Larson Electronics LLC
9419 E US HWY 175, Kemp, TX 75143
Phone: 800.369.6671

www.LarsonElectronics.com
Email: sales@LarsonElectronics.com
Fax: 903.498.3364

EPL-24-2L-LED

Explosion Proof Paint Spray Booth LED Lighting - 2 Foot, 2 Lamp Fixture - Class 1, Div. 1

Product ID: 47225

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



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-24-2L-LED Explosion Proof
NRTL Listed for United States & Canada
Dimensions: 11.25"-W x 27.5"-L x 8.5"-H
Weight: 32 Lbs.
Voltage: Universal 120-277VAC 50/60 Hz or 11-25V AC/DC
Total Watts: 28 watts
Total Lumens: 3,500
LED Lamp Life Expectancy: 50,000+ Hours
Luminous Efficiency: 125 Lumens per Watt
Color Temp: 5600K, 4500K, 3000K

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
Certified Canadian Standards
Listed for Paint Spray Booths
California Title 24 Compliant

IP67 Rated - Waterproof

T6 Temperature Rating

NEMA 4X

LEL Listed LED Lamps
Approved for Confined Spares
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: 1-903-498-3364

E-mail: sales@larsonelectronics.com

Made in the USA

The Larson Electronics EPL-24-2L-LED Explosion Proof LED Light Fixture is NRTL Listed for United States and Canada 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 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-24-2L-LED is equipped with Larson Electronics' specially designed LED T-series bulbs which produce 3,500 lumens, resulting in 30% more foot candles of illumination at 8 feet as compared to standard T8 lamps when measured with an Extech light meter. 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.



Click Photo to Enlarge



Click Photo to Enlarge



Click Photo to Enlarge

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 LEDT8-24-V1 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, 4500K natural white, and 3000K warm white. Our standard unit ships with 5600K unless different color temperature is specified.

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.
The 14 watt LED lamps produce 30% more illumination than standard T8 bulbs while offering lower amp draw and increased reliability. Each lamp produces 1,750 lumens at 125 lumens per watt, for a combined 3,500 total lumen light output. An EPL-24-2L-T8 explosion proof fluorescent light, with a combined total of 34 watts, draws 0.29 amps at 120 volts AC. This LED version of the same 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

	T5HO	T8	LED
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-24-2L-LED LED light fixture is NRTL Listed for United States and Canada 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.

Larson Electronics LLC
9419 E US HWY 175, Kemp, TX 75143
Phone: 800.369.6671

www.LarsonElectronics.com
Email: sales@LarsonElectronics.com
Fax: 903.498.3364



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 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

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.
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.

Larson Electronics LLC
9419 E US HWY 175, Kemp, TX 75143
Phone: 800.369.6671

www.LarsonElectronics.com
Email: sales@LarsonElectronics.com
Fax: 903.498.3364

Frequently Asked Questions (FAQ)



Larson Electronics LLC
9419 E US HWY 175, Kemp, TX 75143
Phone: 800.369.6671

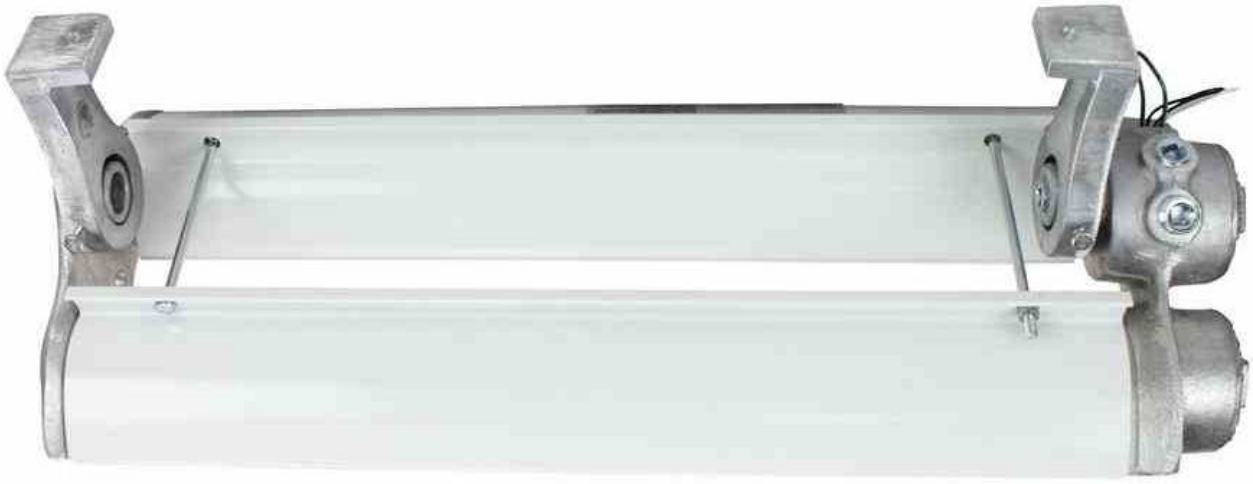
www.LarsonElectronics.com
Email: sales@LarsonElectronics.com
Fax: 903.498.3364



Larson Electronics LLC
9419 E US HWY 175, Kemp, TX 75143
Phone: 800.369.6671

www.LarsonElectronics.com
Email: sales@LarsonElectronics.com
Fax: 903.498.3364





Larson Electronics LLC
9419 E US HWY 175, Kemp, TX 75143
Phone: 800.369.6671

www.LarsonElectronics.com
Email: sales@LarsonElectronics.com
Fax: 903.498.3364

EPL-24-2L-LED

Product ID: 47225

Harmonized System (HS) Code: 9405.41.84.10

Export Control Classification Number (ECCN): EAR99

Options:

EPL-24-2L-LED-Mounting Type-Voltage-Color Temp

Example: EPL-24-2L-LED-SFC-1227-56K

Mounting Type	
SURFACE	-SFC
PENDANT	-PND

Voltage	
120-277V AC	-1227
11-25V AC/DC	-1224

Color Temp	
5600K	-56K
4500K	-45K
3500K	-35K

Links (Click on the below items to view):

- Canadian CEC Certificate (Commonly referred to as CSA Certificate)
- Dimensional Drawing 2D
- IES (Photometric File)
- MSDS (Material Safety Data Sheet
- Operations Manual
- Solidworks EASM File
- SpecSheetArabic
- SpecSheetFarsi
- SpecSheetFrench
- SpecSheetRussian
- SpecSheetSpanish
- Spectrum Curve (Wavelength Graph)
- STEP File (3D CAD Model)
- USA NEC Certificate (Commonly referred to as UL Certificate)
- Wiring Diagram (Oneline)
- HigResPic1
- HigResPic2
- HigResPic3
- HigResPic4
- HigResPic5
- Video1
- Video2
- Video3
- ISO 9001 Certification
- Business Certificate
- Shipping Time Map