Lightstrings

Tokistar® Lightstrings are a system of sockets wired in parallel and permanently attached to flexible, commercial-grade wire. All-weather construction ensures system reliability and installation integrity for years of continuous operation.

Light sources are replaceable energy-efficient TokiLeds with full-range viewing. Our "smart" Kinetic TokiLeds add animation with random cross-fading, blinking and strobing effects. Kinetic LEDs do not require a controller adding to the system’s cost efficiency.

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LEDs are the perfect choice in high-vibration applications, and create a vibrant display on these colorful floats.

Lightstrings incorporated into ceiling tiles with our panel fasteners create a distinctive canopy of blue TokiLeds.

Replacable light sources include static or Kinetic TokiLeds

Silicone Caps for all-environment protection

Replaceable light sources are soldered and bonded to cables

Parallel wiring allows Lightstring to be cut to size on site

Polycarbonate sockets are soldered and bonded to cables

Cable insulation is flexible PVC

Sockets are permanently sealed to cable with hot melt insulation
Lightstrings

Tokistar Lightstrings are available with a wide range of LEDs and socket spacings, designed to create brilliant, safe and reliable lighting effects for a diverse range of applications.

How to Specify

Select the appropriate cable color, socket spacing and LED for the application. For outdoor applications, include the ordering code for silicone caps.

Specifications

Light Sources include static and Kinetic TokiLeds

Polycarbonate Sockets with flammability rating UL 94V-0

Flexible Conductors are plated #18 AWG

Sockets are soldered and permanently sealed to cable with hot melt insulation

Insulation is flexible PVC with flammability rating UL 94 HB
TokiLeds®

TokiLeds unique phosphor-colored lens reflects light in all directions resulting in full-range viewing. Different LEDs may be combined on the same fixture, including a mix of static and Kinetic TokiLeds.

White TokiLeds do an outstanding job of emulating true incandescent light. Our selection includes a variety of color temperatures and brightness levels.

<table>
<thead>
<tr>
<th>Part Number</th>
<th>LED Color</th>
<th>Watts/Volts</th>
<th>Amps</th>
</tr>
</thead>
<tbody>
<tr>
<td>TLED-LW</td>
<td>2000K White</td>
<td>0.1 W / 8 VDC</td>
<td>12.5 mA</td>
</tr>
<tr>
<td>TLED-WW</td>
<td>2400K White</td>
<td>0.1 W / 8 VDC</td>
<td>12.5 mA</td>
</tr>
<tr>
<td>TLED-IW</td>
<td>3000K White</td>
<td>0.1 W / 8 VDC</td>
<td>12.5 mA</td>
</tr>
<tr>
<td>TLED-WH</td>
<td>6500K White</td>
<td>0.1 W / 8 VDC</td>
<td>12.5 mA</td>
</tr>
<tr>
<td>TLED-LW-HB</td>
<td>2000K White</td>
<td>0.2 W / 8 VDC</td>
<td>25.0 mA</td>
</tr>
<tr>
<td>TLED-WW-HB</td>
<td>2400K White</td>
<td>0.2 W / 8 VDC</td>
<td>25.0 mA</td>
</tr>
<tr>
<td>TLED-IW-HB</td>
<td>3000K White</td>
<td>0.2 W / 8 VDC</td>
<td>25.0 mA</td>
</tr>
<tr>
<td>TLED-WH-HB</td>
<td>6500K White</td>
<td>0.2 W / 8 VDC</td>
<td>25.0 mA</td>
</tr>
<tr>
<td>TLED-LW-UB</td>
<td>2000K White</td>
<td>0.4 W / 8 VDC</td>
<td>50.0 mA</td>
</tr>
<tr>
<td>TLED-WW-UB</td>
<td>2400K White</td>
<td>0.4 W / 8 VDC</td>
<td>50.0 mA</td>
</tr>
<tr>
<td>TLED-IW-UB</td>
<td>3000K White</td>
<td>0.4 W / 8 VDC</td>
<td>50.0 mA</td>
</tr>
<tr>
<td>TLED-WH-UB</td>
<td>6500K White</td>
<td>0.4 W / 8 VDC</td>
<td>50.0 mA</td>
</tr>
<tr>
<td>TLED-AM</td>
<td>Amber</td>
<td>0.1 W / 8 VDC</td>
<td>12.5 mA</td>
</tr>
<tr>
<td>TLED-BL</td>
<td>Blue</td>
<td>0.1 W / 8 VDC</td>
<td>12.5 mA</td>
</tr>
<tr>
<td>TLED-GR</td>
<td>Green</td>
<td>0.1 W / 8 VDC</td>
<td>12.5 mA</td>
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<tr>
<td>TLED-MG</td>
<td>Magenta</td>
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<td>TLED-PL</td>
<td>Purple</td>
<td>0.1 W / 8 VDC</td>
<td>12.5 mA</td>
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<tr>
<td>TLED-RD</td>
<td>Red</td>
<td>0.1 W / 8 VDC</td>
<td>12.5 mA</td>
</tr>
</tbody>
</table>

For twinkling effects, the cycle is 0.5 Hz. Faster scintillating effects have a cycle of 4 Hz.

