



Infiltration SuDS Map reveals the suitability of the subsurface for a soakaway in the Isle of Mull

Infiltration sustainable drainage systems (SuDS) are favoured by surface water managers as they deal with water near to where it falls as rain, reducing the potential impacts of downstream flooding. The Infiltration SuDS Map can help assess where these systems, such as soakaways and permeable pavements, are appropriate by providing information about the properties of the ground. The dataset proved to be a highly effective preliminary screening method for a consultancy based in Greengairs in the Central Belt of Scotland

www.bgs.ac.uk/suds

Name David Shanks

Company Shanks Consulting Ltd

Project Developing a sustainable drainage strategy for a small development in Dervaig on the Isle of Mull

Key benefit David Shanks explains:

“Using the Infiltration SuDS Map allowed me to make a preliminary assessment into the suitability of infiltration SuDS without having to visit the site and excavate trial pits. The map allowed me to plan the most appropriate site investigation with confidence as the existing ground conditions at the site were better understood”

SHANKS Consulting Ltd
Chartered Structural &
Civil Engineers



Planning for drainage

Shanks Consulting were commissioned to plan the drainage strategy for a small development. Their preference was to install soakaways, but there were uncertainties about the ground conditions at the site, which was a considerable distance from their offices.

Revealing the subsurface

To obtain an indication of the suitability of the subsurface for infiltration, David, who is a civil engineer, obtained an Infiltration SuDS GeoReport from the BGS website. Using the 24 maps provided in the report, David was able to gain an insight into the subsurface conditions at the site, with respect to drainage, ground stability and potential impacts to groundwater quality. A large amount of data is included within the report, but re-

gardless, David “found the data relatively straightforward to understand and use”.

Facilitating decision making

As a result, David was able to make a preliminary decision that stone-filled soakaway trenches were probably suitable, and that certain areas of the site would potentially be more appropriate than others. Later, percolation tests were carried out on the site and this confirmed that the characteristics of the ground were in line with those stated in the Infiltration SuDS GeoReport.

Whilst saving time, money and resources

Using the map meant that David avoided a 260 mile round trip to the Isle of Mull to dig trial pits that would have otherwise provided the basic subsurface property

information that he required. As a result, he saved time, resources and importantly his client’s money.

In addition, the Infiltration SuDS Map provided him with better spatial information across the site, which would not have been practically obtained through trial pits. This enabled David to ‘to select the most appropriate locations for the proposed trench soakaways and plan the trial pit excavations/percolation tests accordingly’.

Availability

The Infiltration SuDS Map is available from the British Geological Survey in a range of formats to suit your needs. See www.bgs.ac.uk/suds for more information.

For more information please contact:

Enquiries

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British Geological Survey

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