

**Please read carefully: Read through these instructions completely before commencing installation. Retain for future use.**

### 1 Specification

Cat. No.	RGL11	RGLTR60	RGLTR105	RGLTR220
Output Voltage	12 V a.c. ± 5%			
Power VA (Rated Max.)	150	60	105	200
Input voltage	230 -240 V a.c. 50 Hz			
Thermal Overload Protection	Yes - Self Resetting			
Supply Cable	2 Core 1.0 mm <sup>2</sup> Circular Flexible Heavy-Duty Cable, 1.8 m long			
IP Rating	IP56 (Body only)			
Terminal blocks	RGLTR60:	Ø 4.0 mm		
	RGL11, RGLTR105, RGLTR220:	Ø 4.8 mm		

### 2 Steps for Garden Light Configuration

#### STEP 1

##### CHOOSE YOUR LIGHTS

You can add LED and halogen lights on the same cable so you can mix and match.

#### STEP 2

##### CHOOSE A TRANSFORMER

Add up the wattage of the lights you selected, then choose a transformer with a wattage higher than the total wattage of the lights.

#### STEP 3

##### CHOOSE A CABLE

The Accessories section below will help you determine the best cable for your installation.

### 3 Things To Consider Before Installation

- When installing 12V garden lights, a transformer is required to reduce the 240V mains voltage to the extra low voltage (12V) used by HPM D.I.Y. garden lights.
- Transformer selection is simple – just add up the total wattage of the garden lights in your installation and choose the next highest rating for your transformer.

### 3 Things To Consider Before Installation (cont..)

- If mixing halogen and LED globes then follow equation below to determine the right size transformer.  
 $(\text{Number of LED globes} \times \text{Wattage} \times 2) + (\text{Number of halogen globes} \times \text{Wattage}) = \text{total wattage of the required transformer}$
- For example, 10W halogen light + 20W halogen light + 10W halogen light + (3W LED light x 2) + (2W LED light x 2) = 50W. In this case, RGLTR60 can be used.
- For a 60VA transformer, you can use up to 60W of halogen lamps or 30W of LED lamps.
- Always choose a transformer of a higher rating than total load of all lights put together.
- Installing your transformer outdoors - while HPM RGL Series transformers are rated IP56, your powerpoint might not be waterproof. So, if installing outdoors ensure the transformer is mounted in a semi protected area or fit with HPM Aqua Series.
- All HPM RGL series transformers are fitted with "Self Resetting Thermal Overload Protection" which will shut down the system when overheating occurs. Once the unit has cooled, the transformer will automatically restart.
- Do not power ON until all wiring is completed.

## 4 Installation

### STEP 1

Connect the cable to the transformer by stripping back a small amount of insulation from each wire strand (approx. 10mm). Be careful not to damage wires. Twist wire strands to prevent loose wire escaping from terminal and to help ensure a tight joint. Place stripped end into screw terminals on a transformer and secure firmly with a screwdriver.

**Note:** RGLTR220 transformer enables you to install two sets of cable wiring.

### STEP 2

Extend cable and layout in required configuration. Position lights along cable line at desired intervals.

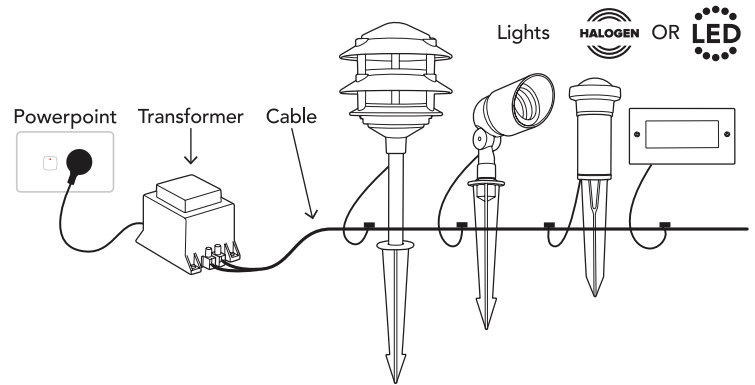
### STEP 3

Connect the garden light that will be positioned the furthest away from the transformer first. Turn ON the power and test that the light is working. Turn OFF the power and connect each of the remaining lights to the cable.

