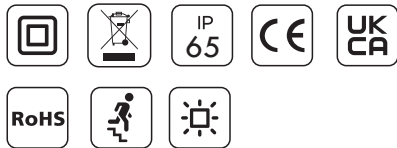


# Installation Instruction

Product Code: EMBULK2SURMT  
Product Description: LED Emergency Bulkhead

## Specification

Charge Power: 4.5W  
Discharge Power: 10W  
EM Duration: 3 hours  
Ambient Temp: 5-45°C  
Emergency Mode: Non-Maintained  
Function: Standard  
Battery: LiFePO<sub>4</sub> 6.4V 6.6Ah  
Warranty: 5 years (battery 2 years)



## Routine Testing

- Testing should be carried out in accordance with the recommendations of BS5266 & EN50172.
1. Do not switch off unswitched mains supply after installation. If interruption is unavoidable, the batteries must be disconnected or damage to the batteries may occur. Leave the luminaire on continuous charge for 24 hours.
  2. A monthly functional test should be conducted manually.
  3. Annually, a full three hour duration test should be conducted manually.
  4. Batteries should be replaced when the luminaire no longer meets the 3 hours duration performance.
  5. Testing is performed by interrupting the unswitched supply for the test duration manually.  
During testing the luminaire should remain illuminated in emergency mode.
  6. Ensure that the 'charge indicator' is 'ON' during 'Charging Mode'.  
If the charge indicator (LED) is unlit, this signifies a fault.
  7. Replace faulty light source and batteries immediately.  
To assist with this testing, a test record is included below.  
To increase the chance of a fault being reported between monthly tests, it is desirable that staff are made aware of the purpose of the indicator.

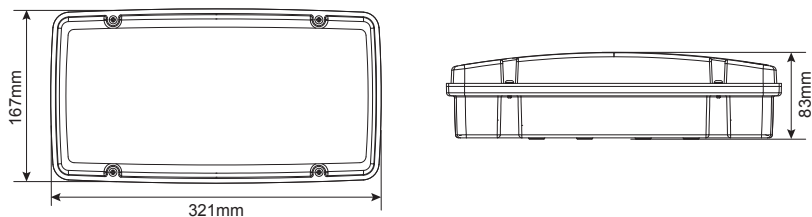
## Testing Record

Product: \_\_\_\_\_ Location: \_\_\_\_\_ Installation Date: \_\_\_\_\_

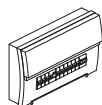
Month	Functional/Duration	Year 1	Year 2	Year 3	Year 4	Year 5
1						
2						
3						
4						
5						
6						
7						
8						
9						
10						
11						
12						

