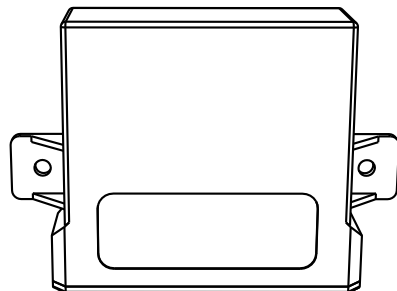
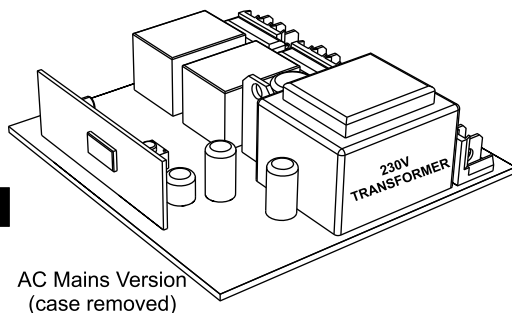
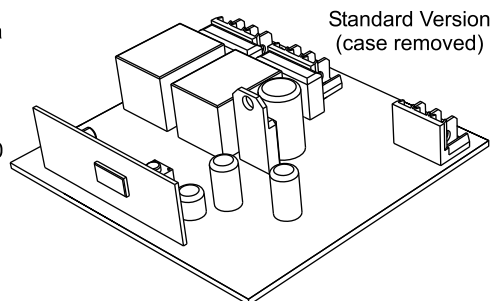


The SENTRY Two Channel 220V Receiver is a two channel receiver for control purposes that requires a 220V power source. It is fully compatible with ALL SENTRY code hopping transmitters in all button formats, and can learn up to 20 unique transmitter buttons, and provides two linked relay control channels, each capable of switching typically 5 to 10 amperes at 230V AC.

The primary control channel relay is of the latching type, and the secondary control channel is of the pulsed type (typical pulse time approx 2 seconds). This mode of operation makes the product versatile. It also makes it possible to use this product to control modern electronic LED type pool lamps easily and cost effectively.

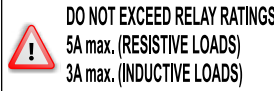
This product is offered in two versions:  
Standard 16V AC/DC version  
230V AC version (built-in transformer)



Complete unit (PCB inside enclosure)

### TECHNICAL SPECIFICATIONS

Transmission Frequency:	433.92MHz
Modulation Format:	ASK
Protocol:	Code Hopping
Power Source:	16V AC or DC 200 - 250V AC 50 - 60Hz 1.5VA
Relay Contacts:	5A @ 240V AC
Dimensions:	90mm x 87mm x 31mm
Mass:	< 373g
Operating Temperature Range:	-30°C to +55°C
Current Consumption: (test supply 13.8VDC)	10mA (idle) 40mA (RELAY 1 active) 70mA (both RELAY 1 & 2 active)



ZV 125



ETSI 300 220-1  
ETSI 300 683  
MPT 1340



### PROGRAMMING AND USAGE

#### MODE OF OPERATION

Both Relay 1 and 2 operates in latch and pulse

#### PROGRAMMING PROCEDURE

(Example shown with SENTRY 4 button transmitter)  
To program a remote control into the receiver, the following procedure applies:

Step 1:  
PRESS AND RELEASE the learn button on the receiver. The receiver will then enter "learn mode" indicated by the RED LED flashing steady. At the same time, the RED LED designated to RELAY 1 will turn on. At the same time RELAY 1 will energise.

Step 2:  
Press the Button you wish to assign to RELAY 1, on the remote control. If successful, the RED LED will flash rapidly, indicating that the button was stored successfully. After approximately 1 second, the RED LED extinguishes, and the relay will de-energise. This indicates LEARN MODE is exited and the receiver returns to normal operation. At this point the button is now learnt in and the primary relay channel (RELAY 1) will operate in latch mode, which can be confirmed if you press the button on the transmitter.

