



Aircraft Hangar - Luton Airport

Contractor Marriott Construction

Architect Architects Co-Partnership

-----

Engineer Roscoe Capita

Steel Tonnage 600 tonnes Caunton have completed the construction of a hangar facility at London Luton Airport for main contractor Marriott Construction. The total steelwork content was 600 tonnes. The structure was capable of housing up to six Boeing 737 airliners. The hangar has a clear span of 85 metres and accommodates the main hangar door 80 metres in width by 13.6 metres high top hung weighing over 24 tonnes.

The hangar was constructed with latticed trusses to follow a curved profile. The 85 metres span trusses were themselves laid out in faceted form and were each fabricate in five sections. Lateral stability of the hangar was introduced by means of a substantial wind girder in the roof plane, with loads transferred to the base via a minimum of vertical bracing.

A major technical problem to overcome was the provision of accuracy required for support of the door mechanism. The door support beam had in fact been re-levelled after installation of the roof cladding and the application of the door loads.

In addition to the supply of the hangar, a three storey steel framed office block was also constructed adjacent to one elevation.

Caunton Engineering Ltd. office block was also constructed adjacent to one elevation.
Caunton House, 2 Coombe Road, Moorgreen Industrial Park, Newthorpe, Nottingham NG16 3SU
T. 01773 531111
E. sales@caunton.co.uk
W. www.caunton.co.uk