

SUPERPROOF PRO

IP67 LED LIGHT

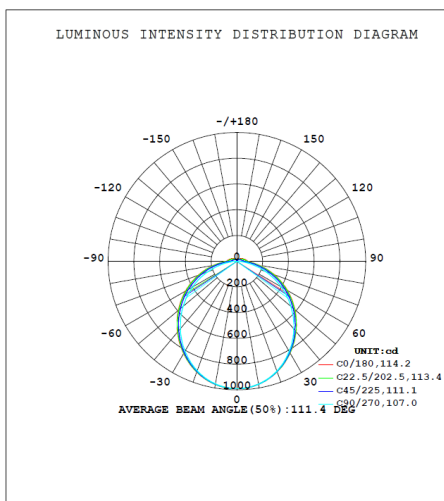


IP67 IK10

Features



Default Factory Configuration

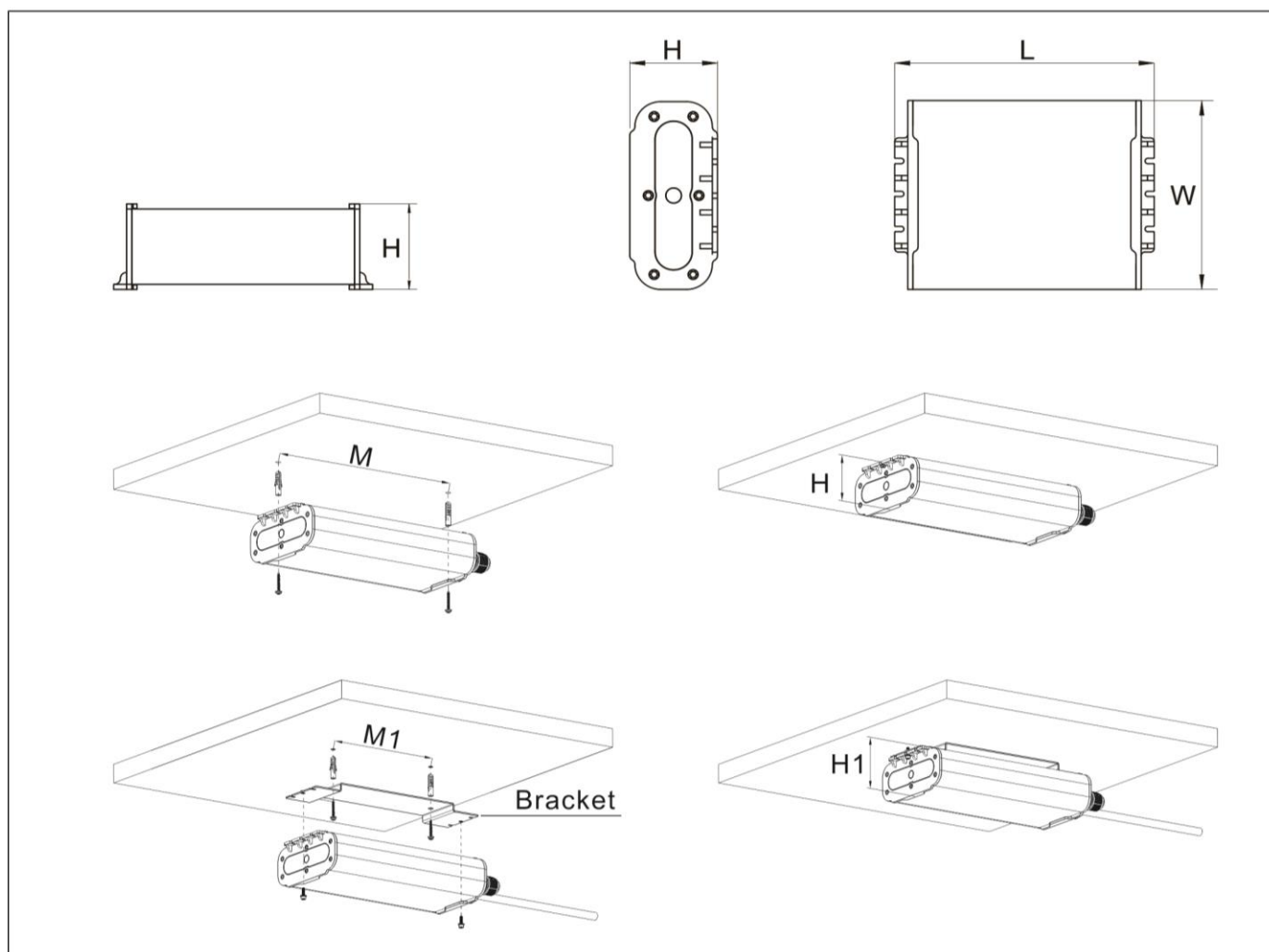


- Ideal for **Platforms, Nacelles, and tower ladders in offshore wind power**, and used as a long-term **working lighting in wet, vibrating corrosive and extreme temperatures'** environments
- Small size, high lumen output **ideal for compact space's lighting**
- Advanced technology allows the lighting to **work well in both normal and emergency mode** in the wide temperature range from **-40°C(-40°F) to +50°C(122°F)**, and the **emergency time is over 90 minutes**
- End cap is made of **thermal conductive Nylon**, and the diffuser is made of high impact resistant **PC**.
- **IEC 60721-3-3 3M5 Vibration resistant.**
- **C5M Anti-corrosion.**
- **IP68 quick connectors** make the **wiring very simple** without opening the casing of the lighting.
- **Battery** can be **easily tested and disconnected without manipulating and opening the casing** of the lighting. With **automatic initial test, monthly test and annual test** functions to minimize the labor cost after installation.
- **IK10 Impact resistant**