Step 3: (Optional if used as normal receiver)  
PRESS AND RELEASE the learn button on the receiver. The receiver once again enters "learn mode" (RED LED flashing and the RED LED along with RELAY 1, is turned on). Now, press and release the LEARN button again, Relay 1 and its LED indicator turn off, Relay 2, and its LED indicator now turn on. Press the button on the remote you wish to assign to this relay (must be a button other than the one assigned to RELAY 1). If successful, the RED LED flashes rapidly, then extinguishes, and RELAY 2 turns off together with its LED indicator.

#### Erasing All Buttons Stored in memory

To erase all buttons stored in memory and to revert the receiver to the factory shipped condition, proceed as follows:  
1. Press and HOLD the LEARN button for at least 2 seconds... After 2 seconds, both RELAY 1 and 2 will turn on, together with their LED indicators.  
2. Release the LEARN button. The relays remain energized for a further 2 seconds. They then release simultaneously. This indicates the memory has been erased.

### LINK CONNECTION

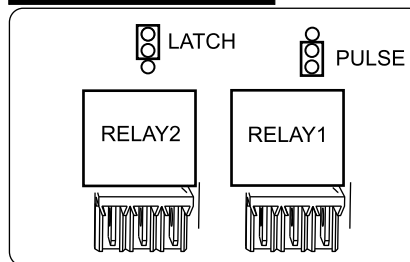
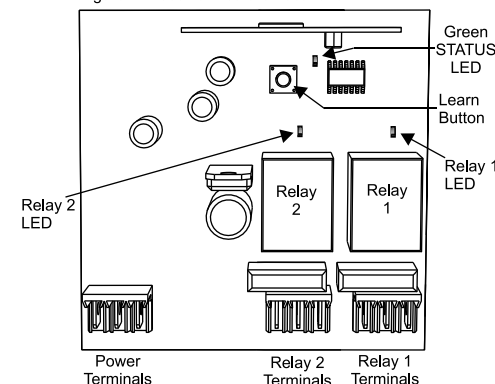
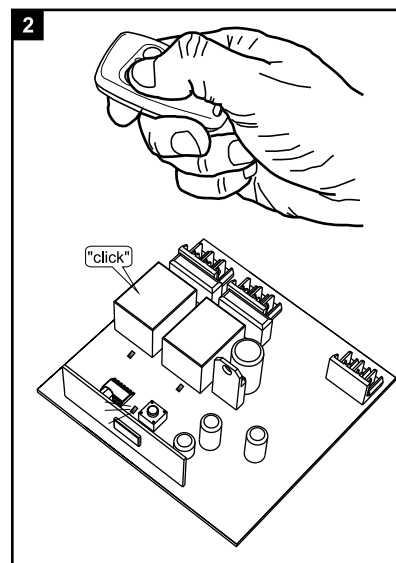
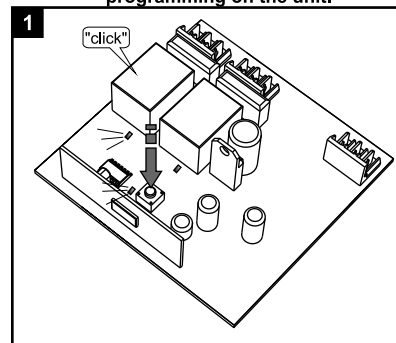
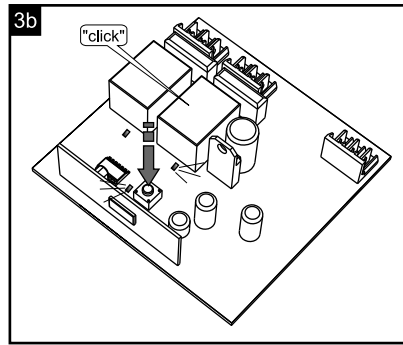
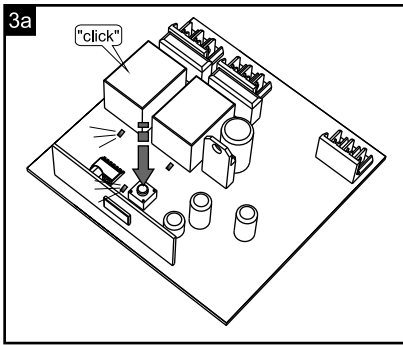


Figure 1. Receiver Feature Locations



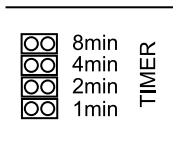
**Warning!** There may be lethal voltages present when this unit is in circuit, therefore always disconnect the relays by unplugging the respective terminal blocks before doing any programming on the unit.





