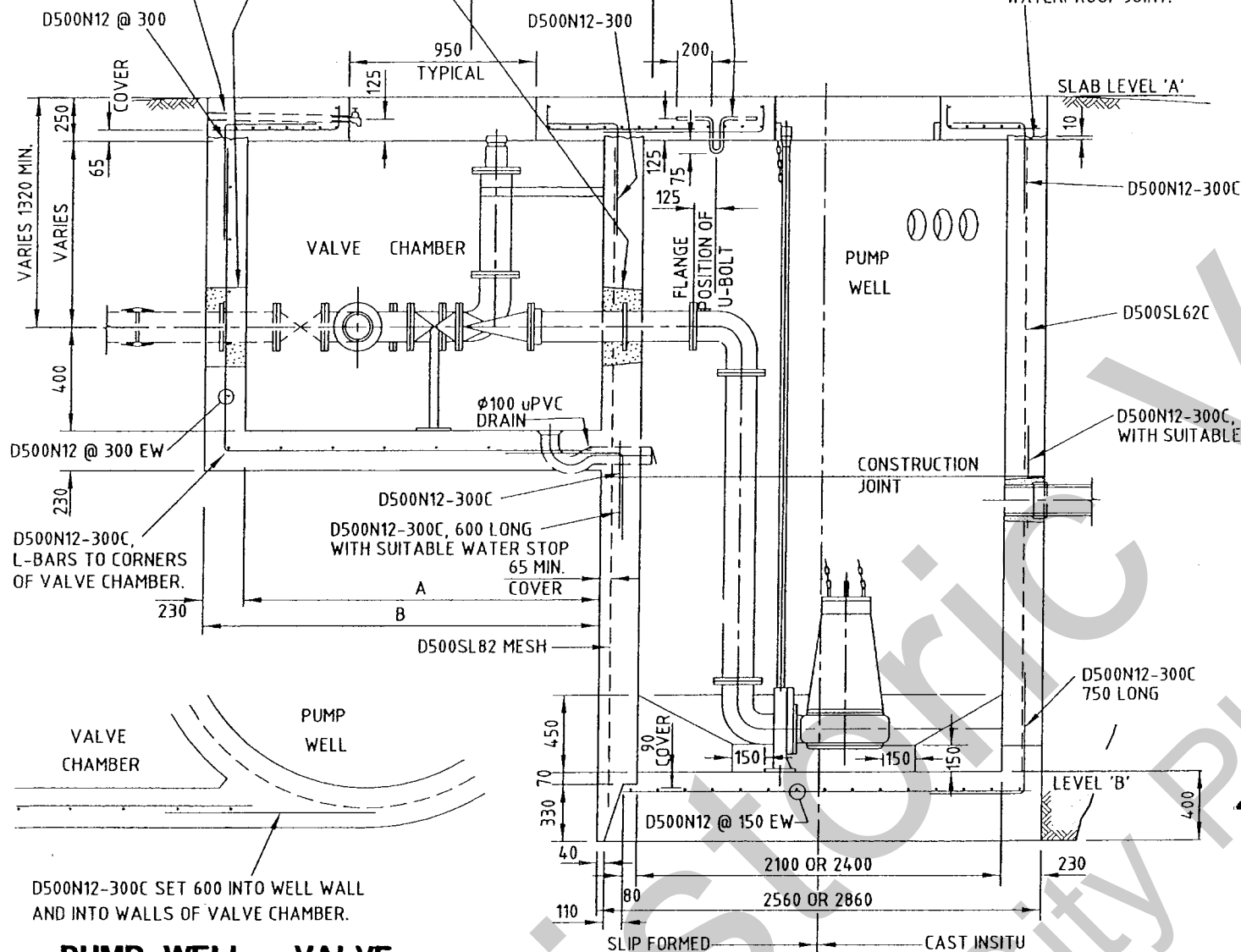
PROVIDE Ø50 WATER SERVICE CONDUIT AS DIRECTED ON SITE. 20 THREADED HOSE COCK FIXED FIRMLY IN POSITION ON INSIDE FACE OF VALVE CHAMBER OPENING.

CORED HOLE SIZED TO PROVIDE 80 CLEARANCE TO FLANGE TO BE CEMENT MORTAR PACKED.

2/Ø12 GRADE 316 STAINLESS STEEL. INTERNAL RADIUS OF BENDS TO BE 25. EMBEDDED PORTION OF U-BOLTS TO BE WRAPPED WITH ELECTRICAL INSULATION TAPE. LOCATE CENTRALLY OVER 90° BENDS.

CONTROL CUBICLE
D500N12-300

ALL JOINT FACES TO BE WELL SCABBLED TO ENSURE WATERPROOF JOINT.



PUMP WELL - VALVE CHAMBER JUNCTION

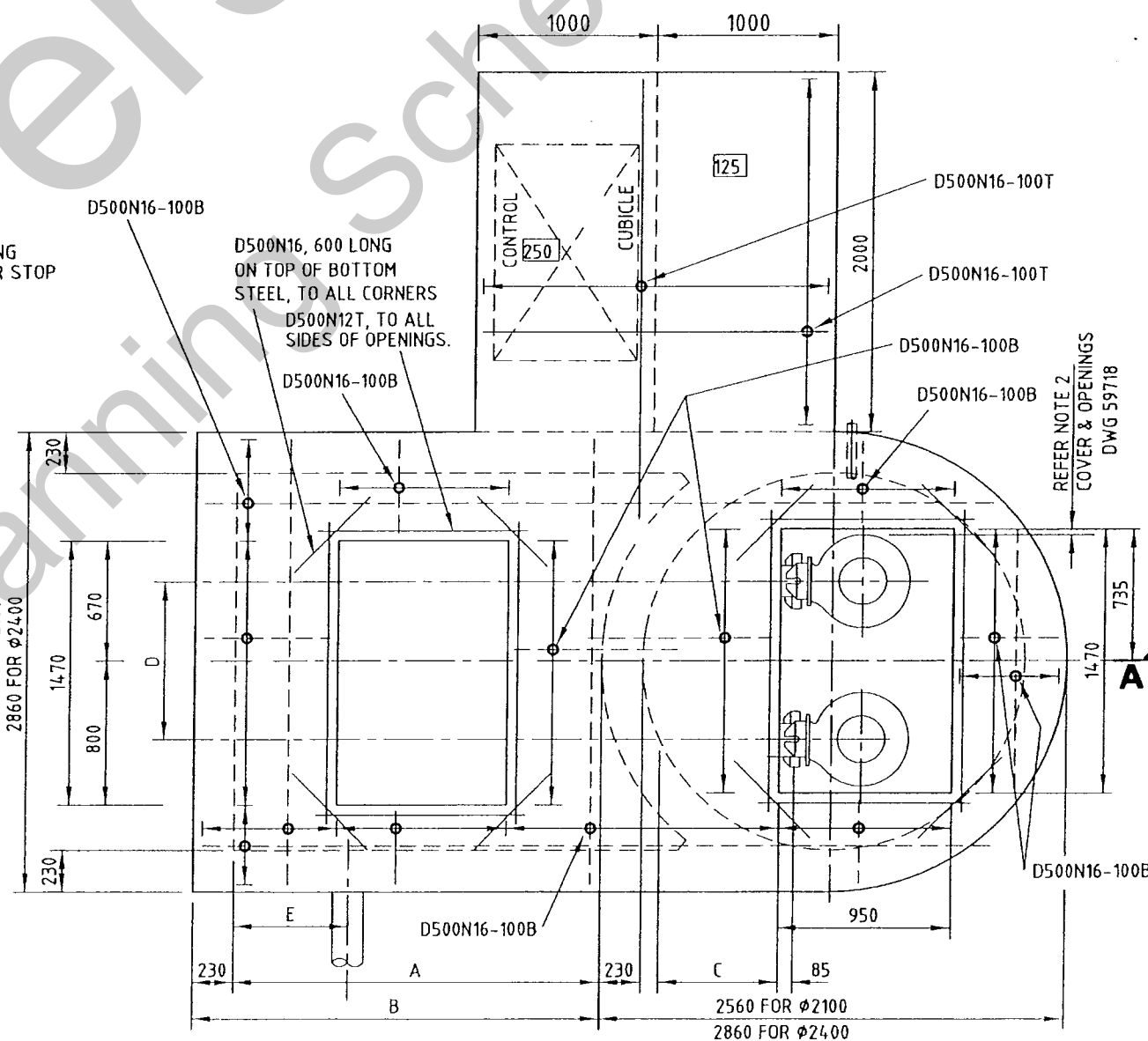
SECTION A-A

CONCRETE NOTES


- ALL CONCRETE SHALL:
 - BE GRADE S40
 - COMPLY WITH THE REQUIREMENTS OF COUNCILS STANDARD SPECIFICATION SS1.
- CORED HOLES LEFT IN THE WALL FOR PIPEWORK SHALL BE TAPERED BEING 25 LARGER IN DIAMETER THAN THE FLANGE AT THE INSIDE FACE AND 50 LARGER AT THE OUTSIDE FACE. PACK HOLES WITH 3:1 CEMENT MORTAR UNLESS OTHERWISE DIRECTED.
- ALL REINFORCING TO AS/NZS 4671:2001.
- LAPS IN REINFORCING SHALL BE 600 MINIMUM FOR BARS AND ONE (1) MESH SPACING FOR FABRIC.
- CONCRETE COVER TO REINFORCEMENT SHALL BE A MINIMUM OF 65 UNLESS OTHERWISE DIRECTED.