Kinetic TokiLeds®

Kinetic TokiLeds are smart LEDs with a microchip to create flashing, cross-fading or strobing effects. LEDs operate independently for a totally random effect.

Sizes and Lengths

To minimize voltage drop and keep conductors safely within their rating, do not exceed the maximum lengths shown for each independent fixture.
**Accessories**

Lightstrings are used to create eye-catching displays in trees, and also may be integrated into signs, panels and channel letters. Any combination of LEDs may be used on the same fixture. We offer accessories designed specifically for our product.

**SH-02 Panel Mounting**

Socket spacing is greater than hole spacing to provide a small slack of wire between each socket.

Multiple Lightstrings can be arranged to create animated lighting effects.

**Opt Bouquet**

Opt Bouquet are edge-lit translucent acrylic petals which snap onto Tokistar Lightstring sockets. The petals create a more pronounced light source, making it possible to provide greater impact from more distant spacing. They can be installed in the field or attached at our factory. They work with any color and variety of TokiLeds.

**0/1-10VDC Dim Card**

**Part #: LDR-DIM**

This component is connected to the secondary output of our LED drivers and works from industry-standard 0/1-10VDC dimmers. The output to our fixtures is Pulse Width Modulation (PWM) for flicker-free operation. Two dimmer cards are required when using our dual output LDR8-80 driver.

**Technical Specifications:**

- **Control Voltage:** 0/1-10VDC
- **Input Voltage:** 8VDC
- **Max. Load:** 40 Watts/5 Amps
- **Dimming Ratio:** 1:10,000
- **Weatherability:** Damp Location/IP65
- **Size:** 0.6” x 2.2” x 5.3”
- **Weight:** 55g
- **Operating Temp:** -20°C to 60°C
- **Case Material:** White Polycarbonate
- **Approvals:** UL Listed/CE Certified

Complies with EN55015/FCC Part 15
LED Drivers

Tokistar’s LDR8-40 is a 40 Watt Class 2 LED driver used to convert an AC input into an 8VDC output. It may be operated from a wide range of input voltages and is wet-location listed.

Tokistar’s LDR8-80 is a dual output Class 2 LED driver with two independent 40 Watt outputs. It may be operated from a wide range of input voltages and is wet-location listed.

Specifications

Input Range: 100~240VAC
Frequency Range: 50/60 Hz
Output: 8VDC (Adjustable +10% / -25%)
Max. Output Current: 5.0A
Max. Output Power: 40W
Protection: Overload, Overcurrent, Short Circuit
Operating Temperature: -30ºC to +60ºC

Mechanical Specifications
Dimensions: 3” x 9.75” x 2”
Weight: 1.94 lbs
Enclosure Rating: Nema 3/IP65
Mounting: Flange Mount
Connection: Knockouts for 1/2” Conduit

LED Capacity
0.10 Watt LEDs: 400 each
0.20 Watt LEDs: 200 each
0.27 Watt LEDs: 148 each
0.40 Watt LEDs: 100 each

Specifications

Input Range: 100~240VAC
Frequency Range: 50/60 Hz
Output: 8VDC (Adjustable +5% / -30%)
Max. Output Current: 10.0A (2 @ 5.0A)
Max. Output Power: 80W (2 @ 40W)
Protection: Overload, Overcurrent, Short Circuit
Operating Temperature: -30ºC to +60ºC

Mechanical Specifications
Dimensions: 3.6” x 11” x 2.25”
Weight: 4 lbs
Enclosure Rating: Nema 3/IP65
Mounting: Flange Mount
Connection: Knockouts for 1/2” Conduit

LED Capacity
0.10 Watt LEDs: 800 each
0.20 Watt LEDs: 400 each
0.27 Watt LEDs: 296 each
0.40 Watt LEDs: 200 each

LED Dimmers

LC Dimming System

This proprietary Dimming System provides full-range dimming of Tokileds. The system components connect with CAT5 cable. Up to 25 dimmer packs may be connected in series if the total length of all CAT5 cable does not exceed 165 feet from the wall dimmer to the last dimmer pack. CAT5 cables are included with units.

Part #: LC-DMR
The remote wall dimmer has a rotary dial and on/off switch. Power to the wall dimmer is provided from the LED driver powering the first dimmer pack.

Part #: LC-1CH-DP
Each dimmer pack receives an 8VDC input from an LED driver and sends a PWM output to the fixture. Logic input and output is communicated through CAT5 cable. Dimensions: 1-1/2” x 3-1/2” x 4-1/16”

LC-1CH-Multi System

Tokistar’s LC-1CH-MULTI Dimmer Pack is compatible with industry-standard dimmers working on DMX or 0/1-10VDC protocol. In the manual mode, a preset light level can be set without the use of an external dimmer. In the DMX mode, the dimmer pack is addressable.

Part #: LC-1CH-MULTI
Max. Load: 40 Watts @ 8VDC
Environmental Rating:
Dry Location/IP20
Dimensions: 3/4” x 1-3/4” x 3-1/2”
Weight: 50g / 0.11 lbs
Listing: ETL Listed/CE Certified
Operating Temperature: 0~+50ºC