Education

BOWER FULLER
Engineering Services for Buildings

Role: M&E Contractor

Client: Suffolk County Council

Main Contractor: Barnes Construction

M & E Consultant: Concertus

Architect: Concertus

M & E Value: £1M

Thurston Primary School

The Thurston Church of England Primary Academy new school facility accommodates 420 students (with a future masterplan expansion to 630 students) and a 30-place standalone pre-school (with the provision to grow to 60 places). The primary school building is a two-storey design with a block and beam ground floor and a metal deck/concrete first floor enclosed in brickwork/ timber cladded facades and a flat Bauder roof. The pre-school is a single storey structure and is similar in style to the primary school. Both buildings together comprise teaching spaces, staff rooms, office/admin areas, WC's, an assembly hall, a commercial kitchen, staff kitchen facilities, and play areas.

We provided the complete mechanical and electrical installations for the development. Our work included two new Protectaline dedicated cold-water mains and gas supply to serve the school. A new boiler room was created to house the main equipment with distribution heating pipework serving radiators and radiant panels, underfloor heating fed from ASHP (pre-school only), BMS controls, domestic water services, gas (main school building only), ventilation systems including natural ventilation to the main assembly hall, MVHR's, kitchen supply AHU, kitchen extract canopy fan and general extract, above ground drainage, sanitaryware and air conditioning. The school also has an external roof plant area where the kitchen canopy supply/extract fans and external condensers are located.

Whereas there is a new incoming electrical infrastructure feeding the main panel board in the primary school, there is a separate supply to the pre-school. This in turn feeds the external ASHP. The main panel board for the primary school links to the sub-distribution boards throughout the project and other external electrical services such as lighting and EV charging points. General power/lighting and emergency lighting has been installed across the scheme. The lighting system to core areas and classrooms are operated via a wireless lighting control system. There is a fire alarm and class change system to the main school and a fire alarm installation to the pre-school, which is network linked. Services also include lightning protection, an intruder/security alarm, disabled refuge, disabled WC alarm, door access, and CCTV arrangements. Stage lighting and induction loops are features of the assembly hall and main reception. There are 3No. web-way systems, one for the fire alarm system, and two for each intruder alarm. The school's data network (CAT6A) cover the new areas with both hard-wired points being provided to the requisite locations and wireless access points scattered throughout to enable uninterrupted Wi-Fi coverage.

For further information contact us:
Bower Fuller, 6 Bermuda Road, Ransomes Europark, Ipswich, Suffolk, IP3 9RU

Bower Fuller, Blue Space SusCon, Brunel Way, Dartford, Kent DA1 5FW

Telephone: 01473 272277
Web Site: www.bowerfuller.co.uk
Email : services@bowerfuller.co.uk