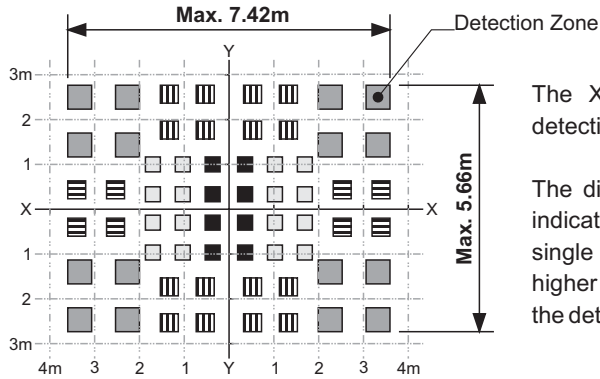
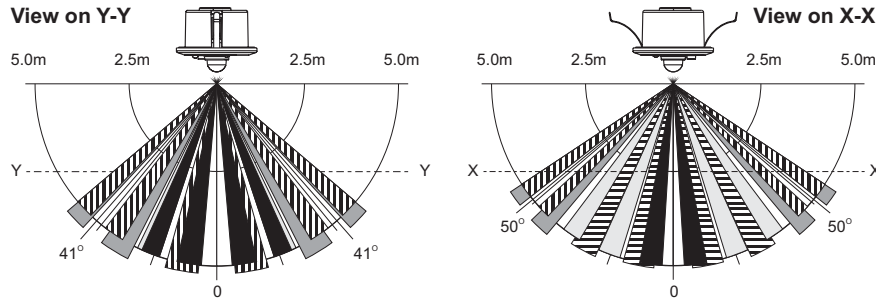


## Detection performance



The X-Y cross-sectional diagram shows the detection area.

The differences in the detection zone patterns indicate the projections of the 16 lenses with a single focal point. Movement of an object with higher than background temperature, between the detection zones, will be detected.

## Supply plug wiring

### fos3000a For analogue ballasts

Black wire	(pin 2)	: Live Feed
Blue wire	(pin 3)	: Neutral
Brown wire	(pin 4)	: Switch Live
Green/Yellow	(Earth)	: Earth
White	(pin 5)	: 0v
Orange wire	(pin 6)	: 10v

### fos3000d For digital ballasts

Blue wire	(pin 3)	: Neutral
Brown wire	(pin 4)	: Switch Live*
Green/Yellow	(Earth)	: Earth
White	(pin 5)	: 0v
Orange wire	(pin 6)	: 10v

\*A link in the sensor plug allows for a live supply to either terminal 2 or terminal 4. Certain applications may require that this link is removed.

## Ratings

### fos3000a For analogue ballasts

Voltage	: 230V, 50Hz, ~
Current	: 10A Max (Resistive)
	: 6A Max (Fluorescent)
Dimming 0-10V	: Sufficient for up to 50 ballasts

### fos3000d For digital ballasts

Voltage	: 230V, 50Hz, ~
Current	: 10A max.
DSI digital control	: Sufficient for up to 25 ballasts

## Installing a fos3000 Sensor Kit

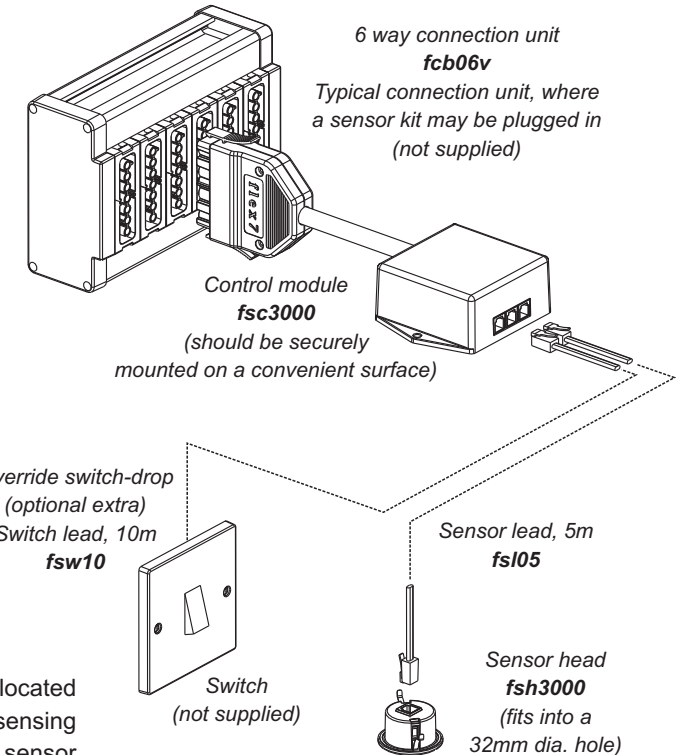
The **fos3000** range sensor kit consists of a single sensor head connected, via a sensor / link lead, to a control module to monitor both occupancy and ambient light levels. The control module comes complete with pre-wired supply lead ready for simple plug in connection to any of the Flex Connectors range of standard connection units.