NOTES:

- THIS DRAWING SHOULD BE READ IN CONJUNCTION WITH R.C.C. STD. DWG. NOS. 59716, 59718, 59719 AND 59720.
- THE THICKNESS OF THE BASE SHOWN IS FOR PUMP STATIONS TO A 4m MAXIMUM DEPTH.
- FOR PUMP STATIONS DEEPER THAN 4m THE BASE THICKNESS SHALL BE INCREASED TO COVER FLOATION OF THE STRUCTURE WHEN EMPTY OF PUMPS, FITTINGS, PIPEWORK AND LIQUID. THE THICKNESS SHALL BE AS DETAILED ON THE APPROVED DRAWINGS.
- TOP OF WALLS TO BE WELL SCABBLED AND TOP SLAB TO BE SEATED ON MORTAR CONTAINING APPROVED WATERPROOF ADDITIVES.
- ALL INTERNAL VERTICAL, SOFFIT & COVER OPENING WET WELL SURFACES SHALL BE COATED WITH AN APPROVED PROTECTIVE COATING SYSTEM IN ACCORDANCE WITH THE MANUFACTURERS' RECOMMENDATIONS. BENCHING SHALL NOT BE COATED.
- THE PROTECTIVE COATING SYSTEM SHALL BE SEALED AT BENCHING EDGES, ALL ENTRIES THROUGH THE CONCRETE STRUCTURE AND AT ALL FITMENT HOLES WITH AN APPROVED SILICON ADHESIVE IN ACCORDANCE WITH THE MANUFACTURERS' RECOMMENDATIONS.
- CONDUITS ARE TO BE LOCATED IN AND UNDER THE ROOF SLAB REFER DWG 59718 FOR DETAILS.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

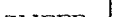


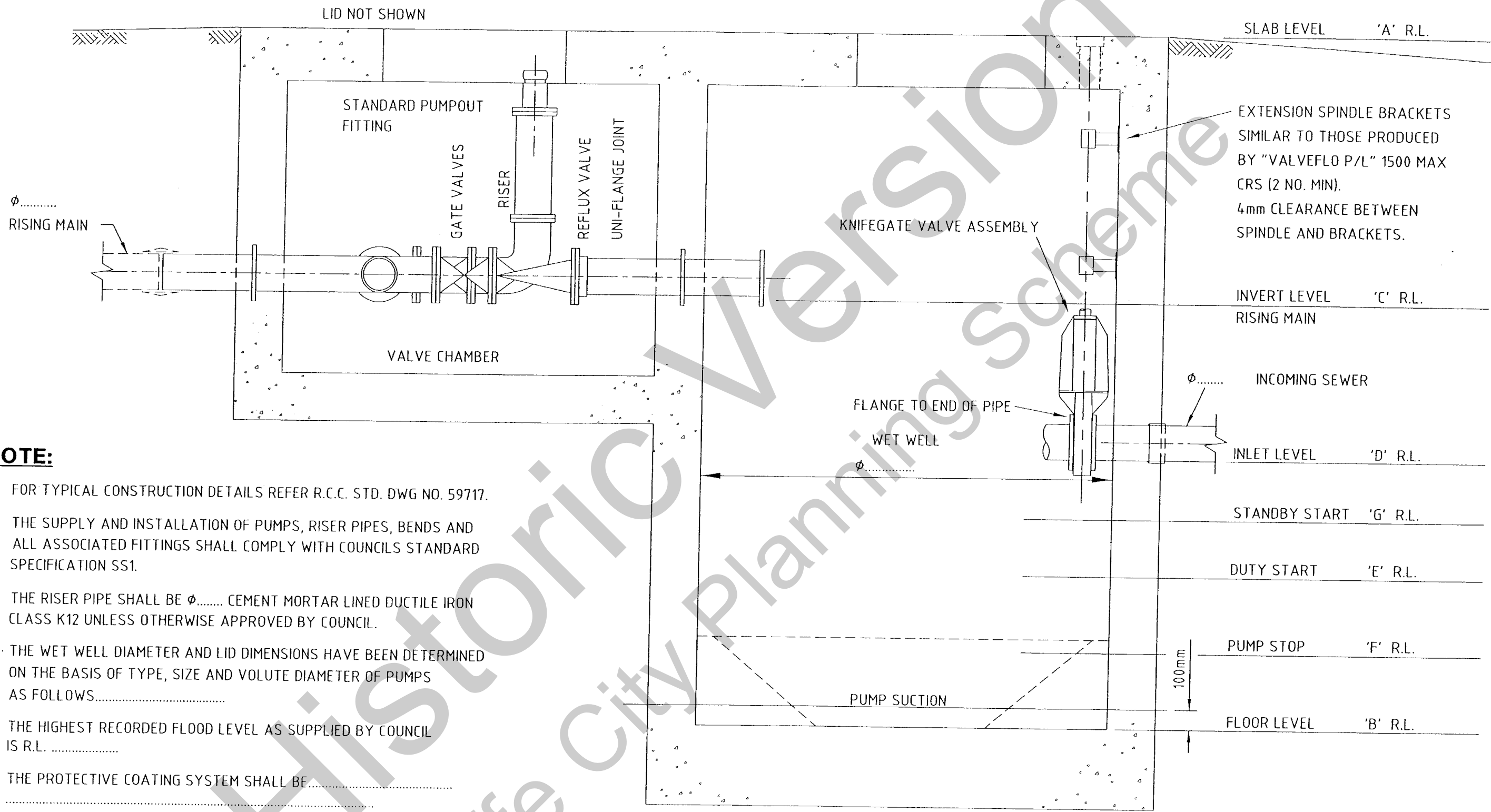
PLAN - ROOF SLAB

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	STANDARD DRAWING				
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			TYPICAL SEWERAGE PUMP STATION				
			G:\Standard Drawings\RCC\Sewage											2100 Dia & 2400 Dia PLAN 2 OF 3 - WELL CONSTRUCTION				
										SURV'D.:	CHK'D.:							
										DRN.:	APP'D.:							
													A				SHEET 2 of 3	59717B



1. THIS DRAWING SHOULD BE READ IN CONJUNCTION WITH THE TYPICAL CONSTRUCTION DETAILS ON R.C.C. STD. DWG. NO. 59717.
2. D500N12 DOWEL BARS SHALL BE SET 100 INTO WALL AND FLOOR OF PUMP WELL TO PROVIDE FOR CONSTRUCTION OF DIVIDING WALL AND INLET STRUCTURE.
3. WELL FLOOR AND WALLS SHALL BE WELL SCABBLED TO PROVIDE SATISFACTORY JOINTING.
4. DIVIDING WALL & INLET STRUCTURES SHALL BE COATED WITH AN APPROVED PROTECTIVE COATING SYSTEM IN ACCORDANCE WITH THE MANUFACTURERS RECOMMENDATIONS.
4. ONE ONLY INCOMING SEWER IS ALLOWED TO ANY PUMP WELL.
5. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES.		BY	DATE	DATUM	A.H.D.		<div>REDCLIFFE</div> <div></div> <div>CITY COUNCIL</div>	STANDARD DRAWING								
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			DIVIDING WALL AND INLET STRUCTURE FOR								
			G:\Standard Drawings\RCC\Sewage								SURV'D.:	CHK'D.:		STANDASRD SEWERAGE PUMP WELLS 2100 Dia & 2400 Dia								
											DRN.:	APP'D.:										
													A						SHEET 1 of 1		59719	



NOTE:

1. FOR TYPICAL CONSTRUCTION DETAILS REFER R.C.C. STD. DWG NO. 59717.
2. THE SUPPLY AND INSTALLATION OF PUMPS, RISER PIPES, BENDS AND ALL ASSOCIATED FITTINGS SHALL COMPLY WITH COUNCILS STANDARD SPECIFICATION SS1.
3. THE RISER PIPE SHALL BE ϕ CEMENT MORTAR LINED DUCTILE IRON CLASS K12 UNLESS OTHERWISE APPROVED BY COUNCIL.
4. THE WET WELL DIAMETER AND LID DIMENSIONS HAVE BEEN DETERMINED ON THE BASIS OF TYPE, SIZE AND VOLUTE DIAMETER OF PUMPS AS FOLLOWS.....
5. THE HIGHEST RECORDED FLOOD LEVEL AS SUPPLIED BY COUNCIL IS R.L.
6. THE PROTECTIVE COATING SYSTEM SHALL BE.....
7. THE LEVEL AT WHICH THE CONTRIBUTING SEWERAGE SYSTEM OR THIS SEWERAGE PUMPING STATION WILL OVERFLOW IS

THIS DRAWING IS TO BE COMPLETED BY THE CONSULTANT AND SHALL FORM PART OF THE ENGINEERING DRAWINGS SUBMITTED TO COUNCIL FOR APPROVAL.

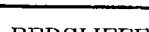

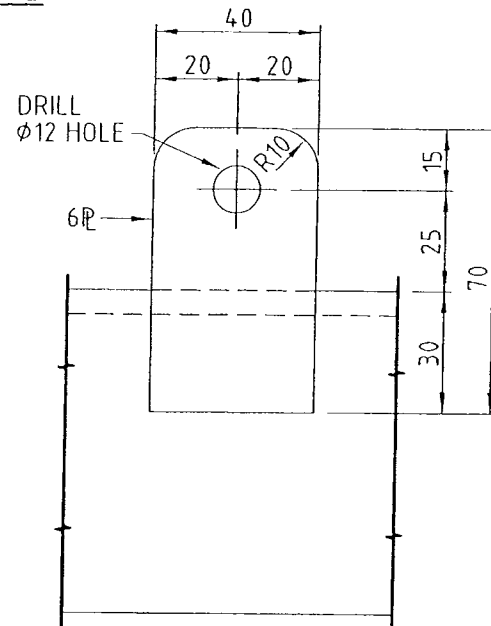
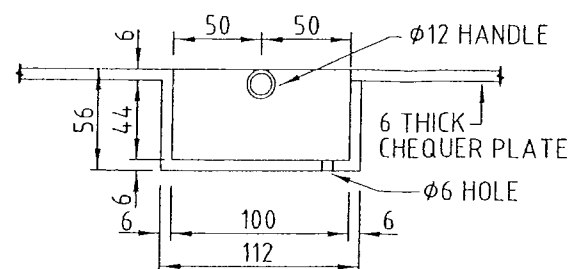
SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL.	STANDARD DRAWING SEWERAGE PUMP STATION DIAGRAMMATIC LAYOUT							
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE					SCALE	As Shown									
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											DRN.:	APP'D.:									
													 REDCLIFFE CITY COUNCIL.	A					SHEET 1 of 1		59720

