

# Using LIDAR Data and Online Sharing to Improve Planning and Project Control

OSBORNE

Even if a full 3D model isn't warranted, online data capture and sharing adds significant value in terms of planning, project control and handback.

<b>PROJECT</b>	Stoneham Farm Bridge
<b>CUSTOMER</b>	Network Rail
<b>LOCATION</b>	Southampton Airport Parkway
<b>CONTRACT</b>	One Team Wessex Framework

## Issue

Stoneham Farm Bridge is a rail structure located near Southampton Airport Parkway Railway Station. The scope of works included: the de-vegetation to both sides of the structure; slit trenching from abutment wall to abutment wall to protect known services with toughing; and the creation of a concrete base for infill works. Formwork was erected on both sides of the bridge to allow the mass pour of foam concrete to 50mm below the soffit. The embankment was built up on both sides in preparation of removing parapet walls.

The project did not warrant a full 3D model but digital data sharing was required to improve efficiency and to collect asset information.

## Solution

LIDAR data from GEO-RINM scans was used to verify topographical information and provide data for F001 Design. A common data sharing environment allowed site users to capture and access shared digital data using iPads including;

- Daily diaries, complete with automatic weather, site hours, photos, and general notes.
- Progress photos captured throughout the project.
- Digital drawings and documents that could be annotated and shared wirelessly.
- Quality Assurance checklists with the attachment of photos, comments, documents and drawings.

## Outcome

Using LIDAR data to improve design we managed to save time and money as well as increase the accuracy of the initial project information. The project created a photo archive stored online and sorted by creator, time captured and source. By not using a 3D model option on this project, we saved money while still adding value and capturing essential data.

