



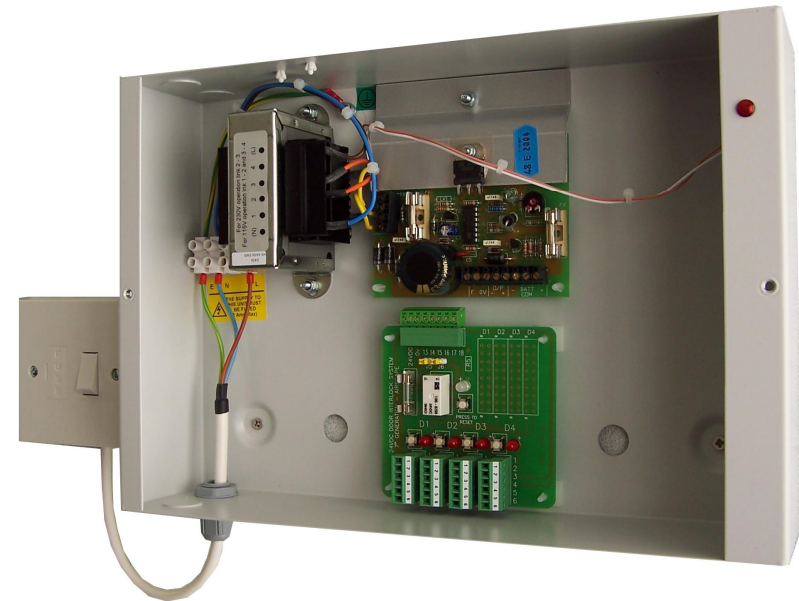
DOOR INTERLOCK SYSTEM INSTALLATION MANUAL

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1. CONTROL AND DISTRIBUTION PANEL

- A. Locate the power and distribution panel within the ceiling void or wall mount to allow distribution of cables to each interlocked door.
- B. The power and distribution panel should be supplied from a switched fused spur, located no more than 1m away from the panel. The power supply requires a 240v 50Hz supply.



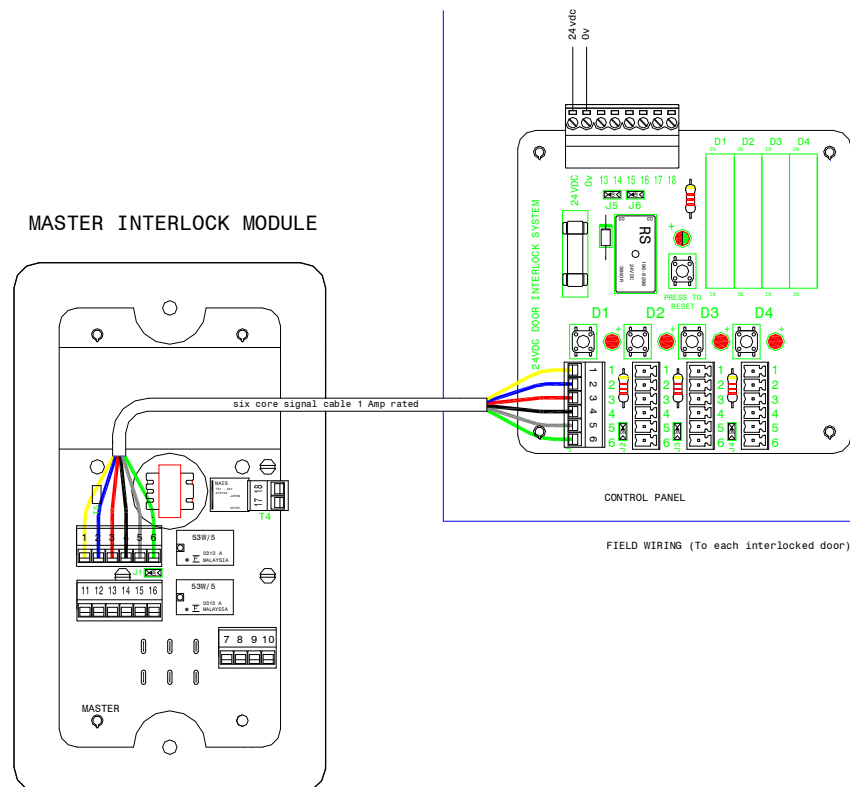
2. FIELD WIRING

- A. Each interlocked door in the system has a Master interlock module. Each master module requires six cores to be run from the control panel to each master module. The cable should be rated at 24vdc and matched to the fuse size installed on the PCB.
- B. Each six way terminal mounted on the distribution board within the power supply panel is for each interlocked door set. Terminations should be connected as follows:-