TABLE OF DIMENSIONS

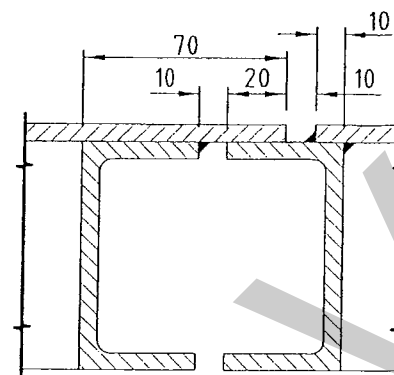
DIMENSION	LIFT STATION		PUMP STATION
	PUMP WELL	DISCHARGE CHAMBER	
A	1260	1000	1470
B	1240	980	1450
C	600	470	705
D	520	390	625
E	580	450	685
F	240	175	293
G	270	205	323
H	950	800	950
J	930	780	930
K	880	730	880
L	440	365	440



PADLOCK TONGUE DETAIL



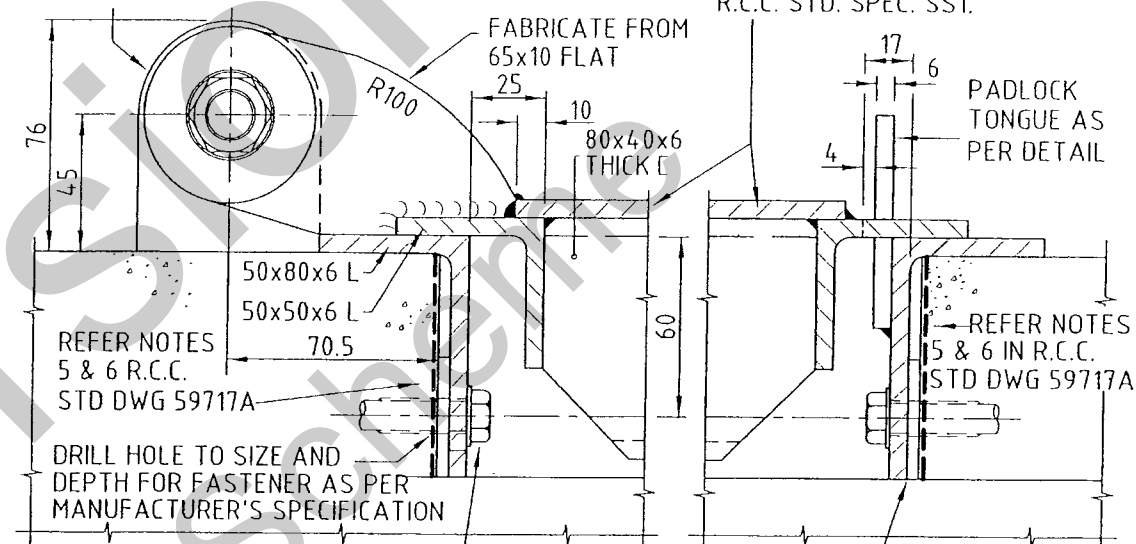
**SECTION D-D
HANDLE DETAIL**



SECTION C-C

127x76x10 L x 65 LONG
WELD FIXED TO EXTERNAL
FRAME. ROUND L AS SHOWN

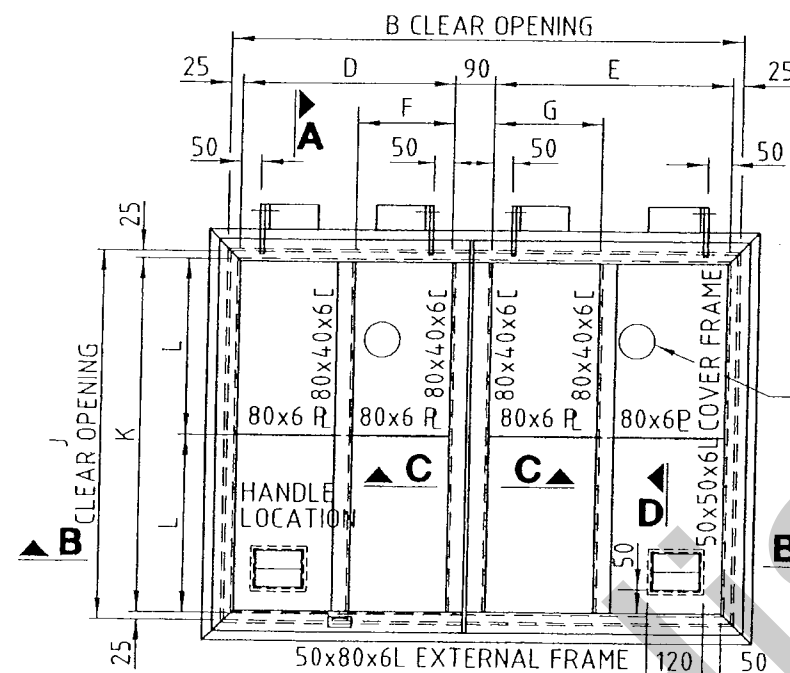
6 THICK CHEQUER PLATE
WITH ANTI SLIP COATING TO
EXTERNAL SURFACES, REFER
R.C.C. STD. SPEC. SS1.



SECTIONAL ELEVATION

PROVIDE 2 NO M10 STAINLESS STEEL DROP IN FLUSH
ANCHOR MASONRY FASTENERS AT 660 CRS
CENTRAL IN LONGEST SIDES. ISOLATE FASTENER
FROM FRAME WITH NEOPRENE GASKET UNDER
WASHER AND BITUMINOUS PAINT TO BOLT SHANK.

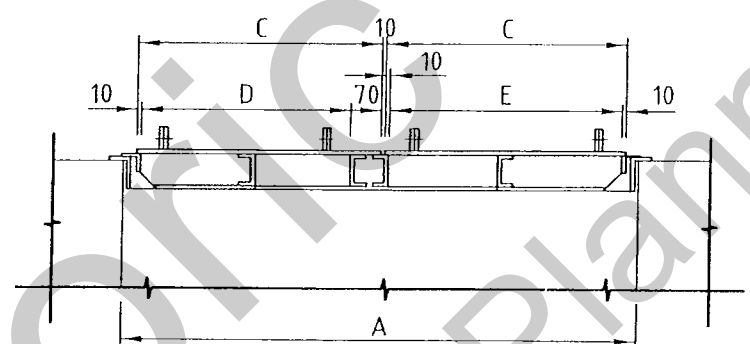
PROVIDE APPROVED PACKING
UNDER FASTENERS AS REQUIRED



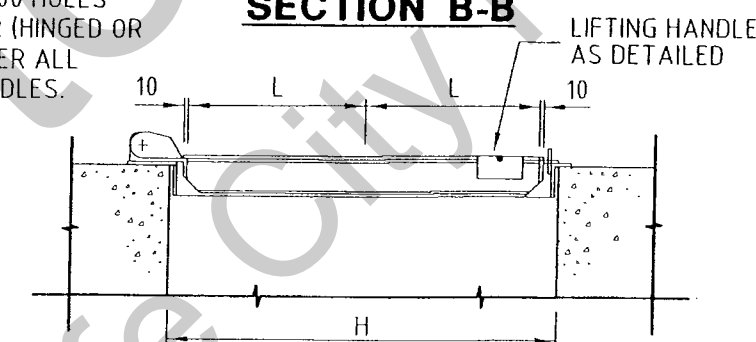
NOTES:

PLAN

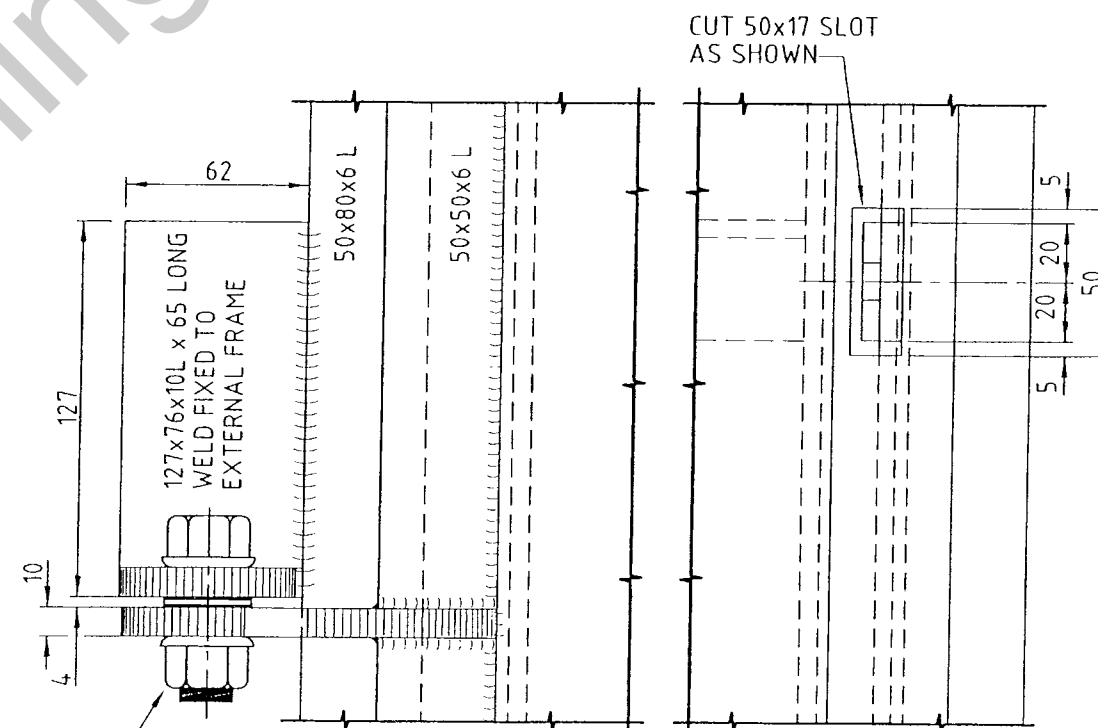
- ALL COMPONENTS SHALL BE ALUMINIUM ALLOY 6061-T6 UNLESS SHOWN OTHERWISE.
- ALL CONNECTIONS SHALL BE WELDED WITH 6 CONTINUOUS FILLET OR FULL STRENGTH BUTT WELDS UNLESS SHOWN OTHERWISE.
- ALL ALLOY FACES IN CONTACT WITH CONCRETE SHALL BE BITUMEN PAINTED.
- 6 THICK CHEQUER PLATE OMITTED FOR CLARITY. WELD TO COVER FRAME WITH 3 CONTINUOUS FILLET ROUND TOP AND UNDERSIDE.
- DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.



