

Life Safety System Specialists | Brochure
2018-2019

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 **Kentec**
Electronics Ltd

Contents

03	Introduction & Manufacturing	26	Addressable Matrix Intelligent Fire Alarm Mimic Display System	44	Power Supplies (PSU) For Fire Detection, Alarm and Fire Protection Systems
06	Taktis® Fire Analogue Addressable Control Equipment	28	Vizulinx Fire Alarm Management Solution	46	Miscellaneous Items
08	Taktis® Vision Analogue Addressable Annunciators	30	Sigma CP Conventional Fire Alarm Control Panels	50	Elite RS Analogue Addressable Fire Control Panel UL/FM Approved
10	Taktis® Virtual Resource Management Tool for Fire Detection	32	Sigma CP-A AlarmSense® Conventional Fire Alarm Control Panels	52	eMatrix Analogue Addressable Fire Repeater UL/FM Approved
12	Loop Explorer 2 (LE2) Configuration Software	34	Sigma CP System Diagram	53	eView Analogue Addressable Fire Repeater UL/FM Approved
14	Taktis® Network Diagram	36	Sigma XT Extinguishant Control Panel	54	Sigma A-CP Conventional Control Panel UL Approved
16	Ockular® Powerful and sophisticated software solution	37	Sigma XT Network Diagram	56	Sigma A-XT Extinguishant Control Panel UL/FM Approved
18	Syncro AS Analogue Addressable 1-2 Loop Control Panels	38	Sigma XT+ Extinguishant Control Panel Multi-Area Addressable	58	Sigma A-Si Extinguishant Status & Ancillary Units UL/FM Approved
20	Syncro AS Network Diagram	40	Syncro XT+ Extinguishant Control Panel Multi-Area Addressable	60	Marine & Offshore Analogue Addressable 1-2 Loop Control Panel Syncro ASM
22	Syncro Repeaters Analogue Addressable Fire Control Panel Repeaters	41	Syncro XT+ Network Diagram	62	Custom Engineered Solutions
24	Addressable Ident Analogue Addressable Fire Control Panel Repeater	42	Sigma Si Extinguishant Status & Ancillary Units		

Introduction

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Protection of people, building and assets from a fire is a paramount concern to any organisation. Keeping a site safe is not the only priority but with the risk of physical damage and financial loss resulting from a fire, there is also the risk to operational performance and reputation, so a reliable and responsive fire system that can respond rapidly to any situation is required.

Early warning fire systems and detection technology can detect a fire, and in the case of extinguishant detection, it can also automatically release a fire suppression agent to eliminate fire within seconds. Stopping a fire within the first few moments can reduce or avoid damage to equipment and assets and subsequent loss of operational productivity.

Kentec Electronics is one of the world's leading life safety solutions manufacturers

of conventional, analogue addressable fire detection and extinguishant control panels. Founded in 1985, Kentec is an end-to-end manufacturer, with everything sold made in the UK. It employs approximately 230 members of staff in its production facility, head office and research and development department.

In addition to design and manufacture, Kentec provides technical support specified to the local standards and customer requirements of over 90 countries worldwide. With a commitment to meeting the needs of individual national markets, Kentec has achieved a global reputation, resulting in its life safety systems being installed in numerous prestigious sites across the world.

Kentec manufactures products approved to EN54, EN12094, UL, FM, NFPA and marine classification societies.



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Manufacturing

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From the initial design process, to sheet metal fabrication, to powder coating and printing through to panel construction, we have full control at every stage of our manufacturing process allowing us to guarantee quality and delivery times.

Our manufacturing facility is continually being enhanced and expanded to meet growing customer demand and utilise the latest manufacturing techniques. By owning the whole manufacturing process, we have the capability and flexibility to produce single items or volume product.

At Kentec we believe that the quality of our products should be paramount; rigorous testing procedures are employed at every stage of the manufacturing process to ensure that all equipment is supplied to the highest standards. For this reason, we offer a three year warranty on all product that we supply.

We also understand that service is a key part of how a manufacturer's quality is judged. To this end we have invested extensively, not only in our manufacturing facilities, but also in our support team including technical support and training.

To underpin our industry leading in-house manufacturing activities, we employ teams of qualified and experienced mechanical, software and electronic hardware developers and technicians dedicated to both new product developments and existing ongoing product support.



Taktis® Fire

Analogue Addressable Control Equipment

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Analogue Fire Detection

Taktis® is Kentec's most powerful and sophisticated analogue addressable fire panel. An intelligent and technically robust fire alarm, it has enhanced integration and networking capabilities to meet the current and future needs of all buildings and installations regardless of size.

Initially configured as a fire detection and alarm system, the flexibility of Taktis is such that it can be re-configured to realise many other control and indication applications, with direct integration into intelligent buildings.

Available in four and eight slot variants, Taktis fire control panel ranges from two to 128 detection loops. Taktis can network up to 128 panels, making it ideal for the largest sites such as schools, hospitals, multi-site retail/supermarkets, critical infrastructure and major commercial and industrial facilities.

Multiple protocols can be supported on each panel to give installers and end-users maximum choice in their systems' design, and the scalable nature of the product provides the highest level of future-proofing and networking possibilities.

The modular nature of Taktis allows all field wiring to be connected to a passive motherboard enabling addition, re-configuration or replacement of all electronic hardware without the need to disconnect any field wiring. This modularity also allows each panel to be customised with addressable loop detection circuits, conventional detection circuits, relay cards, additional sounder outputs or programmable I/O modules as required.

As a truly open protocol panel it offers installers and their customers maximum flexibility in systems' design, site-customisation and in the third-party devices that they use. Not only does Taktis provide solutions to the most technically challenging applications in life safety, it also delivers added value, market advantage and a competitive edge to your business.



Features

- > Up to 512 programmable Input/Output via optional plug-in and serially connected expansion cards
- > Two to eight loop or two to 16 loop versions
- > Multiple protocols supported on a single panel (in banks of two loops)
- > Network up to 128 panels
- > 500mA loop current
- > Four programmable sounder circuits each rated at 2.5 A
- > 5.25 A or 10.25 A power supply options
- > Enclosure options to suit 26Ah or 45Ah battery options
- > Three programmable inputs
- > Five programmable relay outputs
- > Hard wired fire and fault routing inputs and outputs
- > Over 4000 sub address points per panel
- > Option to 'invert' inputs and outputs
- > Configurable via a USB flash drive or alternatively a PC USB serial connection
- > Optional Media Gateway communications card
- > Compatible with Ocular management solution
- > Approved and compliant with EN54-2, EN54-4, EN54-part 13 pending approval

Taktis® Vision

Analogue Addressable Annunciators

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Taktis Vision provides a means of allowing full display and optional control of the Taktis fire alarm control panel from a small and unobtrusive local control station.

The large, full colour graphical display with touch screen functionality, delivers information on the status of the fire alarm system to single or multiple locations. Taktis Vision repeaters can be configured to offer full display and control to replicate the functionality of the fire control panel or to operate as a simple, display only device for applications where access to control the fire alarm system would be inappropriate.

Taktis Vision may be connected to the fire control panels' fault tolerant, ancillary RS485 bus or to the fire alarm panel fault tolerant network using standard, fire rated cable offering flexibility in system wiring.

Available in several standard formats, Taktis Vision can be mounted directly onto a wall, be recessed using our quick-fix adaptor frame or fully flush mounted. Special enclosure finishes and colours are also available to match existing decor.



8
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Analogue Fire Detection



Features

- > Robust, full colour, 7" 800 x 480 touch screen graphical display
- > Full indication of all information displayed at the fire control panel
- > Automatic display brightness adjustment
- > Silenceable internal sounder
- > Connections via:
 - ⊗ Control panel network
 - ⊗ Option to connect to control panel RS485 bus
- > Low current, 24V DC powered
- > Slim compact construction
- > Configurable functionality
- > Configurable languages

Taktis® Virtual Resource

Management Tool for Fire Detection

Virtual Resource is an advanced management tool for fire detection which provides system designers, integrators and service companies with the ability to remotely access and comprehensively manage any system using intelligent analysis of data collected from their systems. End-users and facilities managers can also greatly benefit from the powerful feature set that comes with Virtual Resource.

The remote management features offered by Virtual Resource can result in reduced fault call outs, reduction of unwanted alarms and improved overall service to the end user. Gain access to data from all your systems, assess performance, check status and make decisions based on facts, not assumptions.

VR Access allows your fire system to periodically report its status to the secure servers to enable you to view the latest status report via any web enabled device.



Whether you are a service provider, building owner or facilities manager, Taktis VR can help you reduce costs, add value and improve service integrity by employing the latest communication and analytical technologies.

Analogue Fire Detection

Loop Explorer 2 (LE2)

Configuration Software



Analogue Fire Detection

Loop Explorer 2 (LE2) is a configuration software which is easy to use even when producing the most complex configurations.

LE2 is highly configurable, enabling customisation of languages, colour schemes and company logos and allowing exposure to single or multiple detector protocols to be set for each user.

Additional logical operators for NOT and TIME functions for use in cause and effects and the inclusion of 'groups' (collections of devices not necessarily in the same zone) increase the power and flexibility of LE2 to far beyond what was previously achievable.

LE2 can also be used to select, (where applicable) the appropriate detection loop protocol. It is possible to run different loop protocols on individual loop cards.

Powerful standard templates allow rapid configuration of common fire system configurations for applications such as high-rise buildings or alarm verification from hotel rooms. Cause and effect allows the configuration of large, complex networks with ease. Access to LE2 is via a secure web server, so users with the appropriate credentials have permanent access to the latest version ensuring that the most recent enhancements are always available. LE2 can be customised by the user so that language or specific terminology can be set as defaults for all systems that are configured using LE2. Custom changes are stored on our servers, again ensuring that all authorised users have access to the latest customised version.

