

200W, Rugged Industrial Quality AC/DC Power Supply HBC 200-FT Series

- Rugged industrial quality
- Field-proven design
- Conduction/convection cooling (no fans)
- Full electronic protection
- Large design headroom
- Most versions are available from stock



This rugged, industrial quality AC/DC power supply uses field-proven topology to generate the required output power. It is a simplified version of the field proven OLC 53 series, with the same electrical performance but with fewer available options. Cooling is via baseplate to a heat-sinking surface and by natural convection. Full electronic protection, low component count, large design headroom, and the use of components with established reliability contribute to high MTBF. It is manufactured at our plant under strict quality control. For customized versions with additional options, and for Eurocard plug-in modules, please see the OLC 53 Series.

SPECIFICATIONS

Input Voltage

115/230Vac +/- 15%, 47 - 63Hz
Voltage selection by internal jumper
Input also accepts 220V – 370Vdc range

Input Protection

Inrush current limiting
Varistor
Internal safety fuse
Lower voltage than the specified minimum input will not damage the unit

Isolation

2250VDC input to chassis
4300VDC input to output; 8mm spacing
500VDC output to chassis

Standards

Designed to meet EN 60950 and corresponding standards

EMI

EN55022 Class A with margins

Switching Frequency

55 KHz +/-3KHz

Hold Up Time

Minimum 5ms at full load for 5% drop of output voltage at nominal input

Output Voltage/Current

12V/16A; 24V/8A, 48V/4A or 125V/1.6A
Total output power 200W continuous
Output is floating; either terminal can be grounded
Other voltages on request

Redundancy Diode

Installed on request

Line/Load Regulation

± 1% combined from zero load to full load

Dynamic Response

Max 5% voltage deviation for 10% to 50% load step, with better than 1msec recovery time

Output Ripple / Noise

Less than 1% of output voltage peak to peak or 0.2% RMS of the output voltage (20MHZ BW)

Output Overload Protection

Rectangular current limiting with short-circuit protection (no hiccup)
Thermal shutdown in case of insufficient cooling (self resetting)

Output Overvoltage Protection

Double regulator loop completely stable and independent of main loop

Efficiency

80% - 87% at full load, depending on output voltage

Operating Temperature Range

0 °C to 50 °C for full specification without derating
(For extended temperature range see OLC 53 Series)

Temperature Drift

0.03% per °C over operating temperature range

Cooling

Conduction via base plate to customer heatsink or chassis and natural convection

Environmental Protection

Basic ruggedizing
Heavy ruggedizing and conformal coating available as an option

Shock/Vibration

IEC 61373 Cat 1 A&B

Humidity

5 - 95% non-condensing

MTBF

150,000 hours @ 45 °C
Demonstrated MTBF is significantly higher.

Indicators

Green "Output ON" LED visible through the cooling slots

Control Input

None

Alarm Output

Output fail alarm Form C contacts installed on request

Package/Dimensions (W x H x L)

F2: 114 x 58 x 256 mm (4.5" x 2.3" x 10.1") including terminal block and flanges
Mounting holes are clear

Weight

1.2 kg (2.6 lb)

Connections

9-pole barrier type terminal block with 3/8" spacing

RoHS Compliance

Fully compliant

Warranty

Two years subject to application within good engineering practice



European Stocking Distributor
Phone: +41 44 730 33 53

Email: sales@hvps-condatas.com / www.hvps-condatas.com
Rietbachstrasse 7, 8952 Schlieren (ZH), Switzerland