

Notes:-

1. This drawing and all information contained thereon is intended for Planning purposes only. NOT FOR CONSTRUCTION;
2. All highway geometry, gradients and levels are subject to the approval of the Local Highway Authority;
3. Finished carriageway levels within shared-surface areas and raised tables shall be 100mm higher than the alignment contours shown;
4. Levels of existing surface water culvert to be confirmed.

LEGEND :-

- 180mm Type 4 SW Inspection Chamber I.L. Indicated and SW pipework (Non-Adoptable)
- Yard Gully and SW pipework (Non-Adoptable)
- Rain water downpipe discharges onto driveway or Hydropave (Non-Adoptable)
- Rain water downpipe discharges into Hydropave (Non-Adoptable)
- Rain water downpipe discharges into planter box or rain garden (Non-Adoptable)
- Rain water downpipe discharges into water butt (Non-Adoptable)
- Plastic 210l water butt with overflow into SW system (Non-Adoptable)
- 180mm Type 4 SW Inspection Chamber with Non Return Valve and 300mm sump (below I.L. marked *) before Hydropave (Non-Adoptable)
- Extents of permeable paving parking bay / shared driveway construction (Non-Adoptable).
- Extents of permeable paving parking bay / shared driveway construction with open graded sub-base to provide storm water attenuation (Non-Adoptable).
- Extents of standard block paving construction to suit DCWW S104 requirements. Runoff from these areas to be conveyed onto adjacent permeable paving
- 675mm x 675mm Office Flow Control Chamber I.L. Indicated (Non-Adoptable)
- Highway Gully and connecting spur (NPTC/CBC to Adopt)
- 1200mm Type 2 Concrete Ring Manhole I.L. Indicated and Carrier Drain (NPTC/CBC to Adopt)
- 180mm Type 4 Foul Inspection Chamber I.L. Indicated and FW pipework (Non-Adoptable)
- 1200mm Type 2 Concrete Ring Manhole I.L. Indicated and Foul Sewer (DCWW to Adopt)
- 180mm Type 4 Foul Inspection Chamber I.L. Indicated and FW lateral (DCWW to Adopt)
- 450mm Type 3 Foul Inspection Chamber I.L. Indicated and FW lateral (DCWW to Adopt)
- Foul Rising Main (DCWW to Adopt)
- Additional Facing Brickwork below D.P.C (Height Indicated)
- Masonry Retaining Wall (Height Indicated)
- Existing Ground Level
- Proposed Ground Level
- Finished Floor Level (Garage Levels refer to Level at Entrance Door)
- Embankment (1 in 2 Gradient)
- 150mm Step (No. Indicated)

SITE CATCHMENT

Greenfield

Total Area = 2.05ha
Greenfield Catchment Area* = 0.741ha

*based on proposed impermeable area

Greenfield Runoff Rates (0.741ha)

1 in 1yr = 9.5 l/s
QBar = 10.8 l/s
1 in 30yr = 19.3 l/s
1 in 100yr = 23.6 l/s

Pre-Development volume discharge (100yr 360mins)

1 in 100yr (360mins) = 303m³

Post-Development
Approx Impermeable Area = 0.741ha

Post-Development peak flow rate

1 in 1yr = 8.7 l/s (-0.8 l/s)
1 in 30yr = 9.3 l/s (-10.3 l/s)
1 in 100yr = 9.3 l/s (-14.3 l/s)

Discharge Volume (100yr 360mins)

Post-Dev - 1 in 100yr ± 30% (360mins) = 290m³

Total Volume +/- = 13m³

SuDS Measures

The above post-development flow rates are based on a traditional storm network model simulation. However, all runoff is to be conveyed to pass through a SuDS feature which will further reduce the above discharge rates and volume.

The SuDS components will effectively increase concentration time, reduce flow velocities and rates, and providing significant volume losses through evaporation and evapotranspiration.

Losses are difficult to quantify and will vary depending on plant species, level of saturation and varied ground conditions across the site.