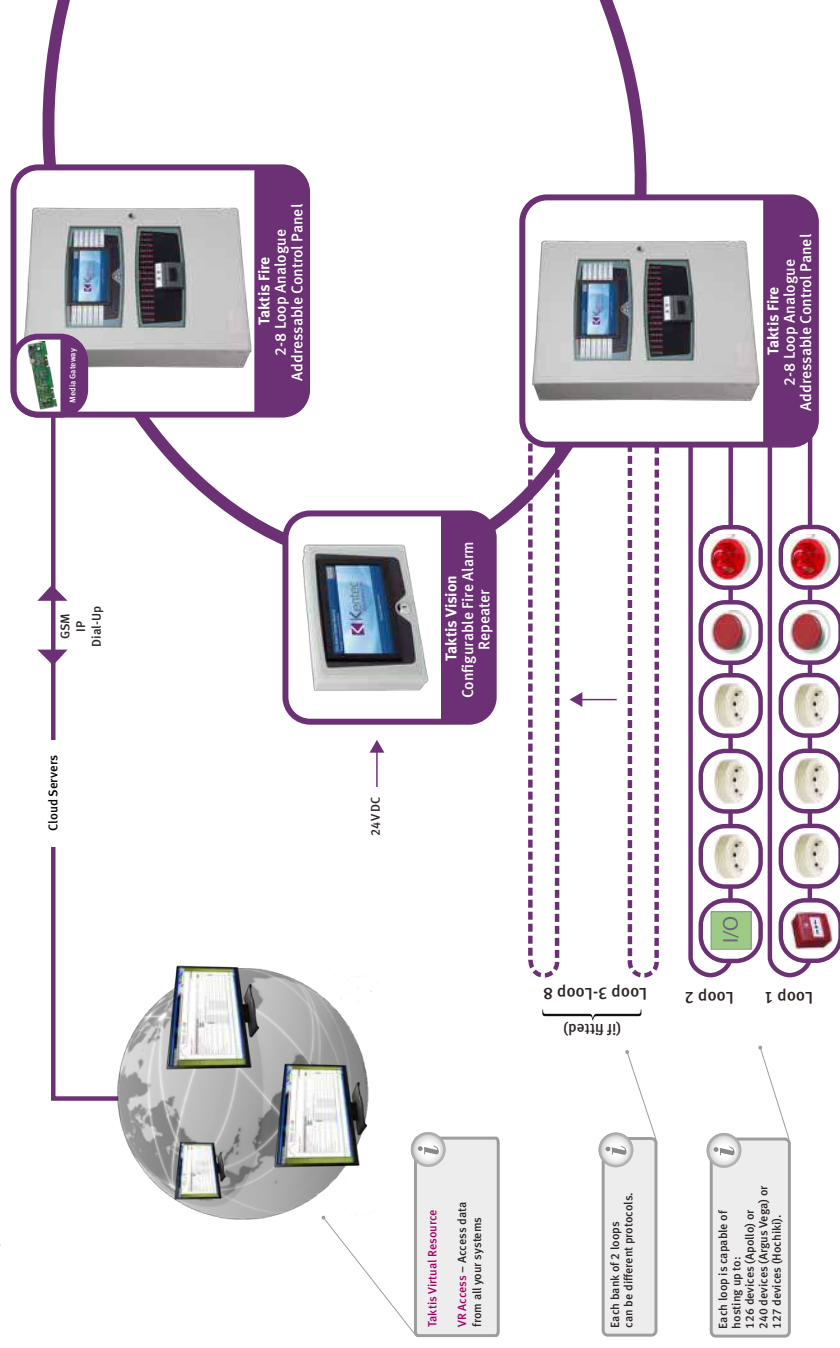
For added convenience, Taktis Virtual Resource subscribers can store LE2 configuration files on our secure servers ensuring that the site configuration is always backed up and available to users with the appropriate access rights.

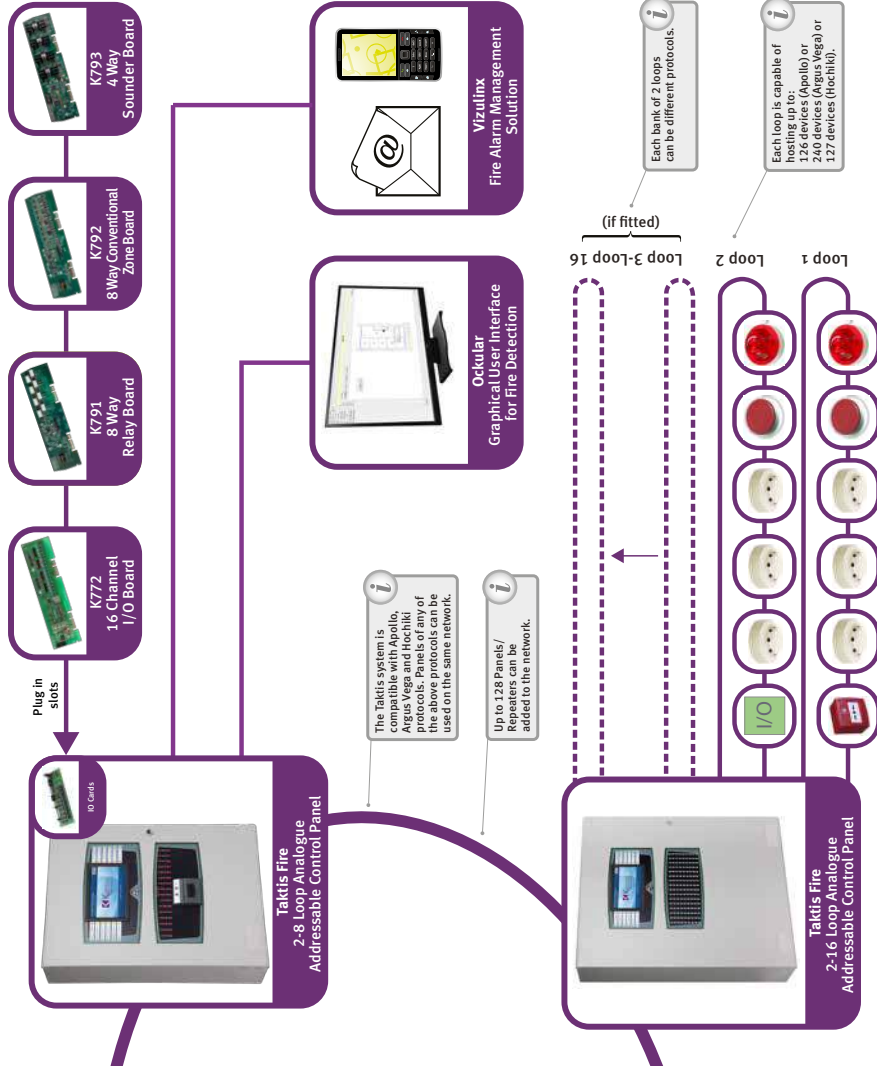
Features

- > Highly configurable software
- > Enables customisation of languages, colour schemes and company logos
- > Powerful standard templates allow rapid configuration
- > Cause and effect allows the configuration of large, complex networks with ease.
- > Taktis Virtual Resource subscribers can store LE2 configuration files

Taktis Network Diagram

High Integrity Configurable Network





Forthcoming products

- > Taktis Serial Repeater
- > Taktis Voice – Fire and Voice control panel
- > Taktis Voice – Voice evacuation panel
- > Building management system interface
- > Taktis Fireman's Telephone
- > Virtual Resource including VR Vault
- > VR Service module
- > Taktis Emergency Lighting
- > Taktis Smoke Control System
- > Taktis Disabled Refuge

Ockular®

A powerful and sophisticated software solution

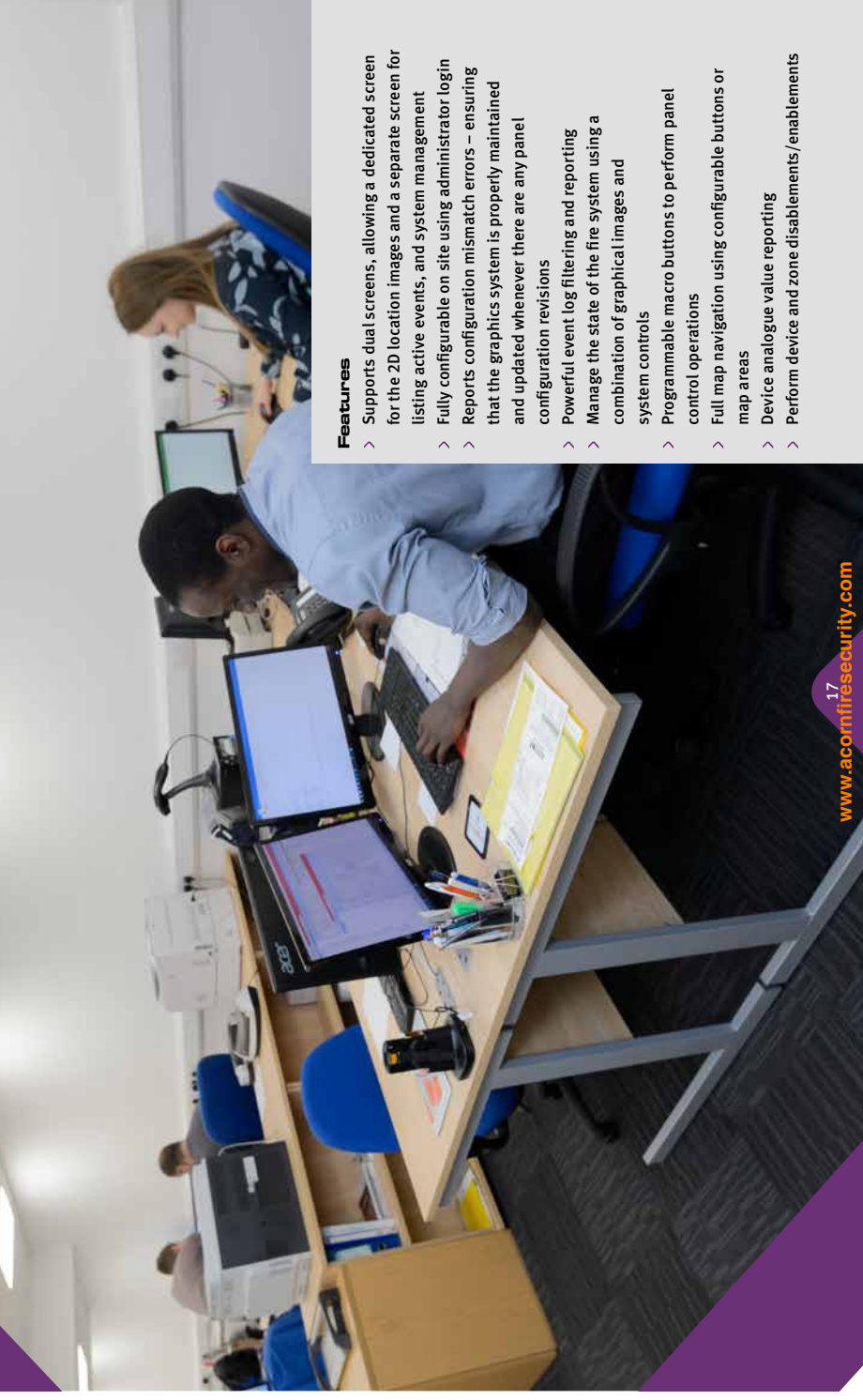
No situation requires a more urgent response than a fire event. On a large public site, especially during busy periods, public safety is paramount.

