# See front page configuring link for details on Wiring Option @m $\omega$ NDim 찟 Emergency (Orange) luminaire (Connection unit shown) ${f fsu06}$ (Brown) (Grn/Yel) (Blue) (Black) (Orange) Luminaire (White) (Brown) (Grn/Yel) (Blue)

# fnc4000(D,X or A)/AB/E - Controllers Includes Integral Emergency Test

The fnc4000(D,X or A)/AB/E, are all control devices which can plug directly into any of the eZeBox range of connection units or a 7-pole single socket outlet. Working with at least a switch or together with a plug in sensor head, the device will control the connected mains rated luminaires ON/OFF, DIM and will be able to carry out an emergency test. The exact operation will largely depend on which of the input devices are connected. Note that any connected switch or sensor head will be operating at ELV.

Three products are available:

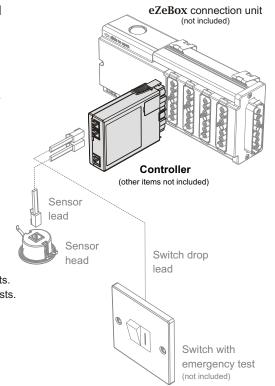
Circuit diagram for fnc4000(D,X or

A)/AB/E

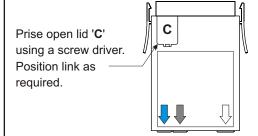
Controller

fnc4000D/AB/E : DSI digital dimmable ballasts.
 fnc4000X/AB/E : DALI digital dimmable ballasts.
 fnc4000A/AB/E : Analogue ballasts 0-10V.

Please ensure the correct product is selected for the type of ballast being used as incorrect connection may damage the controller.



# Configuring the $fnc4000(D,X\ or\ A)/AB/E$ controller





#### Link in position 1

Lights can remain ON during an emergency test. Wire connection unit as shown on the back page.



## Link in position 2

Lights will switch OFF during an emergency test. Wire connection unit as shown on the back page.

#### Rating

Supply Voltage : 230V~ 50Hz

Load

Fluorescent & Incandescent Lighting : 6A Compact Fluorescent Lighting : 3A

## Maximum number of Ballast

fnc4000D/AB/E (DSI Digital control) : 25 fnc4000X/AB/E (DALI Digital control) : 25 fnc4000A/AB/E (Analogue 0-10V control) : 25



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Website: www.flexconnectors.co.uk Email: info@flexconnectors.co.uk

Leaflet reference number: 22/018 issue 2 03/08/2012

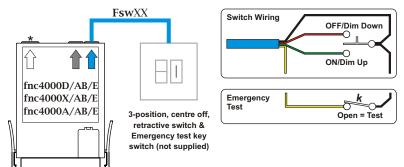
Aux/L Em/L

Neutra

Earth Sw/L

# Using a fnc4000(D,X or A)/AB/E controller with a switch (dimming)

\* Refer to leaflet Networking Sensors, leaflet number 17/245.



## Operation:

#### Switch control:

ON pulse - turns the lights ON (to the last dimmed level). OFF pulse - turns the lights OFF.

A long ON pulse - brightens lights (eventually to maximum). A long OFF pulse - dims lights (eventually to minimum, but should the pulse exceed 15 secs the lights will switch OFF completely).

#### **Emergency Test:**

Operate key switch to carry out an emergency test.

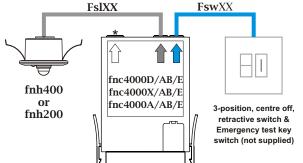
#### Note:

Multiple switches can be connected in parallel. 'Y' connectors are available to enable two switch drop leads to be connected into one point.

(Part No. fsy/A - adaptor)

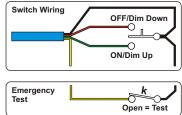
# Using $fnc4000(D_{s}X\ or\ A)/AB/E$ controller with a sensor head & switches

\* Refer to leaflet Networking Sensors, leaflet number 17/245.



#### Note:

For best operation it is advisable that occupancy coverage extends to cover the wall switch.



#### Note:

Multiple switches can be connected in parallel. 'Y' connectors are available to enable two switch drop leads to be connected into one point. (Part No. fsy/A - adaptor)

**Note:** Alternative operational options not necessarily shown above are available using the **frc/set** setup remote control.

Full instructions for setting up the sensor are supplied with the sensor head and the frc/set remote control - both ordered separately.

### **Operation:**

#### If the sensor head is of type fnh200

ON pulse - turns the lights ON.

OFF pulse - turns the lights OFF.

Along ON pulse - brightens lights (eventually to maximum).

Along OFF pulse - dims lights (eventually to minimum, but

should the pulse exceed 15 secs the lights will switch OFF completely).

#### Absence detection:

When occupancy is no longer detected, lights (both lighting circuits) will switch OFF after a pre-selected *time-out* period (default 20 minutes).

#### **Emergency Test:**

Operate key switch to carry out an emergency test.

#### If the sensor head is of type fnh400

#### Switch control:

As above except lights always switch ON with *daylight linking* activated. If the lights are subsequently dimmed up or down by the switch, *daylight linking* will be deactivated in preference to the DIM state attained by the switch.

**Absence detection:** As above (type fnh200)

**Daylight linking:** Provided *daylight linking* is activated (see switch control above) the light output will adjust to compensate for any changes in ambient light in order to maintain a constant light level under the sensor head - the *target level*.

Emergency Test: As above.