# Installation Instruction

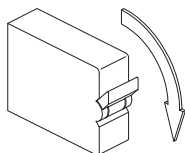
## Dimension



1



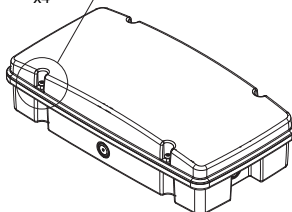
ALWAYS SWITCH OFF THE  
MAINS SUPPLY BEFORE  
INSTALLATION OR SERVICING



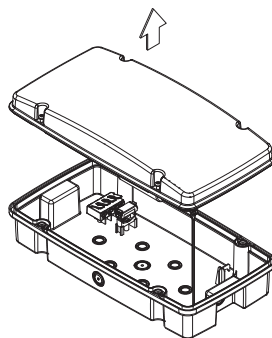
2



x4



3

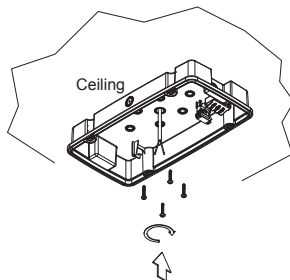


4

**Model A**



Drill hole in base tray

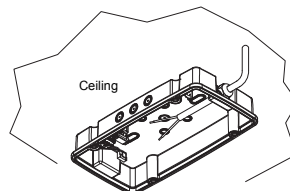


Ceiling

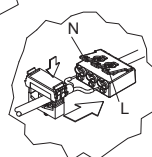
**Model B**



Drill hole in base tray

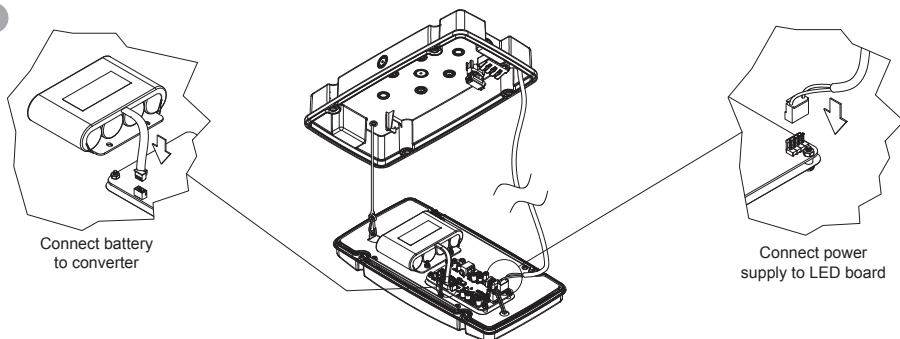


Ceiling

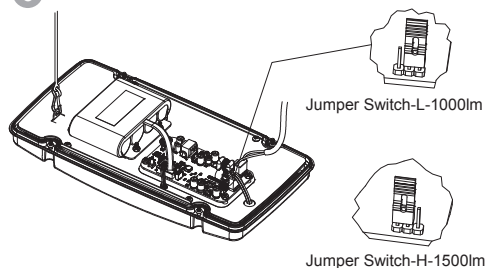


# Installation Instruction

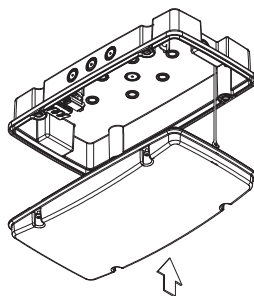
5



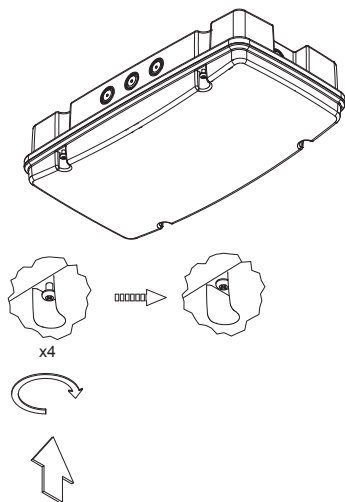
6



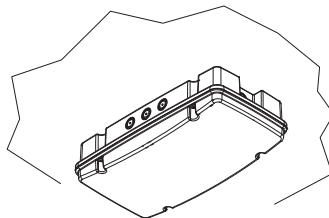
7



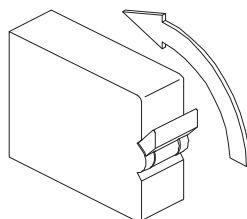
8



9



10



# Installation Instruction

Product Code: EMBULKD2SURST  
Product Description: LED Emergency Bulkhead

## Specification

Charge Power: 4.5W  
Discharge Power: 10W  
EM Duration: 3 hours  
Ambient Temp: 5-45°C  
Emergency Mode: Non-Maintained  
Function: Self Test  
Battery: LiFePO<sub>4</sub> 6.4V 6.6Ah  
Warranty: 5 years (battery 2 years)



## Routine Testing

- Testing should be carried out in accordance with the recommendations of BS5266 & EN50172.
1. Do not switch off unswitched mains supply after installation. If interruption is unavoidable, the batteries must be disconnected or damage to the batteries may occur. Leave the luminaire on continuous charge for 24 hours.
  2. Batteries should be replaced when the luminaire no longer meets the 3 hours duration performance.
  3. Testing is performed by interrupting the unswitched supply for the test duration manually or self-test function complying with IEC62034.  
During testing the luminaire should remain illuminated in emergency mode.
  4. Ensure that the 'charge indicator' is 'ON' during 'Charging Mode'.  
If the charge indicator (LED) is unlit, this signifies a fault.
  5. Replace faulty light source and batteries immediately.  
To assist with this testing, a test record is included below.  
To increase the chance of a fault being reported between monthly tests, it is desirable that staff are made aware of the purpose of the indicator.

