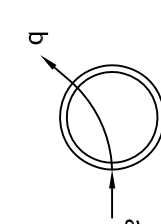
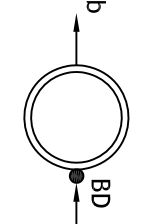
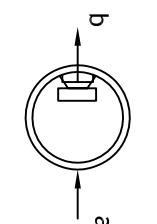
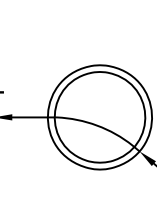
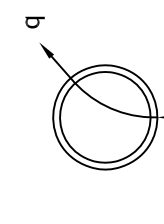
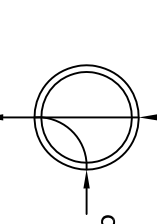
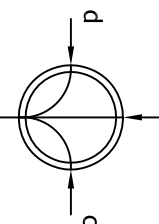
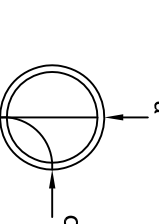
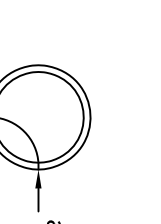
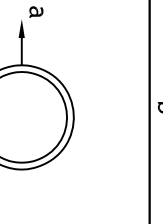
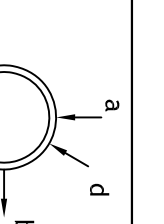
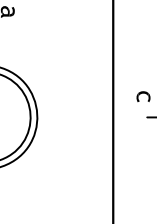
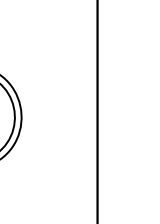
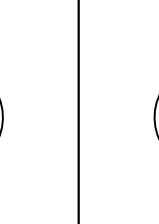
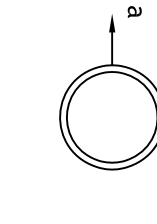


SURFACE WATER MANHOLES

MH Ref.	MANHOLE DETAILS							COVER DETAILS			PIPE DETAILS			MANHOLE LAYOUT	COMMENTS / DETAILS	
	Internal Size	Type	Brick	Conc	PPC	Cover	Invert	Depth (m)	BS EN124 Cover Ref.	Clear Opening	Type of Pipe	Size In	Size Out			Invert Level
SMH 1.0	1200Ø			*		32,000	30,100	1,900	D400	600x600	CLAY	300a	300b	30,100		
						TBC					CLAY		300b	30,100		
SMH 1.1	1200Ø		*			34,000	31,070	2,930	D400	600x600	CONC	300a	300b	31,070		BD, BACKDROP
						TBC					CONC			31,070		
SMH 1.2	1500Ø		*			34,700	30,870	3,830	D400	600x600	CONC	450a	450b	31,170		CATCHPIT WITH 300mm SUWP b. FLOW CONTROL DEVICE
						TBC	SUMP				CONC			31,170		
SMH 1.3	1350Ø		*			36,000	34,500	1,500	C250	600x600	CONC	450a	450b	33,500		
											CONC			33,500		
SMH 1.4	1350Ø		*			36,460	34,655	1,805	C250	600x600	CONC	450a	450b	34,655		
											CONC			34,655		
SMH 1.5	1350Ø		*			36,460	34,915	1,545	C250	600x600	CONC	450a	450b	34,690		
											CONC			34,690		
											CLAY	225c		34,915		
SMH 1.6	1500Ø		*			36,400	37,795	1,605	D400	600x600	CONC	450a	450b	34,795		
											CONC			34,795		
											CLAY	225c		34,795		
											CLAY	225d		34,795		
SMH 1.7	1500Ø		*			36,400	34,870	1,530	D400	600x600	CONC	450a	450b	34,870		
											CONC			34,870		
											CLAY	225c		34,870		
SMH 1.8	1350Ø		*			36,400	34,960	1,440	D400	600x600	CLAY	225a	450b	34,960		
											CONC			34,960		
SMH 1.9	1200Ø		*			36,360	35,610	0,750	B125	600x600	CLAY		225a	35,610		
SMH 2.0	1200Ø		*			36,500	34,800	1,700	D400	600x600	CLAY	150a	225b	35,175		CATCHPIT WITH 300mm SUWP
											CLAY		225b	35,100		
											CLAY	150c		35,175		
											CLAY	150d		35,175		
SMH 2.1	1200Ø		*			36,360	35,610	0,750	B125	600x600	CLAY		225a	35,610		
SMH 3.0	1200Ø		*			36,360	35,610	0,750	B125	600x600	CLAY		225a	35,610		
SMH 4.0	1200Ø		*			36,360	35,685	0,675	B125	600x600	CLAY		225a	35,685		
SMH 5.0	1500Ø		*			34,500	32,600	1,700	D400	600x600	CONC		450a	32,600		MANHOLE FOR FUTURE DEVELOPMENT

SURFACE WATER MANHOLES

[illegible]