SECTION B-B



SECTION A-A

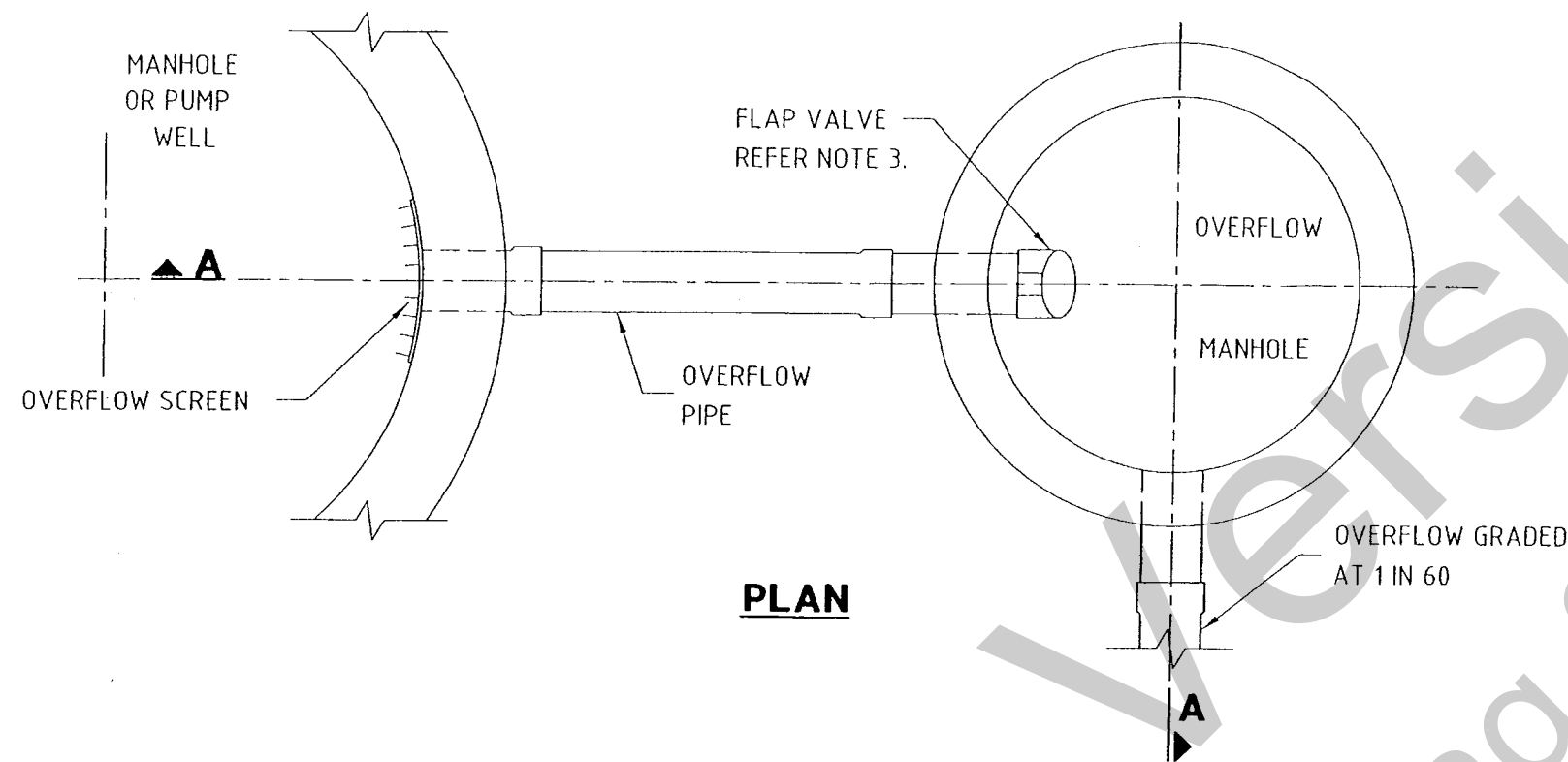


PLAN

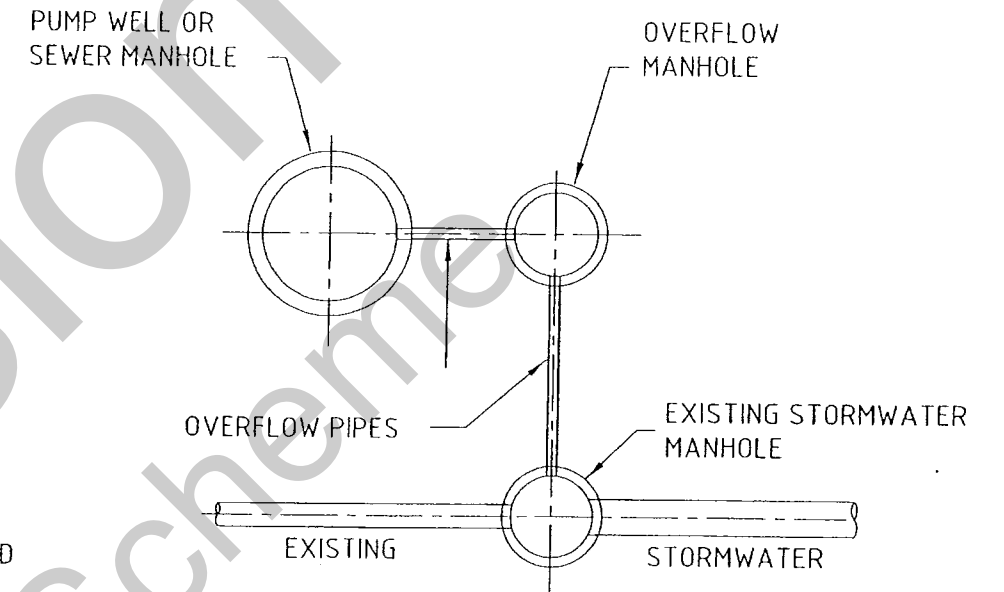
COVER DETAIL

Ø16 S.S. HINGE BOLT COMPLETE WITH
S.S. WASHERS AGAINST BOLT HEAD, NUT
AND BETWEEN FIXINGS. WELD FIX NUT TO
BOLT WITHOUT THREAD PROTRUDING.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING LIGHT DUTY ACCESS COVER FOR SEWERAGE LIFT STATIONS AND PUMP STATIONS				SHEET 1 of 1	59721
	FILE NAME	DATE	BACKUP LOCATION	DATE														
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										SURV'D.	CHK'D.							
										DRN.	APP'D.							



