



Project Title: Land North of Green Lane, Chesterton
Report Ref: JNY8140
Date: 15 March 2016

SUSTAINABLE DRAINAGE PRELIMINARY MANAGEMENT AND MAINTENANCE PLAN

Introduction

- 1 The proposed development consists of 45 new dwellings on land North of Green Lane, Chesterton.
2 The submitted reserved matters application proposes to utilise the following sustainable drainage systems:
- Attenuation basins
- Permeable paving
- Trench soakaways
3 The sustainable drainage systems design is based on initial investigations undertaken by RSK in May 2015 (Ref: 313035) and with the FRA and RSK Factual Soakaway Test Report, No. (Ref: 313035-02) in August 2015. These investigations confirm that infiltration drainage techniques are suitable to use in specific locations across the site.

Attenuation Basins

- 4 The development will be served by two attenuation basins before discharging to the Thames Water network. Table 1 provides a typical maintenance schedule for ponds and swales.

Table 1: Typical Maintenance Schedule for Ponds and Swales

Table with 3 columns: Maintenance Activity, Remedial Action, and Inspection Frequency. Rows include Litter removal from swales and ponds, Inspect control structures to and from swale/ponds, Landscape maintenance, Pond maintenance, and Water condition.

Permeable Paving

- 5 Permeable paving has been specified within the developments parking areas to attenuate surface water and improve water quality before discharging to the sewer network.
- 6 Permeable paving has been specified within Road 3 to attenuate surface water and improve water quality before infiltrating into the underlying ground. Infiltration can be achieved in this area of the site.
- 7 All maintenance operations are to be carried out in accordance with the Manufacturer's recommendations.
- 8 The ongoing maintenance activities, for the permeable paving, are tabulated in **Table 2**.

Table 2: Permeable Paving Maintenance Activities

Maintenance Activity	Remedial Action	Inspection Frequency
Check the surface and ensure it is free from debris, dirt and the like	Clean surfacing as required and remove detrimental materials	Typically monthly or as required
Ensure the surface is clear of sediments	Sweep surface clean of silt and deleterious materials, top up joints with sealing grit as required	Typically monthly or as required
Inspect joints and carry out weed control	Remove weeds and top up joints with sealing grit as required	Typically 3-4 times per year or as required
Ensure paving dewaterers after rain and between storms	Check joints for sedimentation, mechanically clean or jet wash and sweep surface free from silt etc. Refill joints with sealing grit as required	Typically annually or as required
Inspect blocks for spalling or deterioration and joints for loss of grit	Replace blocks and top up joints as required	Typically annually or as required
Check pre-treatment structures (Catchpits and gullies) for sediment	Remove sediment from pre-treatment structures	Monthly in the first year and then annually

Trench Soakaways

- 9 Surface water run-off from dwellings 30-45 will be discharged into stone filled soakaways located in landscaping areas. All soakaways will be located 5m from any structure.
- 10 All maintenance operations are to be carried out in accordance with the Manufacturer's recommendations.
- 11 The ongoing maintenance activities for this system are tabulated below in **Table 3**.

Table 3: Soakaway Maintenance Activities

Maintenance Activity	Remedial Action	Inspection Frequency
Grass cutting	Keep grass at or under a maximum length of 750mm around soakaway features	As required
Inspect catchpits	Clear any sediment or detritus collected. If the silt has entered the outfall pipe jet soakaway systems from rodding eye to remove the build-up of silt.	Typically monthly