Control Panel (Door 1)		Master Interlock Module (Door 1)
Terminal 1	1	Terminal 1
Terminal 2	2	Terminal 2
Terminal 3	3	Terminal 3
Terminal 4	4	Terminal 4
Terminal 5	5	Terminal 5
Terminal 6	6	Terminal 6

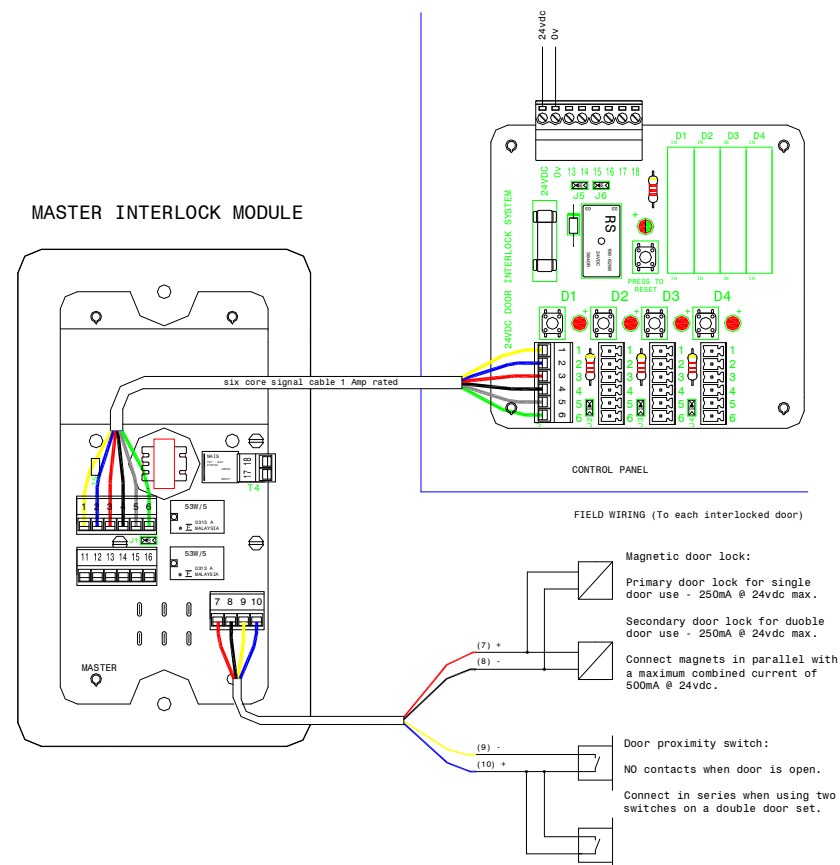
Repeat the above wiring for each door in the system.

If the master module does not have a slave module or remote override connected to it switch J1 to the ON position.



3. MAGNETIC LOCK AND PROXIMITY SWITCH

- A. Run a cable from the master module to the magnetic lock and proximity switch position.
- B. Install the magnetic lock in accordance with the manufactures installation instructions. Connect terminals 7 and 8 into the magnetic lock and **ensure** that the lock is set to 24vdc. The majority of locks are set to 12vdc when sent out from manufacture.
- C. When mounting two locks onto a double door the electrical connections should be connected in parallel.
- D. Install the proximity switch into the door frame header and connect the NO contacts into terminals 9 and 10. Install the magnet into the door head and check that they align.
- E. When using two proximity switches on a double door the electrical connections should be connected in series.
- F. Remove the wires from terminals 9 and 10 and check that continuity is broken when either door is opened and restored when the door is closed, on double doors check that this happens with both door leafs.



NOTE: Use only fail safe locks that fail unlocked in the event of a power failure.