- **IP67 Rated, suitable for wet and outdoor applications**

Characteristics

Product name	SPR ST 200	SPR EH 200	SPR ST 300	SPR EH 300
Item No.	LL17H08	LL17J10	LL17H22	LL17J24
GE item No.	448W9577P002 446W9643P002	448W9577P004 448W9577P006 446W9643P004	448W9577P001 446W9643P001	448W9577P003 448W9577P005 448W9577P007 446W9643P003 453W1084P001
Description	Light, LED, Standard, SW/CW	Light, LED , Emergency backup, SW/CW	Light, LED, Standard, SW/CW	Light, LED , Emergency backup, SW/CW
Input voltage	100-277VAC 50/60Hz			
Input power	8W	8W	22W	22W
		10W (Charging)		24W (Charging)
		20W (Charging + Heating)		33W (Charging + Heating)
Nominal current	0.08A	0.08A	0.22A	0.22A
		0.10A		0.24A
		0.20A		0.33A
Operation temp.	-40~55°C			
Survival temp.	-45~60°C			
Lamp type	LED SMD, 4000-6000K			
Normal lumen output	900LM	900LM	3000LM	3000LM
Emergency lumen output	N/A	900LM	N/A	1000LM
Emergency time	N/A	90 Minutes	N/A	90 Minutes
Expected battery life	N/A	7-10 Years	N/A	7-10 Years
Battery full charge	N/A	24 Hours	N/A	24 Hours
Meas. mm [inch]	L200 [7.87] x W150 [5.91] x H69 [2.72] Mounting center: 192 [7.56] / 100 [3.94]		L300 [11.81] xW150 [5.91] x H69 [2.72] Mounting center: 292 [11.50] / 180 [7.09]	