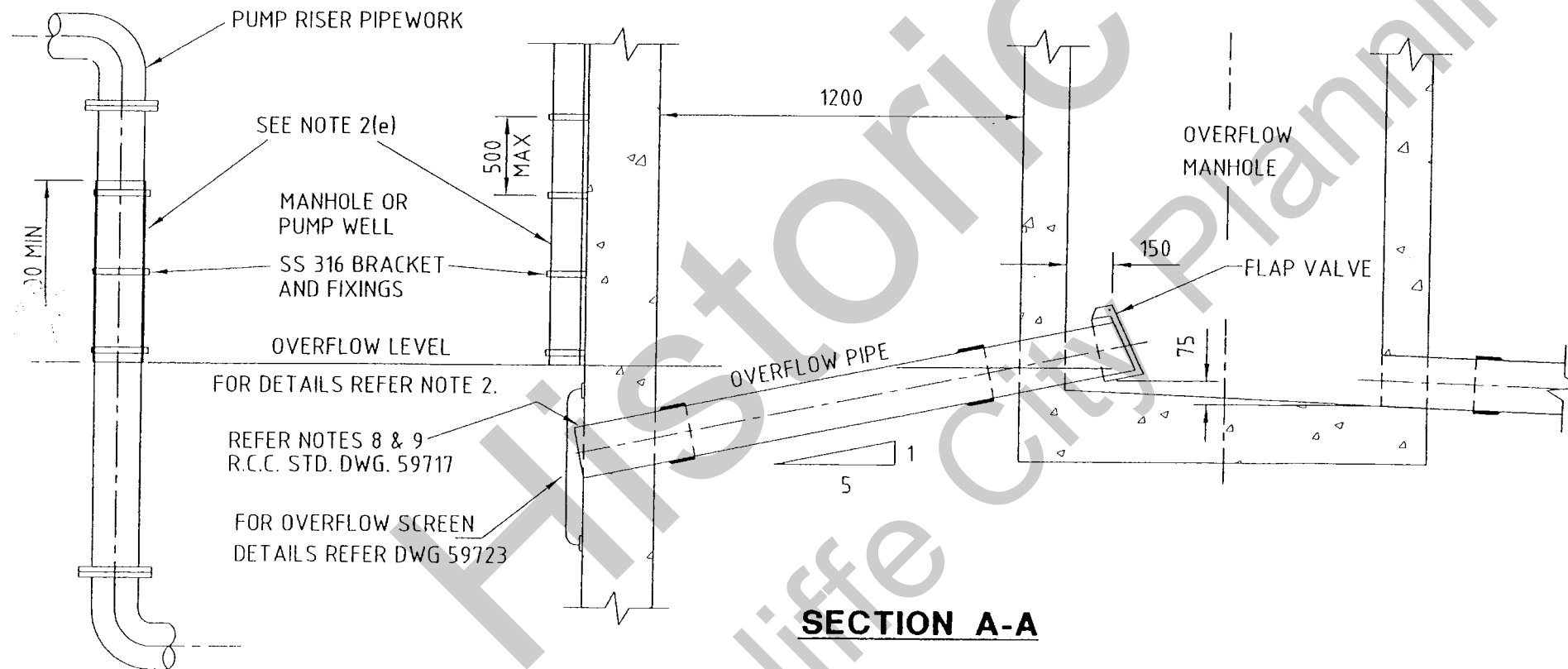
PLAN



LAYOUT ARRANGEMENT

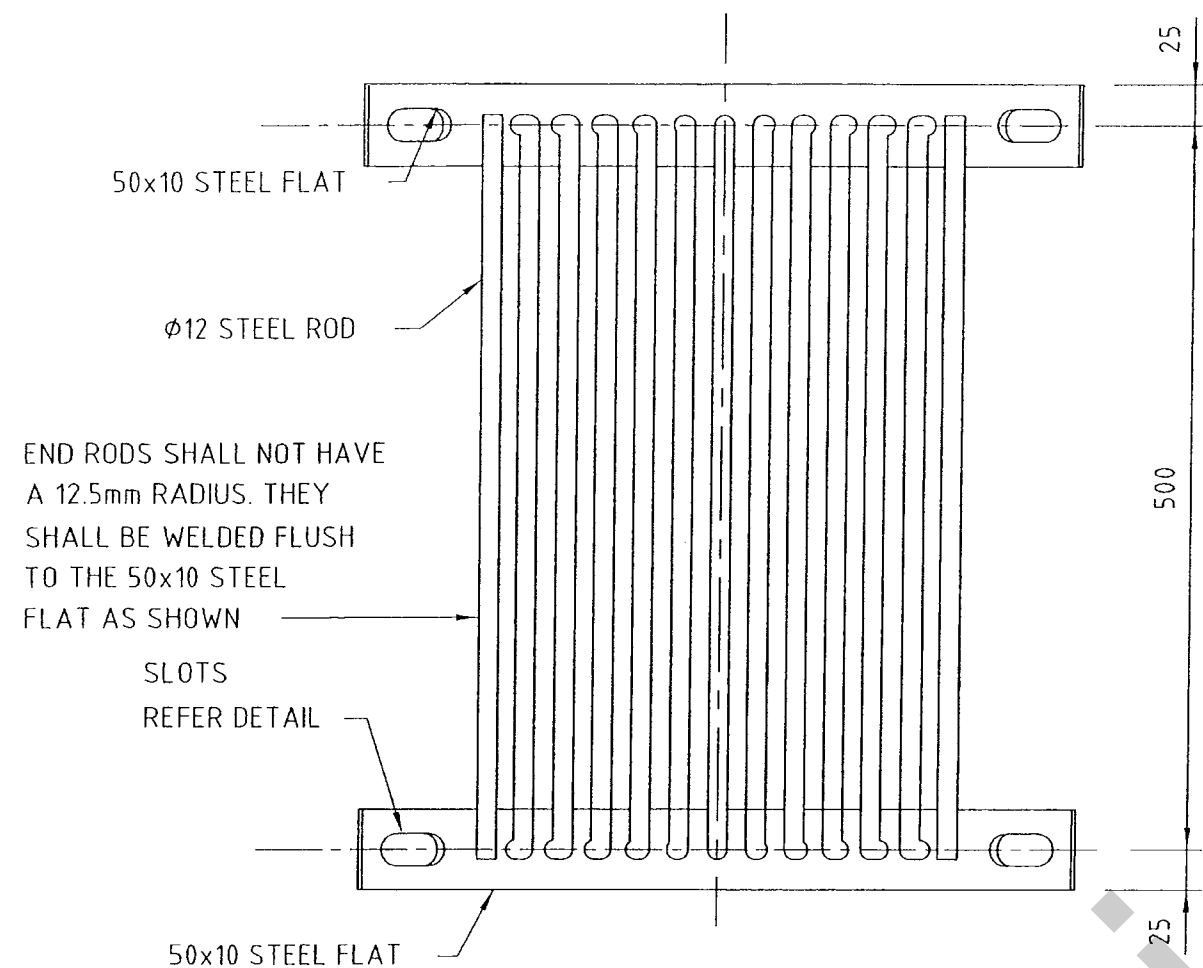
NOTES:

1. FOR OVERFLOW SCREEN DETAILS REFER R.C.C. STD. DWG. NO. 59723.
2. THE OVERFLOW LEVEL SHALL BE:
 - (a) AT LEAST 300 BELOW UNDERSIDE OF PUMP WELL ROOF SLAB.
 - (b) THE SURFACE LEVEL OF THE LOWEST MANHOLE IN THE SYSTEM.
 - (c) THE LOWEST FLOOR SLAB OR RELIEF GULLY TRAP (WHICHEVER IS THE LOWER).
 - (d) MARKED BY A BRASS PLATE ENGRAVED WITH THE DEPTH TO OVERFLOW AND ATTACHED TO TOPSIDE OF PUMP WELL ROOF SLAB, AND
 - (e) SUBJECT TO THE LEVEL, VISIBLY MARKED BY EITHER A SIMILAR DN ORANGE COLOURED PLASTIC CONDUIT, SPLIT AND ATTACHED TO THE PIPEWORK RISERS BY 316 SS CLAMPS ATTACHED AT 500 CRS OR BY A DN 100 ORANGE COLOURED PLASTIC CONDUIT ATTACHED TO THE WALL OF THE WET WELL, IN A VISIBLE LOCATION, WITH THE BASE OF EITHER CONDUIT AT OVERFLOW LEVEL.
3. FLAP VALVE SHALL BE ALUMINIUM ALLOY 6061-T6, FIBREGLASS OR EQUIVALENT.
4. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

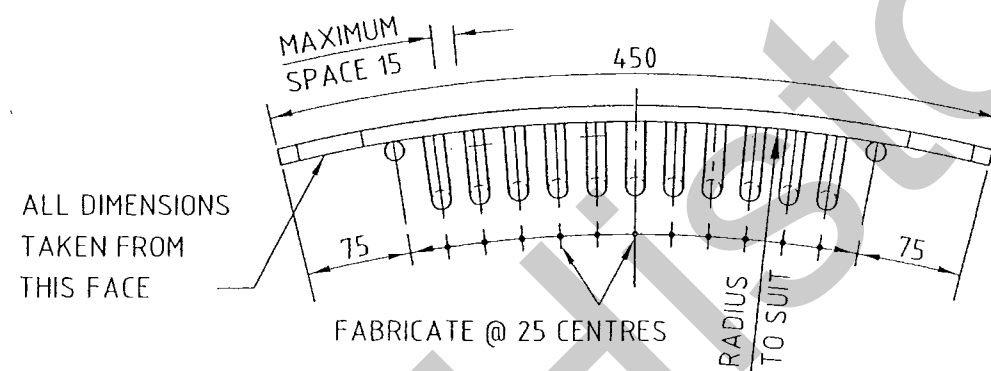


SECTION A-A

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING STANDARD OVERFLOW MANHOLES FROM PUMP WELL OR MANHOLE				SHEET 1 of 1	59722
	FILE NAME	DATE	BACKUP LOCATION	DATE															
			G:\Standard Drawings\RCC\Sewage		A	ORIGINAL ISSUE				SCALE	As Shown								
										SURV'D.:	CHK'D.:								
										DRN.:	APP'D.:								