A powerful and sophisticated graphical representation of your sites, Ockular® gives building managers complete monitoring and control over fire detection providing a comprehensive fire risk and incident management system.

Where time is of the essence, automated control aids site managers to respond quickly and efficiently to a fire event. Ockular plays a crucial role in safeguarding people, vitally important information and property.



Analogue Fire Detection



Features

- > Supports dual screens, allowing a dedicated screen for the 2D location images and a separate screen for listing active events, and system management
- > Fully configurable on site using administrator login
- > Reports configuration mismatch errors – ensuring that the graphics system is properly maintained and updated whenever there are any panel configuration revisions
- > Powerful event log filtering and reporting
- > Manage the state of the fire system using a combination of graphical images and system controls
- > Programmable macro buttons to perform panel control operations
- > Full map navigation using configurable buttons or map areas
- > Device analogue value reporting
- > Perform device and zone disablements/enabements

Analogue Addressable 1-2 Loop Control Panels



Analogue Fire Detection

Syncro AS is an analogue addressable fire control panel, available in either one or two detection loops. It combines compact and practical styling with the programming power and connectivity normally associated with much larger systems.

With its ease of use and simplicity to install, Syncro AS is straightforward to understand for installers, commissioning engineers and end users alike. Using the latest microprocessor, it provides a flexible control system with high reliability and integrity.

Being a multi-protocol panel, enabling choice to our customers, Syncro AS supports Apollo, Argus Vega and Hochiki detection, making it ideal for small and medium sites that require advanced fire sensing and evacuation options. It can be expanded and networked to become part of much larger systems if the need arises, providing a future proof solution for any size of installation.

Syncro AS is also available as a Lite version offering a cost-effective solution for smaller standalone installations requiring only one detection loop.

Features

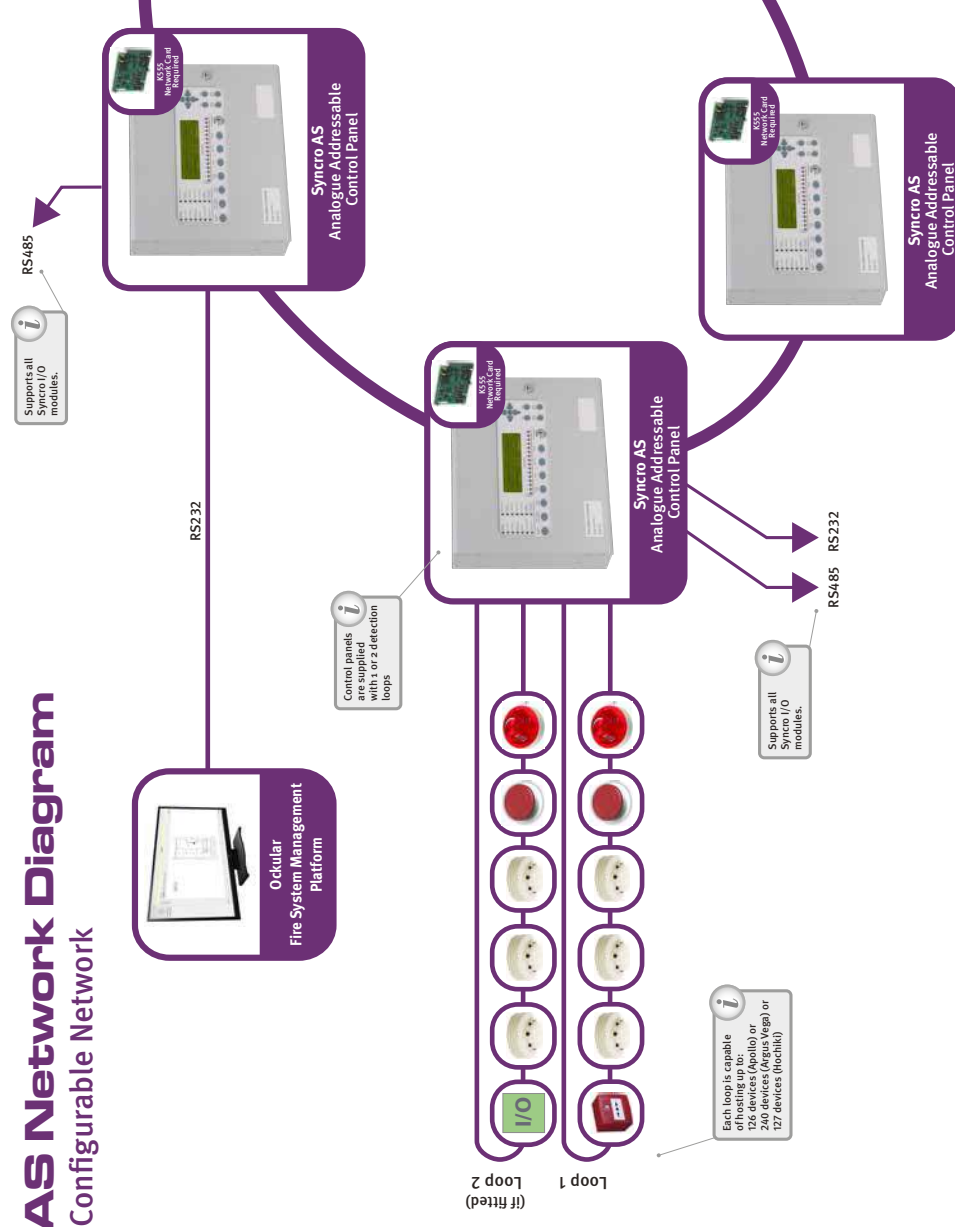
- > Expandable from one to two loops*
- > Network up to 64 panels*
- > Two programmable sounder circuits
- > Five programmable inputs
- > Three programmable relays
- > 3A power supply
- > Up to 512 additional programmable I/O via Syncro I/O modules*
- > Powerful, network wide cause and effects*
- > Sensitivity adjustment and Drift Compensation
- > Compatible with View repeaters*
- > Supports Apollo, Argus Vega and Hochiki protocols
- > Stores 500 last events in event log
- > Installer friendly, removable equipment chassis
- > Different language and character set variants available
- > Approved and certified to EN54-2/EN54-4

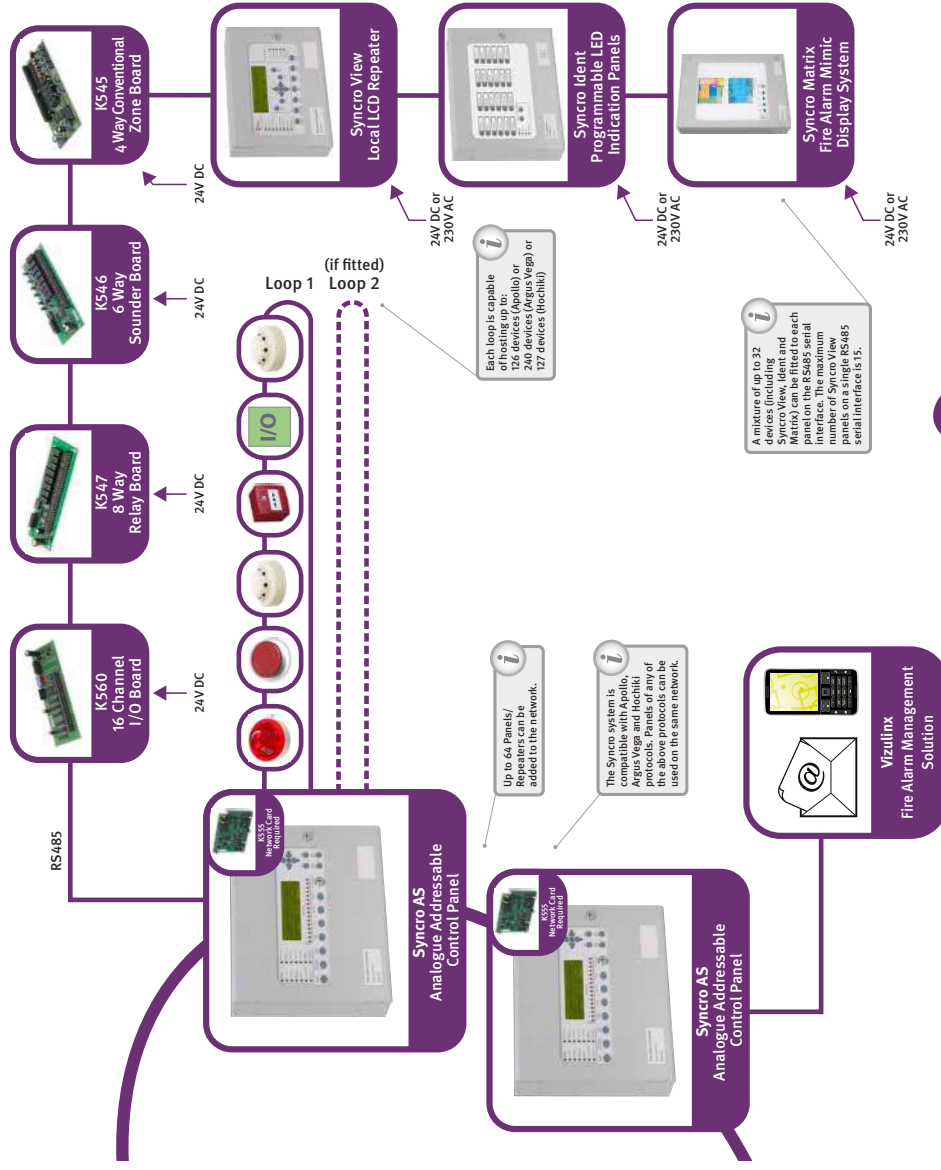
*Please note * These items not available on*

