

Hydrogeological Assessment for Newton Lodge Farm Fishing Ponds

Project Description Sheet



Location

Staining, Lancashire

Client

Independent Homes Ltd

Completed

June 2006

Key Project Elements

Ground Investigation
Infiltration Tests
Hydro-geological Assessment
Earthworks Modelling
Interpretative Report

PSA Design were commissioned to undertake a hydrogeological review of land at Staining proposed for the development of several fishing ponds. Work involved assessing the suitability of the ground for the usage of fishing ponds, the potential for natural attenuation within the development and a review of the earthworks balance for the construction scheme.

The infiltration test showed that the glacial till material showed a permeability of $<1 \times 10^{-9}$ m/s. This would prove more than adequate as a liner material for the fishing ponds.

The effective recharge rate for the site suggested that the development could naturally infill with surface water the fishing ponds to the proposed water levels within approximately 237 days.

