

HS-500P

HOT SWAP - 500 WATTS

ONE TO FOUR OUTPUTS - POWER FACTOR CORRECTED 90-264 VAC

Dual High Current Outputs, Standard Models of 5Vdc/75Amps and 3.3Vdc/20Amps



FEATURES:

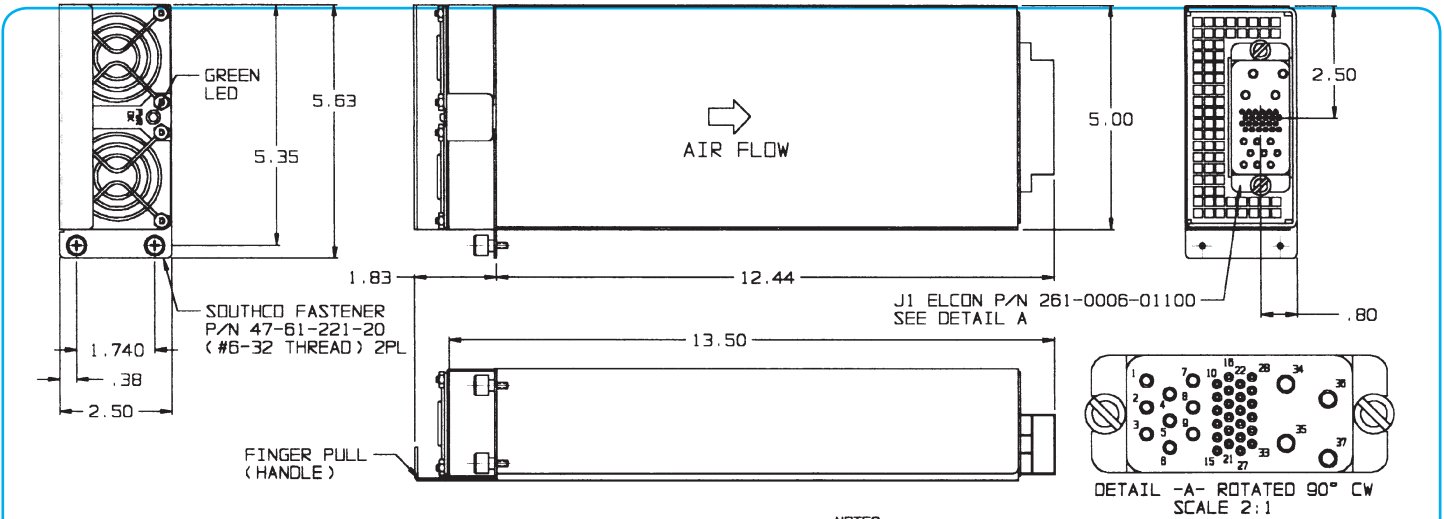
- Size: 2.5" x 5" x 13.5" in Size
- N+1 Redundant and Hot Swap (ELCON Connector)
- One to Four outputs with Oring Diodes
- Meets EN55022 Level A / FCC Class A
- No Additional Cooling Required up to 50 °C
- Power Factor Corrected Input (90-264VAC)
- 'Zero' Wire Current Share
- Remote Sense On V1 / V2 Outputs
- V4 Output Floating
- Up to 20A Capability on V2
- Greater than 90,000 Hrs MTBF (500,000 Hrs in Redundancy)

| | OUTPUT VOLTAGE (VDC) | OUTPUT AMPERES (MAX) | OUTPUT POWER (WATTS) |
|----|-------------------------|-------------------------|-------------------------|
| V1 | 2 to 48 | 75 | 500* |
| V2 | 2 to 48 | 20 | 180 |
| V3 | 5 to 24 | 5 | 96 |
| V4 | 5 to 24 | 5 | 96 |

*600 Watt Capability - Consult Factory



HS-500P SERIES 500 WATT COMPACT SIZE



| J1 CONNECTOR ELCON P/N 261-0006-01100 | | J1 CONNECTOR ELCON P/N 261-0006-01100 | |
|---------------------------------------|-----------------|---------------------------------------|---------------|
| PIN # | SIGNAL | PIN # | SIGNAL |
| 1 | AC-L | 16-19 | NC |
| 2 | AC-N | 20 | RTN |
| 3 | CASE GND | 21 | RTN |
| 4 | N/C | 22 | RTN (PRESENT) |
| 5 | N/C | 23 | +12V/5A (+V4) |
| 6 | +3.3/20A | 24 | +12V/5A (+V4) |
| 7 | -12V/5A | 25 | -12V/5A (-V4) |
| 8 | N/C | 26 | -12V/5A (-V4) |
| 9 | RTN | 27-33 | N/C |
| 10 | +5V SENSE | 34 | RTN |
| 11 | +5V SENSE RTN | 35 | RTN |
| 12 | +3.3V SENSE | 36 | +5V/75A |
| 13 | +3.3V SENSE RTN | 37 | +5V/75A |
| 14 | PW_OK | | |
| 15 | INHIBIT | | |