Size and Mounting

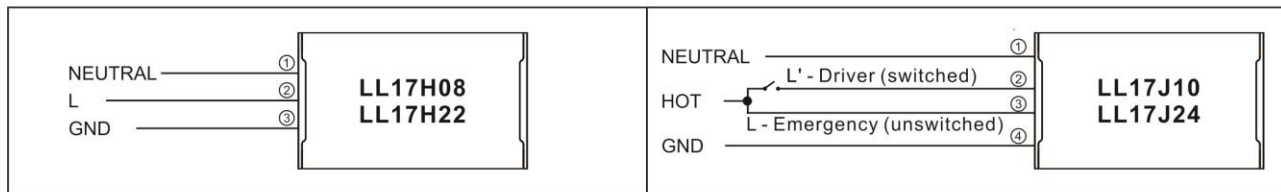


Model	Voltage	Power	Frequency	L	W	H	H1	M	M1	Normal Lumen output	Emergency Lumen output (>90 Minute)	Light Angle
LL17H08	100-277V	8W	50/60Hz	200	150	69	83	190	100	900LM		110°
LL17H22	100-277V	22W	50/60Hz	300	150	69	83	290	180	3000LM		
LL17J10	100-277V	20W	50/60Hz	200	150	69	83	190	100	900LM	900LM	
LL17J24	100-277V	33W	50/60Hz	300	150	69	83	290	180	3000LM	1000LM	

Dimension unit: mm

Tolerance: ± 1 [0.04]

WIRING DIAGRAM



ELECTRIC CONNECTION

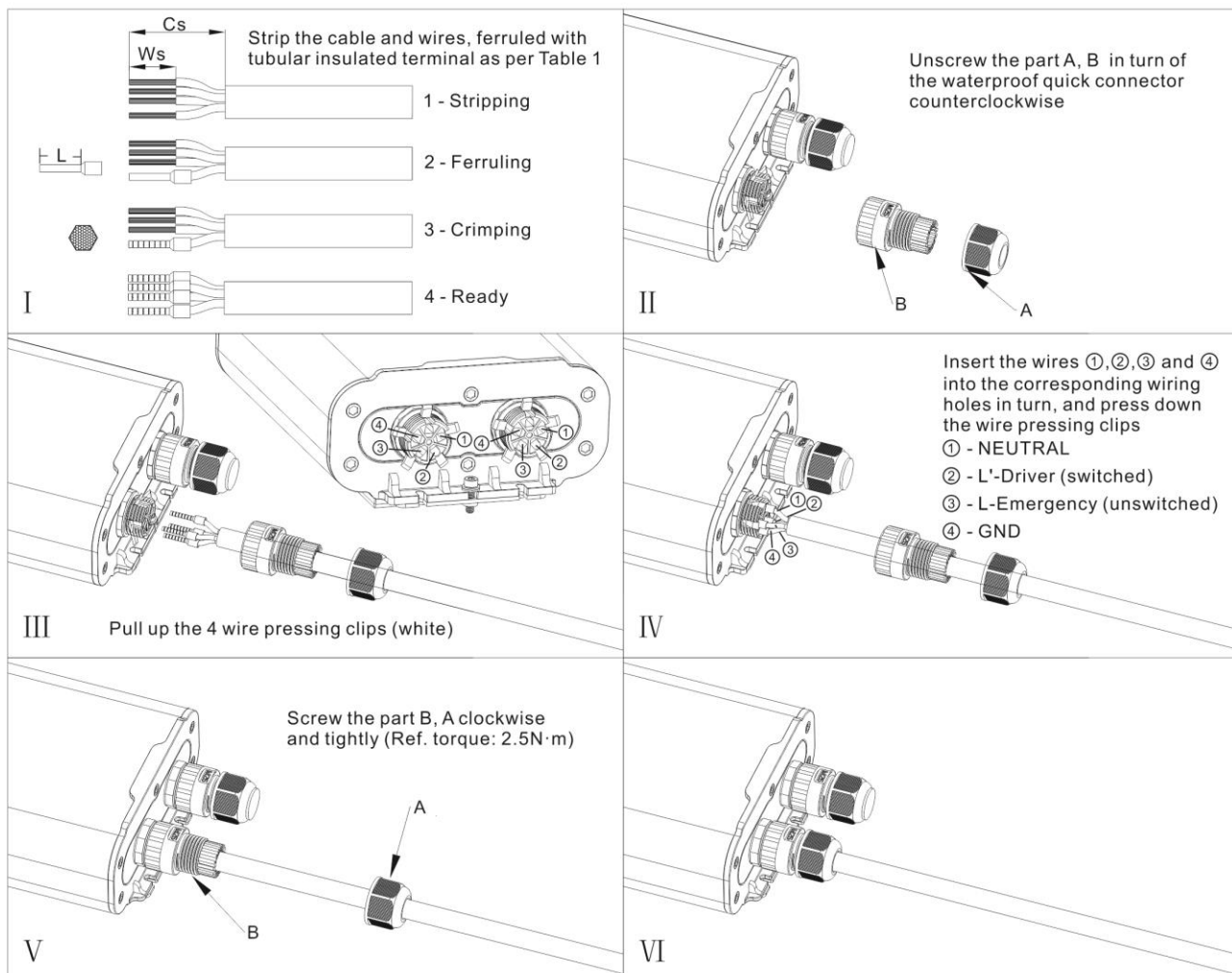
Use VDE or UL approved power cable with the outer diameter from 9mm to 14mm.