Syncro AS Lite panel

If you require a Printer with a Syncro AS panel please view Datasheet

Syncro AS Network Diagram





Syncro Repeaters

Analogue Addressable Fire Control Panel Repeaters

Syncro View

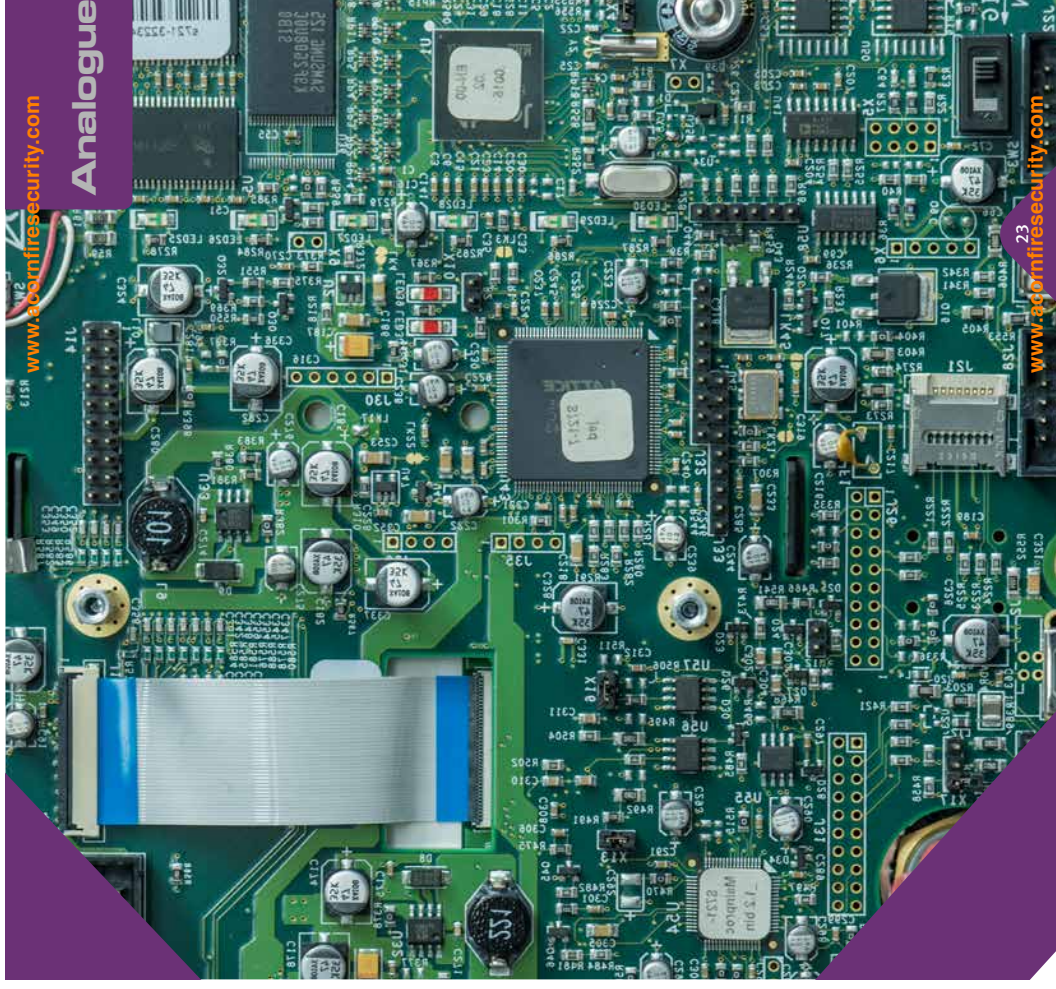
The Syncro View fire alarm repeater provides a cost effective, simple and convenient method of extending the controls and indications of the Syncro AS fire alarm control panel to other locations.

The large, graphic LCD, brightness LED indicators and full set of controls duplicate the indications and controls on the Syncro AS fire alarm control panel at up to 15 additional locations via a (separate to the Syncro AS network) simple, two-wire serial data connection.

Ideal for locations where a control and indication point smaller than a full fire alarm control panel is required, the Syncro View is available in either a 24V DC powered option (which can be powered via an additional two cores from the Syncro AS control panel auxiliary 24V DC supply) or a 230V powered option with local battery back up.



Analogue Fire Detection



Features

- > Up to 15 annunciators can be connected to each Syncro AS fire control panel
- > Large liquid crystal display (240 x 64 pixels)
- > High brightness LED indications
- > Internal sounder
- > Replicates all Syncro panel controls
- > Simple, two-wire serial connection
- > Removable electronics for easy installation
- > 24V DC or 230V AC power options
- > Low power consumption
- > Multi language options
- > Connection monitored by Syncro AS fire control panel

Addressable Ident

Analogue Addressable Fire Control Panel Repeater



Analogue Fire Detection

Addressable Ident panels provide a compact and attractive display for multiples of 24 indications from a Syncro AS or Taktis Fire control panel.

As with all inputs and outputs on the Syncro AS and Taktis Fire, each indicator is fully programmable to indicate a variety of events as well as being fully programmable via cause and effects to operate in response to logically connected inputs.

Each indication defaults to a zonal fire indicator but may be configured via the Loop Explorer configuration utility to operate upon any event type or combination of inputs.

Requiring only a low current 24V power supply and a two-core data connection to the fire panel, the addressable Ident panels can be installed quickly and easily to provide supplementary information on the status of the fire alarm system with the minimum of cost and effort

Features

- > Eight and 24 LED versions available as standard
- > Large versions available to special order
- > Up to 16 x 24 way Addressable Ident can be connected to each fire panel
- > Programmable flashing or steady states
- > Red, yellow or green indications/options
- > Common Fire, Fault and Disabled indication
- > Customisable label identification tags
- > Buzzer with silence control and re-sound
- > Lamp test control
- > Low power 24V DC supply
- > Multiple language options

Addressable Matrix

Intelligent Fire Alarm Mimic Display System

The addressable Matrix system uses flexible, fibre optic light guides to illuminate areas on a floor plan, laid over a high-resolution grid. This unique system dispenses completely with wiring and enables indicators to be moved, removed or added on site without the need for any wiring.

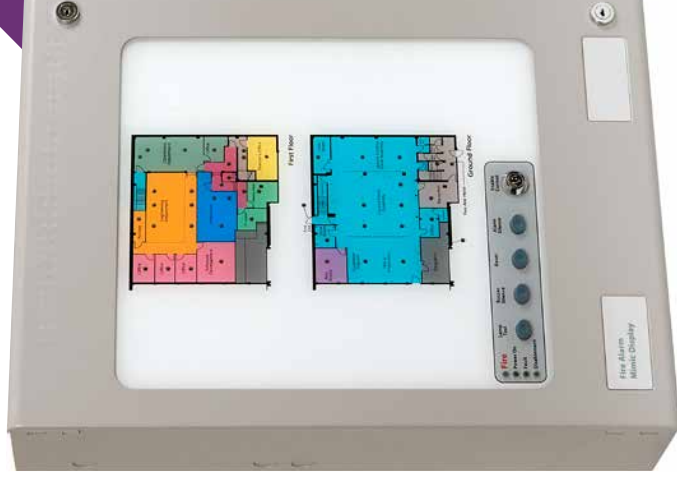
Ideal for buildings such as hospitals where the building layout may evolve over a period. As the building changes, so too can the Matrix, with very little cost or disruption.

The addressable Matrix can be supplied with or without common LEDs and controls. Optional LEDs indicate Power On, Fire, Fault and Disablement and optional controls are for Alarm Silence, Buzzer Silence, Lamp test and Reset.

It provides a clear, geographical indication of fire alarm or other system activation enabling speedy identification of the source of an alarm or other events.

Where the requirements of the installation exceed the standard range of the Matrix panels, completely bespoke solutions are available. The enclosure size, mimic viewing area, colour and finish can all be tailored for the individual requirements of the site, including the option of surface or flush construction.

Up to 32 mimic PCB's can be connected to a single Syncro AS and Taktis Fire panel giving a total of 504 LED's that can be individually configured via the standard loop explorer configuration software. To increase the flexibility of this product further, the LED extension boards are available with yellow or green indicators fitted.



Analogue Fire Detection

Features

- > Up to 504 LEDs can be controlled from any Taktis Fire or Syncro AS panel
- > Full colour printing
- > Available in a range of standard enclosures to suit any applications
- > Bespoke sized units can be made upon request
- > Choice of Red, Green or Yellow LED's
- > Available with or without controls
- > The addressable Matrix can easily be upgraded on site with minimal cost and effort
- > EN54-4 approved PSU (optional)
- > Configured via standard Loop Explorer Software

Vizulinx

Fire Alarm Management Solution



Vizulinx is a fire alarm management solution which enables you to monitor your fire systems remotely.

Highly configurable using an embedded web server and simple configuration wizard, it can be used to pass fire system events via e-mail, SMS, Modbus and BACnet message format using an IP connection.

Upgrade options to interface with two-way radio systems, ESPA telephone and pager units. Speech diallers are available and future connectivity via GSM will be provided for sites where internet connectivity is not available.

Event notifications are triggered and processed immediately, and email or mobile phone messages can be routed to any number of recipients based on the Fire Alarm event types. These include fire, pre-alarm, fault, disable, in test, technical alarm and security.

As events are sent immediately, this reduces false alarms as it allows alarms to be investigated before sounding to prevent unnecessary evacuation.

Modbus and BACnet connectivity enables a simple, low-cost integration into building management systems and the ability to monitor equipment via 16 switched inputs. Configuration of custom messages allows support for conventional fire and extinguishing systems.

For managers of multiple sites, Vizulinx keeps them updated on fire alarm activity providing convenience and time-saving efficiencies.

This application is ideal for building managers and service providers.



Sigma CP

Conventional Fire Alarm Control Panels

Sigma CP Overview

The Sigma CP range of conventional fire control panels are designed for the most demanding of conventional fire detection and alarm system applications.

Easy to install, the Sigma CP is available with two, four or eight detection zones in standard or installation saving, 'two-wire' versions. The extensive range of configuration features available ensure suitability for new installations or panel replacements on older systems.

Configuration options are stored in non-volatile memory and are easily accessed via an intuitive user interface, which enables the configuration data to be viewed and changed efficiently.

Sigma CP control panels are compatible with most standard, conventional detectors, call points and sounders and are also compatible with 'two wire' detector bases from Apollo and Hochiki.



Conventional Fire Detection

Powerful Features

The simple and intuitive programming interface on Sigma CP panels allows simple configuration of many parameters by entering simple codes which are listed on the inner door look up table and in the operation and maintenance manual. Configurable options include sounder delays, short circuit triggering of zones, non latching zones, silent zones, I.S. barrier compatible zones and system disablements.

address and type of any units that fail or are disconnected after the panel has been configured to recognise them.

Two-wire versions of Sigma CP can have detectors, call points and standard, polarised sounders connected to the same two core cable, greatly reducing installation time and cost on some installations.

These two-wire versions also provide the capability of zonal sounders which may be configured as zonal alarm (sounders operate only in the zone of activation), common alarm (all sounders in all zones operate) or two-stage alarm (sounders are continuous in the zone of activation and pulsing in all other zones).

Sigma CP panels combine compact and practical styling with the programming power and connectivity required for the most complex and demanding conventional fire alarm system installations.