- NOTES:
- 90-264VAC INPUT, POWER FACTOR CORRECTED, 500W MAX OUTPUT TO 50°C AMBIENT.
 - ALL OUTPUTS CONTAIN ORING DIODES FOR N+1 REDUNDANCY. A "DROOP" CURRENT SHARE SCHEME ALLOWS FOR GREATER THAN A 60/40 LOAD SHARE ON THE +5V OUTPUT WHEN TWO OR MORE SUPPLIES ARE CONNECTED IN PARALLEL.
 - REMOTE SENSE CAPABILITY FOR BOTH THE +5V AND +3.3V VOLT OUTPUTS
 - INHIBIT SIGNAL ALLOWS SUPPLY TO BE SHUTDOWN ELECTRONICALLY (CONTACT CLOSURE TO RTN TURNS OFF ALL OUTPUTS).
 - THE PW_OK SIGNAL IS A NORMAL LOGIC "1" WHICH SWITCHES STATES WHENEVER:
 - THE +5V, OR +3.3V OUTPUTS GO 5% BELOW OUTPUT SPECIFICATION. (OR)
 - UPON LOSS OF AC, THE SIGNAL SWITCHES STATES AT LEAST 5MSEC BEFORE OUTPUTS GO OUT OF REGULATION.
 - AN OUTPUT LED IS CONTAINED DRIVEN ON/OFF BY PW_OK SIGNAL.
 - CONSULT FACTORY FOR FURTHER ELECTRICAL SPECIFICATIONS.

| | | | |
|--|--|--|---|
| Nominal Input Voltage | 115-240 VAC. | Overvoltage Protection | Shutdown at 130% of nominal Vout. Recycle input power to reset. |
| Frequency | 47-63 Hz , 400Hz. available. | Overtemperature Protection | Unit shuts down if overheated. AC must be recycled. |
| Operational Input Voltage Range | 90-264 VAC Power Factor 0.99 typical at full load. Meets EN 61000-3-2. | Cooling | Integral fans up to 50°C Ambient full power. |
| Inrush Current | Less than 4 msec. 40 amperes @ 115 VAC or 80 amperes @ 230 VAC. | Input/Output Isolation | 4242 VDC, SELV construction. |
| Fusing | 10 Ampere, 250 VAC, Internal ceramic body fuse. | Remote Sense (V1 & V2 output) | Up to 0.5 volts total in load. |
| Hold up time | 20msec minimum after loss of AC Input at full load and nominal input | Inhibit | Open to Run, Contact closure to return , turns off all outputs. |
| Efficiency | 70% typical | PW_OK | The PW_OK signal is a normal Logic "1" which switches states whenever: a) The +5V, or +3.3V outputs go 5% below output specification. or b) Upon Loss of AC, the signal switches states at least 5msec before outputs go out of regulation. |
| Turn on time | Less than 1 sec. | Operating Temperature | -20°C to 50°C full output |
| Load Regulation | 4% for 0% to 100% load change on V1 2% for 0% to 100% load change on V2 3% for 0% to 100% load change on V3 3% for 0% to 100% load change on V4 5% min. load required on V1 for max load reg. on outputs V2 to V4. | Stability | All outputs 0.5% for 8 hrs. after 1 hour warm-up. |
| Line Regulation | ± 0.1% over operating line range, all outputs. | Humidity | Up to 95% non-condensing. |
| Ripple & Noise | 1% PARD or 100mv which ever is greater. 20MHz bandwidth. | Size | 2.5"x 5"x 13.5" Weight: 6 lbs. |
| Transient Response | Output maximum excursion of ± 5% for 25% load step. Recovery less than 500 µsec. | EMI | Meets FCC Class A and EN55022 Level A |
| Short Circuit and Overload Protection | All outputs are protected from short circuit and overload. Automatic recovery. | SAFETY | UL 1950 / CSA C22.2 NO. 950-95, EN 60950 |
| Overshoot | No turn-on or turn-off overshoot. | | |

SERIES BREAKDOWN: HS-500X1-P
where X1= S for Single output, D for Dual output, T for Triple output or Q for Quad output

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