



Private Drainage Notes

- This drawing is to be read in conjunction with and checked against all other drawings, engineering details, specification and any structural, geotechnical or other specialist documents provided.
- All lateral connections for house drainage shall be 100mm unless stated otherwise and must extend a minimum of 500mm behind the back of the footpath.
- All pipes to be vitrified clay or UPVC and shall be 100mmØ laid to a fall of 1:80 unless noted otherwise or indicated by size and invert levels. All connections when laid shall be plugged, protected as necessary and marked with a stake for future use.
- Building drainage shall comply with BS 8301 1985, BS EN 752 and Building Regulations Part H. Inspection chambers located within garages to have double seal bolt down covers.
- Gully top and manhole cover specification to be in accordance with BS EN 124 and located in accordance with the intended use and loading classification as described within groups 1-6:
- This drawing is schematic for clarity only, positions of pipe runs and manholes may vary on site due to site conditions.
- Connections to pre-formed inspection chamber bases should ensure the main channel is used in all cases. High velocity discharges (e.g. from SVPs) should use the main channel where practicable.
- Cover and invert levels are indicative and may vary on site. In any case the following minimum cover to depth of cover to the crown of pipes without protection shall be as follows:
 - a. Domestic driveways and pathways without any possibility of vehicular access - 0.35m
 - b. Domestic driveways, parking areas and yards with height restrictions to prevent entry by vehicles with a gross weight in excess of 7.5 tonnes - 0.5m
 - c. Domestic driveways, parking areas and narrow streets without footways (e.g. Mews developments) with limited access for vehicles with a gross weight in excess of 7.5 tonnes - 0.9m
 - d. Agricultural land and public open space - 0.9m
 - e. Other highways and parking areas with unrestricted access to vehicles with a gross weight in excess of 7.5 tonnes - 1.2m
- Note: any protection required where drainage does not comply with a-e above shall be as follows-
 - a) Vitrified clay pipes - provide a 100 mm min. thick concrete bed and surround (instead of class 'S' bedding) and a 13 mm thick compressible filler at each joint.
 - b) UPVC pipes - provide a concrete bedding (in addition to class 'S' bedding) in accordance with appendix A15, Building Regulations part H.
- Note: in-situ concrete used in connection with a) and b) above shall be standard mix GEN3 in accordance with BS 5328.
- Drainage runs should be laid at a minimum of 5m from the rear of properties where practicable to allow for future extensions.
- Where pipes pass under buildings, unless beam & block floors are used, they are to be surrounded in concrete.
- All branch drains, or connections, are to discharge to the collectors obliquely, and in the direction of the main flow.
- Finished floor levels (FFL's), assumed to be typically a minimum of 150mm above finished ground level outside, refer to architects drawing for details.
- All new private shallow 225mm diameter surface water and foul inspection chambers and rodding eyes shown without cover levels (CL) shall be assumed to be at external ground level, and invert levels (IL) are to be typically between 450 and 600mm below CL, subject to the length of the internal house connections.
- All low spots on hardstanding areas to have double gullies.
- Prior to topsoiling of rear gardens, the gardens should be reworked, rotavated or decompacted to a depth of 600mm. Once this is carried out, no plant is to access these areas, any further consolidation of subsoil to be reworked as necessary. Before reworking or rotavating the Contractor is to mark all drain runs in the area.
- Pipe bedding to be Class 'S' bedding (100mm granular bed and surround).
- Excavations for manholes, pipe runs etc located within a 45 degree load distribution splay from any adjoining existing foundations, are to be adequately supported for the duration of the works and building drainage protected.
- Foundations adjacent to pipe runs or manholes are to have their formation level set above the invert level no higher than the equivalent of the horizontal distance between the pipe/excavation trench and the foundation, minus 500 mm.
- Where excavations for pipe runs are parallel and in close proximity to each other and/or other service trenches, the contractor shall ensure that adequate safety measures, including temporary shoring, are provided in line with current health & safety Legislation and good practice. Particular attention is to be paid to adjacent trenches of differing invert levels.
- All existing drainage found on site during the works shall be investigated, its operational status confirmed, and the following applied-
 - a) Inoperative drainage shall be cut back and pipe runs filled with concrete gROUT.
 - b) 'Live' drainage shall be temporarily re-routed to allow the new drainage to be constructed.
- Where existing drainage is to be re-used including road, building and external drainage systems, the contractor shall ensure that all chambers and drainage runs are cleaned, de-silted and made good.
- Covers to existing chambers to be re-used shall be replaced where necessary to suit proposed development loading class, see note 5. Chamber covers shall also be adjusted to suit final ground levels as necessary.
- Where necessary, existing chambers shall be re-benched to suit new pipework arrangement.
- The Contractor shall consider and take adequate measures to ensure surface water runoff during construction is managed to prevent pollution of surface water receptors and increased flood risk.

General Notes

Health & Safety Note

The details on this drawing have been prepared on the assumption that a competent contractor will be carrying out the works. If the contractor(s) considers that there is insufficient Health and Safety information on this drawing, this should immediately be brought to the attention of the designer.

