

B-5243A

Power Supply (12VDC / 24VDC, 3A – w/ Battery Backup)



Description: Cornell's B-5243A is a UL Listed power supply designed to provide continuous power to Cornell systems. It can provide 12VDC or 24VDC (switchable) with a max. 3 amp rating. Each includes (2) 12VDC, 7Ah batteries for backup power and a 3A fuse kit. For use with the following Cornell systems:

1. **1000** Series = Door Monitor / Access Control (12VDC)
2. **2000** Series = Clinic Status (24VDC)
3. **4000** Series = Nurse Call (24VDC)
4. **4200** Series = Analog Area of Refuge (24VDC)
5. **4800 Sentinel** = Digital Area of Refuge (24VDC)

Operation: Provides primary operating power for the system and associated components. Instantaneous switchover to secondary / failover battery backup power when AC power is lost. Only 1 power supply per system shall be used (except for the Sentinel AOR System). Ensure the power supply is set to the proper voltage (12VDC or 24VDC) prior to energizing. Factory set at 12VDC.

Mounting: Wall mount the B-5243A using the slotted keyholes. Typically mounts in an electrical room / closet.

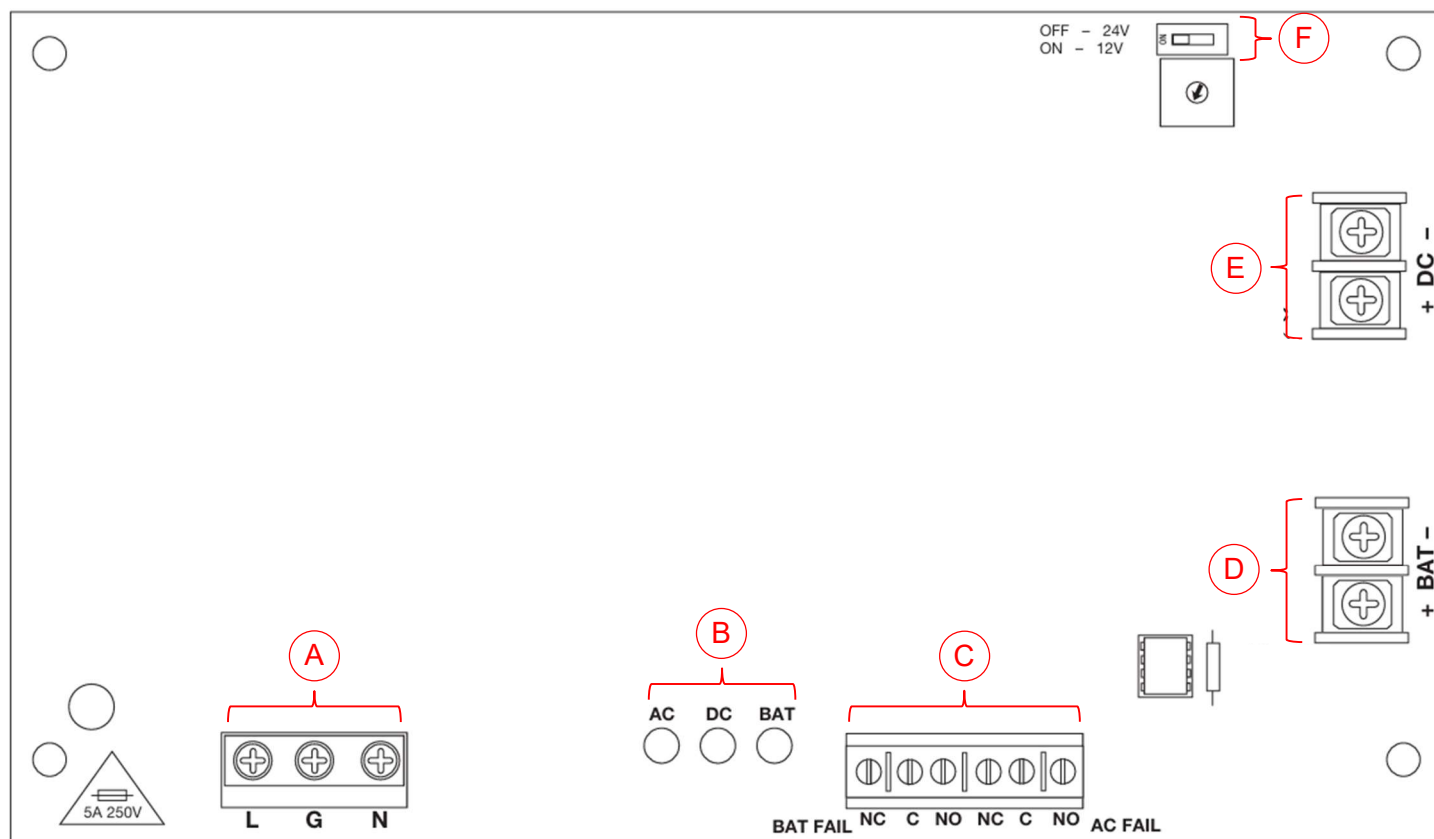
Engineering Specifications: The contractor shall furnish and install the Cornell B-5243A Power Supply as shown on the plans. Requires primary 120VAC input power. Set the voltage to 12VDC or 24VDC correctly for the type of system being installed. Connections for external battery backup power are available. Includes a red (DC) and a green (AC) LED indicator for quick status diagnostics. Includes dry contact outputs for supervision of primary power (AC Fail) and battery failure (BAT Fail) conditions. Cornell recommends replacing batteries every 3-4 years and to test them annually. The amount of battery backup time provided depends on the size of the batteries and the power consumption during the period of time the batteries are in use. The power supply will keep the batteries charged while primary AC power is available.

Technical Information:

- Power Requirements: 115VAC, 60Hz, 0.6 amps
- Operating Environment: 50°-120°F Indoor, Non-condensing.
- Physical Enclosure Dimensions: 16.0"H x 12.0"W x 5.0"D
- AC Fail: Dry contacts (NO, C, NC) for monitoring AC Fail and BAT Fail conditions
- Indicators: Red LED indicator for DC power, green LED indicator for AC power
- Set Voltage: 12VDC, 4A (switch CLOSED) / 24VDC, 3A (switch OPEN)
- Batteries: (x2) 12VDC, 7Ah batteries – sealed lead acid type

B-5243A Power Supply PCB Board

(mounted in metal enclosure)



Descriptions:

- A. Primary 120VAC input power
- B. LED Diagnostics (see below)
- C. Battery Fail and AC Fail contacts
- D. Backup battery connections
- E. DC output power (12VDC or 24VDC)
- F. 12VDC or 24VDC switch (DO NOT SWITCH WHILE POWER SUPPLY IS ENERGIZED!)

LED Diagnostics

Green (AC)	Red (DC)	Red (BAT)	Power Supply Status
ON	ON	ON	Normal operating condition.
OFF	ON	ON	Loss of AC. Stand-by battery is supplying power.
ON	OFF	OFF	No DC output, Battery Trouble.
OFF	OFF	OFF	Loss of AC. Discharged or no stand-by battery. No DC output.
ON	ON	OFF	Battery missing / Low.