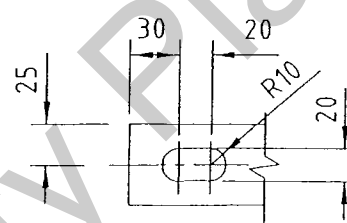
ELEVATION



**PLAN
OVERFLOW SCREEN**



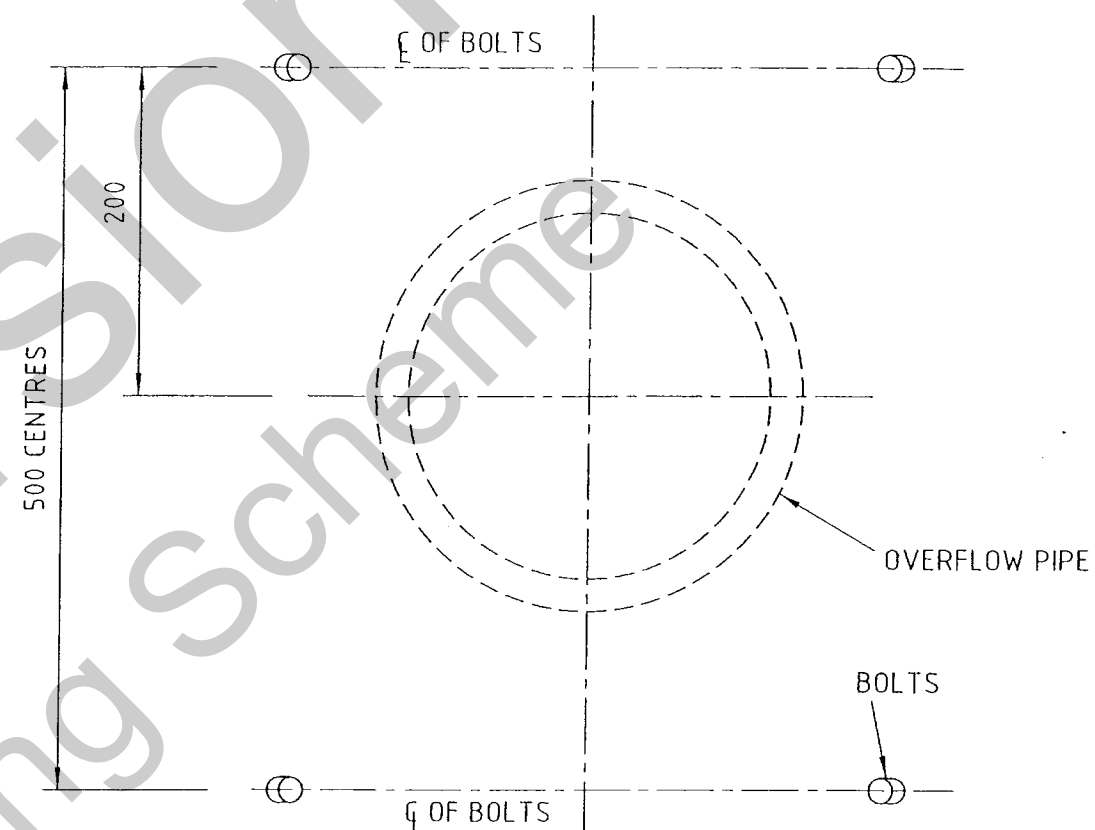
SECTION



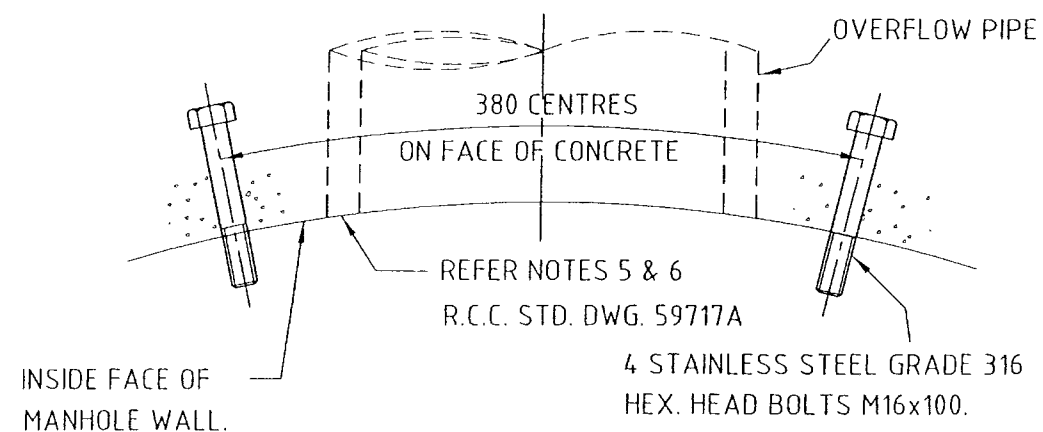
DETAIL OF SLOTS

NOTES:

1. OVERFLOW SCREEN SHALL BE HOT DIPPED GALVANISED AFTER FABRICATION.
2. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.



ELEVATION



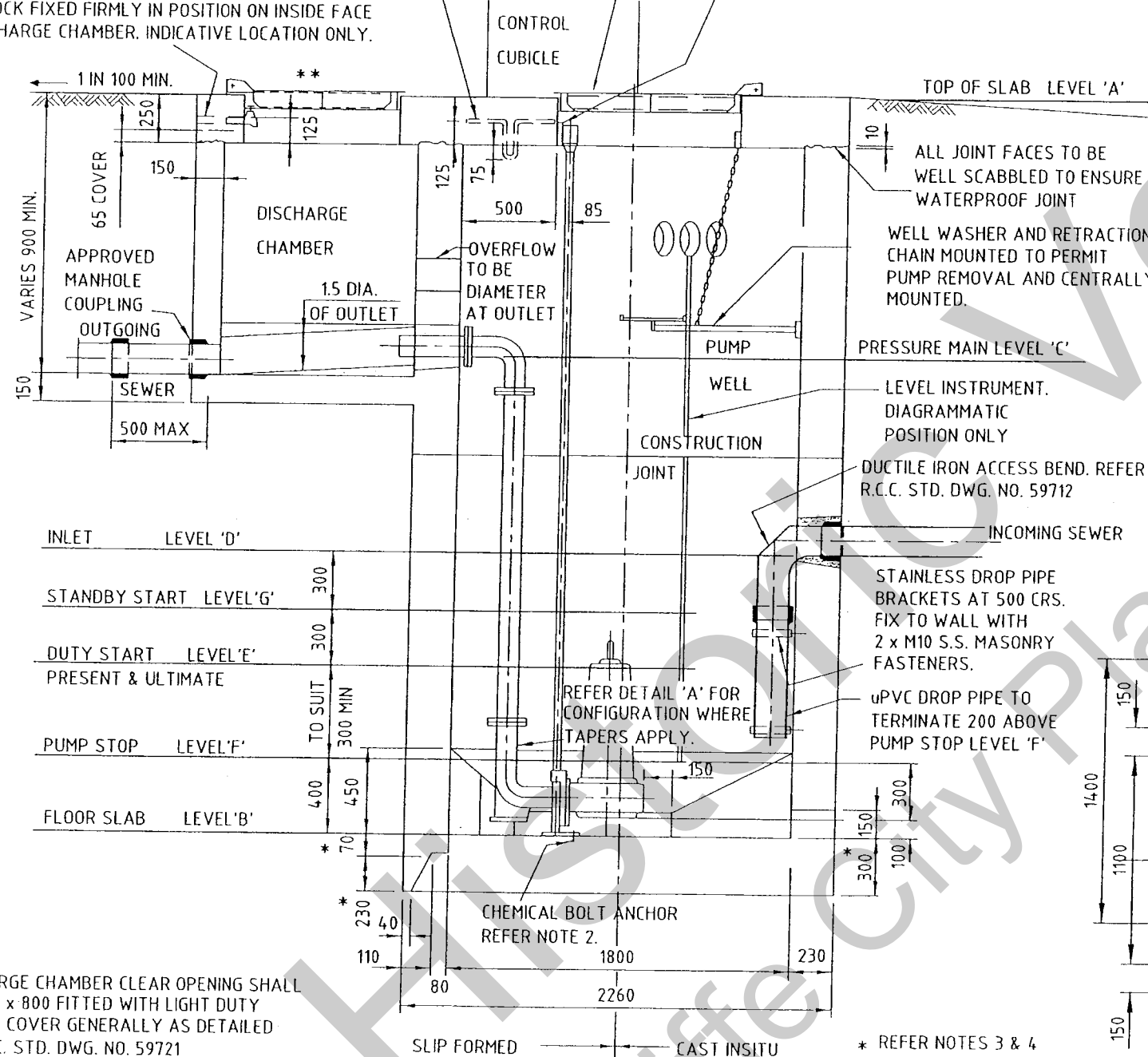
**PLAN
POSITION OF SET-IN BOLTS**

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING STANDARD OVERFLOW SCREEN			
	FILE NAME	DATE	BACKUP LOCATION	DATE													
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										SURV'D.	CHK'D.						
										DRN.	APP'D.						

CLEAR OPENING SHALL GENERALLY BE 1260x950 FITTED WITH LIGHT DUTY ACCESS COVER AS DETAILED ON R.C.C. STD. DWG. NO. S9721. THE VOLUTE DIAMETER OF THE PUMP SHALL DETERMINE THE FINAL OPENING AND LID DIMENSIONS.

EACH PUMP SLIDE SUPPORT TO BE
FIXED TO TOP SLAB WITH 2xM12
STAINLESS STEEL DROP IN FLUSH
ANCHOR MASONRY FASTENERS.

PROVIDE Ø50 CONDUIT TO ACCEPT WATERSERVICE.
POSITION TO BE DIRECTED ON SITE. 20 THREADED
HOSE COCK FIXED FIRMLY IN POSITION ON INSIDE FACE
OF DISCHARGE CHAMBER, INDICATIVE LOCATION ONLY.



**** DISCHARGE CHAMBER CLEAR OPENING SHALL
BE 1000 x 800 FITTED WITH LIGHT DUTY
ACCESS COVER GENERALLY AS DETAILED
ON R.C.C. STD. DWG. NO. 59721**

SECTIONAL ELEVATION

NOTES:

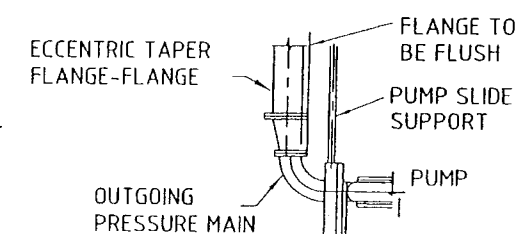
1. THIS DRAWING SHOULD BE READ IN CONJUNCTION WITH R.C.C. STD. DWG. NO. 59716, 59717, 59721 & 59725.
2. PUMP BASEPLATES AND SLIDE SUPPORTS SHALL BE FIXED TO FLOOR AND TOP OF SLAB WITH STAINLESS STEEL DROP IN FLUSH ANCHOR MASONARY FASTENERS IN ACCORDANCE WITH THE MANUFACTURERS RECOMMENDATION.
3. THE THICKNESS OF THE BASE SHOWN IS FOR LIFT STATIONS TO A MAX. DEPTH OF 4.0m.
4. FOR DEPTHS OF LIFT STATIONS GREATER THAN 4.0m THE BASE THICKNESS SHALL BE INCREASED TO COVER FLOTATION OF THE STRUCTURE WHEN EMPTY OF PUMPS, PIPEWORK, FITTINGS AND LIQUID AND SHALL BE AS DETAILED ON THE DRAWINGS.
5. ALL INTERNAL VERTICAL, SOFFIT, COVER OPENING WET WELL AND DISCHARGE CHAMBER SURFACES SHALL BE COATED WITH AN APPROVED PROTECTIVE COATING MANUFACTURERS SYSTEM IN ACCORDANCE WITH THE RECOMMENDATIONS. BENCHING SHALL NOT BE COATED.
6. THE PROTECTIVE COATING SYSTEM SHALL BE SEALED AT BENCHING EDGES, ALL ENTRIES THROUGH THE CONCRETE STRUCTURE AND AT ALL FITMENT HOLES WITH AN APPROVED SILICON ADHESIVE IN ACCORDANCE WITH THE MANUFACTURERS RECOMMENDATIONS.
7. ALL LIFT STATIONS SHALL BE FITTED WITH AN APPROVED WELL WASHER SYSTEM INSTALLED IN ACCORDANCE WITH THE DRAWINGS.
8. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE

PUMP

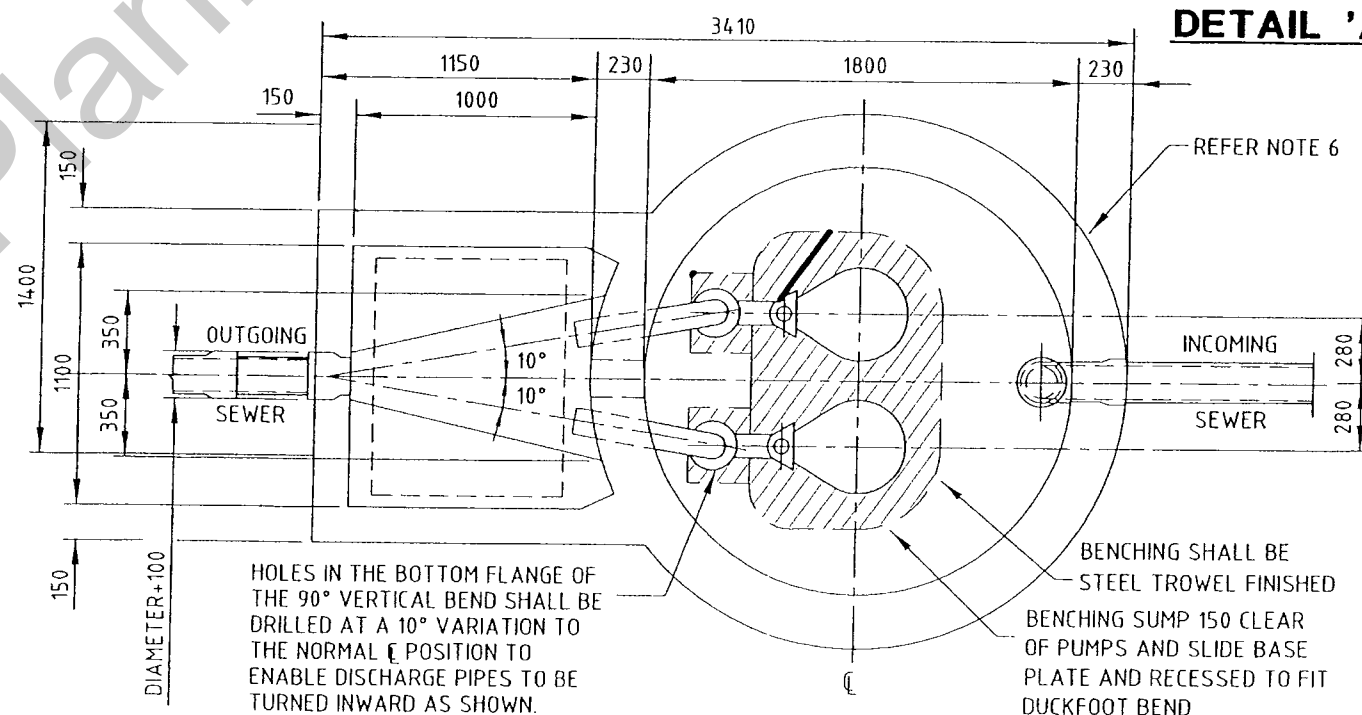
PUMP TYPE	
PUMP RATING FLOW/HEAD	
LEVEL 'A'	m
LEVEL 'B'	m
LEVEL 'C'	m
LEVEL 'D'	m
LEVEL 'E' PRESENT	m
LEVEL 'E' ULTIMATE	m
LEVEL 'F'	m
LEVEL 'G' 300 BELOW INLET OR OVERFLOW	m

OVERFLOW


OVERFLOW LEVEL AT WELL	m
LOWEST HOUSE FLOOR LEVEL OR MANHOLE LID	m

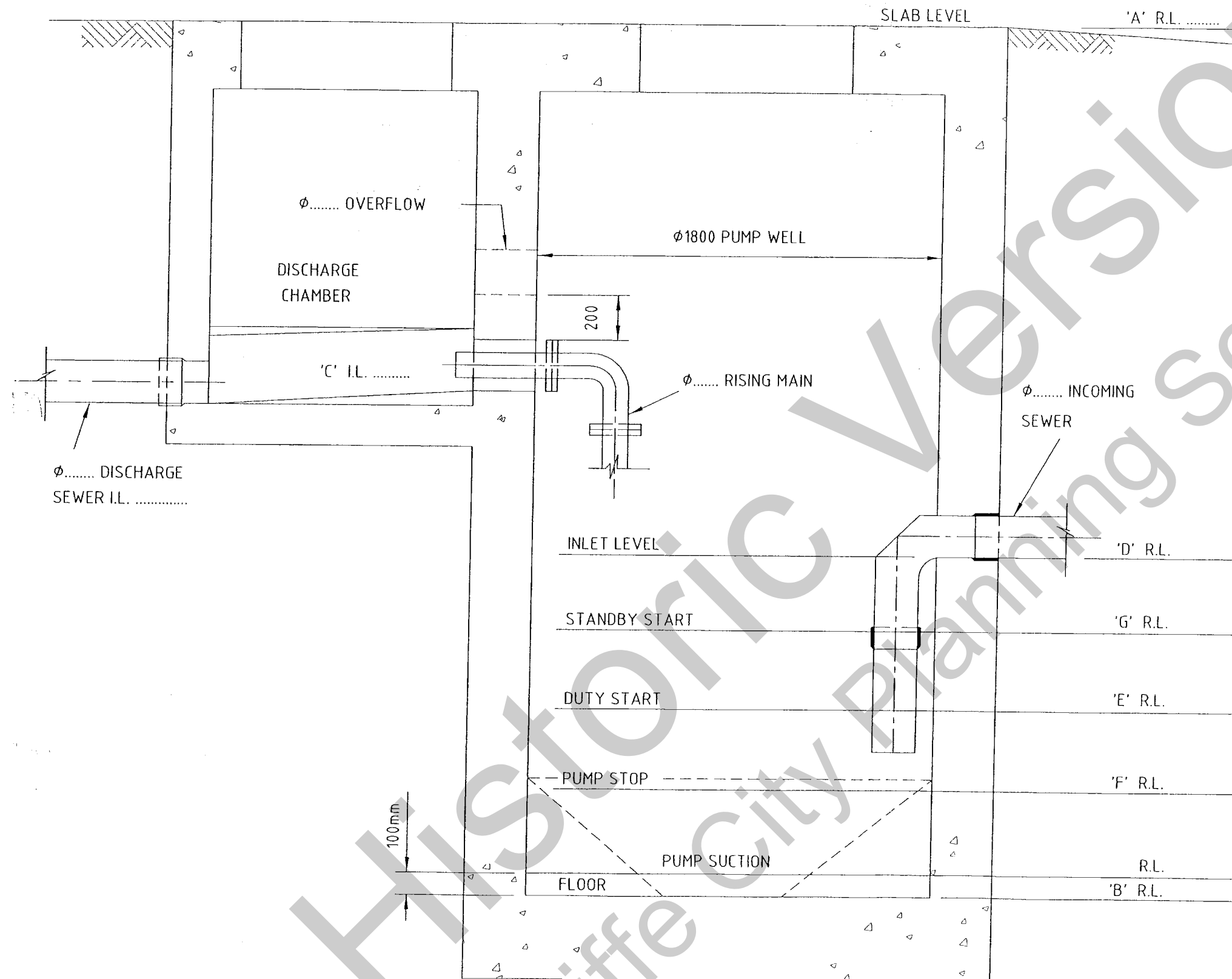


DETAIL 'A'



TYPICAL SECTIONAL PLAN

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		 REDCLIFFE CITY COUNCIL	STANDARD DRAWING				
	FILE NAME	DATE	BACKUP LOCATION	DATE	A	ORIGINAL ISSUE				SCALE	As Shown			STANDARD SEWERAGE LIFT STATION				
			G:\Standard Drawings\RECC\Sewage							SURV'D.:	CHK'D.:			1800 Dia. PLAN 1 OF 3 - GENERAL LAYOUT				
										ORN.:	APP'D.:							
													A				SHEET 1 of 3	59724A



NOTES

1. FOR CONSTRUCTION DETAILS REFER TO R.C.C. STD. DWG. NOS. 59716, 59721, 59724 & 59725.
2. THE SUPPLY AND INSTALLATION OF PUMPS, RISER PIPES, BENDS AND ALL ASSOCIATED FITTINGS SHALL COMPLY WITH COUNCILS STANDARD SPECIFICATION SS1.
3. THE RISER PIPE SHALL BE φ..... LIGHT CEMENT LINED DUCTILE IRON CLASS K12 UNLESS OTHERWISE APPROVED BY COUNCIL.
4. THE LIFT STATION DIAMETER AND LID DIMENSIONS HAVE BEEN DETERMINED ON THE BASIS OF USE OF THE FOLLOWING TYPE, SIZE AND VOLUTE DIAMETER OF PUMPS.....
5. THE HIGHEST RECORDED FLOOD LEVEL AS SUPPLIED BY COUNCIL IS R.L.
6. THE PROTECTIVE COATING SYSTEM SHALL BE.....