4. SLAVE INTERLOCK MODULE

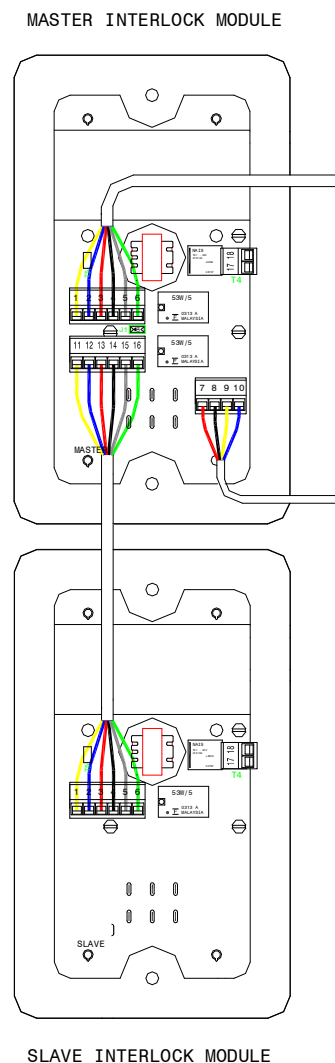
Slave modules enable indicator lights and an override button to be fitted to both sides of the door. This is not always necessary on all systems to have both a master module and a slave module.

- A. Run a six core cable from the master module to the slave module.
- B. Terminals should be connected as follows:-

Master Interlock Module (Door 1)	ï	Slave Interlock Module (Door 1)
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Terminal 11	ï	Terminal 1
Terminal 12	ï	Terminal 2
Terminal 13	ï	Terminal 3
Terminal 14	ï	Terminal 4
Terminal 15	ï	Terminal 5
Terminal 16	ï	Terminal 6

- C. When a slave module is connected into a master module ensure that J1 is switched off to extend the override loop.
- D.



5. REMOTE OVERRIDE MODULE

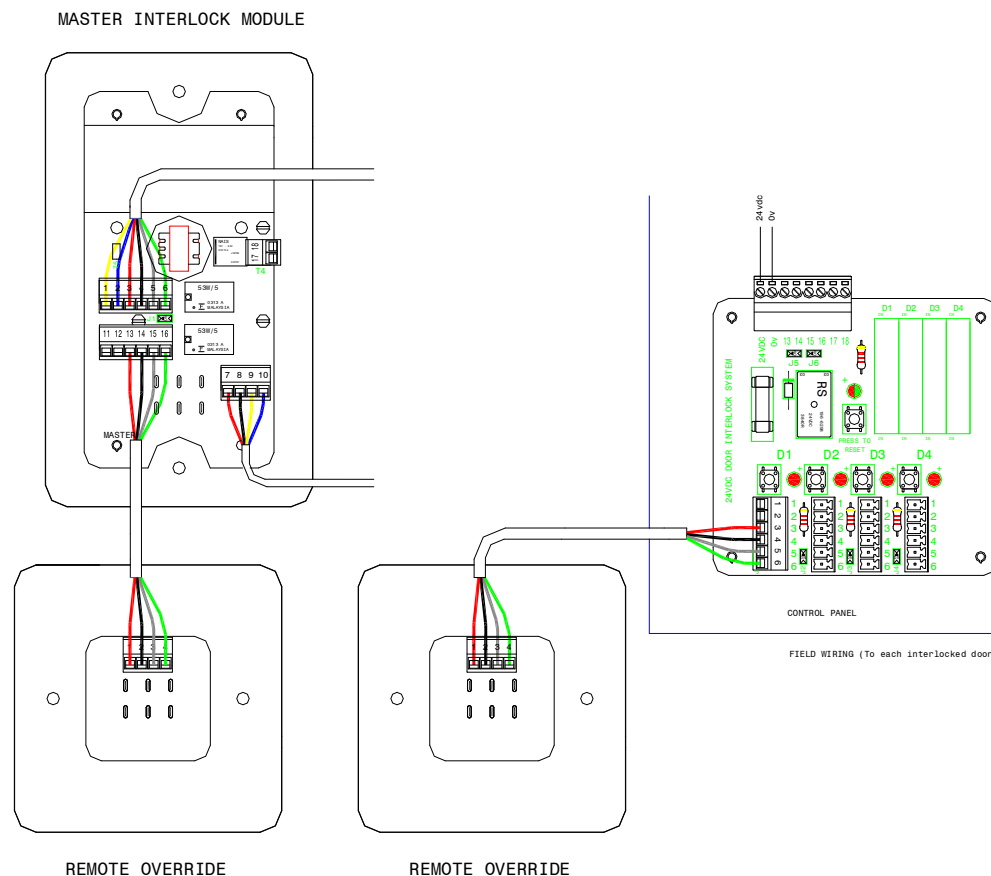
Remote override modules enable an override button to be connected into the system without indicator lights etc. Remote stop buttons can be connected into the main distribution board using a spare door terminal or into a master module that does not have a slave module connected.

