## TECHNICAL DESIGN NOTE



Project name	Former Nestle Site, Nestles Avenue, Hayes
Design note title	Methodology for the Control of Surface Water During the Construction Phase
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### Introduction

The purpose of this statement is to outline the proposals for controlling surface water discharge from the site during the construction phase of the works.

#### Discharge/control of water from site activities

Silt laden run off is expected from many areas of exposed soil, clay and aggregate. Prior to leaving the site all silt laden runoff will require treatment to remove suspended solids/ silts.

Silt removal features are to be designed in accordance with CIRIA C697 'SUDS manual' and C648 'Control of Water pollution from Linear Construction Projects' in particular Section 18 'Runoff and sediment Control'.

The drainage shall be designed to provide a three-stage treatment process as defined in the SUDS manual.

The treatment shall follow the following processes:

- Filtration this shall take place by passing the runoff through filter media such as sand or a check dam.
- Detention/ settlement ponds and swales to be used to allow settlement, they may comprise a single or sequence of features. The size and location of the pond/s shall depend on:
  - » the volume of water requiring treatment.
  - » the rate of flow and silt load characteristics.
  - » the ponds shall be designed to accommodate the critical storm (for volume) for a 1 in 1 year storm event.
  - » designed to accommodate treatment volume as specified in the SUDS manual
- Conveyance conveyance of water through swales shall further allow removal of silts.

Where soils are to be stockpiled for long periods of time, stocks piles of clay are to be covered with topsoil to prevent fine silts washing off. Once vegetation has taken hold the potential for silt loading shall reduce.

Stockpiles should not be located close to watercourses and drains.

All settlement features to be checked once a week via a weekly walkover survey. All excess silts to be removed and disposed of appropriately.

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#### Protection of SUDS features during construction

Following installation of SUDS features it is important that they are protected during the construction phase to ensure that they work correctly at completion.

The method of protection is dependent on the Contractors construction program and methodology. Once a Contractor has been appointed we shall be able to provide further information on how we propose to provide protection.