### STEP 4

Before covering the cable, turn ON the power and check that all lights are working. If any lights are flickering or seem dull go back and check that all lamp and cable connections are firm.

## 5 Installation Example



## 6 Troubleshooting

Problems	Explanation	Possible solution
Lights are dim	This occurs with any garden light set-up and is referred to as "Voltage Drop". Each light connected to the cable will reduce in brightness in relation to the number of lights preceding it and by the distance, it is away from the transformer.	<ul style="list-style-type: none"> <li>a. Do not exceed the rating of your transformer.</li> <li>b. Limit the number of lamps on long runs of cable.</li> <li>c. Use the shortest length of cable you can or divide lights evenly using two or more lengths of cable.</li> <li>d. Use thicker cable.</li> </ul>
Transformer Switches off	Possible Cause - excessive current, HPM transformer are fitted with "Self Resetting Thermal Overload Protector" which automatically switches OFF the power supply, if an overload or short circuit occur.	<ul style="list-style-type: none"> <li>a. Reduce the number of lights you have attached to the cable so that it does not exceed the rating of the transformer.</li> <li>b. Check globes, connectors or transformer terminals for any poor connections.</li> </ul>

## 7 Accessories

### Outdoor Garden Cables:

RGL8 (2-core 1.3mm<sup>2</sup>, 10m length)  
 RGL9 (2-core 1.3mm<sup>2</sup>, 20m length)  
 RGLHSC15 (2-core 0.5mm<sup>2</sup>, 15m length)

Compatible products can also be chosen from [HPM webpage](#).

If you have purchased a transformer with build in timer, you can add Automatic switching (PE170/10, PE170R2) and Dusk to Dawn Sensor (DGLS150).

### Connectors:

CDGLCC4 (pack of 4 cable connector)

### Sensor:

(Compatible only with 60VA -200VA transformers)  
 DGLS150 (150W dusk to dawn sensor)

### Spotlights:

GLLEDSSLSS, GLLEDSLBL  
 RGLVSPBL, RGL21, RGLVSBL

### Replacement Globe:

3.5W LED-MR16 (Up to 20W Halogen MR16)  
 3.5W LED-MR16 (Up to 35W Halogen MR16)

## Product Notes

- This product must be installed and used as per these instructions.
- The mounting screws on this product should be tightened to a maximum torque of 0.8 Nm. Over tightening may damage the product.
- This product contains no serviceable parts and no attempt should be made to repair it. If the product is faulty it should be discarded.
- This product is not suitable for installation in hazardous and/or corrosive areas.
- Electrical installations periodically receive transient over-voltages. This product has been designed to minimise the effect of such voltages on connected equipment. It may not give full protection for extreme over-voltage transients such as those resulting from a close lightning strike.
- An IP rating of IP56 is generally considered suitable for fully exposed external installations and for areas subject to hose down.
- Extended exposure to UV rays (such as exposure to direct sunlight) may cause discolouration of this product.
- The material in this product may vary in colour from batch to batch. Colour matching from one batch to another cannot be guaranteed.
- This product utilises intellectual property in the form of registered designs, trademarks, and/or patents. Such intellectual property remains the property of Legrand in all cases.
- Legrand reserves the right to modify the specification of this product at any time.

## Warranty

Legrand warrants this product for a period of 3 years from the date of purchase.

These goods come with guarantees that cannot be excluded under the Australian and New Zealand Consumer Laws. You are entitled to a replacement or a refund for a major failure and for compensation for any other reasonably foreseeable loss or damage. You are also entitled to have the goods repaired if the goods fail to be of acceptable quality and the failure does not amount to a major failure.

See the Warranty card enclosed with this product for further details.

## Customer Service

For all Customer Service and Technical Support please call Monday to Friday during business hours.

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