- A. Run a cable with four cores from the distribution panel or a master module to the remote override button position.
- B. Terminals should be connected as follows when connecting into a master module:

Master Module	Remote override
Terminal 13 (3) i	Terminal 1
Terminal 14 (4) i	Terminal 2
Terminal 15 (5) i	Terminal 3
Terminal 16 (6) i	Terminal 4

Break glass units should be connected in series (NC contacts) into terminals 15 and 16 on the master.

- C. Terminal numbers in brackets are the terminals to use when connecting into a spare terminal in the distribution panel. When a remote override module is connected into a master module ensure that J1 is switched off to extend the override loop. When connecting into a spare door terminal in the power supply panel switch the jumper on the bottom right of the terminal to OFF.



6. FIRE ALARM CONTROL

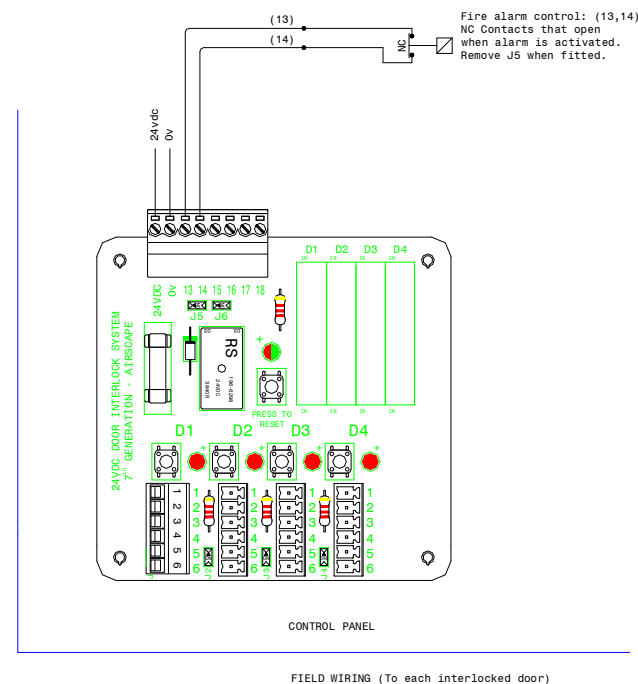
Terminals 13 and 14 on the distribution board can be used to disable the entire system in the event of a fire alarm condition.

Use NO contacts rated at 24vdc that are held closed when the system is healthy. The terminals should open in the event of fire alarm activation.

Ensure J5 (J9 on the large board) is switched off when fitting the fire alarm control.

When the fire alarm is operated and the control contacts are opened all power is isolated to the system which will ensure all doors fail safe.

Normal operation will resume when the contacts are closed and the fire alarm system reset.

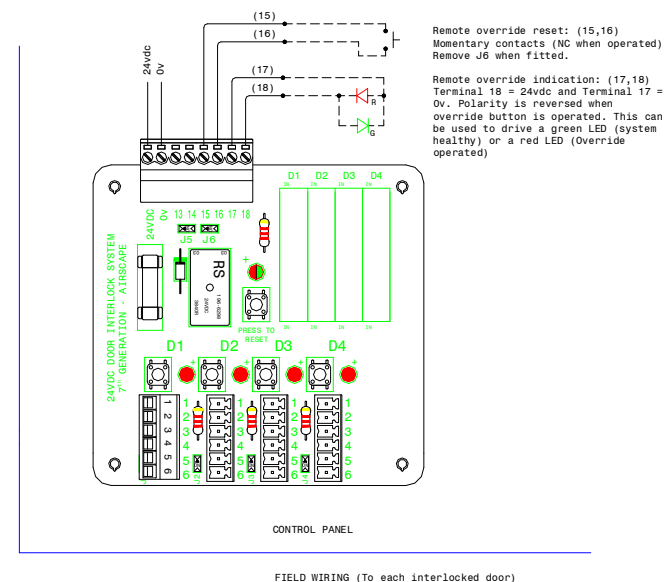


7. REMOTE RESET AND INDICATION

The override loop can be set up to latch in the override state. This may be required for a supervisor to be alerted in the event of the button being operated. This can help reduce misuse of the override facility.