Drainage Legend

- Existing public combined sewer taken from records
 - Existing private combined/foul drainage as surveyed
 - Existing private surface water drainage as surveyed
 - Existing stone culverts
 - New private foul water drainage
 - New private soil and vent pipe
 - New private surface water drainage
 - New private yard gully
 - New private channel drain
 - New private rain water pipe
 - New cellular crate attenuation tank
 - New oil separator tank
- Note existing surveyed drainage is taken from TD Jagger Existing Drainage Plan drawing 3310 100

Surface Water - Manhole Schedule

Manhole Reference	Cover Level (m)	Invert Level (M)	Depth to Invert (m)	Manhole Size (mm)	Manhole Type	Clear Opening (mm)	Cover Classification	Eastings	Northings	Connected Pipes
S1	66.685	65.350	1.335	600Ø	PPIC	600x600	D400	414892.320	416829.912	1.000 150Ø IL 65.350m
S2	66.827	65.179	1.648	600Ø	PPIC	600x600	D400	414890.545	416839.328	1.000 150Ø IL 65.254m 1.001 225Ø IL 65.179m
S3	66.900	65.007	1.893	600Ø	PPIC	600x600	D400	414907.463	416842.339	1.001 225Ø IL 65.007m 1.002 225Ø IL 65.007m
S4	66.800	65.800	1.000	600Ø	PPIC	600x600	D400	414875.151	416871.271	2.000 225Ø IL 65.800m
S5	66.500	65.550	0.950	600Ø	PPIC	600x600	D400	414901.615	416875.269	2.000 225Ø IL 65.550m 2.001 225Ø IL 65.550m
S6	66.900	64.779	2.121	1200Ø	Type B	600x600	D400	414903.504	416864.758	2.001 225Ø IL 64.779m 1.003 225Ø IL 64.779m 1.002 225Ø IL 64.779m
S7	66.177	64.850	1.327	1350Ø	Type C	1200x675	D400	414922.067	416847.640	3.000 150Ø IL 64.850m
S8	66.223	64.102	2.121	1200Ø	Catchpit (Type B)	1200x675	D400	414918.758	416867.633	1.003 225Ø IL 64.402m 1.004 225Ø IL 64.402m 3.000 150Ø IL 64.477m
S9	64.501	63.100	1.401	1350Ø	Type C	1200x675	D400	414936.118	416846.695	4.000 150Ø IL 63.100m
S10	65.805	63.500	2.305	1200Ø	Type B	600x600	D400	414928.978	416854.563	5.000 150Ø IL 63.500m
S11	65.530	62.879	2.651	1200Ø	Type B	600x600	D400	414934.410	416857.223	5.000 150Ø IL 63.029m 4.000 150Ø IL 63.029m 4.001 300Ø IL 62.879m
S12	65.557	62.582	2.975	1200Ø	Catchpit (Type B)	600x600	D400	414933.144	416864.761	4.002 300Ø IL 62.882m 4.001 300Ø IL 62.882m
S13	65.442	62.790	2.652	1800Ø	Type B	600x600	D400	414935.501	416870.566	1.005 300Ø IL 62.790m 1.006 225Ø IL 62.790m
S14	67.507	66.000	1.507	1350Ø	Type C	1200x675	D400	414865.017	416920.105	7.000 150Ø IL 66.000m
S15	67.377	65.258	2.119	1200Ø	Catchpit (Type B)	1200x675	D400	414871.932	416933.056	7.000 150Ø IL 65.633m 7.001 225Ø IL 65.558m
S16	67.238	65.488	1.750	1200Ø	Type B	1200x675	D400	414864.615	416937.535	7.003 225Ø IL 65.488m 7.002 225Ø IL 65.488m

Foul Water - Manhole Schedule

Manhole Reference	Cover Level (m)	Invert Level (M)	Depth to Invert (m)	Manhole Size (mm)	Manhole Type	Clear Opening (mm)	Cover Classification	Eastings	Northings	Connected Pipes
F1	66.900	66.000	0.900	600Ø	PPIC	600x600	D400	414885.702	416842.652	F1.000 150Ø IL 66.000m
F2	66.852	65.439	1.413	1350Ø	Type C	1200x675	D400	414908.352	416846.584	F1.000 150Ø IL 65.439m F1.001 150Ø IL 65.439m
F3	65.797	64.050	1.747	1200Ø	Type B	600x600	D400	414929.582	416849.993	F1.001 150Ø IL 64.050m F1.002 150Ø IL 64.450m
F4	65.360	64.000	1.360	1350Ø	Type C	1200x675	D400	414932.438	416836.205	F1.002 150Ø IL 64.050m F1.003 150Ø IL 64.000m

Rev.	Date	Description	Drawn By	Checked By
P01	28/11/2025	Draft Issue		LC/CS

S3 - Suitable for Review & Comment

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Client: **John L Brierley Ltd.**

Job: **Turnbridge Mills, Quay Street, Huddersfield**

Title: **Proposed Drainage Layout**

Classification: **FL 60_20**

Scale @ A1: **1:250**

Project - Originator - Valuation System - Level/Location - Type - Discipline - Number: **S12097 - JNP-XX-XX-DR-C-2005**

Revision: **P01**