Connectivity

Sigma CP control panels have a dedicated 'two-wire' serial bus for connection of repeater panels, ancillary relay boards or zonal sounder extension boards. Up to seven units may be connected to the serial bus which can be up to 1200 metres in length. All units connected to the serial bus are fully monitored and the control panel will announce a fault condition showing the

Features

- > Two-wire and standard versions in two, four or eight zones
- > Compatible for use on BS5839: Part 1: 2017 installations
- > Two-wire repeaters and ancillary boards
- > Fully programmable using simple menu options
 - ⊙ Adjustable sounder delay time
 - ⊙ Sounder configuration options
 - ⊙ Zonal sounder delay detectors only
 - ⊙ Zonal sounder delay call points only
 - ⊙ Coincidence input selection
 - ⊙ I.S. Barrier selection by zone
 - ⊙ Short circuit fire by zone
 - ⊙ Non latching zones
 - ⊙ Silent zones
 - ⊙ Zone input delay
- > General panel configuration
- > Simple, single board construction
- > Installer friendly
- > Compatible with wide range of detection devices
- > Two monitored sounder outputs
- > Three Amp power supply
- > Auxiliary power output
- > Fully certified to BS EN54-2 and BS EN54-4

Sigma CP-A

AlarmSense® Conventional Fire Alarm Control Panels

The Sigma CP-A AlarmSense® range consists of a series of conventional, two, four and eight zone fire alarm control panels.

The AlarmSense system enables all detection and sounder devices in a given zone to be wired to the same pair of cables, greatly reducing the cabling and installation requirements and hence costs.

The AlarmSense range of devices includes smoke and heat detectors, call points, base sounders, base sounder/beacons and relay units – all wired to the same pair of cables.

Having sounders and sounder beacons installed on the same cabling as detectors and call points allows all systems to be configured for common, zonal or two-stage alarms by simply setting one of the panels configuration options.

Selection of the AlarmSense local alarm feature at sounder or sounder beacon bases invokes the alarm verification feature. This is particularly useful in Houses of Multiple Occupation such as

student accommodation or nursing homes. When sounder or sounder beacon bases are selected for local alarm mode, alarms are restricted such that only the sounder connected to the activated detector will operate initially. The panel will attempt to reset the activated detector after a time delay and if successful no further alarms are sounded. If the detector re-activates after being reset, a general alarm will sound throughout the premises.

Activation of a second detector or a call point will sound the general alarm immediately.

The alarm verification feature of the Sigma CP-A control panel greatly reduces the risk of unwanted alarms or call outs while still providing secure, high quality fire protection throughout the premises.

All control panels have an integral, 3 Amp mains powered battery charger and power supply capable of providing power to the most demanding of applications.

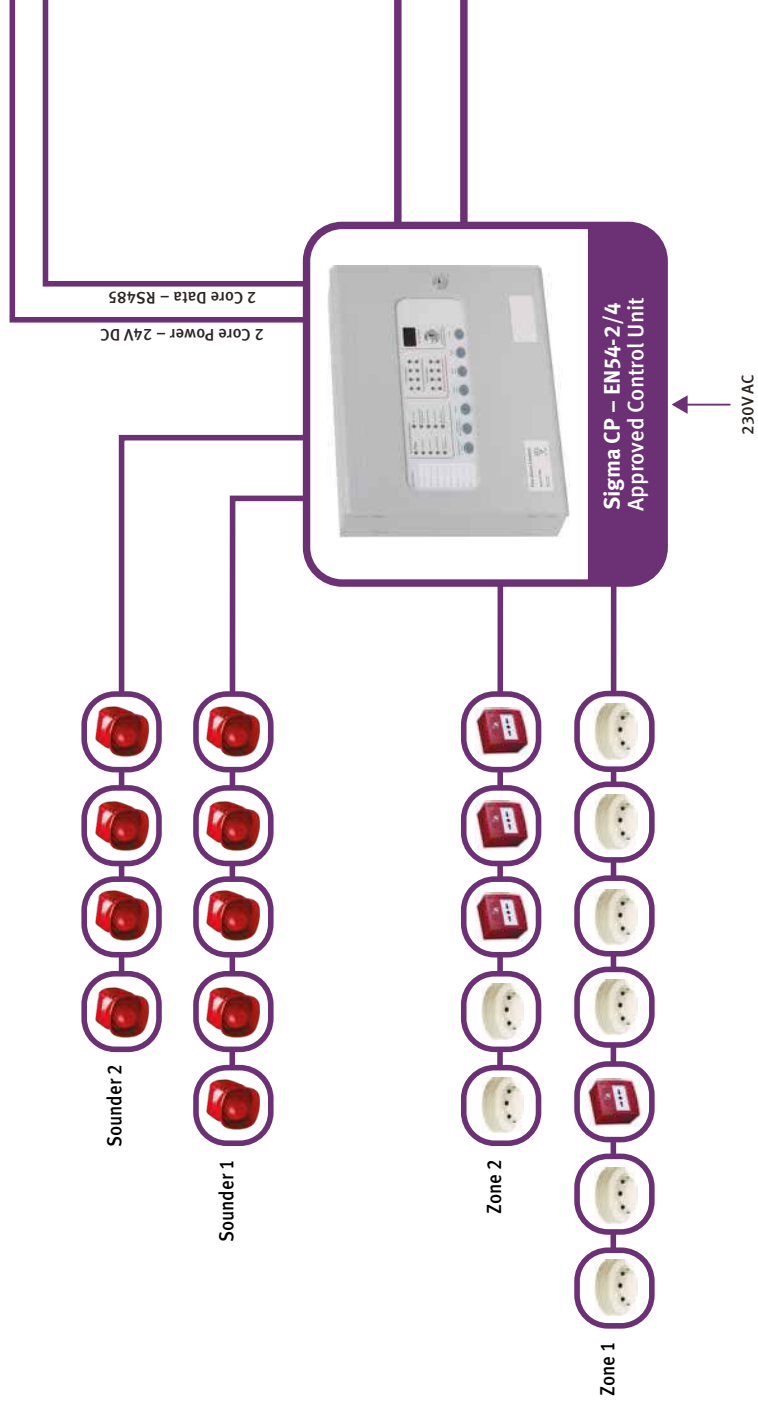
Conventional Fire Detection

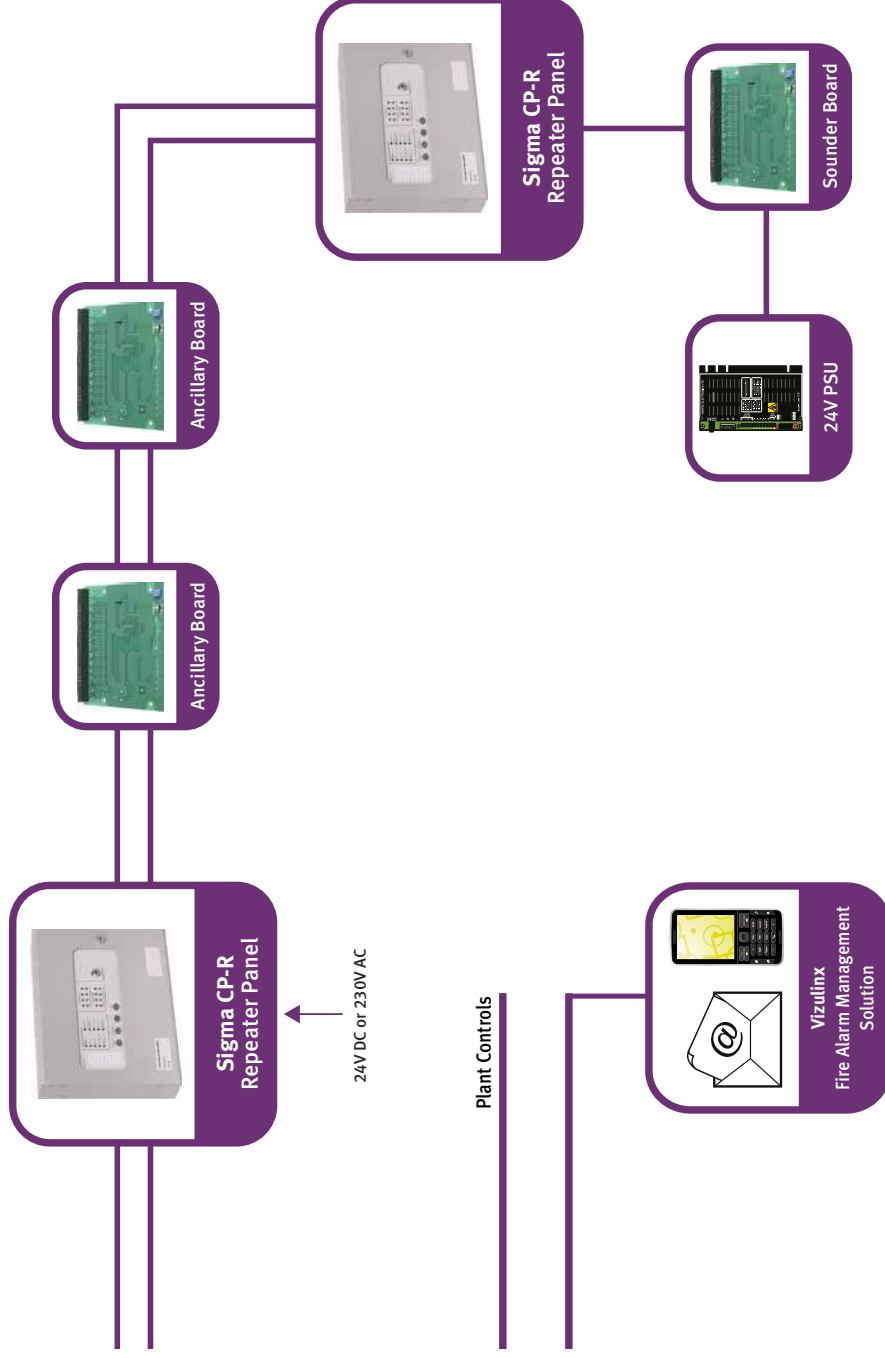


Features

- > Allows systems to be installed in accordance with BS5839: Part 6: 2013 installations
- > Two-wire systems, reduces installation cabling
- > Two-wire repeaters and ancillary boards via serial bus
- > Fully programmable using simple menu options
- > Adjustable sounder delay time
- > Sounder configuration options
- > Zonal sounder delay for detectors only
- > Zonal sounder delay for call points only
- > Coincidence output via ancillary board
- > Short circuit fire selectable by zone
- > Non-latching selection by zone
- > Silent zones (common sounder outputs)
- > Zone input delay for sprinkler system connection
- > AlarmSense® local alarm feature supported
- > Simple, single board construction
- > Installer friendly
- > Compatible with all AlarmSense® devices
- > Two conventional monitored sounder outputs
- > 3 Amp power supply
- > Auxiliary power output
- > Fully compliant with BS EN54-2 and BS EN54-4