A key switch with a momentary action should be used for this function, so that the supervisor will hold the reset key and therefore always be alerted in the event of the override buttons being operated.

Switch J6 (J10 on the large PCB) to OFF when connecting a remote reset switch.

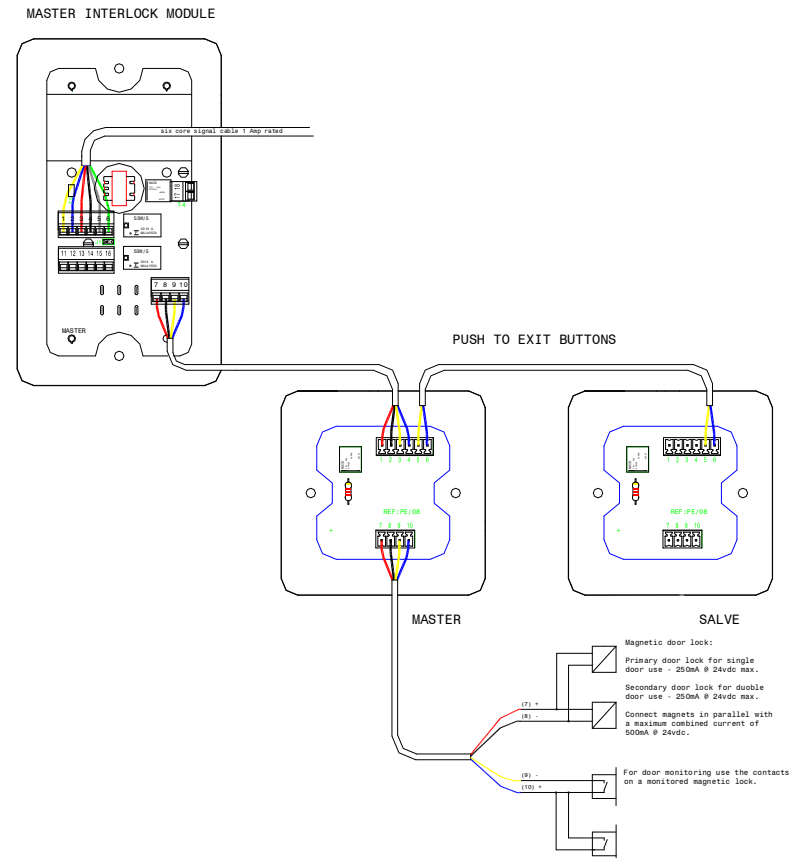


8. PUSH TO EXIT BUTTONS

PUSH TO EXIT buttons can be fitted if the system needs to operate as a normally locked system.

The magnetic locks will release when either button is pressed.

Use monitored door locks with relay output when using PUSH TO EXIT buttons.



9. INSTALLATION CHECKLIST BEFORE SWITCHING ON.

- ✓ Ensure all magnetic locks have been set to 24vdc. Locks are supplied to operate on 12vdc systems and must be changed to 24vdc during installation.
- ✓ Ensure all field wiring has been installed as per the installation instructions.
- ✓ Ensure that the correct fuse has been fitted to the fused spur.

This door interlock system has a 120db alarm configured that operates when the override facility is operated. It is recommended to follow the following steps to prevent accidental activation of the alarm.

1. On the distribution PCB located in the control panel each door has a jumper located to the bottom right of the terminal. Switch these to ON to isolate the override loop for each door.
2. On the small distribution board (4 doors) switch ON J5 and J6 (On the large distribution boards the jumpers are numbered J9 and J10). J5 (J9) isolates the fire alarm, this should be switched on if no fire alarm control is fitted and J6 (J10) is used to reset the override loop this should only be switched off if the remote reset is used.
3. Switch on the supply to the control panel and the LED next to the white relay should be green, indicating that the system is healthy.
4. Check that all override buttons are twisted out (Reset) and switch each jumper next to each door terminal off to extend the override loop to each door. If when the jumper is switched off the alarm sounds or the LED turns red switch back on and check the field wiring. Carry out this procedure for each door until all jumpers have been switched off.
5. If the fire alarm control has been fitted, switch jumper J5 (J9) off and ensure that the green light is still illuminated.
6. When the system is working correctly, check that the correct doors are interlocked and press each stop button in turn and reset to check operation. When the override button is pressed the alarm should sound and a red light illuminated in the center of the stop button.

