



Case Study

Project

Sector

Education

Software Utilised

FastTest, ProDesign, Contract Costing, Procurement, Financial Suite, Estimating, Contract Management

Location

Oldham, Greater Manchester

Owner

The Oldham Academy North

Value

£3.3million



“Amtech is the primary software used on all of our projects for design, procurement and management, as well as the control of recording and onsite testing results.”

**Jim Crossley, Group
Qualifying Manager**

Amtech's ProDesign provides extensive detailed reports providing all the design information a client may require.

Company Overview

Smith Group is part of Imtech and has over 50 years of mechanical and electrical engineering experience and comprises a number of specialist departments, each delivering a huge amount of knowledge and experience to the projects the company undertakes.

Smith Group operates in a broad range of industry sectors such as education, healthcare, leisure, financial and residential. Their projects range in value from £100k to £12m. To supplement its mechanical and electrical services the company provides in-house building, fit-out and maintenance total solutions.

Business Challenge

The Oldham Academy North was created in September 2010, replacing the former Grange School, and is due to move into its new state-of-the art facility in April 2013. Construction work began in June 2011 and the electrical services are being designed by Smith Group. Amtech's unique range of integrated software is playing a key role in completing the work to the highest standard, on time and on budget.





"ProDesign provides an excellent electronic aid for Electrical Designers."

Martin Brook & Stephen Smith, joint Managing Directors of Smith Group

Why Smith Group Chose Amtech

Amtech is the market leading developer and supplier of specialist software for the Building Services Industry. Over 96% of the UK's top contractors utilise software from Amtech who specialise in software for Specification Writing, Electrical Design, Inspection & Testing, Estimating, Contract Management, Financial Management and Service Management, powered by a reliable and accurate data source from Luckins.

Technical Challenge

Values of volt drop, spare capacity, and minimum cable size allowances are set within the preferences of Amtech's ProDesign. These need to be taken not just from the regulations, but also from contract specific terms.

ProDesign assists and provides added comfort to the Smith Group Electrical Designers by electronically verifying their design for compliance to BS 7671.

ProDesign is set by default to calculate CPC's to meet disconnection time requirements and then to re-evaluate and re-size to meet Adiabatic requirements. Manual input of line and CPC conductor sizes is also available, which are verified by the calculation process.

Once the designs for the electrical systems were completed they were exported to Amtech's Protect software to carry out co-ordination studies and verify the selection of protective devices.

Information Provided On Site

Information provided to site must be presented in a format the on-site Electricians are used to seeing. Electricians require the information to confirm/verify the installation and its design. Subsequently two main reports are required to be produced for Smith Group.

First

A detailed ProDesign electrical schematic drawing showing displayed results of cable size, cable length, separate CPC requirement, protective device ratings is sent to site in PDF format or printed in size A0 and issued. This drawing is then pinned to the wall and referenced for install information, which can be easily highlighted for installed and tested cables.

Second

The circuit charts provide easy to understand information for the installer. By referencing the circuit construction drawings, this ensures each final circuit is wired in the correct size of cable, connected to the designed phase way of the respective DB board with the correct type and rating of the protection device fitted.

"Amtech ProDesign is the best electrical design package available within the market place"

As revealed by an internal audit from Smith Group

Integrated Software

Amtech's ProDesign provides reports on materials calculated. This information is used by the Contract Manager to place bulk orders.

Once the electrical design is completed and installed by Smith Group, it is exported to Amtech's FastTest to certify the work and installation. A huge amount of time is saved by populating all the board details straight from ProDesign at the click of a button.

In parallel, FastTest was used to produce a draft electrical installation certificate, which is saved in a database that is specific to The Oldham Academy North project. From this database the circuit charts for each distribution board are produced and a PDF of all circuit charts is issued to site for the wiring of final circuits.

Amtech's software provided Smith Group with an integrated networked solution reinforced by support from Amtech's Expert Technical Support Team.

To find out more about Amtech visit www.amtech.co.uk or call 0800 028 28 28