

EPL-48-2L-LED-VISRED

Explosion Proof LED Lighting - Visible/Red Combination - 4ft 2-Lamp - Class 1, Div. 1 - Blackout

Product ID: 148332

Please see last page for supporting documentation for this product (certificates, CAD files & drawings, IES files, wiring diagrams, etc).



Image: EPL-48-2L-LED-VISRED

Larson Electronics LLC manufactures a wide variety of products, including custom built to spec designs. The pictures displayed for this unit are a general representation of form factor for the product line and may not accurately represent this exact configuration in every detail due to custom builds and changes between similar products in our standard catalog. The specifics for this configuration are listed in the specification table and supporting documentation (CAD files, Dimensional Drawing, Name Plate Diagram, Wiring Diagram, etc.). This means that specific details (receptacles, plugs, wires, connections, mounting brackets, external finishes, etc.) may not be accurately represented in images vs specifications. Please review specifications and do not order based solely on images.

EPL-48-2L-LED-VISRED Explosion Proof

Dimensions: W-11.25" x L-52" x H-8.5 "

Weight: 45 Lbs.

Voltage: Universal 120-277VAC 50/60 Hz or 11-25V AC/DC

Total Watts: 28 watts (White), 24 watts (Red)

Total Lumens: 3,500 (white), 3,000 (red)

LED Lamp Life Expectancy: 50,000+ Hours

Luminous Efficiency: 125 Lumens per Watt

Color Temp: 5600K and 600-675Nm Red

Color Rendering Index: >80

Beam Angle: 150°

Power Efficiency: 90%

Power Factor: >0.95

Ambient Operating Temp Range: -30° C to +85°C

Operating Temp Rating: T6 Rated

Minimum Operating Temp: -30°C

Maximum Case Temp: +90°C

Housing Material: Cast Aluminum End Caps, Aluminum Reflectors - Copper Free

Lens Material: Hardened Borosilicate Glass Tubes

Gasket Material: Buna Rubber O-Rings

Mounting: Surface Standard - Pendant Optional

Wiring Hub: 1/2" NPT

Ratings

Class 1 Division 1, Groups C and D

Class 1 Division 2, Group A,B,C,D

Class 2, Division 1 & 2, Groups E,F,G

NRTL Certified to UL 595 Marine Type (Saltwater)

NRTL Certified to UL 844

NRTL Certified to UL 1598 Marine Type

Listed for Paint Spray Booths

California Title 24 Compliant

IP67 Rated - Waterproof

T6 Temperature Rating

NEMA 4X

LEL Listed LED Lamps

Approved for Confined Spaces

Silicone Free

Factory Sealed Fixture

Made in the USA

Special Orders - Special Requirements

Contact us for special requirements

Toll Free: 1-800-369-6671

Intl: 1-903-270-1187

Fax: 1-903-765-7664

E-mail: sales@larsonelectronics.com

Made in the USA

The Larson Electronics EPL-48-2L-LED-VISRED Explosion Proof LED Light Fixture with Visible and Blackout lamps is NRTL Listed for United States and Canada and rated Class 1 Division 1 & 2 and Class 2 Division 1 and 2 for areas where flammable chemical/petrochemical vapors exist or have the potential to exist. This 4' explosion proof LED light has a T6 temperature rating and carries a paint spray booth light certification, making it ideal for applications such as paint booths, oil rigs, offshore applications, petrochemical, manufacturing, chemical storage, water treatment centers, and food processing plants.

This two foot, two lamp LED fixture is ideal for operators seeking a top quality explosion proof light that will reduce operating costs, improve lighting quality and reduce downtime incurred from frequent servicing intervals. The EPL-48-2L-LED-VISRED is equipped with Larson Electronics' specially designed LED T-series bulbs, with one visible white LED lamp and one blackout red LED lamp with 6 individual LED light strips. Each lamp has individual leads to be powered separately. Our LED-T series bulbs are visibly brighter than standard F17/T8's and have consistently surprised many of our customers with their unexpectedly high light output levels.