### fos3000a

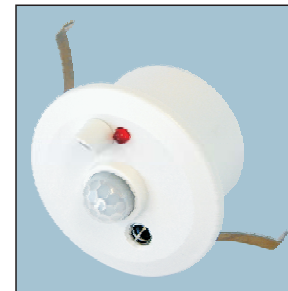
For daylight linked dimming of 0-10v analogue ballasts or the daylight dependent switching of standard ballasts, incandescent lamps or low voltage transformers.

### fos3000d

For use on DSI digital dimmable ballasts only.



## Locating the sensor head

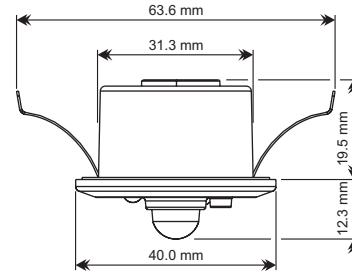


The sensor head needs to be located according to its functions. Light sensing takes place directly below the sensor head at a surface, typically at a desk but could also be the floor. Occupancy sensing covers a rectangular field (see *Detection performance*). Locate the occupancy sensor so that all areas of a room are within range; if this is not possible, locate where the occupants spend most time. The sensor head is connected to the control unit via a sensor / link lead **fslxx** (where **xx** = length in metres). Only connect the sensor head to the port marked **sensor head** on the control unit.

## Sensor head dimensions

The sensor head, **fsh3000**, fits into a 32mm diameter hole, with clips which can grip ceiling panels down to 1.5mm thick.

The sensor head has a rectangular detection area of 7.42m x 5.66m max., at a ceiling height of 2.50m. Please refer to '**Detection performance**' section on the back page for further information.



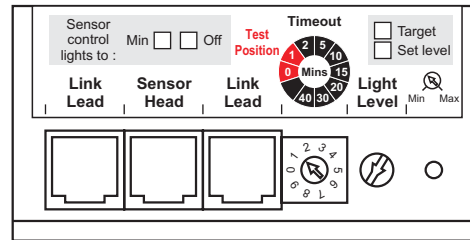
## Setting instructions

### Timeout

SWITCH POSITION	TIMEOUT
-----------------	---------

0	Time-out 15-30 s
1	Daylight dependency 15-30 s (see <b>Daylight dependency</b> )
2	2 minutes
3	5 minutes
4	10 minutes
5	15 minutes
6	20 minutes
7	30 minutes
8	40 minutes
9	Always on - never times out (infinity)

Use the rotary switch to select the time period that you wish the lights to remain on for, after occupancy is no longer detected.



### Target light level (Daylight linking)

Set the Target light level when the installation is complete and all lights are in operation. The **fos3000** range of sensors is designed to react slowly to changing light levels so when adjusting the potentiometer, allow 15-30 seconds for light levels to settle down before further adjustment. Note that the light level being detected is directly below the sensor head and will be affected by the reflective qualities of the surface detected. Use the small-truncated tube supplied, where bright sunlight might otherwise shine directly into the light sensing aperture and lead to erratic light readings. Push fit on to the raised tube on the sensor head and rotate to optimum position.

### Daylight dependency

Daylight dependency is a further energy-saving feature of the **fos3000**. If the light level detected exceeds the set target level (see above) by more than 150%, for a period longer than 5 minutes\* the lights will switch off. They will not come back on until the light level falls back below 100% of the set target level.

\* In test position 1 - Daylight dependency, can occur in 15-30s.  
(Note that in this test position, timeout is as position 9 - Infinity)

## Optional extras

### LV Override switch drop

Low voltage override switch-drop leads, **fswxx** (**xx** = Length in metres 10, 20 and 30m available as standard). Connected via either of the ports marked **link lead** on the control module / unit and combined with a suitable wall switch, can override the lights controlled from the sensor to **off** or **on** (full brightness). The free end of the lead is supplied with 4 x prepared crimped tails ready for termination to a suitable wall switch. Wiring options are as follows:



Override - On / Sensor  
Use 2 position switch



Override - Off / Sensor  
Use 2 position switch



Override - Off / Sensor / On  
Use 3 position - centre off switch

Note: Cut back and insulate any redundant wires.

### Remote control

The remote control, **frc3000**, allows line-of-site remote control of the **fos3000** range of sensors (on/off, dimming and scene setting).

### Sensor link leads

Sensor link leads, **fslxx** (**xx** = Length in metres 5, 10, 15, 20 and 25m available as standard). Use where the control unit is sited further than 5m from the sensor head.

### Additional sensor controls for large /multi circuit/complex areas

Please refer to '**Networking Sensors**' data sheet for details on linking sensors.

## Special fos3000 configurations

The following variations are available within the **fos3000** range and if specifically ordered will be indicated by ticks in the appropriate tick box on the front label of the control unit. These options are as follows:

### Sensor control to minimum (instead of off)

The lights will dim down to **minimum** after a time out period instead of switching **off**.

### Light level to set level (instead of Target)

The potentiometer adjuster will adjust light level directly (acts as a dimmer) and not set a target level. This light level will persist whenever the lights are brought on by occupancy. Note that an override on signal (see override control) will bring the lights to full brightness whilst maintained.