

HEATHLANDS C OF E PRIMARY SCHOOL

Introduction

This new design and build education facility for Essex County Council on the Smarteast framework, is a high quality, low impact contemporary building, comprising two additional class bases with associated WC provision and storage, additional hall space and SEN room, PE store and a Library store.

Achieving success of project outcomes set at commencement

This was the first Essex County Council Smarteast project that commenced works with just an A3 outline drawing. We therefore ensured a smooth construction process by working closely with key stakeholders in our AsheCAT process.

This clearly mapped out a programme of engagement activity allowing us to clearly map the Council's aim and objectives against those of the stakeholders. Using this structured approach from the outset allowed us to prioritise outcomes and ensure we delivered an uncompromised building that met and exceeded stakeholder expectations.

Central to these requirements was the creation of a low impact solution that minimised disturbance throughout its life-span.

Recognising these requirements also ensured that every solution could be benchmarked for its wider impact as well as its affordability, visual impact and functionality.

Innovations implemented

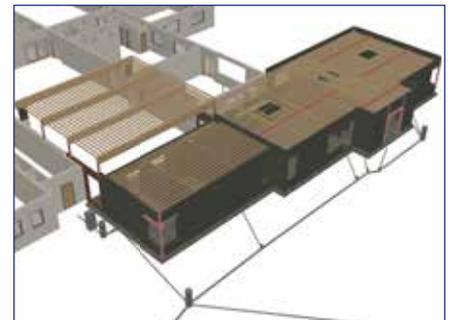
We realised at initial tender stage that the end user client was very inexperienced and couldn't visualise what the end product would look like, as there were a number of different extensions being added to different parts of the building. Our team made the decision to employ a multi-disciplinary design team with BIM capabilities who designed 3D models and a fly-through of the proposed new building, that gave the end user team a full appreciation of how their building would flow and work. This reduced traditional workshop and design time dramatically, enabling an early planning application to be made, which kept the main build out of the main winter

“ I am very pleased with Ashe's performance. Their ability to absorb additional works and with (Mace) scrutinising their programme has been an excellent combination.

The (Ashe) site manager has been a star.

Amanda Laycock
Project Manager,
Essex County Council

months & ensured best use of the summer shutdown period. A fully federated BIM model also ensured that there were no service/structure clashes resulting in no delays or costly abortive work.



3D image with architectural, structural, drainage all in one model

Location New Church Road, West Bergholt, Colchester, CO6 3JF

Client Essex County Council | **Project Manager** Mace Ltd

Architect Bryden Wood Associates | **Form of Contract** NEC Contract Option A

Start 02/04/2012 **Finish** 16/11/2012 **Duration** 31 Weeks **Value** £890k

To lower costs & reduce the programme we changed the proposed outer leaf of brickwork initially stipulated by Essex County Council to timber cladding which;

- reduced the visual impact of the building elevations easing the planning process,
- reduced length of programme and prelim costs as a result,
- reduced material costs as timber cheaper than brickwork,
- reduced possibility of programme delay as brickwork due to be undertaken during autumn/winter months, & can't be laid in wet/cold conditions, timber cladding can, and
- reduced noise impact of brickwork operation as adjoining live school environment.

How value for money was demonstrated

Having worked closely with the client and stakeholders from the outset we were able to

clearly identify what value for money meant, and continually benchmark our proposals against these value for money criteria.

In addition to the project finishing on time after an agreed EOT (saving the client £15k), the project was also finished on budget. This took into account the incorporation of a number of large client variations, one of which was for a total roof upgrade and replacement on the existing school building.

Change of brickwork to timber saved £10k.

Estimated that the BIM model saved the scheme £10k as no waste or re-work required throughout build

How social, economic and environmental benefits were addressed

To ensure minimal disruption to school operations we worked

closely with the parish council to create a different entrance on to the construction site.

We sustainably sourced brick and timber materials, existing trees were retained with additional planting in the new secured play areas creating an environmentally balanced design.

The school was surrounded by protected heathland, we protected these areas to ensure that these natural habitats remained undisturbed.

Wildlife protocols were also put into place to ensure that wildlife issues were considered at all times as there were issues with wildlife in the Heathlands and the potential presence of BATS.

We put in place a footpath allowing access from the nearby playing fields to the school, which was previously accessed using a road.

A generator power supply was installed to enable the school to safely facilitate the annual fireworks display, which has an attendance of over 1000 people.

We achieved a final CCS score of 35.5 out of 40.

Key Performance Measures

Overall quality of product	9	/10
Overall quality of service	10	/10
Defects at the time of completion	10	/10
Completion of contract to agreed cost	10	/10
Completion of contract to agreed time	9	/10
Safety	9	/10



Client contact details

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