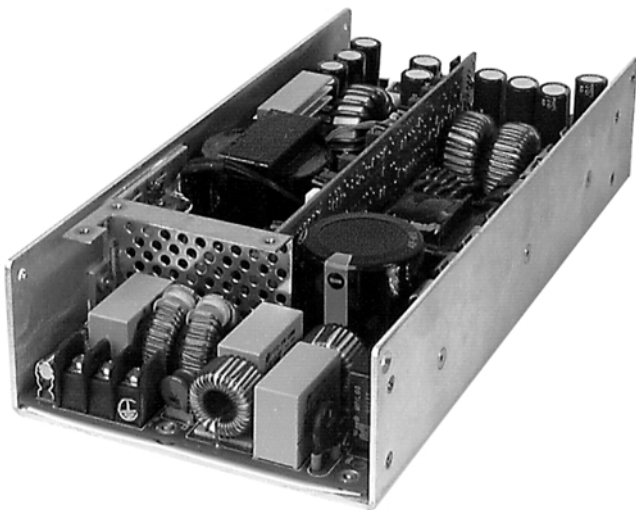


## 500 WATT AC/DC POWER SUPPLY

### PX500



#### DESCRIPTION

The PX500 is a compact 500 watt Power Factor Corrected, multiple output power supply. All outputs are fully isolated and regulated. Active current sharing circuitry, together with control functions and alarm options, simplifies N+1 and redundant applications. Fan and disk drive applications are handled by the peak current ratings of the auxiliary outputs.

#### FEATURES

- Active Power Factor Correction
- High Surge Current Auxiliary Outputs
- Fully Isolated Outputs
- One, Two, Three or Four Output Models
- N + 1 Current Sharing
- FCC/VDE Class B EMI Filter Standard
- Fast Transient Response
- Optional Cover With Fan

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# Input Specifications

Parameter	Conditions	Min	Typ	Max	Units
Operating Range	47-63 Hz	90		264	VAC
Inrush Current Limiting	120VAC, cold start			30	APK
	240VAC, cold start			70	APK
Efficiency	120VAC, full load		70%		
	240VAC, full load		75%		
Power Factor Correction (PFC)	Meets IEC 1000-4-7/EN61000-2-3 (formerly IEC 555-2)			0.99	

## Remote Sense

Remote Sense is provided on Output #1 and will compensate for 1.0V of line drop. Remote Sense leads are protected against open, short and reversal.

## Remote On/Off (Optional)

The power supply is turned on with a TTL logic '1' (or open) signal and turned off by a switch closure or TTL logic '0' referenced to (-) sense terminal. Consult the factory for other options.

## Over Voltage Protection

Output #1: 6.5V,  $\pm 0.5$  V<sub>DC</sub>

The power supply will latch off until AC power is cycled.

## Over Current Protection

Individual current limit on all outputs. Automatic recovery upon fault removal.

## Transient Response

The peak output voltage excursion will not exceed 2% and will recover within 1% in 400  $\mu$ sec for a 25% step load.

## Output Isolation

All outputs are fully isolated.

## N+1 Load Share

Output #1 has active load sharing circuitry. Units will load share within 1.0% of Maximum Rated Load.

## Power Fail Signal

Upon AC input voltage removal, the power fail signal drops to logic zero at least 5msec before loss of DC output. Upon AC input turn-on, signal remains low until outputs are in regulation. Consult the factory for other options.

## Over Temperature Protection

Internal thermal switch turns off power supply if overheating occurs and automatically restarts. Automatic restart when temperature drops below threshold.

## Safety

UL Recognized: UL File Number E14675 (1950 & 1012)

CSA Certified: CSA File Number LR 9070-154C  
(C22.2 No9. 234-M90, Level 6)

TUV License Number: R9576030 (EN60950) (IEC950)

## Cooling

The unit is designed to operate with 40 CFM of airflow.

## Output Voltages and Maximum Rated Loads

MODEL NUMBER	OUTPUT #1		OUTPUT #2		OUTPUT #3		OUTPUT #4	
	V <sub>OUT</sub>	I <sub>MAX</sub>	V <sub>NOM</sub>	I <sub>MAX</sub> /I <sub>PK</sub>	V <sub>NOM</sub>	I <sub>MAX</sub> /I <sub>PK</sub>	V <sub>NOM</sub>	I <sub>MAX</sub>
PX500-U3A	±5V	80A	± 12V	12A/15A	± 12V	12A/15A	-	-
PX500-U3B	±5V	80A	± 15V	12A/15A	± 15V	12A/15A	-	-
PX500-U4C	±5V	80A	± 12V	12A/15A	± 12V	12A/15A	± 5V	4.0A
PX500-U4D	±5V	80A	± 12V	12A/15A	± 12V	12A/15A	± 24V	3.0A
PX500-U4E	±5V	80A	± 12V	12A/15A	± 12V	12A/15A	± 12V	4.0A
PX500-U4F	±5V	80A	± 15V	12A/15A	± 15V	12A/15A	± 5V	4.0A
PX500-U4G	±5V	80A	± 15V	12A/15A	± 15V	12A/15A	± 24V	3.0A
PX500-U4H	±5V	80A	± 12V	12A/15A	± 12V	12A/15A	± 5.2V	10.0A
PX500-U4I	±5V	80A	± 12V	12A/15A	± 15V	12A/15A	± 5.2V	10.0A
PX500-U4J	±5V	80A	± 24V	4A	± 24V	4A	± 5V	3.0A
PX500-U4K	±5V	80A	± 5V	15A	± 12V	12A	± 12V	4.0A
PX500-U4L	±5V	80A	± 12V	12A	± 12V	12A	± 3.3V	10.0A

