SINGAPORE'S VICTORY FAMILY CENTRE CHURCH RECENTLY TACKLED DIFFICULT ACOUSTICS IN ITS NEW FACILITY, CREATING THE IDEAL MULTI-FUNCTION SPACE

TAMING difficult acoustics in a worship space can often present a house of worship with a number of questions to answer, not least finding the correct expertise to help overcome the problem. When the space in question is used for more than just regular services, those questions become harder still. Yet as Victory Family Centre Church in Singapore recently proved, even the toughest space can be overcome.

Boldly coloured in red, it's hard to miss the new addition to the church.Occupying the upper three floors of the four storey facility along Jalan Bukit Merah Road, the new space combines two levels of multi-purpose rooms and a third storey convention hall.

Working closely with consultant CCW, the acoustic expertise of Electronics & Engineering Pte Ltd (E&E) was called upon to provide the main auditorium with a selection of acoustic absorbing panels with the noise reduction coeffi cient (NRC) of 0.70.

Yet the project was made more complicated by the room's multifunctional nature. Courtesy of two operable walls, it can be divided into three smaller spaces, each capable of hosting its own events. To achieve this acoustic criteria, the upper 3m section of the 7m height walls is lined with 1.2m x 1.2m fabric covered fibreglass panels from FUYI Acoustics, whilst the lower 3m section is treated with 15mm thick wooden perforated panelling, expertly crafted by E&E's team of specialist workers. Behind this outer façade is a 20mm layer of polyester and a further 50mm cavity to enhance absorption.

Project manager and designer, Jason Leong, worked on the project from December 2013 to April 2014, and outlined the main challenges of the project. 'It was a difficult project to work on for a variety of reasons, including the limited time-frame in which we had to complete it,' he explained. 'The most difficult aspect for me personally was ensuring that the fabric acoustic panels were all in the correct proportion. The aesthetics were also an important consideration for the client and after going through all the available colour samples, the selected colour compliments the ceiling and flooring very nicely.'