CUSTOMER SUCCESS STORY

VISUALLY INTEGRATED FIRE PROTECTION FOR HISTORIC CHRISTCHURCH PRIORY

Christchurch Priory is set on the southernmost edge of the town of Christchurch, on the meeting of the River Avon and the River Stour as they flow into Christchurch Harbour. The site has been used for prayer and worship for more than 1,300 years, and in the Priory Church for over 900 years. This is a landmark building for the town and has a long and fascinating history with a priory of 24 secular canons being recorded on the site in the Domesday Book of 1086. As far back as 1509 the Church was granted to town's inhabitants and churchwardens as their parish church in perpetuity.

The Challenge

The constraints of providing protection for historic building such as these present a wide range of challenges, these involve height and architectural design, volume configurations, airflow, obstructions and evacuation plans. These sites often require unique fire and security solutions simply because of their design. VESDA's range of Aspirating Smoke Detectors (ASD) is designed to provide complete peace of mind to the caretakers of such significant buildings and heritage sites.

The Solution

VESDA uses a pipe network and sampling pipes to provide reliable detection in large open spaces and areas of high airflow that cause smoke dilution. By routing the sampling pipes in areas that are not generally visible such as light fittings, paintings, wall hangings and ceiling structures VESDA provides the discreet air sampling detection necessary in such buildings. VESDA's wide sensitivity range allows alarm thresholds to be programmed to avoid the consequences of nuisance alarms from candles, incense and theatrical smoke.

PROJECT:
Christchurch Priory

END USER/LOCATION:
Dorset, England

INDUSTRY:
Cultural / Heritage

INSTALLER:
Technical Alarms Limited

SOLUTION:
VESDA VLC
OSID

"The blazes at Windsor Castle and the Cutty Sark, as well as at the more recent Clarence Hotel in Exeter, are bleak reminders that fire is a very real hazard to historic buildings. There is an impressive array of modern protection and alarm equipment on the market, and we relied on Technical Alarm Systems (TAS) to recommend the most appropriate kit, and to install it so that visitors don't know it's there."

Columba Cook
Priory Architect

These alarms can be set to trigger at various levels so that cultural and heritage site staff can attend and help prevent unnecessary panic among visitors.

Technical Alarms Limited was entrusted to replace an older VESDA system with a new VESDA VLC system. This was specified by Technical Alarms as it not only replaced and updated their old system but took into account the aesthetics of the building.

The Outcome

Malcolm Brooke at Technical Alarm Systems (TAS), a company that specialises in safeguarding historic buildings whilst hiding or camouflaging the detection and alarm equipment, explained, "In conjunction with other products, we installed 17 VESDA VLC units in areas including the Nave, Quire, Lady Chapel, Triforium, Organ Loft and roof areas. Xtralis also supplied the OSID, which is a beam detector covering the North Transit area; this was a challenge to install as it is so high, and we will have to take care in maintaining it in the years ahead."

About VESDA VLC

- Absolute smoke detection (coverage of 800 m^2 (8,610 sq. ft.))
- Wide sensitivity range (0.005 - 20% obscuration/m and 0.0015 - 6% obscuration/ft.)
- Single pipe inlet
- Five (5) status LEDs
- VESDAnet communication (VN)
- Clean air barrier optics protection
- Air flow monitoring
- Optional remote display and relay capability
- AutoLearn™

About OSID

- Patented dual wavelength, UV & IR, particle detection
- CMOS Imager with wide viewing angles
- Simple installation, commissioning and maintenance
- High tolerance to vibration and structural movement
- High tolerance to dust, fogging, steam, reflections and object intrusion
- High resistance to reflected sunlight
- On-board log memory
- Software tool for diagnostic purposes
- Aesthetically discreet and 3D coverage
- Long range up to 150 m (492 ft.) with minimal free space (Ø15 cm./5.85")