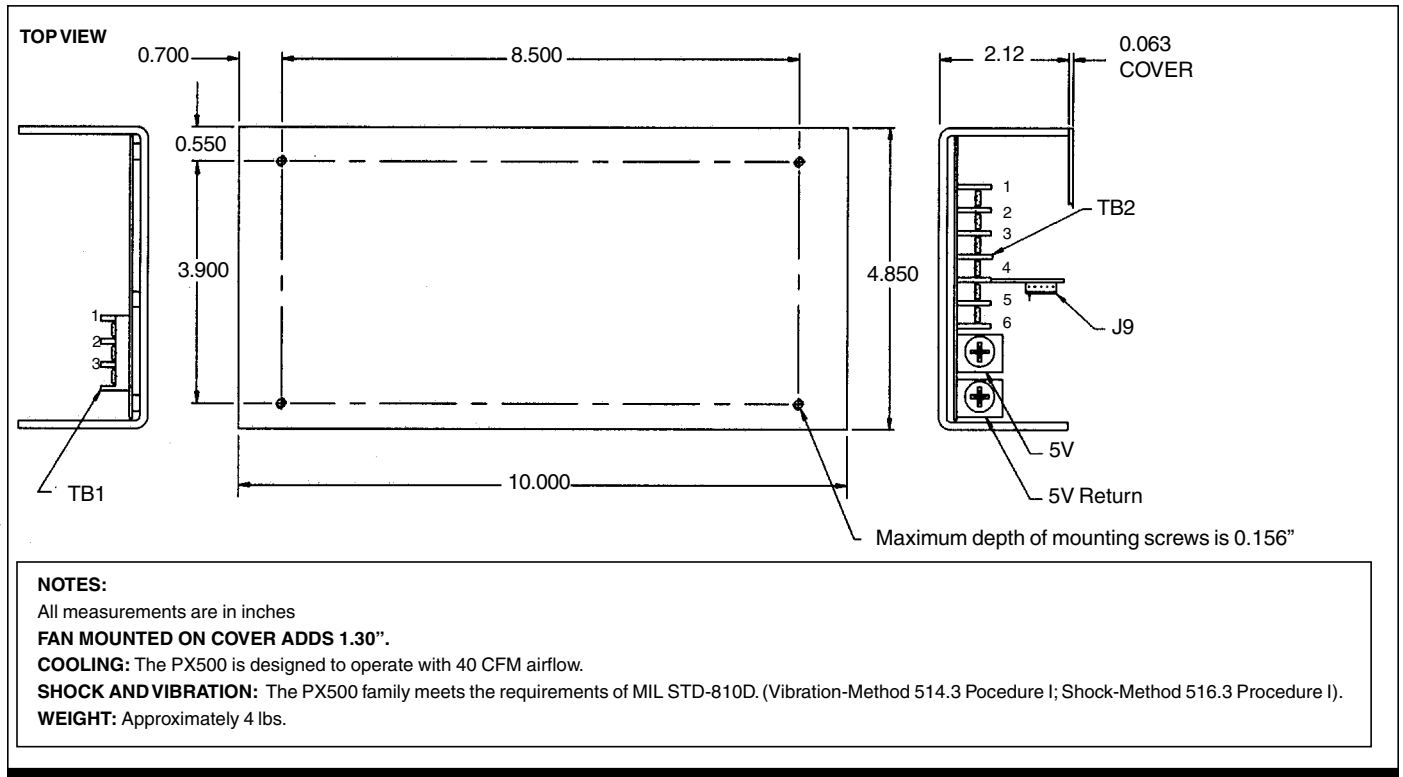
Note: Peak current ratings are for 10sec maximum. Total power not to exceed 500 watts.

## Output Specifications

Parameter	Limits
Regulation	
Line	± 0.1%
Load	±0.25%
Cross	±0.1%
Minimum Load	
Output # 1	4.0A
Outputs #2, #3, #4	0.0A
Hold-Up Time	20mSec at Full Load

Parameter	Conditions	Min	Typ	Max	Units
Voltage Adjustment Range			±5		%
PARD	20 MHz bandwidth			1	% P-P
Temperature					
Operating		0		50	°C
Derates to half power				70	°C
Storage		-20		+85	°C
Temperature Coefficient (Tc)	After half hour warm-up		± 0.02		% /°C

# Mechanical



Terminal Block 1		Terminal Block 2	
POS	FUNCTION	POS	FUNCTION
1	Ground	1	-V4
2	AC Neutral	2	+V4
3	AC Line	3	-V3
		4	+V3
		5	-V2
		6	+V2

J9 Connector		J9 Connector	
PIN	FUNCTION		Molex No.
1	- Sense	Connector	22-28-1050
2	+ Sense		
3	Current Share		
4	Remote Inhibit		
5	Power Fail		

Standard Options are shown, consult factory for other available options.

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