FXP600 Lead acid charger series 600 Watt Switched Mode

Features:

- Universal mains input (90-264Vac)
- · Low profile High density format
- Thermal protection as standard
- Active PFC to EN61000-3-2 class D
- Conforms to International safety regulations
- Optional 19" Rack (1U/4U Available) or chassis mount



Description: The FXP600 series offers a high performance / high efficiency battery charging source for numerous applications which may require a higher backup autonomy than usual. It's low profile make it particularly ideal for applications where space is critical. A host of standard options are available including temperature compensation and custom options are available where required (contact sales).

The product is fully designed to meet the international safety requirements of UL60950, CSA22.2 no 950 & 234 and EN60950 and CE marked to LVD.

Specification:

Models available	FXP600-36: 40.5V / 14.8A	FXP600-96: 108V / 5.55A
FXP600-12: 13.5V / 44.4A	FXP600-48: 54V / 11.1A	FXP600-120: 135V / 4.44A
FXP600-24: 27.6V / 21.73A	FXP600-60: 67.5V / 8.88A	FXP600-240: 270V / 2.22A

Input

Input voltage : 90 - 264ac Input freq. : 47 - 63Hz Inrush current : < 30A (230Vac)

Earth Leakage : <2.5mA

PFC :> 0.98 to EN61000-3-2 class D

Output

Output voltage / currents: see table

 $\begin{array}{ll} \mbox{Adjustment} & : \pm \, 5\% \\ \mbox{Line regulation} & : \pm \, 0.02\% \\ \mbox{Load regulation} & : \pm \, 1\% \\ \end{array}$

Hold up time : 10mSecs from 220V full load

Minimum load : Not required

Dynamic reg. : 1% for 25% load change

Ripple & noise : 0.2% RMS, 1% pk to pk (DC - 30MHz)

Overload

Protection : Electronic protection >110% constant I.

Over voltage

protection : 115 – 125% crowbar cycle mains to reset

Temperature

coefficient : 0.02%/°C Max power : 600W

Thermal

protection : Internal thermostat shuts down unit if internal rating exceeded

Cooling : Via 2 * 40mm end fans

Options

Front Panel for 19" rack applications (1U or 4U) Battery temperature compensation @ 0.2% Vout / $^{\circ}\text{C}$

Enable or inhibit (HI or LO as required) DC output OK signal via volt free relay

Mains powerfail: Provides TTL compatible 5mS warning Active current Share: Provides 60:40% maximum share ratio

Internal series ORing diode for hot-swap applications Voltage or current programming control:

(0-5Vdc or 0-10Vdc available) ± 1% accuracy

Current monitor signal: (0-5Vdc or 0-10Vdc @ 0 - full load. ± 1% accuracy)

10Vdc @ 1mA internal ref. supplied

Low battery disconnect signal (@<1.75V/cell)

General

Efficiency: 80% typical

MTBF > 100,000 hrs to MIL217E @ 25°C

Dielectric strength: 4.25Kvdc input to Output 2.25Kvdc input to Earth 500Vdc output to Earth

Connections: 0.375" Beau screw terminals as standard -

H15 DIN 41612 or M6 studs optional

Signals: 10 Way IDC header

Environmental

Operating Temperature:

-20c to $+60^{\circ}$ C De-rate at 2.5% $/^{\circ}$ C above 50° C

Storage Temperature: -25°C to + 85°C Operating humidity:

0 to 95% RH non-condensing

Safety & EMC

Isolation, input to earth : 2.5kVdc, >2.5mm Isolation, input to output : 4.25KVdc, >6.4mm

Isolation, output to earth: 500Vdc

(unless commoned)

Units designed to meet: EN60950, UL60950, CSA 22.2

No. 950 & 234

Emissions designed to meet: EN55022-A (conducted)

EN55022-A (radiated)

Immunity designed to meet:

EN61000-4-2 (ESD)

EN61000-4-3 (RAD)

EN61000-4-4 (FAST TRANS)

EN61000-4-5 (SURGE)

EN61000-4-6 (CONDUCTED)

EN61000-4-8 (MAGNETIC)

EN61000-4-11 (VOLTAGE DIPS & FLUCTUATIONS)

EN61000-3-2 (MAINS HARMONICS)

EN61000-3-3 (VOLTAGE FLUCTUATIONS)

FXP600 SERIES

Mechanical Details and Connections