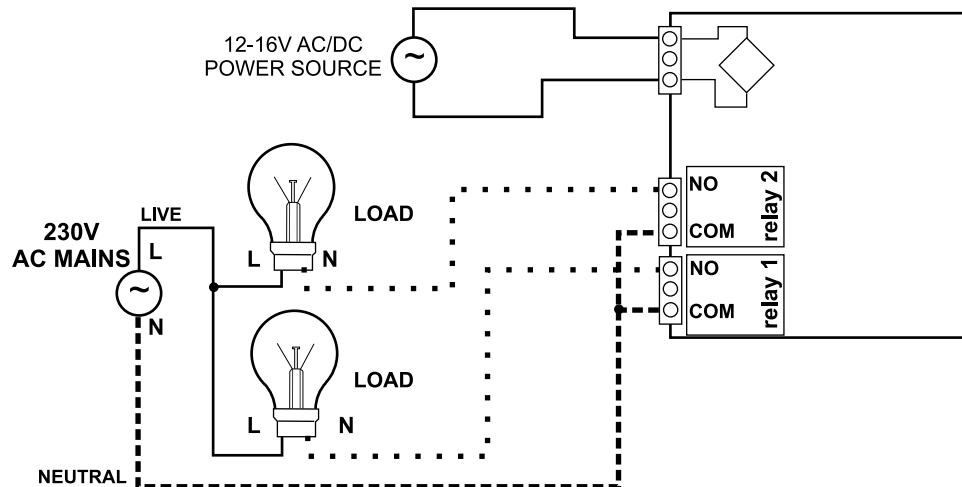
### Setting the Onboard Timer

The onboard Timer can be used with Relay 1 and Relay 2. For the Timer to function correctly, the Relay Function link needs to be on Pulse (see link connection). The Timer has a total time of ~15min. Any combination of links can be used together to create a time. Set the links as follows (TOP RIGHT CORNER):



### ELECTRICAL CONNECTIVITY

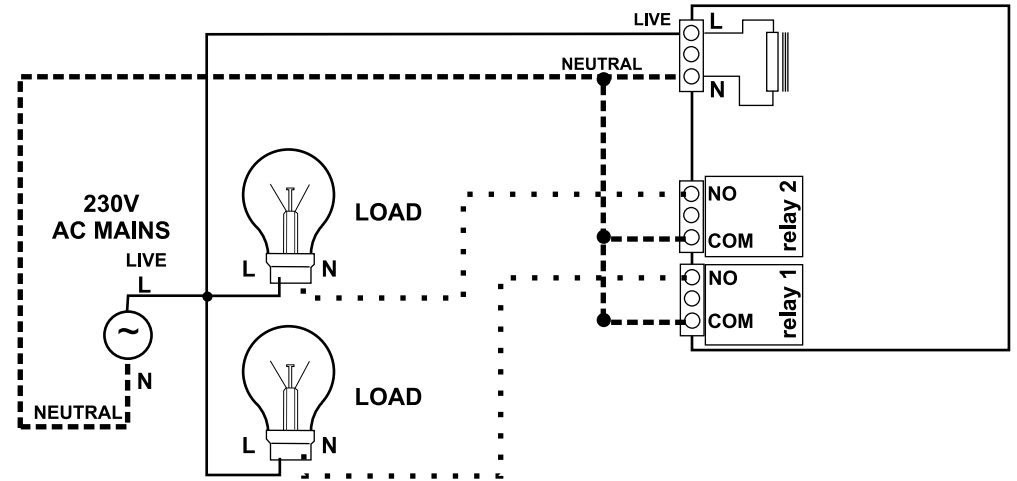
#### Electrical Schematic Diagram - DC Version



