



Talbot Road redevelopment, phases 1-5

Trafford College, Manchester

A basic description of the project and building	This project involved developing Trafford College's Talbot Road campus. The complex scheme involved extensive remodelling of the original building with significant structural alterations, plus constructing a new extension.
BREEAM Rating and score	Very Good
The key innovative and low-impact design features of the building	<p>Sustainable technologies included ground source and air source heat pumps, photovoltaic panels, a rainwater harvesting system, energy efficient boilers and underfloor heating. These are now key elements in the educational facilities provided by the college.</p> <p>Permanent installations included a BMS controlled system with energy efficient lighting, water management and AV systems. We also upgraded the existing drainage system by incorporating water attenuation facilities and extensive drainage repairs to leaking pipework.</p>
Basic Building Cost - £/m2	£714
Services Costs - £/m2	£306
External Works - £/m2	£56.85
Gross floor area - m2	10,204
Total area of site – m2	24,750
Function areas and their size (m2)	8,980
Area of circulation (m2)	816
Area of storage (m2)	408
· % area of grounds to be used by community (where relevant)	n/a
· % area of buildings to be used by community (where relevant)	n/a
Predicted electricity consumption - kWh/m2	68 (new build areas only)
Predicted fossil fuel consumption - kWh/m2	88 (new build areas only)



Predicted renewable energy generation - kWh/m2	n/a (Part L 2 B)
Predicted water use - m3/person/year	42
· % predicted water use to be provided by rainwater or greywater	5%
The steps taken during the construction process to reduce environmental impacts, i.e. innovative construction management techniques	98% of all on site waste was recycled. We upgraded the roof coverings for better insulation values and to increase product life expectancy. The external timber cladding materials were chosen to complement the existing facades, and the paving in the courtyard area was also selected to reflect the character of the existing building.
A list of any social or economically sustainable measures achieved/piloted.	To support the Trafford Apprenticeship Scheme, we had eight apprentices working on site who were employed directly or through sub-contractors. We also had another ISG apprentice working on the project, and ISG provided a two week work placement. The apprenticeship weeks totalled 172. Tom Sherlock was taken on as a full-time Apprentice by our M&E sub-contractor following a successful placement. Natasha Swain was also offered extra experience on our Whitworth Art Gallery site before moving on to her next placement. In addition to the support of the local apprenticeship scheme, we encouraged local labour use with 61% of the workforce based within 30km of the site. To reduce our carbon footprint and site congestion, we provided cycle store facilities to encourage site workers to cycle in, and supported site workers to car/van share.