## Testing Record

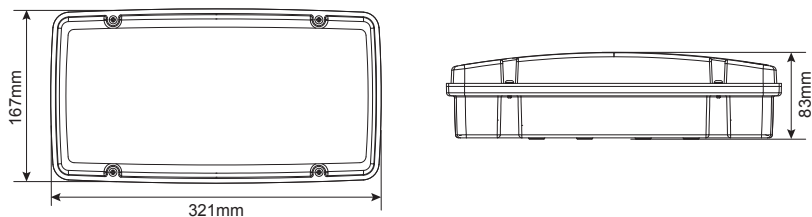
Product: \_\_\_\_\_ Location: \_\_\_\_\_ Installation Date: \_\_\_\_\_

Month	Functional/Duration	Year 1	Year 2	Year 3	Year 4	Year 5
1						
2						
3						
4						
5						
6						
7						
8						
9						
10						
11						
12						

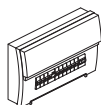


# Installation Instruction

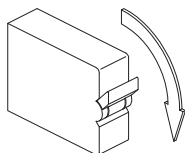
## Dimension



1



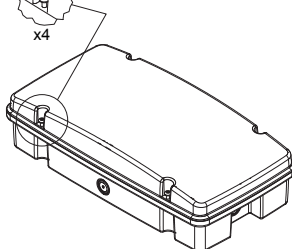
ALWAYS SWITCH OFF THE  
MAINS SUPPLY BEFORE  
INSTALLATION OR SERVICING



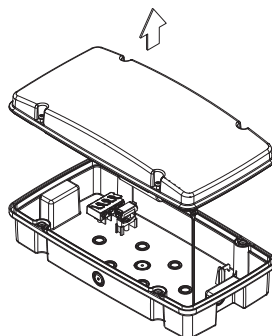
2



x4



3

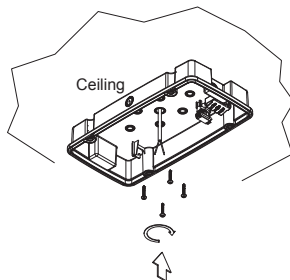


4

**Model A**



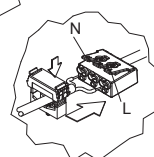
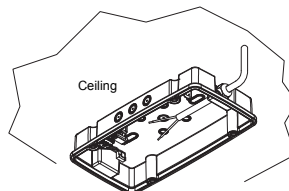
Drill hole in base tray



