Vi10120

120W Hardened DIN Rail Power Supply

Features

- High efficiency up to 92% with universal AC input range (85~264Vac)
- 120W output at 48~56VDC with 150% (180W) peak load capacity
- Hardened with wide operating temp -25°C~70°C
- Support 1+1 or N+1 redundant system
- Built-in current sharing function
- Built in DC OK relay contact
- Output protections: OVP/OLP/SCP/OTP
- Easy Fuse Tripping due to High Overload Current
- 100% full load burn-in test
- Free air convection



Applications

- Transportation, Perimeter applications
- · PoE applications requiring wide operating temperature
- · Applications requiring back up power
- · Outdoor, transit, perimeter, and parking lot applications

Vigitron's MaxiiPower™ Vi10120 Din Rail Power Supply is designed for hardened applications. A wide operating temperature range of -25°C to 70°C assures reliable operation for many mission critical operations. It provides many features designed for its own protection and connection to the device its powering. The Vi10120's combined a 150% peak load up to 180W, over current protection and current limiting will protect itself and powered devices. An alarm relay provides notification in the event of failures. Outputs of multiple Vi10120s can be connected together to increase the total power or serve as a back up supply. Multiple DIN Rail mountings simplifies installation.

The Vigitron Vi10120 can be configured for a wide variety of applications to provide both additive and back up power.



Technical Specifications*

Electrical

Output:

Ripple and Noise ≤ 240 mV at -25° CVoltage Accuracy $\pm 1.0\%$ Line Regulation $\pm 0.5\%$ Load Regulation $\pm 1.0\%$ Set-up Time < 250 mS@230VAC, < 500 mS@100VACHold up Time ≥ 20 mS (230VAC input, Full load)Temperature Coefficient $\pm 0.03\%$ °COvershoot / Undersbort $< 5.0\%$ Input:Voltage Range $85VAC - 264VAC$, $130VDC - 350VDC$ Frequency Range $47Hz - 63Hz$ Power Factor $0.99/100VAC$, $0.95/230VAC$ (max.)Inrush Current $< 30A/100VAC$, $< 0.65A/230VAC$ (max.)Inrush Current $< 30A/100VAC$, $< 60A/230VAC$ Cold startLeakage Input-outputInput-Output < 0.25 mA, Input-PG: < 3.5 mAProtection:Input-Output < 0.25 mA, Input-PG: < 3.5 mAOver Load $110\% - 150\%$ of rated current, Auto recoveryOver temperature $100 \pm 5^{\circ}$ C, shut down O/P, Auto recoveryOver temperatureLong-term mode, Auto recoveryOver temperature $100 \pm 5^{\circ}$ C, shut down to 80% of rated output voltage Off: when output is up to 90% of rated output voltage Off: when output is down to 80% of rated output voltage Off: when output is down to 80% of rated output voltage	• Output Power	120W, 48-56VDC (Adjustable) @ 2.5A Max.
Voltage Accuracy $\pm 1.0\%$ Line Regulation $\pm 0.5\%$ Load Regulation $\pm 1.0\%$ Set-up Time $<250mS@230VAC, <500mS@100VAC$ Hold up Time $\geq 20mS(230VAC input, Full load)$ Temperature Coefficient $\pm 0.03\%^{\circ}C$ Overshoot / Undersbot $<5.0\%$ Input:Voltage Range $85VAC \sim 264VAC, 130VDC \cdot 350VDC$ Frequency Range $47Hz \sim 63Hz$ Power Factor $0.99/100VAC, 0.95/230VAC$ Efficiency 92% AC Current $<1.5A/100VAC, <0.65A/230VAC (max.)$ Inrush Current $<30A/100VAC, <60A/230VAC Cold start$ Leakage Input-outputInput-Output <0.25mA, Input-PG:<3.5mA	Ripple and Noise	
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DC-OK Relay Max 30V/1A or 60V/0.3A or 30Vac/0.3A, Resistive load	DC-OK LED	
	DC-OK Relay	Max 30V/1A or 60V/0.3A or 30Vac/0.3A, Resistive load