Sigma CP System Diagram





Sigma XT

Extinguishant Control Panel

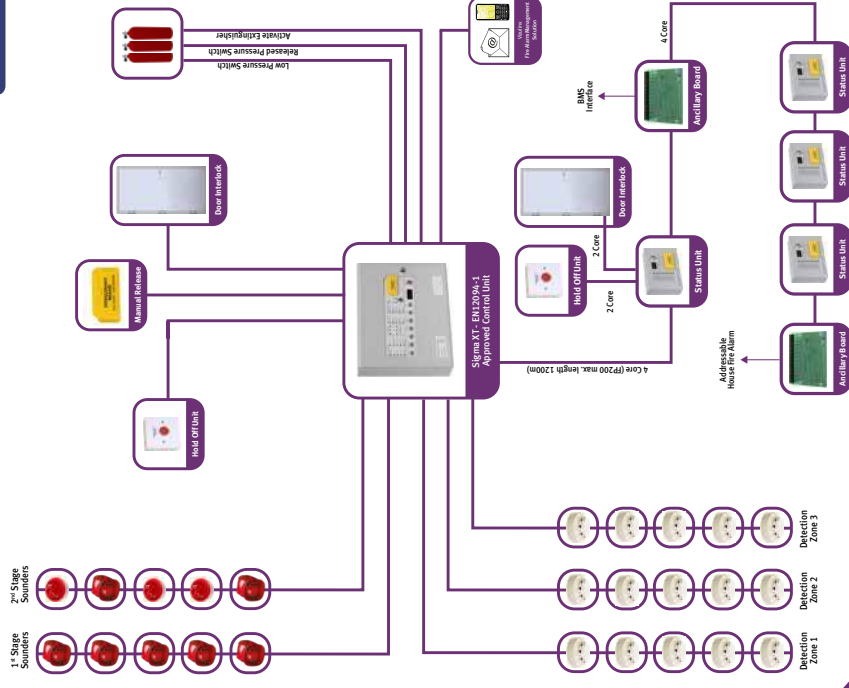
The industry leading Sigma XT extinguishing releasing panel, installed extensively in thousands of premises globally, offers outstanding value and performance for all small to medium fixed firefighting installations.

With three detection zones as standard, extinguishant release can be configured to activate from any combination of detection zone inputs.

Sigma XT panels are both robust and easy to install having all the electronics mounted on a single, easily removable, steel plate.



Sigma XT Network Diagram



Extinguishant System Control

Features

- > Any single zone or any combinations of zones can be configured to release
- > Configurable first stage sounder delays
- > Configurable detection delays
- > Zero time delay upon manual release option
- > Compatible with I.S. barriers
- > Non-latching zone input option to receive signals from other systems such as aspirating equipment
- > Countdown timer shows time remaining until release
- > Supports up to seven, four-wire status indicators
- > Approved and certified to EN12094-1, EN54-2 and EN54-4
- > UL and FM Approved version also available

Sigma XT+

Extinguishant Control Panel Multi-Area Addressable

The Sigma XT+ range combines Sigma CP conventional fire detection from two to eight zones. With highly configurable extinguishing control modules, it provides an integrated control solution for extinguishing systems with up to four protected areas.

The fire detection section connects to the extinguishant control modules via a serial link which allows secure, bi-directional transfer of data between the two. Sigma XT+ modules may

be mounted remotely in separate enclosures and connected to Sigma CP panels via this serial interface to provide central fire detection and control with distributed extinguishing systems.

Sigma XT+ modules may also be mounted separately from fire detection and control equipment and activated by addressable output modules or voltage free contacts from other systems via two monitored activation inputs.

Extinguishant System Control



Features

- > Two, four or eight detection zones
- > One to four extinguishant areas
- > Dual extinguishant outputs for each area (configurable as Main/Reserve)
- > First and second stage sounder outputs for each area
- > First and second stage volt-free changeover contacts for each area
- > Released volt-free contact per area
- > Fault volt-free contact per area
- > Programmable extinguishant delays
- > Programmable output duration
- > Countdown indicator shows time until release in seconds
- > Mode select and manual release controls per area
- > Monitored remote manual release input, Abort input & Hold input
- > Approved and certified to EN12094-1, EN54-2 and EN54-4

Syncro XT+

Extinguishant Control Panel Multi-Area Addressable

Syncro XT+ multi area addressable control panel enables extinguishing systems to use all the features and benefits of the more sophisticated detection techniques provided by addressable fire detectors. It also includes other benefits of analogue addressable systems such as control of loop connected sounders, beacons and input/output modules.

With up to 16 zones of addressable detection over one or two loops it ensures every detector can contribute to the extinguishant release.

The Syncro XT+ has up to four extinguishing areas and two releasing outputs per area which can be controlled via simple coincidence detection or via

more complex cause and effects configured by the Loop Explorer configuration programme.

Each extinguishant area has a comprehensive set of inputs and outputs and is configurable via the Loop Explorer configuration programme.

All extinguishant areas may have up to seven serially connected Sigma Si status indication and control units, or ancillary relay boards connected via a simple four-core cable.

With the addition of a Syncro network card, Syncro XT+ control panels can be networked to provide scalable extinguishing systems for all sizes of installation.

Features

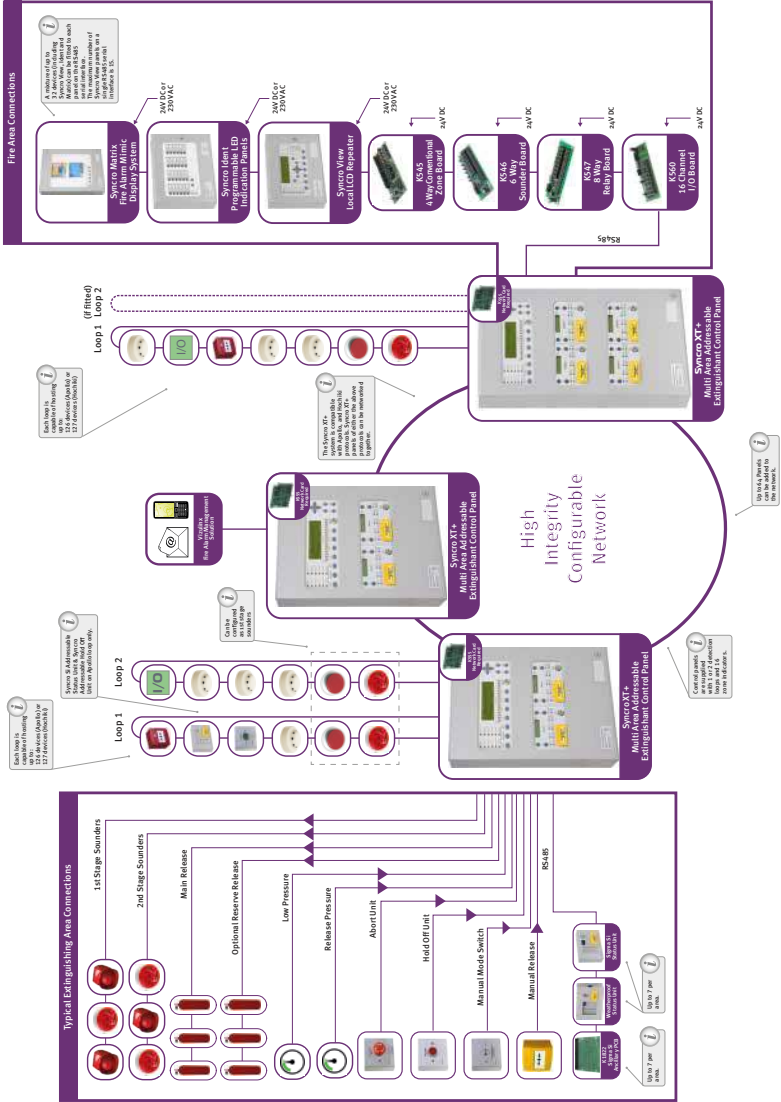
- > Up to four extinguishant areas (custom build options are available)
- > Dual extinguishant outputs for each area (configurable as main/reserve)
- > First and second stage sounder outputs for each area
- > First and second stage volt-free changeover contacts for each area
- > Released volt-free contact per area
- > Fault volt-free contact per area
- > Programmable extinguishant delays
- > Programmable output duration
- > Countdown indicator shows time until release in seconds
- > Mode select and manual release controls per area
- > Serial connections for Sigma Si status units and ancillary boards (K588)
- > Approved and certified to EN12094-1, EN54-2 and EN54-4



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Extinguishant System Control

Syncro XT+ Network Diagram



Sigma Si

Extinguishant Status & Ancillary Units

Sigma Si is a range of system status indicator units for use with Kentec Sigma XT, Sigma XT+ and Syncro XT+ extinguishant releasing control panels.

The Sigma Si range of status indicators provides detailed status information for Sigma XT and Sigma XT+ extinguishant release control equipment. All models provide high brightness, LED indication of Manual Only, Automatic and Manual, Hold Operated, Disabled, Imminent and Released conditions. Sigma Si 10 lamp version also has zonal fire indicators and a common fault indicator.

For systems where local control of the Automatic/Manual mode and or a Manual extinguishant release control are required, units are available with these controls fitted.

All models have monitored inputs for the remote connection of Automatic/Manual mode and Hold switches and are provided with a large, LED display which shows a countdown of the time remaining until the extinguishant is released in seconds.



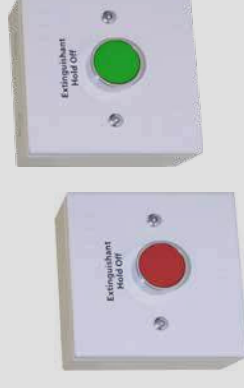
Extinguishant System Control

Hold-Off Units

Sigma Si Hold off units are available with red or green actuators (BS 7273-1 recommends white with red button) and are mounted in a single gang, surface mounting enclosure. For flush mounting, the enclosure may be discarded, and the unit mounted to a standard UK single gang electrical back box.

The unit has a durable, shrouded push button to prevent accidental operation, and a simple two-wire connection to Sigma XT, Sigma XT+, Syncro XT+ or Sigma Si status units is required.

Sigma Si Hold off units are fitted with normally open and normally closed contacts to allow operation with monitored and unmonitored systems.



