Half Inch Round LED Rope Light

LED Rope light is a beautiful and versatile way to light any area. Available in full reels or custom cut meter lengths. Full reels range from 6 meters to 45 meters. A variety of accessories are also available, to assist in hanging your rope lights and extending the maximum run length possible.

Available in eleven different colors, listed to the right, LED rope light can help you create the perfect ambiance for any occasion.

<table>
<thead>
<tr>
<th>Color</th>
<th>Multi</th>
<th>Warm White</th>
<th>Neutral White</th>
<th>Daylight White</th>
<th>Red</th>
<th>Green</th>
</tr>
</thead>
<tbody>
<tr>
<td>Part Number - 1 meter</td>
<td>EL 01001</td>
<td>EL 02001</td>
<td>EL 03001</td>
<td>EL 04001</td>
<td>EL 05001</td>
<td>EL 06001</td>
</tr>
<tr>
<td>Part Number - 9m (30 feet)</td>
<td>EL 01020*</td>
<td>EL 02030</td>
<td>EL 03030</td>
<td>EL 04030</td>
<td>EL 05030</td>
<td>EL 06030</td>
</tr>
<tr>
<td>Part Number - 45m (148 feet)</td>
<td>EL 01140*</td>
<td>EL 02150</td>
<td>EL 03150</td>
<td>EL 04150</td>
<td>EL 05150</td>
<td>EL 06150</td>
</tr>
<tr>
<td>Color</td>
<td>Blue</td>
<td>Yellow</td>
<td>Purple</td>
<td>Pink</td>
<td>Orange</td>
<td></td>
</tr>
<tr>
<td>Part Number - 1 meter</td>
<td>EL 07001</td>
<td>EL 08001</td>
<td>EL 09001</td>
<td>EL 10001</td>
<td>EL 11001</td>
<td></td>
</tr>
<tr>
<td>Part Number - 9m (30 feet)</td>
<td>EL 07030</td>
<td>EL 08030</td>
<td>EL 09030</td>
<td>EL 10030</td>
<td>EL 11030</td>
<td></td>
</tr>
<tr>
<td>Part Number - 45m (148 feet)</td>
<td>EL 07150</td>
<td>EL 08150</td>
<td>EL 09150</td>
<td>EL 10150</td>
<td>EL 11150</td>
<td></td>
</tr>
</tbody>
</table>

*Multi-colored reels come in lengths of 1m, 6m (20 feet) and 42m (138 feet) respectively.
## Specifications

Diameter: 0.5” (12.7 mm)
LED Spacing: 1 LED per inch (25.4 mm)
Voltage: 120 VAC
Cut Length: 1 meter
LEDs per Cut Segment: 36

<table>
<thead>
<tr>
<th></th>
<th>Available Lengths (feet)</th>
<th>Power Consumption (Watts per foot)</th>
<th>Maximum Run Length (feet)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Multi</strong></td>
<td>20 or 140</td>
<td>0.48</td>
<td>240</td>
</tr>
<tr>
<td><strong>Warm White, Neutral White, Daylight White</strong></td>
<td>30 or 150</td>
<td>0.52</td>
<td>240</td>
</tr>
<tr>
<td><strong>Red, Yellow, Orange</strong></td>
<td>30 or 150</td>
<td>0.48</td>
<td>360</td>
</tr>
<tr>
<td><strong>Green</strong></td>
<td>30 or 150</td>
<td>0.52</td>
<td>240</td>
</tr>
<tr>
<td><strong>Blue</strong></td>
<td>30 or 150</td>
<td>0.68</td>
<td>240</td>
</tr>
<tr>
<td><strong>Purple</strong></td>
<td>30 or 150</td>
<td>0.68</td>
<td>240</td>
</tr>
<tr>
<td><strong>Pink</strong></td>
<td>30 or 150</td>
<td>0.48</td>
<td>240</td>
</tr>
</tbody>
</table>
Instructions for Use

1. Cutting Rope Light
   a. Cut rope light to the preferred length according to the cutting mark indicated. Make sure to cut between the two wires of the parallel connection, even if the stamped cut mark is slightly off to one side or another.
   b. To avoid short circuiting the rope light, make sure the tin wires inside the rope light are cut neatly. Bend the rope light left and right, then cut off any extra copper wires.
   c. Cover the end of the rope light with an appropriate end cap, seal with silicone adhesive, and tie with a tie strap for insulation. The other end of rope light can be joined to a power cord.

2. Connecting Rope Light
   a. Method 1: Splice Connector
      i. Unscrew the spiral nut and disassemble the splice connector.
      ii. Slip the spiral nut over the rope light.
      iii. Vertically insert pins of the splice connector into the inner wires of the rope light. Make sure pins of slice connector are fully contacted with the tin wires of rope light and inserted all the way.
      iv. Twist spiral nut until firm.
b. Method 2: Housing Clamp
   i. Insert the pins of easy splice connector into the inner wires of the rope light.
   ii. Place the cut-pieces of rope light with easy splice connector in the middle of the housing clamp. Make sure the easy splice connection is in the center channel of the housing clamp.
   iii. Fill the housing clamp with neutral silicone adhesive to cover connection fully to prevent the build-up of moisture.
   iv. Lock together the upper and lower parts of the housing clamp and fasten tightly with screws.

