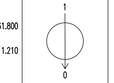
Manhole Number / Coordinates	Cover Level / Depth To Soffit	Connections	Pipe: Code	Pipe: Inverts	Pipe: Diams	Manhole Size	Types: Manhole	Types: Cover
S12 E. 1031.760 N. 3176.704	63.000 1.450		0 0	4.000 1.325	225	1200	C	D400
S13 E. 998.514 N. 3202.968	62.350 1.752		1 2 0	4.000 3.003 3.004	225 450 450	1800	B	D400
S14 E. 972.870 N. 3223.755	62.400 1.884		1 0	3.004 3.005	450 450	1500	B	D400
S15 E. 963.452 N. 3223.951	61.700 1.208		1 0	3.005 3.006	450 450	1500	C	D400
S16 E. 947.159 N. 3234.510	61.600 1.830		1 2 0	3.006 1.005 1.006	450 375 450	1800	B	D400
S25 E. 923.005 N. 3253.558	61.090 2.210		1 0	5.007 5.008	525 600	1500	B	D400
S26 E. 918.929 N. 3234.910	61.146 2.330		1 2 0	1.006 5.008 1.007	450 600 675	1500	B	D400
S27 E. 917.463 N. 3203.213	61.557 2.820		1 0	1.007 1.008	675 675	1500	B	D400
S28 E. 914.160 N. 3189.999	61.734 3.031		1 0	1.008 1.009	675 675	1800	A	D400
S29 E. 891.377 N. 3145.552	61.412 1.202		0	6.000	150	1200	C	D400
S30 E. 896.630 N. 3155.498	61.553 2.946		1 2 0	1.009 6.000 1.010	675 150 BD 675	1500	B	D400
S31 E. 920.928 N. 3142.663	62.180 3.628		1 0	1.010 1.011	675 675	1500	A	D400

Manhole Number / Coordinates	Cover Level / Depth To Soffit	Connections	Pipe: Code	Pipe: Inverts	Pipe: Diams	Manhole Size	Types: Manhole	Types: Cover
S32 TANK INLET	62.200 3.668		1 0	1.011 1.012	675 TANK			
S33 E. 1087.197 N. 3128.342	62.914 1.204		0	7.000	225	1200	C	D400
S34 E. 1062.087 N. 3096.893	62.340 1.640		1 0	7.000 7.001	225 225	1200	B	D400
S35 E. 1034.120 N. 3105.323	62.378 1.918		1 0	7.001 7.002	225 300	1200	B	D400
S36 E. 1000.009 N. 3132.558	62.922 2.792		1 0	7.002 7.003	300 300	1500	B	D400
S37 E. 968.154 N. 3157.993	62.952 3.242		1 0	7.003 7.004	300 375	1500	A	D400
S38 E. 960.141 N. 3157.095	62.851 3.181		1 0	7.004 7.005	375 375	1500	A	D400
S39 E. 940.446 N. 3132.308	62.445 3.041		1 0	7.005 7.006	375 375	1500	A	D400
S40 TANK INLET	62.200 3.625		1 0	7.006 7.007	375 TANK			
S41 TANK OUTLET	62.200 4.799		1 2 0	7.007 1.012 1.013	TANK TANK 675			
S42 FLOW CONTROL E. 910.688 N. 3135.585	62.200 5.005		1 0	1.013 1.014	675 525	REFER TO ARP DRAWING 0906/03/12 FOR DETAILS	REFER TO ARP DRAWING 0906/03/12 FOR DETAILS	REFER TO ARP DRAWING 0906/03/12 FOR DETAILS
S43 INLET MANHOLE	62.050 4.868		1 0	1.014	525	1500		
S44 E. 905.593 N. 3116.560	61.800 1.210		1 0	Rising Main 1.016	60.440 60.440	150	1200	C	D400
S45 Ex Headwall			1 0	1.016 Ditch Base	60.400 Existing	150	EXISTING	EXISTING	EXISTING

SUBJECT TO THE APPROVAL OF ALL RELEVANT AUTHORITIES

N O T E S

1. This drawing is to be read in conjunction with all relevant ARP and Architects drawings and project specifications.
2. Survey related to topographical survey supplied by Minerva Works Developments Ltd.
3. Co-ordinates to be checked prior to works commencing. Any discrepancies to be brought to the immediate attention of ARP.