Power Supplies (PSU)

For Fire Detection, Alarm and Fire Protection Systems

The K25000 range of 24V DC power supplies are designed to meet the exacting requirements of fire detection and alarm systems, and fire protection systems.

All models charge sealed lead acid batteries using sophisticated, temperature compensated charging and monitoring techniques to keep the batteries in the best possible condition.

Over depletion of batteries is prevented by a low battery voltage disconnection function which removes the load from the batteries when their terminal voltage reduces to a level which would damage them.

A low battery voltage fault warning is given when the batteries reach the minimum terminal voltage recommended by the battery manufacturers.

A high series resistance in the battery supply circuit, which would allow the power supply output voltage to fall outside of the specified range, is indicated as a fault condition.

K25000 power supplies can be fitted with an optional dual output board to provide redundant power paths for fire alarm applications, and are available in a range of enclosures to accommodate different battery sizes. These part numbers are prefixed with KD.



Power Supplies

Onboard LED indicators are provided to indicate the status of the unit. An onboard header is available to extend status signals to other systems and a volt-free relay contact operates upon any fault condition or total power failure.

Enclosures are designed to match both Sigma and Syncro AS fire panel ranges and are constructed from 1.2mm mild steel and are finished with epoxy powder coating.

The K25000 boxed range is available in the following power outputs:

K25250 range – 2.5A output and up to 12Ah batteries

K25400 range – 5.25A output and up to 26Ah batteries

K25800 range – 10.25A output and up to 45Ah batteries.

Unboxed or caged power supplies for incorporation into other equipment are available as follows:

S2014 – 2.6A output

S406 – 5.25A output

S408 – 10.25A output





Tamper Vision Resistant Window

The Tamper Resistant Vision Window is perfect for public areas where restricted access is necessary to prevent damage and unauthorised operation of the control panel. The cover features a fully welded steel construction and key lockable inner door making it robust and secure.

The Vision Window is available from stock, fully assembled, and can be fitted on site in minutes by simply removing the hinge pins on the existing enclosure and removing the lid before fitting the new Vision Window cover and hinge pins.

Control panels can also be supplied pre-fitted with the Vision Window on any M2, H2, M3, and H3 size control panels.

Sigma DocBox

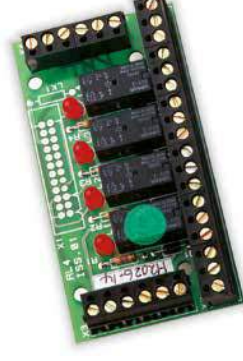
Designed to provide a convenient method of storing system test records, manuals, configuration files, keys and other documents or access arrangements for fire alarm and protection systems, the Sigma DocBox is finished and constructed in a similar manner to Sigma and Syncro fire alarm control equipment.

Available as standard, deep or extra deep enclosure versions, and in grey and red colours, DocBoxes are available to suit any size of installation.

The DocBox also doubles up as a Key Box providing 7 easily accessible formed key hooks inside the enclosure and is itself lockable using a standard fire control panel key.



Miscellaneous Items



Relay Boards

Easy to fit and wire for additional control functions or to expand the capability of existing relay outputs, these simple boards contains either one or four 24V DC relays, which can be used for any extra-low voltage switching applications.

Each relay has two changeover contacts, and an LED indicator to show when the coil is energised.

The coils of the relays are common to the positive supply and the relays can be operated individually by switching a negative to the numbered coil inputs.

The contacts are suitable for switching a maximum of 30V DC and 2 Amps. The current consumption of the unit when operated from a 24V supply is approximately 25mA per relay.





Audio Visual

A range of indicator units with either red or yellow indicators to provide an audible and visual status of alarms, isolations or other functions.

These units are available with a keyswitch to silence the internal buzzer or a keyswitch to illuminate the indicator and buzzer. A volt-free contact is provided when the keyswitch is operated for ancillary control functions.

The units are mounted in a durable steel enclosure that has the same plate fixing centres as a standard UK single gang electrical box, enabling the unit to be easily flush mounted if required.



Remote Indicator Unit

Remote Indicator Units provide an extension for LED indicators on hidden detection devices to allow their status to be observed without having to expose the detection device itself.

All units have dual, bright LED indicators with a wide viewing angle that flash alternately to attract attention, and are available mounted to square or round metal plates for fitting to standard electrical back boxes. They are finished in white, durable epoxy powder and printed in red with 'FIRE ALARM IN CONCEALED SPACE'. Other printing options are available upon request.

Remote indicators are compatible with all types of conventional and addressable detectors.



Miscellaneous Items

Warning Signs

Powered by a nominal 24V DC supply, the illuminated warning signs employ the very latest in LED technology to provide a high reliability, high brightness, audio/visual warning indication unit to supplement mandatory alarm warnings.

The brightness of the sign remains constant over its entire operating range of 15 to 30 volts DC due to the unique 'power boost' circuitry employed. This ensures that even with a system running on depleted batteries, all signs remain at full intensity.

A range of standard text signs are available and fully customised text and languages are easily accommodated. The large display panel is backlit with high intensity white LEDs to provide a high contrast indication in a range of different colours.

A split-level function allows the top and bottom halves of the sign to be illuminated independently via separate inputs or by reversing the supply voltage, enabling two-stage messages to be displayed if required.

The internal buzzer can be enabled or disabled via configuration switches and it can be silenced via a two-wire remote input.

The enclosure is slimline and attractively finished in a durable, neutral epoxy powder coat.



Elite RS

Analogue Addressable Fire Control Panel UL/FM Approved

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Elite RS is a versatile range of UL/FM approved open protocol fire alarm control panels.

Available with one or two detection loops capable of hosting Hochiki or Apollo UL devices. Elite RS uses microprocessor-based electronics to provide a flexible control system with high reliability and integrity.

Suitable for all small to medium sized fire detection systems, Elite RS control panels can be expanded and networked to become part of significantly larger systems if the need arises, therefore providing a future-proof solution for any installation.

With its large graphical display and ergonomic button and indicator layout, the Elite RS control panel is simple and straightforward to understand for installers, commissioning engineers and end users alike.



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UL/FM Approved Panels

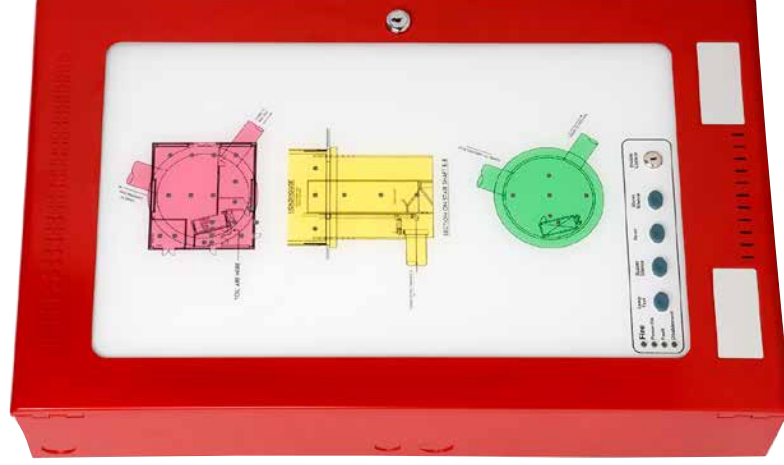
Features

- > One full SLC circuit expandable to two
- > Three programmable relays
- > 5.25A power supply
- > Compatible with eMatrix graphics annunciator
- > Powerful, network wide cause and effects (500 total). Fully user programmable by point or zone
- > Can be networked with additional RS and/or Elite control panels
- > Compatible with eView annunciator
- > Programmable through a PC connection to the panel
- > Stores 1000 last events in history log
- > Model ranges include with or without a Dual-Line internal DACT
- > Two programmable NAC circuits with internal synchronization support
- > UL 864 listed
- > EN54 Approved versions also available

eMatrix

Analogue Addressable Fire Repeater UL/FM Approved

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The eMatrix system uses flexible, optic light guides to illuminate areas on a floor plan, laid over a high-resolution grid. This unique system enables indicators to be moved, removed or added on site without the need for any wiring.

All indicators can be configured to operate upon any event type and at point, zone or group level via the powerful and intuitive Loop Explorer configuration programme. eMatrix can be supplied with or without common LEDs and controls. Optional LEDs indicate Power on, Fire, Trouble and Disarmament and optional controls are for Alarm Silence, Buzzer Silence, Lamp Test and Reset.

Housed in attractive, slimline enclosures to match Elite fire alarm panels and with high quality, full colour or monochrome floor plans, eMatrix provides a clear, geographical indication of fire alarm activation enabling speedy identification of the source of an alarm.

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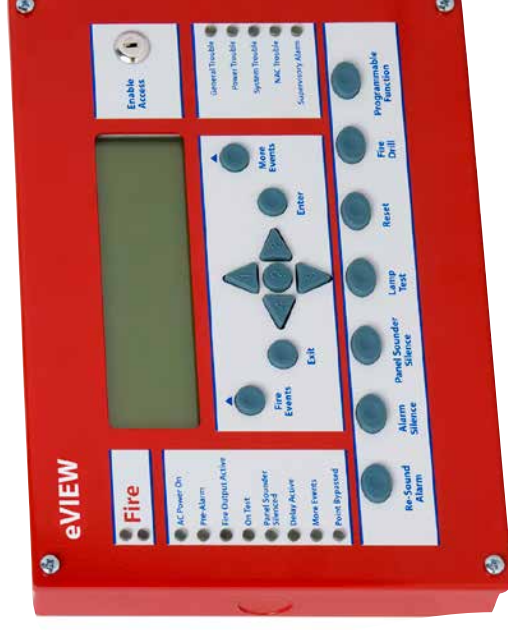
eView Analogue Addressable Fire Repeater UL/FM Approved

The eView fire alarm annunciator provides a simple and convenient method of extending the controls and indications of the Elite RS fire alarm control panel to other locations.

The large, graphic LCD and high brightness LED indicators duplicate the indications on the Elite RS fire alarm control panel at up to 15 additional locations via a simple, two-wire serial data connection.

Housed in a small enclosure, it is ideal for installations where a large control panel would be detrimental to décor such as entrance halls.

Up to 15 eView annunciators can be connected to each control panel on the Elite network making eView ideal where multiple points of indication and/or control are required, such as nurse's stations or retail units



Sigma A-CP

Conventional Control Panel UL Approved

The Sigma A-CP is a range of conventional fire control panels with an optional built-in communicator.

With two, four or eight initiating circuits all panels can be extensively configured via a simple front panel operated programming method.