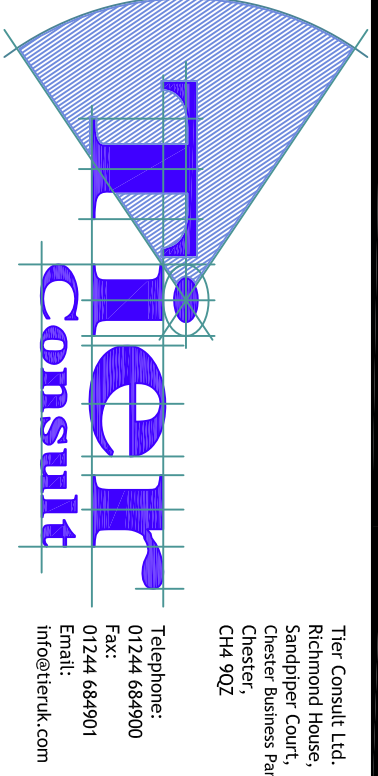
DO NOT SCALE

NOTES

1. ALL LEVELS AS SHOWN ARE AS PER TOPOGRAPHICAL SURVEY.
2. CONSTRUCTION AND TESTING OF DRAINS AND SEWERS TO COMPLY WITH BS EN 1610. CONTRACTOR SHALL NOTE THAT TOLERANCES OF +0 OR -5% OF THE PIPES INTERNAL DIAMETER MUST BE ACHIEVED UPON A MAXIMUM OF 20mm
3. FOR MANHOLE CONSTRUCTION INFORMATION REFER TO PRECAST DETAILS DRAWINGS.
4. PRECAST MANHOLES SHALL COMPLY WITH BS EN 1917
5. POLYPROPYLENE CHAMBERS TO COMPLY WITH BS 7198.
6. BRICKWORK CHAMBERS WILL TO BE CONSTRUCTED FROM CLASS 1.1 RED BRICKS CONFORMING TO BS 3921. BRICKS SHALL ALSO BE FIRE-RESISTANT CATEGORY F.
7. CLAY PIPES TO COMPLY TO BS EN 295
8. CONCRETE PIPES TO COMPLY TO BS EN 1916
9. TYPE OF PIPE "PERF" REFERS TO PERFORATED FILTER DRAINS TO COMPLY TO BS 4962.
10. PLASTIC PIPE ALTERNATIVES
11. IF THE CONTRACTOR INTENDS TO USE PLASTIC PIPEWORK IN ACCORDANCE WITH BS 4660 - THE FOLLOWING STANDARDS WILL BE REQUIRED:
12. SMALL DRAIN PIPES COMPLYING WITH BS EN 14011
13. ALL UPVC PIPES COMPLYING WITH BS EN 14011
14. PLASTIC PIPE CONNECTIONS OF LESS THAN 1500 SHALL BE SOLDERED
15. PIPE SIZES 150-9000 TO BE USED IN TOLL OR COMBINED FLOW DRAINAGE SYSTEMS SHALL BE THERMOPLASTIC STRUCTURED WALL PIPE COMPLYING WITH WIS 4-35-01
16. PIPE SIZES 150-9000 TO BE USED IN SURFACE WATER DRAINAGE SYSTEMS SHALL BE THERMOPLASTIC STRUCTURED WALL PIPES WITH BBA & HASAS ACCREDITATION.
17. THE CONTRACTOR SHALL SUBMIT DETAILS OF THE PROPOSED PLASTIC PRODUCTS FOR APPROVAL BY THE ENGINEER.
18. THE CONTRACTOR SHALL ALSO TAKE CONNECTIONS TO EXISTING SEWERS & MATERIALS USED IS SUBJECT TO AGREEMENT WITH THE ADJOINING AUTHORITY AND THE CONTRACTOR SHALL THEREFORE ASSURE THAT TRADITIONAL MATERIALS MUST BE USED EXPRESSLY INFORMED OTHERWISE.
19. MOULDED PIPE BARS HAVE A CAST IN SLOPE OF 1:40 ACROSS THE MAIN CHANNEL, AND A STEP OF 75mm FROM THE MAIN CHANNEL, TO RISING BRICKS, WHERE PIPIC MANHOLES ARE INSTALLED, LEVELS HAVE BEEN CALCULATED TO REFLECT THE SLOPE AS NECESSARY.
20. MOULDED MINI PIPE BARS HAVE A CAST IN SLOPE OF 75mm ACROSS THE MAIN CHANNEL, WHERE MINI PIPE MANHOLES ARE SHOWN, LEVELS HAVE BEEN CALCULATED TO REFLECT THE SLOPE AS NECESSARY.
21. POLYPROPYLENE INSPECTION CHAMBERS OF 5000 - 1.2m DEEP TO BE FITTED WITH A REDUCED ACCESS FITTING.

REV	DATE	BY	ISSUED FOR COMMENT	DESCRIPTION	CHK	AI
1	11.02.15	WHL			MCH	PJL

ONLINE 31.01.03.



CLIENT:

PORTAL

ARCHITECT:

TACP ARCHITECTS

PROJECT:

LLOYDS WAREHOUSING

TITLE:

MANHOLE SCHEDULE

DATE @ SIZE:		CHECKED:	MCH	APPROVED:	PJB
NO TITLE:	NTS	DESIGN/DRAWING:	VNWL	DATE:	JAN15
PROJECT NO:	T/15/1570	DRAWING NO:	CL(19)02	REV:	P1