

# Installation and Operation Instructions

# Product: ELSMX-C1D1 – LED Edge Lit Exit Sign – Explosion Proof – Class 1 Division 1

Thank you for choosing our lighting product. To ensure safe use, please take a moment to carefully read these instructions. We also recommend keeping this manual for future reference.

## Important Safety Information:

- The Emergency Exit Sign must only be connected to a power source with an output voltage of AC100-277V and a frequency of 50/60Hz.
- Do not dismantle, modify, or replace any internal electronic components. If you need assistance, please reach out to us directly.
- Always disconnect the power supply before performing installation, maintenance, or any work that involves direct contact with the light.
- Avoid installing the lights on surfaces that are easily damaged.
- Under no circumstances should this light be covered with any insulation material.
- This product is designed for use in wet locations. Do not touch the light while it is in use.
- Maintenance should only be conducted by certified electricians.

## 1. General Overview

This LED emergency exit sign is designed to be explosion-proof, with the following electrical specifications:

- Voltage: 100-277Vac, 50/60Hz, 5W
- Input Voltage: AC100-277V, 50/60Hz
- Maximum Power: 5W



The ELSMX-C1D1 exit sign is suitable for installation in the following locations:

- Class I, Division 1, Groups B, C, D
- Class I, Division 2, Groups A, B, C, D
- Class II, Division 1, Groups E, F, G
- Class II, Division 2, Groups F, G
- Class III

Operating temperature range: 14°F to +140°F, T6 rating

Construction Details This emergency exit sign is both explosion-proof and dust-ignition proof,

primarily composed of ADC12 aluminum alloy explosion-proof enclosures, a PCB power board, a light

panel, tempered glass, and other essential components.

## **Standards Compliance:**

This product meets UL 924 and UL 844 standards.

The label is depicted below:





## 2. Safety Installation Instructions

## On-Site Installation

These guidelines provide specialized installation instructions tailored for users and installers, focusing on the deployment of the exit sign in hazardous locations. Installation should be carried out by a qualified electrician. Ensure that all supply connections are made using the 3/4" NPT conduit opening and verify the correct conduit size before proceeding with the wiring system installation.

## Installation and Mounting

The wiring system and method for making supply connections must be appropriate for the specific hazardous locations, in compliance with the National Electrical Code (NEC) and the Canadian Electrical Code (CEC).

## Height Adjustment and Parameter Settings

The fixture should be installed at a minimum height of 2 meters (6 feet). To ensure proper heat dissipation, avoid installing the fixture below this height.

#### Connecting to Power

Connect the exit sign to an AC 100-277V, 50/60Hz power source. It is designed for use in the following classifications: Class I, Division 1, Groups B, C, D; Class I, Division 2, Groups A, B, C, D; Class II, Division 1, Groups E, F, G; Class II, Division 2, Groups F, G; and Class III. After installation, turn on the power to test the unit before placing it into continuous operation.

#### • Maintenance

It is recommended to clean the fixtures every 6 months to ensure optimal performance.

## **Indicator Light**

The exit sign includes a red indicator light that will illuminate when the battery is charged to 80-100% capacity.

## **Magnetic Test Switch**

Regularly check the emergency power and battery capacity of the fixture within the specified intervals to ensure the emergency function operates correctly. If abnormalities are detected or the emergency duration is insufficient, contact your local agent or manufacturer. To test: place the magnetic ring included with the product into the glass area of the magnetron test switch chamber. If the lamp flashes off and then back on within 1-3 seconds and the lighting duration is normal, the system is  $Page \mid 3$ 



functioning correctly. If there is no response or the lighting time is insufficient, there may be an issue. Note: The magnetic ring is provided with additional accessories.

## Assembly and Removal of the Unit

For easier packing, the accessories are provided separately. Installers should carefully review the instructions before beginning assembly. If you have any questions, please don't hesitate to contact us.

It is crucial to disconnect the power supply before removing the exit sign. The removal process must be conducted by a qualified electrician. Ensure the power is off for at least 5 minutes before starting the removal.

## • Safety Training Instructions

For wiring instructions, please refer to the detailed installation guide below. Typically, the black wire connects to the live wire, the white wire to the neutral, and the green wire with yellow stripes to the ground.

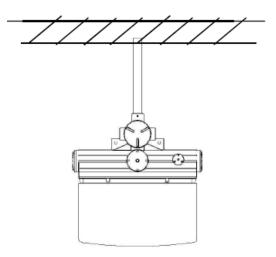
#### • Contents of the Package

Item	Qty
LED Edge Lit Exit Sign	1
Mounting Accessories	1 (bracket)
Installation Instructions	1
Expanded Screws	4 (M12x30)
Magnetic Ring	1



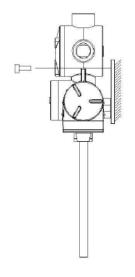
## 3. Installation Processes

- Rigid Metal Conduit Mounting (Conduit Not Included)
  - Step 1 Select a rigid metal conduit that fits the conduit opening on the light. Once selected, thread and securely tighten the conduit to the light fixture.
  - Step 2 Proceed with the wiring connections. Typically, the black wire connects to the live wire, the white wire connects to the neutral wire, and the green wire with a yellow stripe connects to the ground wire.
  - **Step 3 -** Secure the rigid metal conduit to the mounting surface. After installation, ensure the light is powered and functioning correctly.



## Wall Mounting

- Step 1 Ensure the wall is strong enough to support the fixture. Using the metal brackets as a guide, measure and mark the wall where the fixture will be mounted.
- Step 2 Before mounting and securing the fixture, connect the wiring. Typically, the black wire connects to the live wire, the white wire to the neutral wire, and the green wire with a yellow stripe to the ground wire.
- **Step 3 –** Use the supplied screws to mount the fixture to the wall.
- **Step 4 -** Finally, verify that the light is powered on and functioning correctly.





- Pendant and Chain Mounting (Pendant Not Included)
  - Step 1 Ensure the ceiling is strong enough to support the hanging fixture.
  - Step 2 Select a rigid metal conduit that fits the conduit opening on the light. Once selected, thread and securely tighten the conduit to the light fixture.
  - Step 3 Ensure the fixture is stable and secured via pendant mount and chains for extra security measure.
  - Step 4 Proceed with wiring connections. Typically, the black wire connects to the live wire, the white wire to the neutral wire, and the green wire with a yellow stripe to the ground wire.
  - Step 5 Finally, verify that the light is powered on and functioning correctly.