**Model B**

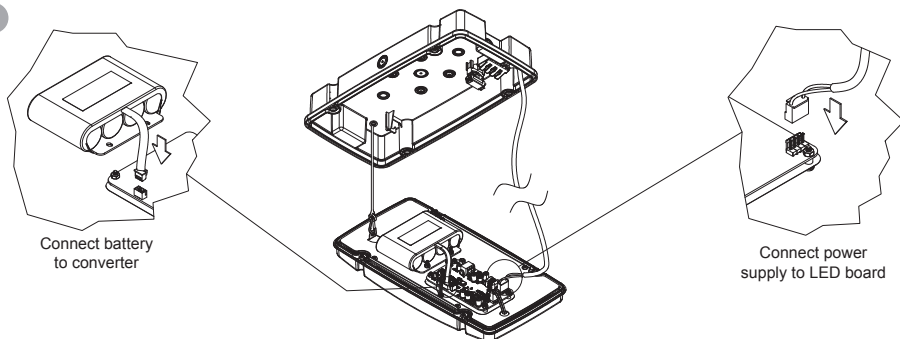


Drill hole in base tray

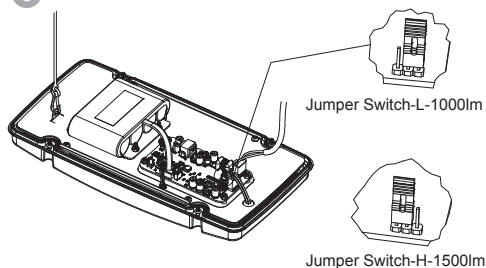


# Installation Instruction

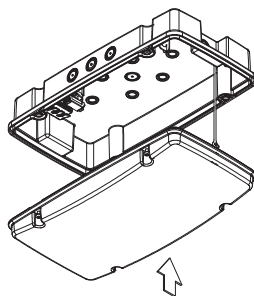
5



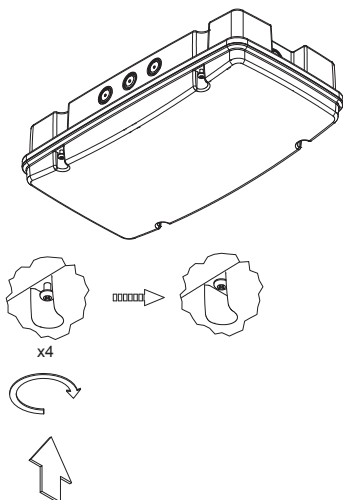
6



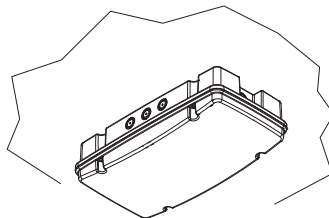
7



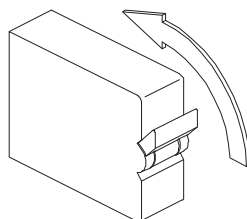
8



9



10



# Specifications for Self Test









## Function Test

The function test is carried out every month for 3 minutes. It will check the connection of battery, battery discharging and the connection of LED module.

## Duration Test

An initial duration test is carried out at first power on, but after 24 hours charging. The yearly duration test is carried out for 3 hours on one day within the 300th day to the 365th day every year. It will also check the connection of battery and LED module.

A bi-colour indicator will indicate the normal and abnormal status. Green is for conditions are normal and red for the faulty conditions.

LED Colour	Status		On Time (Seconds)	Off Time (Seconds)	Description
Green		Permanent on	/	/	Normal status when mains connected
		Slow flash	1s	1s	Duration test running
		Fast flash	0.2s	0.2s	Function test running
		Normal flash three times only	0.5s	0.5s	Time reset
Red		Permanent on	/	/	Battery failure
		Slow flash	1s	1s	Lamp failure
		Fast flash	0.2s	0.2s	Duration failure - the capacity of the battery is not enough
Both Off		Off	/	/	Emergency mode

A test switch is applied for different functions activated manually.

Duration	Function
Press for <2s	Simulate emergency mode
Press for 3-5s	Start duration test manually. The test can be aborted by pressing off (1-2s).
Press for 5-8s	Start Function test manually for 60s. The test can be aborted by pressing off (1-2s).
Press for >10s	Time Reset

**Note:**

When the mains is on, the green indicator will be permanent on. It will check the connection of battery and the connection of LED module. If it is a non-maintained fitting, the connection of LED module no need to be checked. When the mains is off, no test will perform.

The luminaries on which we want to perform the function and duration tests must be connected to the mains supply for at least 24 uninterrupted hours. If the mains is off during these tests, the tests will be postponed for 3 days.

When the fault is corrected, the indicator will only be reset to its normal status after mains reconnected or test switch pressed.

An accuracy of the timing of the test interval is ensured that it has an accuracy of  $\pm 75$  s per week. The timing function will be retained through periods of mains supply failure or interruption for up to 7 days.