Regulatory

Safety	UL508, UL60950, EN60950, CE
EMC Emission	EN55022, EN55024, FCC PART 15 Class B
EMC Immunity	EN61000-4-2,3,4,5,6,8,11; heavy industry level
Environmental	RoHS, WEEE

Environmental

Humidity

Temperature

Operating: 20 to 90%, non-condensing Storage: 5 to 95%, non-condensing Operating: -25°C to +70°C Storage: -40°C to +85°C

Mechanical

Dimensions	4.68x1.26x4.88in, 119x32x124mm (LxWxH)
Weight	1.3 lbs (590g)
Material	Sheet Metal

*Specifications subject to change without notice.



Ordering Information

Part No.	Description
Vi10120	Din Rail 120W Power Supply

Related Products

Part No.	Description
Vi10240	DIN Rail 240W Power Supply
Vi10480	DIN Rail 480W Power Supply

Technical Specifications*

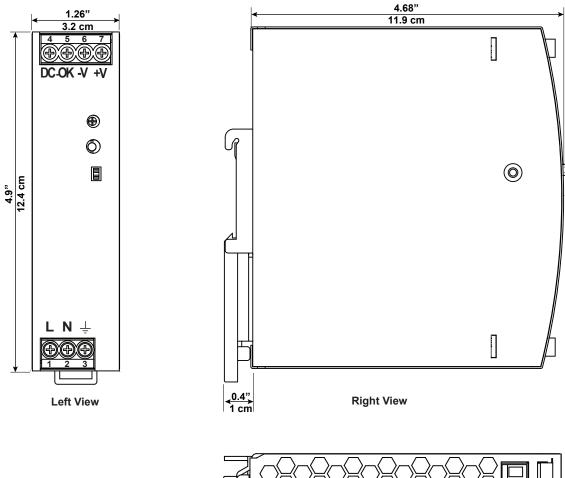
De-Rating Chart

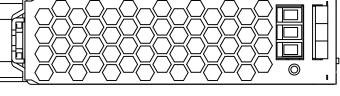




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Mechanical Drawings





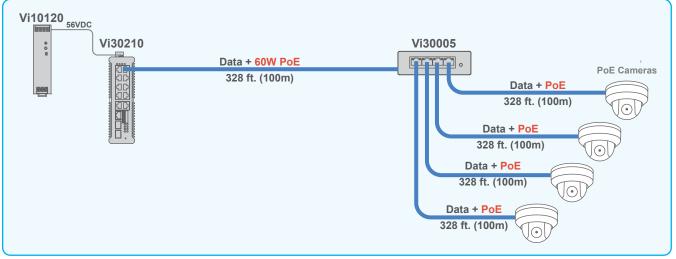
Top View



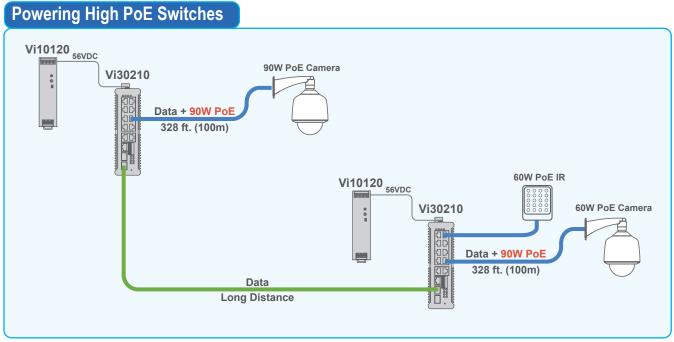
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Application Drawings

Powering Multiple Remote PoE Cameras



The Vi10120 can be used to power a local PoE switch, a remote PoE powered PoE switch and multiple connected PoE cameras.



Multiple Vi10120s can be used in a wide variety to power High power cameras and IR illuminators.



Cat 5/6 Fiber Optics