

# SPI **WARRIOR**

# Mid Power Luminaire Range -Installation Guide

This installation guide provides instructions for installing the WARRIOR MP Highbay/Floodlight series of industrial floodlights.

#### Overview



- Safety Instructions
- Installation
- 3 Maintenance
- 4 Technical Specification
- 5 Trouble Shooting

## Important information

The WARRIOR MP series of industrial floodlights/highbay are specialist devices, for use in specific operating environments.

The units must be installed in accordance with these instructions, and must be installed by suitably qualified personnel.

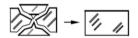
If you have any queries about the installation or the certification of the unit – please contact Raytec for immediate assistance and advice.

#### 1. Safety instructions

- Read this leaflet carefully before commencing to install the WARRIOR unit and retain it for future use. Installation can only be carried out by suitably qualified personnel.
- 2. Check the certification to ensure that the mains supply and the ambient temperature present is suitable for the unit being installed.
- If the WARRIOR unit is to be installed in areas of high vibration, please consult with Raytec.
- 4. Check label on front of floodlight to ascertain type of threaded cable entry on the luminaire. Select suitable cable glands and stopper plugs, these must be parallel thread, have a minium of 5 full thread engagement and be of a medium/fine tolerance to ISO965-1 and ISO965-3. The cable entry devices selected must maintain the IP rating of the luminaire.
- 5. The incoming mains cable should not exceed a temperature rise of 27°C above the ambient conditions: select suitable cable.
- 6. When the unit is installed correctly and in accordance with these installation instructions it will not harm humans or animals
- 7. The light source contained in this luminaire shall only be replaced by the manufacturer or his service agent or a similar qualified person.

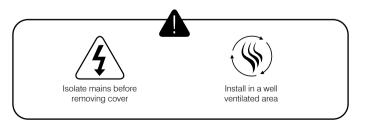
#### Eye Safety:

Caution - EN62471 Risk Group 2 Classification - The luminaire should be positioned so that prolonged staring into the luminaire at a distance closer than 0.230m is not expected



Replace any cracked protective shield.

Order SPX-BKT-MPFL-RL

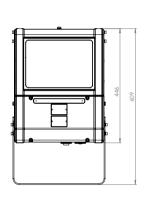


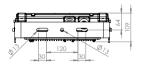
#### 2. Installation

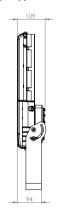
#### Mounting WARRIOR Unit

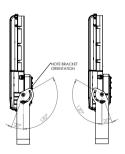
- To meet the requirements of certification a MINIMUM of 2 fixing points must be used, the fixing points must be suitable for the conditions of use.
- 2. The line diagrams below are for guidance only units may be mounted in any orientation

#### Mounting MP WARRIOR Unit - Floodlight Application

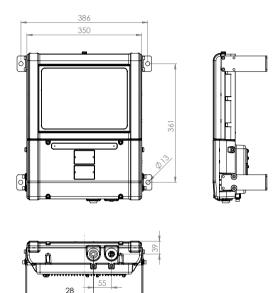






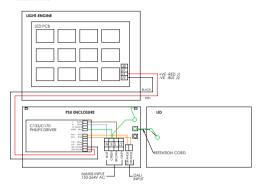


#### Mounting SPARTAN Unit - Highbay Application



#### Typical wiring diagram

#### INDUSTRIAL WIRING



Wire the Mains cable into the terminal block. Provision has been made for this and identified as the E (Earth), L1 (Switched Live), L2 (permanent live) and N (Neutral) terminals. There are two pairs of contacts for each of these to facilitate a mains cable that can be looped in and out of the unit. The L2 terminals on a standard unit are not electrically connected but allows them to be used on the same circuits as *emergency units*.

- Attach mounting brackets as required with M6 screws/washers provided. Tighten to 10Nm. (see Bracket Orientation Diagram)
- 4. Open terminal block enclosure.
- Installer should earth the unit separately an internal and external earth point are provided as standard.
- 6. Connect wires to mains supply.
- If the unit is to be opened for any reason, disconnect mains.
- All WARRIOR floodlights/highbay have terminal blocks suitable for looping 4mm2 cable, only one cable should be connected to each terminal block connection – when incoming cables are installed a creepage and clearance of 5mm and 4mm respectively.
- Ensure no cables are trapped and gasket is seated correctly and replace terminal cover, tighten to 4Nm
- 10. If carrying out Insulation Resistance tests the normal method of insulation testing is to connect Live and Neutral together and test between this point and Earth to prevent the risk of damage to the electronic control gear.

#### 3 Maintenance

- 1. **IMPORTANT.** No modifications are permitted to the unit, all spare parts must be purchased from the manufacturer unauthorized modifications or spare parts will invalidate certification and make the equipment dangerous.
- 2. Isolate the WARRIOR unit from the mains supply and allow to cool before carrying out any maintenance work.
- 3. The unit has one power supply: in the event that a power supply needs to be replaced remove the terminal enclosure cover to get access to the power supply. Remove the power supply from the mains terminals then remove LED wires (white and white with red mark.)
- 4. Disposal of packaging, WARRIOR units and old LED assemblies/power supplies should be carried out in accordance with national regulations.

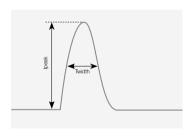
### 4. Troubleshooting

- 1. Ensure the two LED boards are correctly wired to terminal block. White/Red to White/ Red: White to White - paired cables.
- Ensure Mains input is correctly connected. 2.
- 3 Ensure Mains Input is turned on at the source.

# 4. Technical Specification

	60W version	120W version
Input Voltage	150-264V AC	
Input Current (230Vac, full load)	0.26A	0.52A
Consumption	60W	120W
Power Factor (230Vac, full load)	>0.97	
Mains Frequency	50/60Hz	
Inrush Current (Ipeak @50%)	53A, $\Delta t < 300 \mu s$	
Total Harmonic Distortion (230Vac, full load)	≤10%	
IP Rating	IP66/67	
Weight (std)	13.2Kg	13.2Kg
Dimensions	See previous pages for line diagrams	

### **Inrush Current Typical Curve**



MCB Type	Rating	SPI/SPX-MP15K (120W Version)
В	10A	4
В	16A	10
В	20A	12
В	25A	15
С	10A	8
С	16A	16
С	20A	20
С	25A	26



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