c. Method 3: Power Connector
   i. Put the spiral nut with thread onto one end of the rope light.
   ii. Insert the splice connector pins into the inner wires of the rope light.
   iii. After the insertion is done, tighten the spiral nut.
   iv. Connect the splice connector crimp with the wire connector.
   v. Tighten the spiral nut.

d. Method 4: Housing Clamp (Cord)
   i. Insert the pins of male connector into the inner wires of rope light, then insert the round pins of the male connector into the female part of the power cord.
   ii. Place the rope light connected to the power cord in the middle of the housing clamp. Make sure the male connector is in the center channel of the housing clamp.
   iii. Fill the housing clamp with neutral silicone adhesive to cover the connection fully to prevent the build-up of moisture.
   iv. Lock together upper and lower parts of the housing clamp and fasten tightly with screws.
e. Method 5: Splice and Heat Shrink
   i. Make sure that the rope light is not connected to any electricity, and was cut neatly.
   ii. Insert the male pin connector into the center of the tubes of the rope light. The male pin and the rope light must be straight.
   iii. Place the shrink tube over the rope light.
   iv. Apply glue (around 3 cm or 1 inch from the end of the rope light) to the rope light. Push half of the splice connector into the rope light section, until you can no longer see the pins. Let the glue dry before continuing installation.
   v. Insert the other end of the connector into the second rope light section. Ensure that the ends of the male pin are placed in the center of the tubes.
   vi. Push the shrinkable tube over the rope light and connector and heat. Ensure the glue is firm enough.
   vii. Connectors and joints can only withstand a limited amount of mechanical pressure. Do not stress or bend tightly at the joint.
Installation

1. Tie Strap
   a. Make frame works with steel wire/steel bar according to your design.
   b. Use tie straps to secure rope light onto the wire.
   c. Good for making artwork or highlighting architectural features of a building.

2. Mounting Clip
   a. Fix mounting clips with nails on wooden surfaces, or with glue or double sided tape on smooth metal surface according to your design.
   b. Can be applied on concrete/wooden/smooth metal surface, perfect for big lighting projects.

3. Channel
   a. Fix the channel to a surface.
   b. Press rope light into the channel.
   c. Applicable to straight line decoration.

4. Suction Cup
   a. Fix suction cups on glass surface, or on metal surface with glue.
   b. Use tie straps to fix rope light to the suction cups.
   c. Suitable to be applied on glass surface/window display/smooth metal surface.

5. Steel Net
   a. Sketch your design on paper at actual size.
   b. Put it under the steel net and fix rope light on the net with tie straps according to your drawing.
   c. Good for making artwork and intricate designs.
Cautions

Plugging into Power Source

- Do not plug rope light into power source until installation or alteration has been completed.
- Do not plug rope light into power source until end cap has been securely fixed on the end of rope light.
- Do not plug rope light into power source when it is in rolling/coiling or in packing.
- Make sure the power supply is not greater than the rated voltage of rope light.
- It is recommended to use a fused socket/adaptor to avoid damage caused by overloading.

Connecting

- Only rope light in the same voltage can be connected.
- When connecting cut-pieces of rope light or rope light with power cord, make sure the fellows are deeply and tightly inserted together:
  - Pins of connector and copper wires of rope light.
  - Male connector and female connector.
- The length of rope light connected should not be over the maximum loading length. Refer to table above for specifications.
- It is highly recommended to seal all connections with neutral silicone adhesive to avoid moisture build up.

Cutting

- Rope light can only be cut at the cutting mark.
- To avoid short circuit of rope light, make sure its copper wires are cut neatly.

Using

- Warm up rope light by connecting power before shaping into design. Unplug it while shaping.
- Do not use conducting metal wire to tie rope light.
- Make sure rope light does not come into contact with any flammable material or any material likely to melt or distort.
- Ensure adequate ventilation around rope light, never wrap or install rope light in any enclosure.
- Do not submerge rope light in water.
- When planning your installation, it is recommended to review your plan with a licensed electrician.
Instructions

Please take the following precautions:

1. This equipment, like all electrical equipment, should be installed by a qualified person.
2. Do not expose these LEDs, dimmers or power supplies to intense electro-magnetic fields, including lightning.
3. The controllers and power supplies are not waterproof. Keep them dry.
4. Always observe proper polarity.

When installing LED lighting, it is a good idea to follow this “dry-run” procedure:

1. Be sure you have everything you need before you start.
2. Lay out your lights and power supply on the floor or table.
3. There is some resistance in the LED lighting. If you see any color fading or dimming at the end of a long run, you may have too many LEDs for your power supply and you might need a bigger supply or shorter runs. Use a bus structure as described in rgb_manual.pdf. Call if you need assistance with larger projects.
4. Connect everything and test it to be sure it works and you have it connected properly. It is unlikely, but possible, that some part of your system is defective or was damaged during shipment. If that is the case, it will be very helpful to you to know that before you do all the work involved in installing custom LED lighting systems. You will also know if you damage anything during installation, which is really helpful in trouble-shooting because manufacturing defects and installation damage typically have very different solutions.

Once you have tested the system successfully, you are ready to install it. We recommend you install LEDs, electronic controls and dimmers in such a way that you have access to them in case they fail. All electrical components can fail.