**MAKE SURE YOU HAVE THE CORRECT RECEIVER TYPE FOR THE POWER SOURCE YOU INTEND TO USE. USING THE WRONG RECEIVER VERSION ON MAINS POWER WILL DESTROY THE PRODUCT AND LEAD TO PERSONAL INJURY OR FIRE**

### ELECTRICAL CONNECTIVITY

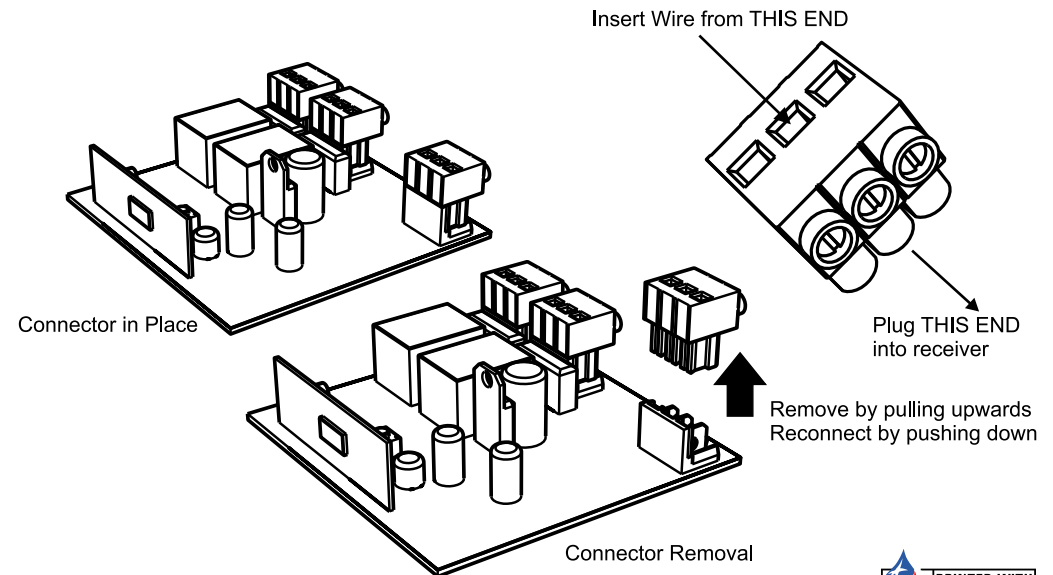
#### Electrical Schematic Diagram - AC Mains Version



**MAKE SURE YOU HAVE THE CORRECT RECEIVER TYPE FOR THE POWER SOURCE YOU INTEND TO USE. USING THE WRONG RECEIVER VERSION ON MAINS POWER WILL DESTROY THE PRODUCT AND LEAD TO PERSONAL INJURY OR FIRE**

### ELECTRICAL TERMINATIONS

This product is supplied with pluggable terminal blocks to make it easy to disconnect and or reconnect the product from an installation if and when necessary, without having to unscrew the wires. The following diagrams illustrate how to use these connectors...



## Using the Tigger Input

### Activating the Input trigger function

To activate the input function you need to learn in a remote button as a third channel on the remote.

To do this follow the steps below:

1. Press the learn button 3 times, both relays should be active.
2. Press the button on the remote you what to activate the input trigger.

The controller will exit programming mode automatically when a code is received.

By learning in a remote button on the third channel, this enables the unit to receive and external trigger. The user can activate or deactivate the input by pressing the remote button.

When the input channel is activated and a trigger is received, the unit will switch on both relays and enable the transmitter(if a transmitter is fitted). The relays will be active for a time duration of approx 2 min. The relays can be deactivated before the 2 min by just pressing the corresponding remote button.

If the user has a four button remote, the fourth button basically becomes an panic button. This activates both relays and the transmitter( if a transmitter is fitted).

Note: the panic button only functions if a remote button is learned into the third channel.

### “Arming” and “Disarming” the input function

1. To activate the input function press the remote button for channel 3 once.  
Both relays will give one short blip.
2. To deactivate the input function press the remote button for channel 3 once.  
Both relays will give two short blips.



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