The low standby power requirements and cost effective small batteries allow the panel to be mounted in a discrete enclosure which is available in red or grey.

A simple programming method using just 3 front panel buttons allows an extensive list of configuration options to be set and reviewed.

Single board construction enables easy removal of all electronic parts by removing just two screws, and ample provision of cable entry knockouts simplify installation.

4 Amp notification appliance power and built-in selectable sync protocols provide ample power and control for a wide range of standard notification appliances.

The built-in RS485 communications bus provides the facility to connect 4 wire annunciators or ancillary relay boards to provide further indication and control options throughout a premises.

The optional DACT allows dual line reporting to central stations and provides a 500-event history buffer.



UL/FM Approved Panels



Features

- > Two, four or eight initiating circuits
- > Initiating circuits individually configurable as Fire, Water Flow or Supervisory
- > Two 2A notification appliance circuits
- > Selectable NAC sync protocols
- > 6.5A power supply
- > Alarm verification selectable by zone
- > Resettable aux power output rated at 0.3A
- > Aux power configurable to power off on Fire condition
- > Fire, Trouble and Supervisory relays
- > Single person walk test function
- > Optional DACT
- > Advanced configuration options
- > 72 hour standby with 7Ah batteries
- > Compact enclosure
- > UL864 listed

Sigma A-XT

Extinguishant Control Panel UL/FM Approved

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Sigma A-XT releasing panel offers outstanding value and performance for all small to medium fixed firefighting installations.

With three initiating circuits as standard, release can be configured to activate from any combination of detection zone inputs to allow (among other combinations) any two from three types of activations for detection in ceiling void, room and floor void applications.

The extensive configuration options of the Sigma A-XT allow the functionality of the system to be extensively modified. The panel contains a large LED display to enable easy configuration and control which also displays the time remaining until release for added user safety.

The countdown timer is duplicated on up to seven remote status units to provide local indication of the system status.

With all the electronics mounted on a single, easily removable, steel plate Sigma A-XT panels are both robust and easy to install. Sigma A-XT is supplied in an enclosure that matches the design and colour of the Elite RS range and is available in standard red or optional grey.



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UL/FM Approved Panels



Features

- > Three initiating circuits as standard
- > Any single zone or any combinations of zones can be configured to release
 - ⊖ Configurable first stage NAC delays
 - ⊖ Configurable detection delays
- > Zero time delay upon manual release option
- > Compatible with I.S. barriers
- > Non-latching zone input option to receive signals from other systems such as aspirating equipment
- > Configurable releasing delays up to 60 seconds in five second steps
- > Configurable releasing duration up to five minutes in five second steps
- > Countdown timer shows time remaining until release
- > UL864 and FM listed

Sigma A-Si

Extinguishant Status & Ancillary Units

UL/FM Approved

The Sigma A-Si range of status indicators provides detailed status information for Sigma A-XT releasing control equipment.

All models provide high brightness, LED indication of Manual Only, Automatic and Manual, Abort Operated, Disabled, Imminent and Released conditions. Models are also available with zonal fire indicators and a common trouble indicator.

For systems where local control of the Automatic/Manual mode and or a Manual extinguishant release control are required, units are available with these controls fitted. All models have supervised inputs for the remote connection of Automatic/Manual mode and abort switches.

All units contain a large, LED display that shows a countdown of the time remaining until release in seconds.

Up to seven Sigma A-Si status units can be connected to the Sigma A-XT serial bus and require just two cores for data and two cores for power. Once connected, status units are supervised, and the Sigma A-XT control panel will indicate a trouble condition should any unit become disconnected.



Sigma A-Si Features

- > High brightness LEDs
- > Detailed indication of the status of the control panel
- > Supervised data connection
- > Countdown timer shows time remaining until release
- > Manual only and Automatic & Manual mode select
- > Four-wire connection (data and power)
- > Protected dual action manual release switch option
- > Option for zonal fire and trouble indication with buzzer
- > Robust, high quality enclosure
- > Easy access to terminals
- > Remote Auto/Manual door interlock input (supervised)
- > Remote Abort input (supervised)
- > Internal trouble diagnosis indicators
- > UL864 and FM listed



UL/FM Approved Panels

Ancillary PCB

The Sigma A-XT Ancillary Board is compatible with all Sigma A-XT control panels. The board provides volt-free, normally-open contacts, enabling control of sub-systems and plant remotely from the main panel over a two-wire data bus.

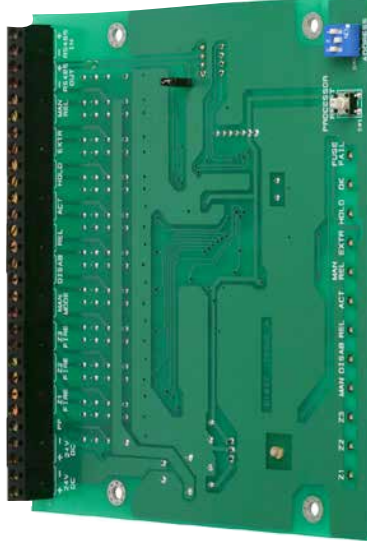
Up to seven Ancillary boards can be connected to a control panel and each is allocated an address from one to seven using a binary coded DIL switch. The total length of the data cable from the main panel to the last repeater must not exceed 4000 feet.

Ancillary boards require only a two-core data cable from the main control panel and a two-core power cable from the main panel.

A mixture of status units and Ancillary boards, up to a maximum of seven of each type, can be connected to the serial data bus.

Ancillary PCB Features

- > Two-wire serial connection
- > Up to seven per system
- > Volt-free relay outputs for fire and releasing system status
- > Relay operated LED indicators
- > UL864 and FM listed



Abort Switch

The Sigma A-SI Abort Switch connects to the Abort terminals of the Sigma A-XT releasing panel. Any number of Sigma A-SI Abort Switches may be connected to the circuit.

The last switch must have the end-of-line device from the Abort circuit terminals of the Sigma A-XT releasing panel fitted across its connections to provide open and short circuit supervision.

The unit is supplied mounted to a steel enclosure but may also be flush mounted to a single gang electrical box.

Marine & Offshore Analogue Addressable

1-2 Loop Control Panel Syncro ASM

Based on the popular Syncro AS single and two loop analogue addressable fire control panel, the Syncro ASM is certified with a host of classification societies and is Marine Equipment Directive approved.

Suitable for all small to medium sized vessels, it is compatible with marine approved devices manufactured by Apollo Fire Detectors and Hochiki. Syncro ASM provides a cost effective and scalable solution for all marine fire alarm systems.

Up to 64 Syncro ASM control panels may be networked to provide integrated control and indication of over 16000 fire alarm points.

The optional Voyage Data Recorder interface outputs standard NMEA 0183 protocol and can be fitted inside any control panel on the network.

With its large graphical display and ergonomic button and indicator layout, the Syncro ASM control panel is simple to understand for installers, commissioning engineers and end users alike.



Marine and Offshore



Features

- > One or two loop versions
- > Two programmable sounder circuits
- > Five programmable inputs
- > Three programmable relays
- > 3A power supply
- > Powerful, network wide cause and effects
- > Sensitivity adjustment and Drift Compensation
- > Apollo and Hochiki protocol
- > Stores 500 last events in a non-volatile event log
- > Compact, stylish enclosure
- > Installer friendly, removable equipment chassis
- > Different language and character set variants available
- > Fully EN54-2 and EN54-4 compliant

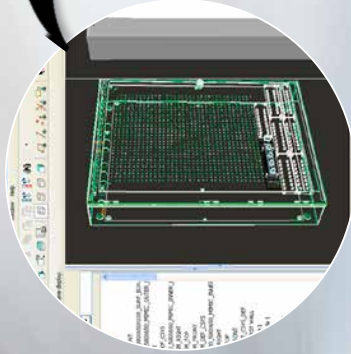


Facilities

- > Artwork and printing design
- > Documentation
- > Electrical engineering
- > Electronic engineering
- > Electrical safety testing
- > Expert design advice
- > Factory acceptance testing
- > Mechanical engineering design
- > Metal finishing
- > Powder coat finishing
- > Sheet metal fabrication
- > Silk screen printing
- > Technical support
- > Wire loomng

Custom Engineered Solutions

From initial
design process



To sheet metal
fabrication



To painting
and printing



To panel
construction



One of the key areas of our business is the design and manufacture of bespoke equipment. With considerable expertise in this field, custom-engineered product will be designed and built in accordance with your exact requirements as well as our strict ISO 9001 approved quality procedures.

All custom-built equipment is project managed by our engineering department, using the latest software to produce electrical, mechanical and construction drawings to the customers' specifications.

We have a dedicated design and manufacturing area for the construction of bespoke product that enables us to offer an enhanced service to our customers including factory acceptance testing.

Our skilled and dedicated production engineers build each bespoke product to the highest standards and to specifications driven by our customers.

We have full control at every stage, allowing us to provide industry leading delivery times, combined with the highest quality.

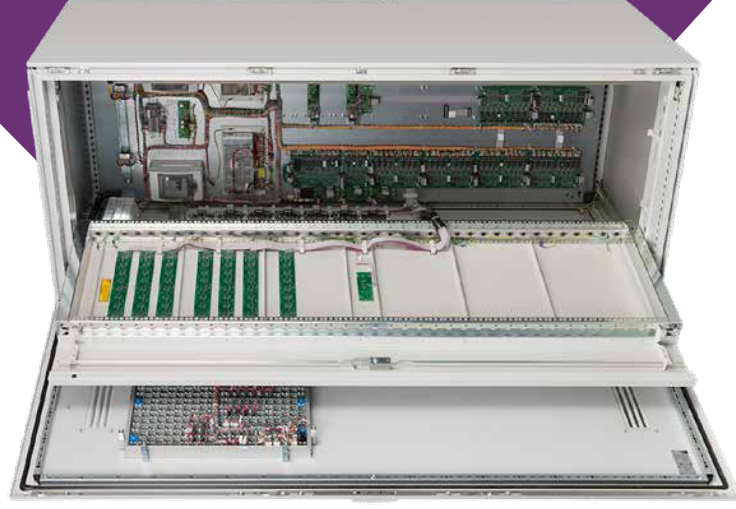
Custom

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Applications

- > Smoke Damper Control Panels
- > Composite Relay Units
- > (c/w Resettable Latching Relay and Firemans Switch)
- > Sprinkler System Indicator Panels
- > Pump Status Indicator Panels
- > Firemans Control Switch Panels
- > Analogue/Addressable Interface Units (with or without integral PSU)
- > Mimic Repeat Indicator Panels (Perspex)
- > Wire loomng



64
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your colour



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