This fixture carries a T6 temperature rating and is approved for Class I Division 1, Groups C and D, Class I, Division 2, Group A, B, C and D, and Class II, Division 1 and 2, Groups E, F and G environments where flammable or combustible gases, vapors, dusts, fibers, and flying exist or stand the potential to exist. This LED linear fixture is approved for use in confined spaces. [Click here to read the NEC description for explosion proof and hazardous locations.](#)

We have eliminated the ballast box normally associated with explosion proof fluorescent fixtures which reduces overall weight and overall complexity of installation. There is no ballast in this unit and the included LED lamps have a 50,000+ hour service life, both of which result in extreme efficiency and greatly reduced maintenance costs. These fluorescent LED lamps have internal drivers, eliminating external power components. The solid state design of the LED lamps give this fixture superior resistance to damage from vibration, extremes in temperature and a lamp service life over twice that of standard fluorescent bulbs. This second generation lamp is offered in 5600K cool white for the visible lamp and 600-675nm wavelength red for the blackout lamp.

Unlike the glass tube design of traditional fluorescent lamps, these LED T-Style lamps have no filaments or fragile housings to break during operation. Instead of using a combination of gases to produce light, light emitting diodes (LEDs) use semi-conductive materials that illuminate when electric current applied and emitting light. The LED assembly is mounted to the "tube" constructed from extruded aluminum, with a polycarbonate lens protecting the LEDs. With LED lights, there is no warm up time or cool down time before re-striking and provide instant illumination when powered on, adding to the reliability of LED technology. By nature, LED light sources run significantly cooler than fluorescent lamps, reducing the chance of accidental burns and increased temperatures due to heat emissions. This solid state design of light emitting diodes provides a more reliable, stable, durable, and energy efficient light source over traditional fluorescent lighting.

These LED lamps produce 30% more illumination than standard T8 bulbs while offering lower amp draw and increased reliability. The visible white lamp produces 3,500 lumens at 125 lumens

per watt. This LED light, with a total of 28 watts, draws only 0.23 amps at 120 volts AC. The EPL-48-2L-LED is universal voltage, not multi-tap, and operates on any voltage from 120V to 277V AC 50/60hz without any modifications. We also make a 12/24V AC/DC version for low voltage applications for AC or DC power.

Energy Consumption Comparison

	<u>T5HO</u>	<u>T8</u>	<u>LED</u>
Wattage	48 watts	34 watts	28 watts
Amp Draw @ 120V AC	0.40 amps	0.29 amps	0.23 amps
Amp Draw @ 220V AC	0.22 amps	0.16 amps	0.13 amps
Amp Draw @ 240V AC	0.20 amps	0.14 amps	0.12 amps
Amp Draw @ 277V AC	0.18 amps	0.13 amps	0.10 amps
Amp Draw @ 12V DC	4 amps	2.84 amps	2.34 amps
Amp Draw @ 24V DC	2 amps	1.42 amps	1.17 amps
Lamp Life Expectancy	20,000 hours	24,000 hours	50,000 hours
Operation cost per year (12hs/day @ 12c/kWh)	\$25.23	\$14.87	\$14.72

Our EPL-48-2L-LED-VISRED LED light fixture is NRTL Listed for United States and Canada and approved for use in paint spray booths. Please note, according to the NEC, using threaded rigid pipe does not require additional seal offs with this fixture. An EYM and seal off is necessary for flex conduit or other non-rigid pipe implementations.

Mounting Options: Unless otherwise specified, our standard, most popular configuration is the bracket end mounting shown enlarged below. We also offer a pendant mount for those needing to suspend the fixture away from the ceiling surface (i.e. suspend from pipe or conduit). Additional mounting configurations can be customized to meet the requirements on the application. Please contact us for special mounting configurations.



Surface Mount (Standard)



[Click Photo to Enlarge](#)



[Click Photo to Enlarge](#)



[Click Photo to Enlarge](#)

Adjustable Surface Mount Brackets: Each bracket is cinched to the bracket mounting peg on each side of the light. The angle of the bracket is set by tightening two cap screws on either side of the bracket. The cap screws act as a set screw. The bracket itself is mounted via a single bolt hole at the top the bracket. There are two brackets, one on each end of the light. Once the brackets are mounted to a surface (ceiling, floor or wall), the light fixture can be removed from the brackets by loosening the cap screws that hold the bracket to the mounting peg.