Yorkshire Water General Notes

1. All adoptable sewer works and material to be in accordance with Sewerage Sector Guidance Design and Construction Guidance [Code for Adoption]. The Relevant British/European and Yorkshire Water's Standards/Requirements/Local Practice for the Adoption of Small Submersible Foul and Surface Water Pumping Stations and Kitemarked.
2. Manhole covers shall/must have a clear opening of 600mm and shall be Class D400 to BS EN 124 with 150mm deep frames in highways.
3. Filled ground must be filled and consolidated under the supervision and to the satisfaction of Yorkshire Water before any sewer works are carried out.
4. Yorkshire Water is not obliged to accept filter drain/land drainage run-off into the public sewer network or adoptable drainage system (directly or in-directly). An alternative method of disposal of the land drainage run-off will therefore be required and you will have to liaise with the Local Authority, Land Drainage Section with regard to the disposal of the filter drain/land drainage run-off.
5. The adoptable sewers should be a minimum of 1m and manholes 0.5m from kerb faces and service margins.
6. Sewers must have 5 metres clearance from trees and hedges or the width of the canopy at mature height.
7. Sewers to be laid in Class "S" Bedding (150mm granular bed and surround). Where depth of cover to top of the sewer is less than 1.2m in highways and verges (or less than 900mm in non-vehicular access areas) then a concrete slab should be provide above granular bed and surround.
8. There must be enough clearance at crossovers to accommodate bedding to both pipes, approx. 300mm : if crossover is near the rocker then the clearance needed may be increased".
9. Bedding and backfill material to conform to the requirement of Water Industry Specification 4-08-02 (Table A2).
10. Adoptable plastic sewer pipes to be BSI Kitemarked (certified to WIS 4-35-01 and BS/EN13476). Adoptable plastic sewer pipes to be laid in maximum 3 metre lengths unless there is a specific operational need to lay longer lengths. Plastic channel sections in manholes are not acceptable and Yorkshire Water would prefer clayware channel in manholes.
11. The minimum crushing strength for clay pipes should be as follows : 100mm dia. 40KN/m, 150mm dia. 40KN/m, 225mm dia. 45KN/m and 300mm dia. 72KN/m. The minimum crushing strength for concrete pipes should be – (Class 120 to EN 1916/BS5911-1 2002). Plastic pipes should conform to WIS 4-35-01 and BS EN13476.
12. Yorkshire Water policy is that Type "C" brick manholes and 1050mm dia. manhole rings are not preferred. Instead it is preferred that you use a type "B" manhole with 1200mm dia or 1500mm dia rings, with the opening sited over the channel where depth of cover to pipe soffit is 1 – 1.5m.
13. Where a B125 cover and frame has been approved, this must not be coated in plastic and must have lifting eyes suitably sized to accommodate standard lifting keys. Screw down covers are not acceptable.

Rev	By	Date	Revision	Chk	Apvd
/	DJG	26.01.24	Issued for approval	MI	MI

ARP ASSOCIATES
Chartered Consulting Engineers
Northwest House ● 5 & 6 Northwest Business Park ● Servia Hill, Leeds ● LS6 2QH
☎ 0113 245 8498 🖷 0113 244 3864 ✉ leeds@arpassociates.co.uk 🌐 www.arpassociates.co.uk
ARP Associates is a trading division of ARP Geotechnical Ltd, a company registered in England and Wales with company number 3771811, whose registered office is at 5/6 Northwest Business Park, Servia Hill, Leeds LS6 2QH

TITLE
PHASE 5
SURFACE WATER
MANHOLE SCHEDULES

PROJECT
CROSSLEY LANE,
HUDDERSFIELD

CLIENT
MINERVA WORKS
DEVELOPMENTS LTD

DRAWING STATUS
PRELIMINARY

Scale	Date	Drawn	Chk.
N/A @ A1	JAN 24	DJG	MI

Drg. No. 0906/03/11.01 Rev /