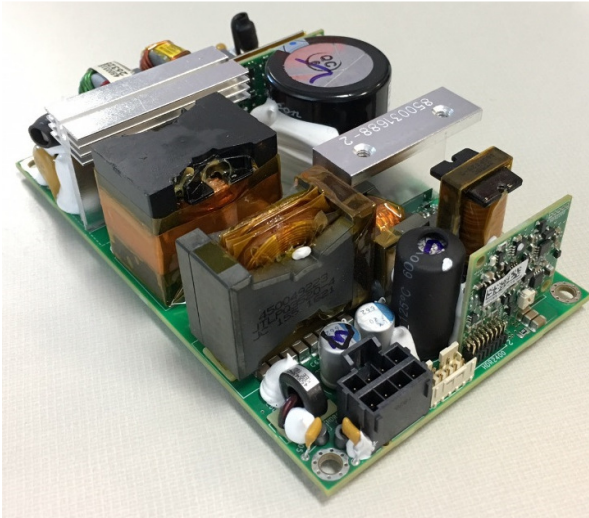


CLP0412DC Open Frame Power Supply

48Vdc input; 12Vdc output; 450W Output Power



Applications

- Industrial equipment
- Telecommunications equipment

Description

In a small 3 x 5 inch footprint, the 12Vdc single-output **CLP0412DC** open frame power supply delivers 92 percent typical power efficiency and 450W output at 42°C and 1m/s airflow. With its small size, the CLP series is specifically designed to handle power challenges associated with tight space and low airflow. Offering a high 20.7W/in³ power density in a 1U high, fan-less form factor, the CLP series addresses a broad range of applications in new products from industrial equipment and communications original equipment manufacturers (OEMs). Higher temperature operation is possible at derated output. The CLP series utilizes a unique design approach at this power level, leveraging zero voltage switching techniques in conjunction with quasi-resonant power factor correction (PFC) circuits. Protection features include overcurrent (OCP), overvoltage (OVP), and overtemperature (OTP).

Features

- **Reverse input voltage protection**
- Compact size 76.2 mm x 127 mm x 36.8 mm (3 in x 5 in x 1.45 in) with density of 20.7 W/in³
- **Universal DC Input Range (36 – 75VDC)**
- Output voltage of 12V (adjustable ±5%)
- Standby output of 5V @ 1A (standard versions)
- Maximum output current of 37.5A @ 12Vout (450W)
- High efficiency (92% at Full Load)
- 450W capability at 42°C and 1m/s airflow with derating at higher temperatures or lower airflows
- Capable of 320W out in sealed enclosure applications with enclosure ambient at 55°C
- Output overcurrent protection (non-latching)
- Overtemperature protection
- Output overvoltage protection
- **Up to 2ms of holdup time**
- Parallelable with output current sharing (option)
- Conducted EMI - meets CISPR22 (EN55022) and FCC Class B requirements
- Meets IEC61000-4-5, Level 4 (2kV/4kV)
- Compliant to RoHS II EU "Directive 2011/65/EU"
- UL and cUL approved to UL/CSA60950-1, TUV (EN60950-1), CE Mark (for LVD) and CB Report available
- ISO** 9001 and ISO 14001 certified manufacturing facilities

* UL is a registered trademark of Underwriters Laboratories, Inc.

† CSA is a registered trademark of Canadian Standards Association.

‡ VDE is a trademark of Verband Deutscher Elektrotechniker e.V.

** ISO is a registered trademark of the International Organization of Standards