Pendant Mount (Optional)



[Click Photo to Enlarge](#)

3 Conduit Positions



[Click Photo to Enlarge](#)

Suspension Mounting: Pendant mount fixtures hang from the ceiling and are suspended by rigid pipe. Each fixture features a 1/2" NPT junction box on one end, and a 1/2" NPT adjustable L-bracket on the other end of the fixture. Operators bring rigid pipe down to the threaded mounting hubs. Wiring is fed down through the rigid pipe to the junction box and tied in to the fixture's lead wires, completing the electrical connection. The adjustable L-shape mounting bracket provides support for the opposite end of the fixture.

Suggested Applications: Paint spray booths, aircraft maintenance, oil drilling rigs, refineries, solvent and cleaning areas, gas processing plants, chemical manufacturing, waste treatment plants, gas processing plants.

Made in USA Quality

1. Each unit dialectically tested.
2. Fixture arrives assembled and lamped to reduce installation time and cost. Adjustable mounting brackets enable the operator to choose any mounting angle for the fixture.
3. Fixture constructed of extruded corrosion resistant copper free aluminum alloy
4. No ballast box. No ballast to replace. We simply run the black wire to one end of the bulb and white wire to the other.
5. Heavy gauge extruded aluminum reflectors with high gloss reflective finish. Resists dents and corrosion.
6. A wrench is used to unscrew the end caps for re-lamping the fixture, while some competitive models require the "tap

Superior LED Benefits

1. 50,000 hour lifespan.
2. Can SAVE 50% or more on energy.
3. Qualifies retrofit projects for financial incentives, including utility rebates, tax credits and energy loan programs.
4. Reduces energy use and prolongs life-spans of peripheral cooling units (A/C, refrigeration)
5. 100% recyclable.
6. No toxins-lead, mercury.
7. No UV light, infrared radiation or CO2 emissions.
8. Qualifies buildings for LEED and other sustainable business certifications.
9. Bright, even light maintains consistent color over time.



and knock off" method to loosen the end cap.

7. Explosion proof, impact and heat resistant Pyrex tubes provide lamp protection.

8. Spring loaded sockets on both ends hold lamps firmly for maximum shock and vibration protection.

9. Lighter weight, slimmer, brighter alternative to fluorescent configurations

10. Instant on/off – No flickering, delays or buzzing.

11. Very good color rendering.

12. Vibration/impact resistant.

13. Significantly cooler operation.

14. Less frequent outages, higher output improves workplace safety.



Frequently Asked Questions (FAQ)

There are no Faqs



Image: EPL-48-2L-LED-VISRED

EPL-48-2L-LED-VISRED

Product ID: 148332

Harmonized System (HS) Code: 9405.41.84.10

Export Control Classification Number (ECCN): EAR99

Options:

EPL-48-2L-LED-VISRED-Mount-Voltage

Example: EPL-48-2L-LED-VISRED-SFC-1227

Mount		Voltage	
SURFACE	-SFC	120-277VAC	-1227
PENDANT	-PND	12VDC/24VDC	-1224

Links (Click on the below items to view):

- **Canadian CEC Certificate (Commonly referred to as CSA Certificate)**(<https://www.larsonelectronics.com/images/product/CECCert/148332.PDF>)
- **MSDS (Material Safety Data Sheet)**(<https://www.larsonelectronics.com/images/product/Msds/148332.PDF>)
- **SpecSheetFrench**(<https://www.larsonelectronics.com/images/product/SpecSheetFrench/148332.PDF>)
- **SpecSheetRussian**(<https://www.larsonelectronics.com/images/product/SpecSheetRussian/148332.PDF>)
- **SpecSheetSpanish**(<https://www.larsonelectronics.com/images/product/SpecSheetSpanish/148332.PDF>)
- **USA NEC Certificate (Commonly referred to as UL Certificate)**(<https://www.larsonelectronics.com/images/product/NECCert/148332.PDF>)
- **HigResPic1**(<https://www.larsonelectronics.com/images/product/HigResPic1/148332.JPG>)
- **HigResPic2**(<https://www.larsonelectronics.com/images/product/HigResPic2/148332.JPG>)
- **Video1**(<https://www.youtube.com/watch?v=ZseBiwS7iMI>)
- **ISO 9001 Certification**(<http://larsonelectronics.com/images/pdfdocs/ISO9001.PDF>)
- **Business Certificate**(<https://www.larsonelectronics.com/images/pdfdocs/w9.PDF>)
- **Shipping Time Map**(<https://www.larsonelectronics.com/images/product/ShippingTimeMap/ShippingTimeMap.pdf>)