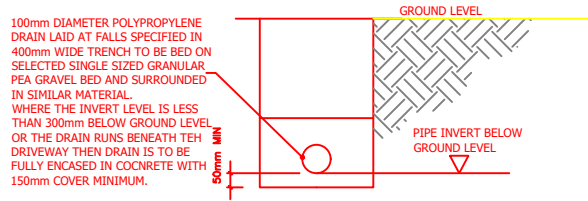
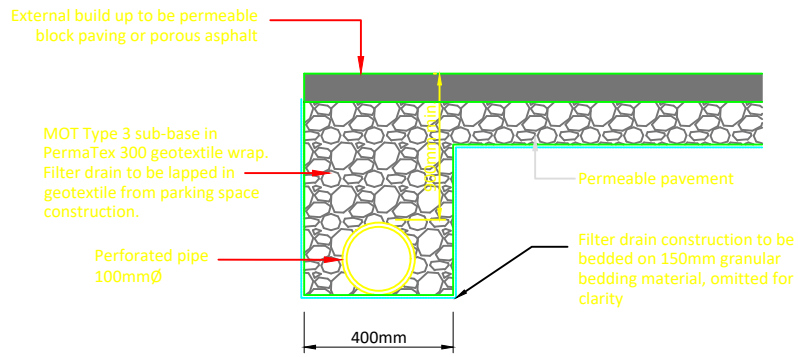


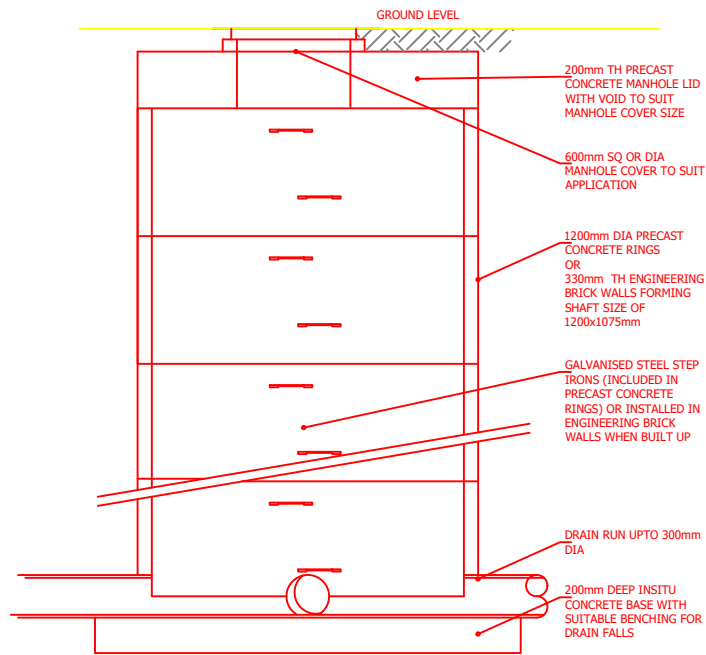
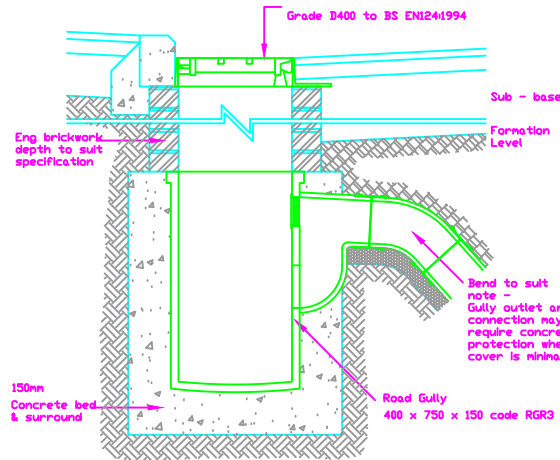
TYPICAL INSPECTION CHAMBER DETAIL
FOR INVERT LEVELS <1.0m DP



