

VESDA-E VEA UL POWER SUPPLIES

VPS-VEA-115UL & VPS-VEA-230UL



The VESDA-E VEA Power Supplies are capable of providing operating power for the VESDA-E VEA detector including battery backup. It provides 24 volt operating power to the VEA unit as well as battery charging function that supervises and maintains the standby batteries.

Installation

The VESDA-E VEA Power Supplies are designed to power the VESDA-E VEA Detector and VESDA-E VEA Relay StaX. Depending on the model number they convert 120VAC or 230VAC input to 24VDC nominal output. These power supplies are intended for use in applications requiring UL and ULC for fire protection signalling.

The units must be installed in accordance with the National Electric Code (NEC), the National Fire Code (NFPA72), and all other applicable local codes necessary for compliance with the local authority having jurisdiction.

Space is provided in the VPS-VEA-115UL and VPS-VEA-230UL power supply cabinet for up to two 36AH batteries. For a larger standby capacity, use additional battery enclosures as per local electrical and fire codes.

Refer to Installation Instructions for VEA Power Supplies (Document 29843) for detailed installation instructions.

Fault Reporting

A Power Supply Fault indicator is provided via a dry relay contact (Form C), which changes state due to the following conditions:

- AC input loss
- Low AC input voltage (Brown-out)
- Loss of battery voltage
- A short circuit of the battery leads
- A short circuit of any of the DC power outputs



Features

- Input 120 VAC and 230 VAC
- Output: 27 VDC/2.8A Continuous, 27 VDC/5 A Alarm
- Filtered and electronically regulated output
- AC fail supervision
- Low AC (brown-out) supervision
- Battery supervision
- Built-in charger for sealed lead acid or gel-type batteries
- Automatic switch over to standby battery when AC fails
- AC input LED indicator

Listings / Approvals

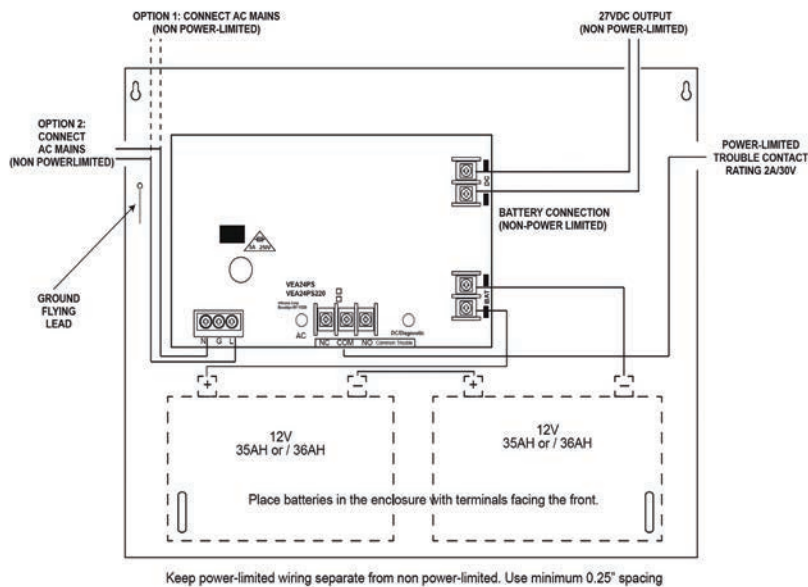
- UL
- UL 864 listed
- ULC-S527
- CSFM

Power Supply Capacity & Recommended Battery Requirements

Battery requirements and recommendations for typical power supply loads		
VESDA-E VEA Configuration	Power Supply/ Alarm Load	24 hours of standby operation and 30 minutes of alarm
1 x VEA-040-A00/A10 + 1 x VER-A40-040-STX	1A/1.8A	24V/35AH or 36AH
For use with the Listed VESDA-E VEA Detectors and VESDA-E VEA Relay StaX		

Notes:

- VEA power supply must be confirmed with a battery calculation compliant with local fire protection codes and standards.
- Above recommendations are based on standard battery sizes, to facilitate the calculation of exact back up battery size, refer to the Battery Calculator (Document 21062), available on Xtralis website (www.xtralis.com).



Specifications

Components	The VPS-VEA-115 UL and VPS-VEA-230UL consist of two main components: the mounting enclosure and the main circuit board. It uses two backup batteries (supplied separately).*
Input	VPS-VEA-115UL - 120VAC/2.0A/60Hz VPS-VEA-230UL - 230VAC/1.0A/50Hz.
Output	27VDC/2.8A Continuous 27VDC/5A Alarm
Maximum charging current	5.3A
Max. AMP/HOUR capacity battery for charging	108AH
Dimensions (WHD)	438 mm x 330 mm x 142 mm (17.25 in. x 13 in. x 5.6 in.)
Weight	5.9Kg (13lbs) without batteries
Operating Temperature	Power supply ambient: 0 °C to 49 °C (32 °F to 120 °F)
Humidity	10 - 95%RH, non-condensing
Trouble Relay	Common trouble relay rated 2A @ 30VDC (Form C: NO/NC) During normal operation, the power supply Fault Reporting Relay is energized.
Cable Access	3/4" knockouts in various positions
Cable Termination	Screw terminal blocks 30-12 AWG

*The VESDA-E VEA Power Supply uses sealed acid, 12VDC, 35/36 Amp/hour batteries.

Ordering Information

P/N	Description	Requirements
VPS-VEA-115UL	Power Supply	Input voltage: 120VAC
VPS-VEA-230UL	Power Supply	Input voltage: 230VAC