







# Brooks 230V Relay Base to suit 140RC & 3000 series Alarms

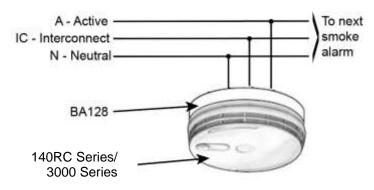
**BA128** 

### **Description**

The BA128 is a surface mount relay base designed to operate with the Brooks mains powered smoke / heat / CO Alarms. The Alarm can be mounted on the BA128, when a fire is detected, the relay contacts change over. The electrically isolated contacts can be used for signalling, emergency lighting, switching lights and sirens or activating door release devices etc.

Warning: To comply with the mandatory safety regulations, the BA128 must be fitted under one of the 140RC Series or 3000 Series Alarms as shown in this technical document. An optional cover is available to fully enclose BA128 which enables the installer to place the base in any location.

The BA128 replaces the previous version EIB128



## **Specifications**

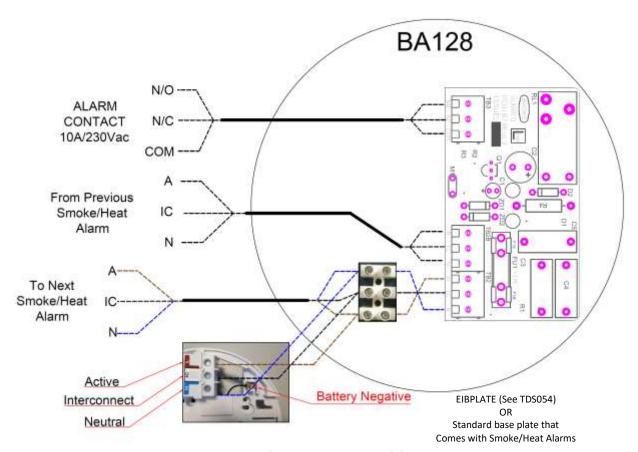
Function	Description					
Input supply	230V <sub>AC</sub> / 35mA Maximum					
Maximum carry current of the relay contacts	10A @ 250V <sub>AC</sub> , resistive load					
Input driving current from the Interconnect	150uA max @ 9V					
Max. number of Alarms connected to BA128	11					
Compatible Alarms	EIB141RC, EIB144RC, EIB146RC, EIB3014, EIB3016, EIB3018, EIB3024, EIB3028					
High isolation relay	Insulation distance 8mm, dielectric strength 5000Vac, Surge strength 10 000V					
Temperature Range	0°C to 40°C					
Material	Flame retardant					
Dimensions	140mm diameter x 21mm depth					
Approvals	Meets AS3000 requirements					

7/4/22	2	Update technical image	N.F.	A.S.	Title Brooks 230V Relay Base to suit 140RC & 3000	Technical Datasheet		BROOKS Fire Products & Solutions	
31/10/18	1	Minor update	A.S.	A.S.	series Alarms	Created	Checked	TDS No.	Rev
14/8/2018	0	Original Issue	E.T.	A.S.		N.F.	A.S.	TDS065	2
Date	Rev	Description	Ву	Apv.		07/04/2022	07/04/2022		

#### **Installation**

Warning: Mains powered Smoke / Heat / CO Alarms and BA128 must be installed by a licensed electrician in accordance with AS3000. Failure to install the unit correctly may expose the user to shock or fire hazards

- 1. Choose a mounting location of the Smoke/Heat/CO Alarm following the siting instructions in the leaflet.
- 2. Screw the BA128 base to the ceiling on the selected location to mount the Alarm. Where the incoming wiring is on the surface of the ceiling, the appropriately sized ducting/conduit must be chosen to mate with the BA128. Use a sharp knife to remove material from the selected knockout, making sure that there is no gap when mated with ducting / conduit.
- 3. If more than one Alarm is to be used, connect the 2nd set of marked A Active, N Neutral and IC-Interconnect, on the terminal block on the PCB. The additional 3-Way terminal block is provided if the cables cannot fit into the PCB's terminal block.
- 4. Connect three double insulated wires between the terminals on BA128 PCB and the terminals on the Smoke / Heat Alarm / CO base plate as shown in Figure 1. This "IC" wire must be connected even if it is a single alarm installation.
- 5. Connect the wires to the required relay contacts for controlling the auxiliary device as shown in the examples in Figure 2 or Figure 3.
- 6. Screw the base plate of Smoke / Heat / CO Alarms onto the top of BA128 using the two screws supplied.
- 7. Slide the Alarm on to its base plate.
- 8. Switch on the mains power the green LED light on the Alarm should be on. Press and hold down the test button for approximately 8 seconds, the relay will switch over.



#### Figure 1 BA128 Wiring

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# **Wiring Examples**

Figure 2 below shows a typical example of how the relay contacts of BA128 can be connected to control external emergency lights via the normally closed contact of the BA128 relay.

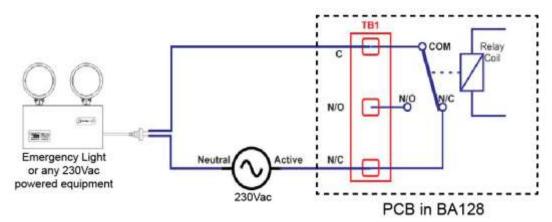


Figure 2 Control of AC Powered Ancillary Devices

Figure 3 below shows a second example to drive external sirens or sounders by connecting a DC source to the normally closed contact of the BA128 relay.

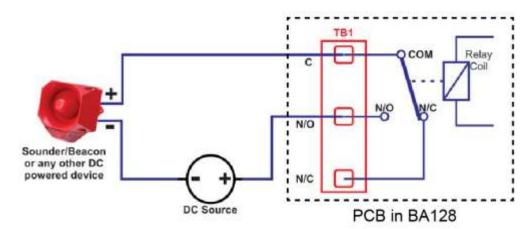


Figure 3 Control of DC Powered Ancillary Devices

#### **Notes**

- 1. A maximum of 11 Smoke/Heat/CO Alarm of the types specified may be interconnected to one or two BA128 units. When one Alarm senses fire all interconnected units will alarm and the relay will switch over.
- 2. Additional surface mount relay bases BA128 can be added to the interconnected Alarms. For every 2 additional relay bases, reduce the total number of interconnected Alarms by one Alarm.
- 3. The relay board is not battery backed and requires 230VAC to operate i.e. a Smoke / Heat / CO Alarm with battery backup will continue to operate during mains failure but will not be able to switch the relay.
- 4. Inbuilt filter is incorporated in the relay board to reduce the effects of external noise interference.
- 5. Devices connected to the relay contacts must not give a fire warning until the contacts have switched for at least 200ms. (The contacts may switch momentarily when subjected to electromagnetic interference).

(Due to the continual development Brooks Australia reserves the rights to change the product specifications)

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