Use wire with 1.0-2.5mm² or 14-17AWG for electric connection.

After connection, the conductors shall not be exposed.

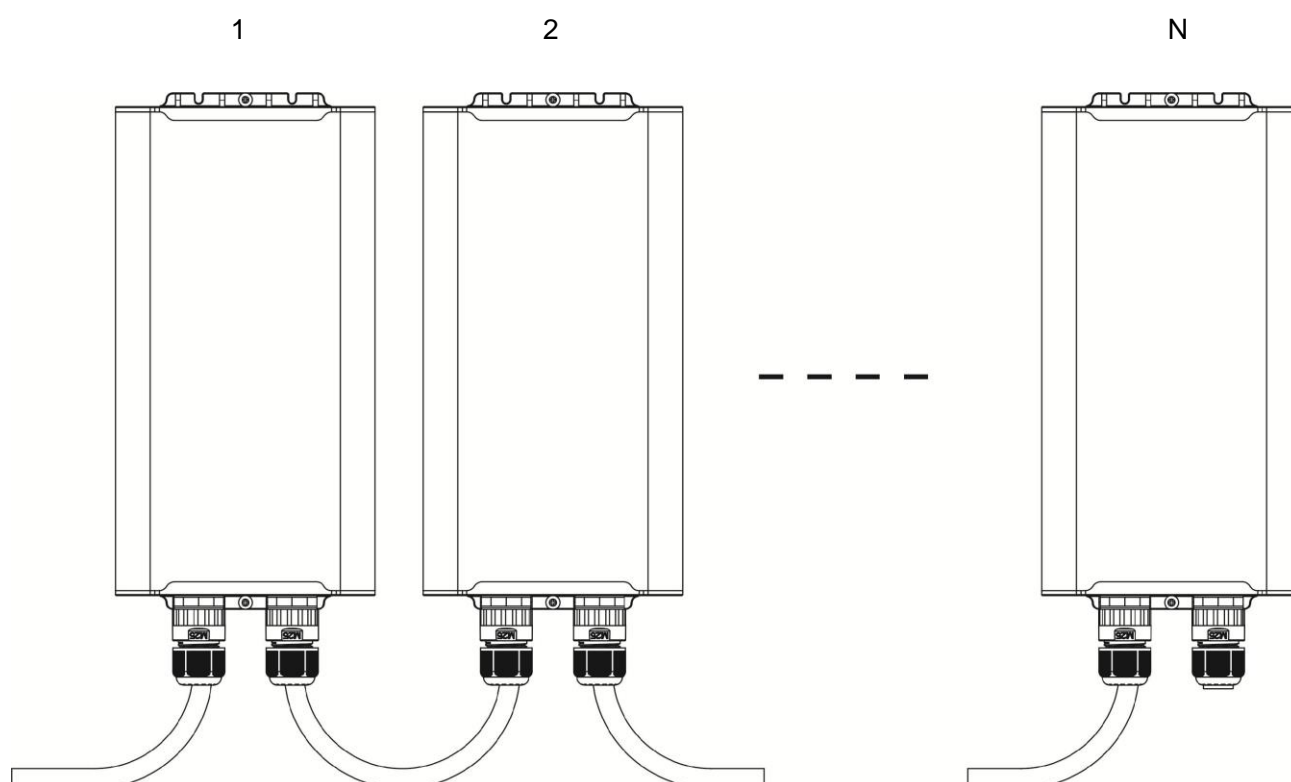
TABLE 1

Wire diameter	Wire type	Cable stripping length (Cs)	Wire stripping length (Ws)	Tubular insulated ferrule
2.5mm ² (14AWG)	Flexible	33-35mm	17-18mm	L=15mm, hexagonal
2.5mm ² (14AWG)	Solid	33-35mm	17-18mm	-
1.5mm ² (16AWG)	Flexible	33-35mm	15-16mm	L=12mm, hexagonal
1.5mm ² (16AWG)	Solid	33-35mm	15-16mm	-
1.0mm ² (17AWG)	Flexible	33-35mm	15-16mm	L=12mm, hexagonal
1.0mm ² (17AWG)	Solid	33-35mm	15-16mm	-



N_{Max.} = LINKABLE QUANTITY (PCS)

Item	Input N _{max.}	4x1.0~4x2.5mm ²			
		100V AC	120 V AC	230 V AC	277 V AC
LL17H08	100	100	110	200	220
LL17H22	35	35	40	75	80
LL17J10	40	40	45	80	85
LL17J24	25	25	25	50	50



Testing & Maintenance

Please find following proper operation and testing procedures for the LED light with emergency backup.

OPERATION

When the AC power is switched on, the lighting is in the normal mode and powered by the mains power. Through the wall switch, you can control the lighting's ON and OFF. The LED test switch (LTS) is illuminated at one of following two states: One is slow blinking, indicating that the battery is being charged; the other is long bright, indicating that the battery has been fully charged. In case of AC power failure, the lighting will switch to emergency mode automatically. At this time, the lighting will be powered by the battery, and the LTS is OFF. When the AC power is restored, the lighting will switch back to normal mode automatically and resume charging the battery.

MANUAL TEST

In the normal mode, we can make following manual tests by LTS:

1. Press the LTS once to force a ten-second emergency test. After ten seconds, the lighting will return to its normal mode automatically.
 2. Press the LTS twice continuously within 3 seconds to force a 60-second monthly test. After 60 seconds, the lighting will return to its normal mode automatically.
 3. When the battery is fully charged, press the LTS 3 times continuously within 3 seconds to force a 90-minute annual test. After 90 minutes, the lighting will return to its normal mode automatically.
- When the lighting is in test mode, the LTS will be in a gradual changing (breathing) state.
During any manual test, press and hold the LTS for over 3 seconds to terminate the manual test.
Please note: Before performing a short emergency manual test, charge the battery for at least one hour.
Before performing a long term emergency test (e.g. a 90-minute annual test), charge the battery for 24 hours.
The charging time for a full discharge is 24 hours.

AUTO TEST

The Auto Test feature enables the lighting to conduct the initial test, monthly test and annual test automatically.

Initial Test - When the lighting is connected properly and powered on, it will perform an initial Auto Test immediately, to check if the battery is well connected.

Monthly Test - The first monthly Auto Test will be performed at 24 hours to 7 days after Initial power on. After that, the monthly Auto Test will be executed every 30 days.

Annual Test - The annual Auto Test will be performed every 52 weeks after first powered on.

LED TEST SWITCH (LTS) CONDITIONS

LTS Slow Blinking: Normal Charging
LTS Long Bright: Battery Fully Charged - Normal Mode
LTS Off: Power Failure
LTS Gradual Change: In Testing Mode
LTS Quick Blinking: Abnormal Condition - Corrective Action Required