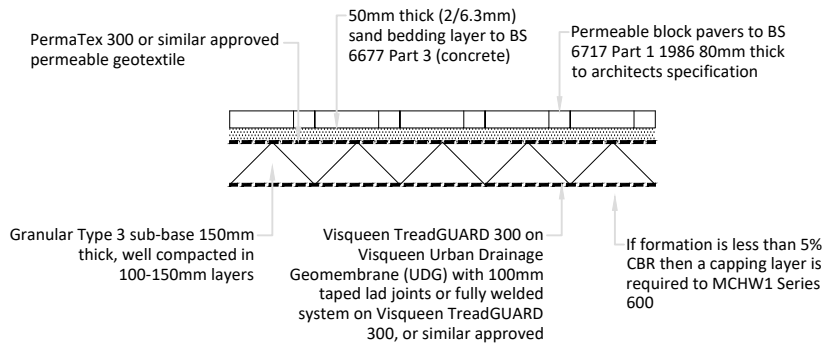
TYPICAL PIPE BEDDING DETAIL



Road gully
Connection Detail



TYPICAL MANHOLE DETAIL
FOR INVERT LEVELS >1.0m <3.0m DP



Below Ground Drainage

1. All proposed drainage levels shown on the drawings are taken from the levels provided on the Architects/Survey drawings and **must** be confirmed by the contractor on site **prior** to excavating trenches etc. All invert levels are to the underside of any pipes, inspection chambers, manholes or tanks and it is the contractors responsibility to check these prior to commencing works.
2. All new below ground drainage is to be of 100mm diameter, unless noted otherwise, Hepworth Supersleeve vitreous clay pipework to BS65:1981 laid and bedded to manufacturer's instructions to sizes dependant upon loading conditions and gradients within their recommendations, to comply with BS 8301:1985 together with parts H1, 2 & 3 of the Building Regulations.
3. Jointing shall be either u.p.v.c pushfit couplings or by sealing rubber "o" rings in polyester mouldings.
4. Drains to be laid in suitable trench bedding classes for the specific application and accordance with all relevant British Standards and Building Regulations at the time of installation.
5. Where pipes run beneath solid floors, roads or are close to the surface then these should be encased in minimum 150mm concrete.
6. Where pipes run through walls then suitable precast concrete lintels are to be installed over the line of the pipe and the voids filled with gravel to prevent loading from the walls to the pipes.
7. No drainage pipes are to be laid beneath or within 45 degrees of the underside of a foundation.
8. Pipes are to be laid on a gradual fall as shown on the drawings to suit invert levels shown, although minimum falls of 1:40 for 100mm diameter foul sewers and 1:100 for 100mm diameter surface water pipes are used unless calculated otherwise.
9. Wherever possible, surface water should be discharged into suitable water storage units or directly into a soakaway positioned at least 5m from any structure.
10. Where drainage runs exceed 20m in length then intermediate rodding access/inspection chambers should be installed.
11. All new gullies should be back inlet gullies, BIG's, for rodding purposes. All new soil waste pipes should have roddable access covers.
12. All new manholes are to be of suitable design for the application and in accordance with all relevant British Standards and Building Regulations at the time of installation.
13. Proprietary plastic inspection chambers are required at a change in direction upto 1.0m deep, whilst masonry or precast concrete ring chambers are required below this depth.
14. Brickwork manhole construction to be of 225mm class "B" engineering brickwork in 1:3 cement/mortar
15. Brick or concrete ring manholes to be built up off minimum 150mm thick concrete base. Benching of concrete base to be formed around drainage channels to a smooth finish and fall to outlet.
16. Cast iron steps to BS1247:1975 shall be provided where depth of chamber exceeds 1000mm. All external MH covers shall be medium duty galv. steel to BS497 unless located within carriageways or car parks where heavy duty cast iron are to be used.
17. Manhole cover to be seated in rebated steel frames and sealed with grease on 100mm thk concrete frame base with 600x600mm min opening.
18. Any internal chambers shall be fitted with a double seal bolt down cover with an "inlay" recess for finishes and set in greased frame.
19. Proprietary u.p.v.c inspection chambers to have 150mm min sulphate resisting conc base.



E. steve@cheshirestructural.co.uk
M. 07793201898
W. www.cheshirestructural.co.uk

Site Address: 351, Palatine Rd
Northenden

Drawing Title:
Drainage
Details

Drawing Status:
Sketch

Date:
11-02-2021

Scale:
NTS

Drawn By:
SN

Drawing No:
101A