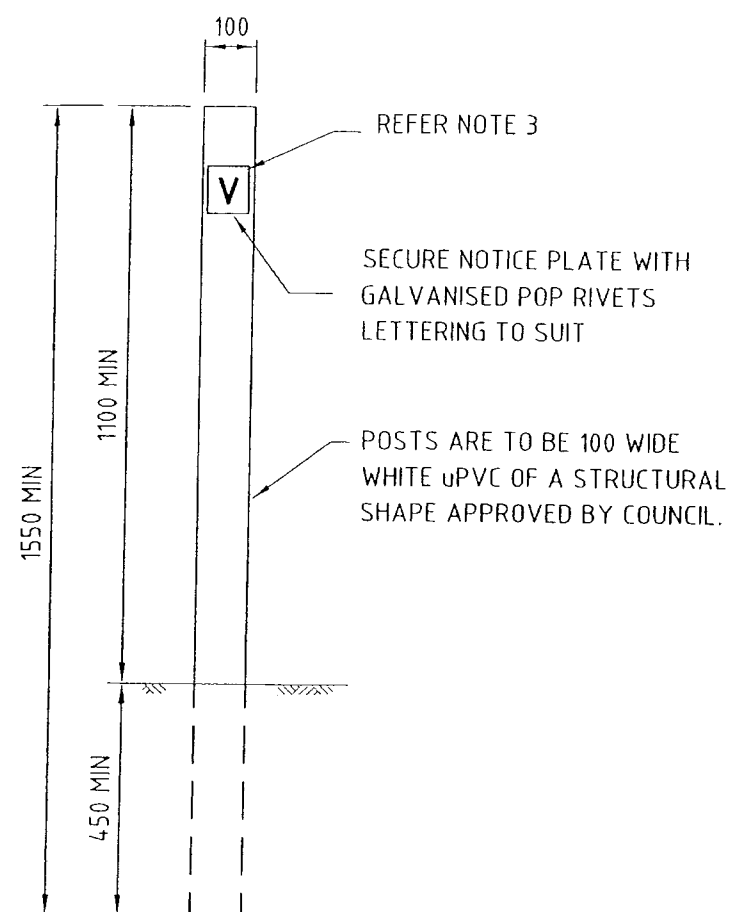
THIS DRAWING IS TO BE COMPLETED BY THE CONSULTANT AND SHALL FORM PART OF THE ENGINEERING DRAWINGS SUBMITTED TO COUNCIL FOR APPROVAL

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES	BY	DATE	DATUM	A.H.D.	REDCLIFFE CITY COUNCIL	STANDARD DRAWING SEWERAGE LIFT STATION DIAGRAMMATIC LAYOUT			
	FILE NAME	DATE	BACKUP LOCATION	DATE											
			G:\Standard Drawings\RCC\Sewage		A	ORIGINAL ISSUE			SCALE	As Shown					
									SURV'D.:	CHK'D.:					
									DRN.:	APP'D.:					

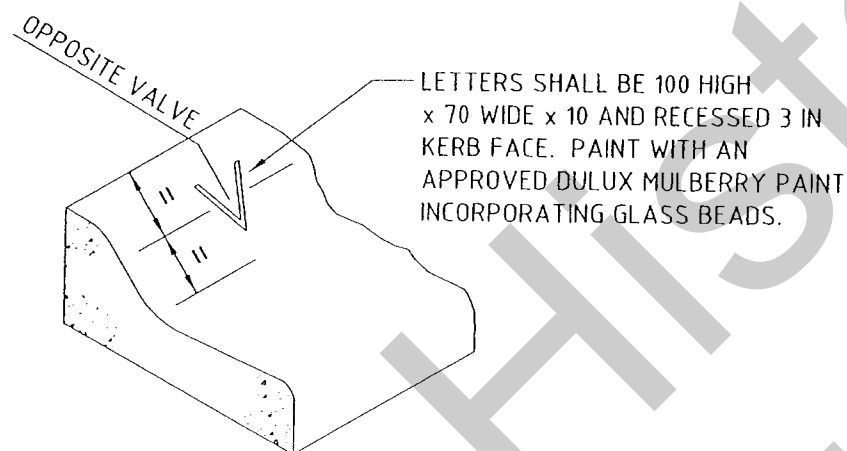
A

SHEET 1 of 1

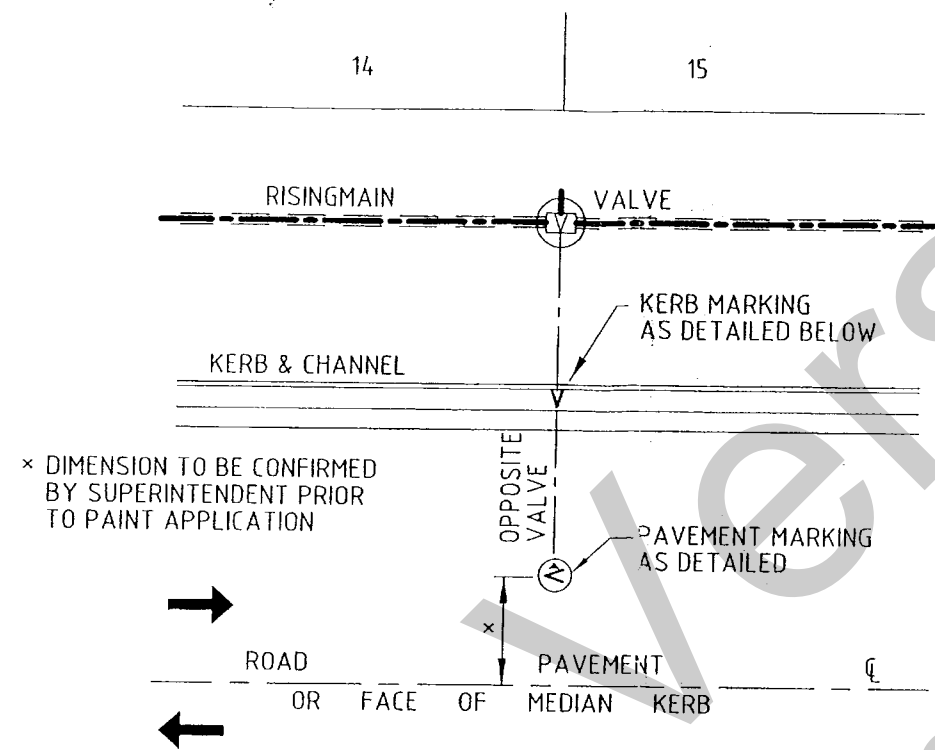
59726



FRONT ELEVATION

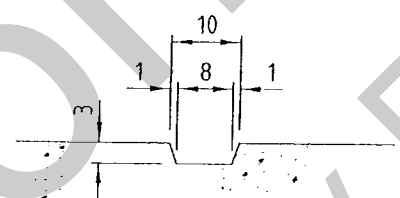


TYPICAL KERB MARKING DETAIL



**KERBED STREETS/ROADS
TYPICAL PAVEMENT MARKING PLAN FOR VALVES**

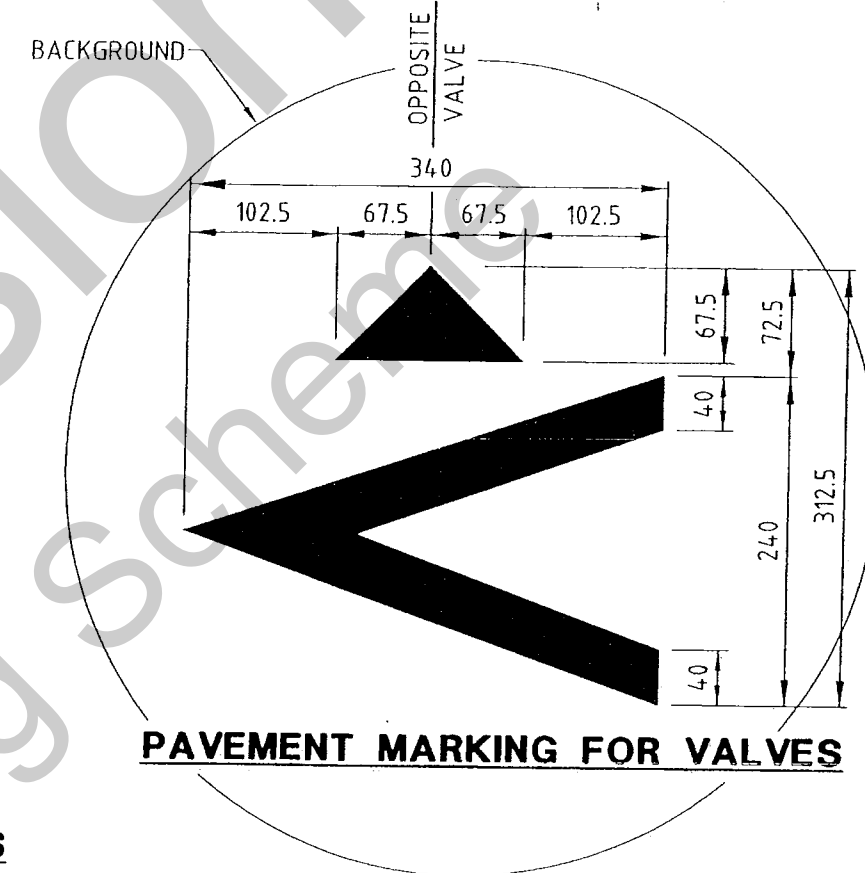
REFER NOTES



**SECTION THROUGH
LETTER RECESS**

**OTHER KERB & NOTICE
PLATE MARKINGS**

VS - VALVE SECTION CONTROL
GV - GAS VALVE
SV - SCOUR VALVE



NOTES:

1. ALL SEWERAGE KERB, PAVEMENT & BOX MARKINGS SHALL BE DULUX MULBERRY WITH ONLY PAVEMENT AND KERB MARKINGS TO CONTAIN GLASS BEADS.
2. PAVEMENT MARKING FOR VALVES SHALL BE PROVIDED ON A WHITE PAINTED BACKGROUND CIRCLE LOCATED CLEAR OF THE PARKING LANE SO THAT TYRE WEAR IS MINIMISED. THE EXACT LOCATION SHALL BE DETERMINED BY THE SUPERINTENDENT FOLLOWING SITE INSPECTIONS.
3. MARKER POSTS SHALL ONLY BE USED IN STREETS AND ROADS WHERE THERE IS NO KERB & CHANNEL OR AS DIRECTED BY THE SUPERINTENDENT.
4. THE NOTICE PLATE SHALL BE REFLECTORIZED ALUMINIUM WITH BLACK LETTERING ON A WHITE BACKGROUND NOMINALLY 80 x 80.
5. MARKER POSTS SHALL BE POSITIONED AT THE FRONT OF THE PROPERTY BOUNDARY OPPOSITE THE FITTING.
6. DIMENSIONS ARE IN MILLIMETRES UNLESS SHOWN OTHERWISE.

SURVEY BOOKS	COMPUTER DETAILS				No.	AMENDMENTS AND ISSUES		BY	DATE	DATUM	A.H.D.		REDCLIFFE CITY COUNCIL	STANDARD DRAWING MARKING FOR LOCATION OF RISING MAIN VALVES AND OTHER FITTINGS				SHEET 1 of 1	59727
	FILE NAME	DATE	BACKUP LOCATION	DATE															
			G:\Standard Drawings\RCC\Sewage		A	ORIGINAL ISSUE				SCALE	As Shown								
										SURV'D.	CHK'D.								
										DRN.	APP'D.								