

ESPRIT[®]

One to four loop analogue addressable control panel

The Esprit 1-4 loop analogue addressable control panels have been developed to provide a simple to use and cost effective, robust solution for the intelligent fire systems market.

Extendable up to four loop circuits, and with up to 240 devices per loop, the control panels' compact styling and programming power makes it ideal for all small and medium site requirements.

The large graphical display with easy to navigate menus provide fast and simple setup and maintenance.

Esprit-A panels support the full range of Argus protocol devices including their range of wireless accessories.

The panels are supplied with a 3.4 amp internal switch mode power supply module. This module complies with the requirements of EN54-4 : 1998 and provides temperature compensated battery management charging.

Esprit-A panels are approved to European standards; EN54-2 & EN54-4.



Features

Main Features

- One to four loops
- 2 programmable sounder circuits
- Large graphical display
- 255 date and time stamped event logs
- Auto learn function
- 240 devices per loop
- False alarm management
- Programmable company logo
- Loop fault diagnostics
- Delays to outputs
- 64 programmable groups
- 36 zonal LEDs
- 3.4A integral PSU
- Approved to EN54-2 & EN54-4
- Robust metal enclosure

Technical specifications

Enclosure	1.2mm Mild Steel IP30. Colour ref MW334E Interpon Powder coat
Cable entry	Via 20mm knockouts located in the top and rear of the cabinet
Dimensions	Back box: 450 W x 385 H x 100 D (mm), Lid: 463 W x 394 H x 25 D (mm)
Mains supply	Universal switch mode PSU, 3.4A
Battery capacity	Up to 18 Ah 24V
Charger current	1.2A
Auxiliary supply	400mA aux supply output (21-28vdc)
Loop	Argus Protocol. Up to 4 loops. Each loop - 500mA maximum current
Sounder circuits	2 x 400mA 21-28vdc
Switch inputs	CC, PULS
Event log	255 events, time & date stamped
Earth fault monitoring	Yes
Display	240 x 64 Graphical LCD backlit

Models

ESA-1002	One loop analogue addressable control panel (extendable to four loops) - Argus protocol
ESA-3001	Loop extension card - Argus protocol



KM 683147
BS EN 54-2 & 54-4

Specifications

Electrical Specification Inputs & Outputs		
Common fire relay	Fire relay contact. Clean C/O. Max 3A at 30VDC.	Unfused
Common fault relay	Maintained fault relay contact. Clean C/O Max 3A at 30VDC.	Unfused
Inputs: CC, PULSE	Switched -ve inputs, connect to 0v to trigger. Max input voltage = 30VDC. Non-latching, max resistance = 100R.	Protected via 10K Ohm impedance, 3v6 Zener diode.
SOUNDERS 1 and 2	28VDC polarity reversal monitored sounder outputs to fire alarm devices. End of line resistor: 6K8 Ohm 5% 0.25W EOL resistor.	Monitoring current limit 28mA, fused at 500mA. Typical max load 22 devices at 18mA each per circuit.
PBUS Output + / -	RS-485	RSU Comms, fused at 20mA
Zone normal threshold	Minimum 192 analogue value	Analogue value within (0 – 255)
Temp Sense Input	Input for connection of battery temperature sensor. Attach to central point of sealed lead acid battery pair.	Thermistor TTC5103 10,000 Ohms at 25°C.
LOOP	Addressable circuit	Maximum current limit 500mA. Max 240 devices per loop.
Number of detection circuits	1 to 4 loops	1 to 36 Detection Zones

Power Supply Specification		
Mains supply	230vac +10% / -15% 50Hz max current 0.347Amp (35W) 1.08A (100W)	
Internal power supply rating	3.4 Amps total including battery charging	Maximum load shared between outputs = 3A
Power supply output voltage	19.8 - 29.7vdc	Tolerance +/- 0.1%
Battery charging voltage	27.3VDC nominal at 20°C	Temperature compensated
Battery charging output current	1.2A current limited	Charging suppressed during alarm condition
Min/max battery size and type	2 x 17.2Ah 12v VRLA.	
Battery type	YUASA NP18-12 (12V 17.2Ah)	
Maximum quiescent current	Approx. 370mA at 28V	

Quiescent and Alarm Current Details for Standby Battery Calculations		
Models	Standby Current	Alarm Current
ESA-1002- one to four loop panel	360mA	3000mA