

MT60-ANS POWER SUPPLY / BATTERY CHARGER

PRODUCT DESCRIPTION

The MT60-ANS series are rack mounting convection cooled power supply modules with 60Vdc output. They are 6U high with rear connectivity and are suitable as a standalone DC power source or to charge batteries. The mating connector for input and output is supplied separately so the units can be used with or without a 19" subrack as long as correct airflow is allowed for. These rectifiers are designed for high voltage Power Plants, Substations, Oil & Gas installations and many other applications.

Because the units are highly modular it is possible to configure systems with multiple units per rack for higher power or n+1 redundant applications. The robust construction with rugged metal handles make them ideal for industrial hot swap applications.

Each rectifier module receives its operating parameters via the internal RS485 communication bus. The password protected central monitoring unit controls and monitors each of the units, although the units will still operate with their default values if the monitoring unit is not present. Therefore the continuity of all connected loads and the charging of the batteries are guaranteed without any interruption.

APPLICATIONS

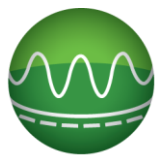
These power supplies are designed for a wide range of applications such as:

- Power supply for all medium to high power DC loads
- Rectifiers in DC systems with battery backup
- Telecommunication
- Industrial control systems
- Charging and buffering of stationary batteries in electrical power plants



KEY FEATURES

- Single Phase, 230Vac Input
- 60Vdc Output, 25A
- Protection for Input and output over voltage, under voltage, over temperature, phase reversal, phase failure, and short circuit
- "Hot plug-in" design with backplane connection
- High power density
- RS 485 Interface for Remote Control, Monitoring and Signaling.
- Digital display for output voltage, current and buttons for adjustment of values
- CE Certification for Safety and EMC
LED indication for module status reporting.



Input

| Type | 60V/25A |
|-----------------------|-----------------------|
| Model No. | MT60V/25A-AN-S |
| Input voltage | 230Vac |
| Input current | 9A |
| Input frequency range | 45 Hz-65 Hz |
| Power Factor | ≥ 0.99 |

Mechanical

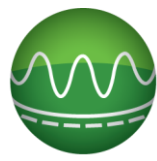
| Type | 60V/25A |
|--------------------------------------|-----------------------|
| Model No. | MT60V/25A-AN-S |
| Weight approx. | 9kgs |
| Dimensions (W/H/D) | 263x139x325 |
| Type of enclosure / Protection class | IP 20 |
| Colour (front panel) | Grey |

Output

| | |
|--|--|
| Nominal output voltage (Vnom) | 60V DC |
| Adjustable output voltage range | 51-76V DC |
| Voltage Stabilization Accuracy | ± 0.5% |
| Current Stabilization Accuracy | ± 1 % |
| Nominal output current (Inom) | 25A DC @ 68V |
| Nominal output power at 60 V DC | 1500 W |
| Efficiency | ≥ 95 % |
| Charge characteristic line | IU Characteristic according to DIN41772/DIN41773 |
| Default value of the charging voltage | 51-76 V DC |
| O/p Overvoltage Vo> (factory set) | 72V DC |
| Voltage ripple | ≤ ± 0.5% |
| Dynamic accuracy of the charging voltage | <3% of Venom at load change from 10% -90%-10% ;Transient time <50 ms |
| Short circuit protection | 15% - 30% of Inom when in short circuit |
| Parallel operation | Yes .Current Sharing ± 3% |
| Internal decoupling at the output | Yes ,In positive output line |

Technical Data

| | |
|-----------------------------|---|
| Communications interface | RS 485 |
| Ambient temperature | Operation: -20° to+50° C , Storage:-40° to +60° C |
| Humidity | ≤ 95 % RH |
| Cooling | Air Natural |
| Climatic conditions | IEC-68-2-2, IEC-68-2-3, IEC-68-2-6 |
| Max. installation altitude | ≤2000 m |
| Audible noise | < 50 db |
| Connections | AC Input DC Output and Signalization at rear |
| CE conformity | Yes |
| Compliance to EMC standards | EN61000-4-2, EN-61000-4-6, EN-61000-4-3, EN-61000-4-12 |
| Air Pressure | 70-106 Pa |
| Insulation Resistance | Input Chassis & Output > 10M Ohms at 500VDC |
| Dielectric strength | 2000V between Input, Output & Chassis for 1Min. |



CP POWER
AND AUTOMATION LTD

CP Power & Automation Ltd, 3 Fairfield Court, Seven Stars Industrial Estate, Coventry, CV3 4LJ, UK

Tel: 00 44 (0) 2476 214799 Fax: 00 44 (0) 2476 301810

Website: <http://www.cppowerautomation.com>

E-mail: mail@cppowerautomation.com