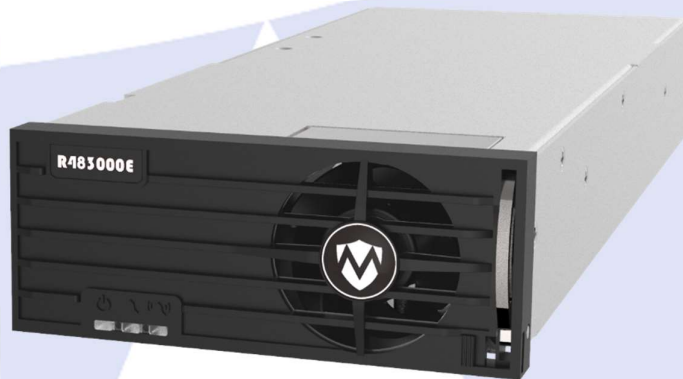


## Magnizon Rectifier Module

### Product Description

R483000 is a digitalized rectifier module with outstanding reliability and it is capable of delivering 3000W of DC power at standard -48V DC (positive grounding compatible for Telecom solutions) with maximum current supply of 62.5Amp continuous.



### Applications

- Fiber optic network and data room
- Wireless communications
- Broad band and network access
- Telecom roadside cabinets
- Satellite communications ground stations
- BTS 4G/5G Base station
- Manufacturing industry

### Key Feature

- Nominal AC input: 85Vac ~ 300Vac
- Wide Working Temperature range: -40°C ~ +85°C
- Active power factor correction: PF ≥ 0.99
- Fan speed control design
- Output terminal with hot plug connector.
- High efficiency and highest power density (Typical: 93.7%, Maximum: 94.5%, 50W/in<sup>3</sup> power density)
- Digitalized Control: Digitalized primary and secondary controls could realize excellent monitoring and regulation
- High Reliability Design: Fan front to back air flow with latest thermal solution and experienced electric synthesize ensure suitable working environment and high reliability
- Disconnects input Mains when hazardous
- Excellent EMC performance
- Lower interference and excellent susceptibility gives module more reliable.

### Compliance standards

- ISO9001:2015, ISO14001:2015, RoHs, CE
- Electrical Safety: IEC60950/ UL60950, EN55022 Class B (emission)
- EMC: IEC61000-4-2/3/4/5/6, IEC61000-4-11
- Harmonics: IEC61000-3-2, IEC61000-3-3

## R483000

### Specifications

| ITEM                              | R483000   |
|-----------------------------------|---|
| <b>ENVIRONMENTAL REQUIREMENTS</b> |   |
| Working temperature               | -40℃~+85℃   |
| Storage temperature               | -40℃~ +85℃  |
| Humidity RH                       | ≤95% RH   |
| <b>AC INPUT</b>                   |   |
| Voltage (V)                       | 85Vac ~ 300Vac  |
| Current (A)                       | ≤18A  |
| Frequency                         | 45Hz ~66Hz  |
| Power factor                      | ≥0.99   |
| <b>DC OUTPUT</b>                  |   |
| Efficiency                        | >97.8% Peak   |
| Voltage range                     | -42.0Vto-58.0VDC  |
| Rated Power                       | 3000W   |
| Load regulation                   | ≤±0.5%  |
| Voltage regulation factor         | ≤±0.1%  |
| Noise Voltage mV)                 | ≤2 (Balance weight)   |
|                                   | ≤200 (Peak-peak)  |
|                                   | ≤50 (3.4~150kHz)  |
|                                   | ≤20 (0.15~30MHz)  |
| Error in load sharing             | ≤±5%  |
| Precision of voltage regulation   | ≤±0.6%  |
| Protective function               | Input overvoltage, under-voltage  |
|                                   | output overvoltage, overload, short circuit, over-temperature and fan failure |
| Cooling-down method               | Speed air cooling   |
| Electrical Safety                 | IEC60950 UL60950  |
| EMC                               | EN55022 Class B (emission)  |
|                                   | IEC61000-4-11   |
|                                   | IEC61000-4-2 (electrostatic discharge)  |
|                                   | IEC61000-4-3 (Radiated immunity)  |
|                                   | IEC61000-4-4 (Fast transient)   |
|                                   | IEC61000-4-5 (Surge immunity)   |
|                                   | IEC61000-4-6 (Conducted immunity)   |
| Harmonics                         | IEC61000-3-3  |
|                                   | IEC61000-3-2  |
| Environment                       | ETSI EN 300 019-2 (-1, -2, -3)  |
|                                   | ETSI EN 300 132-2   |
|                                   | TELCORDIA NEBS GR63 CORE ZONE H   |
|                                   | RohS Compliant  |
| Certificate                       | CE  |
| Quality standards                 | ISO9001:2015, ISO14001:2015, RoHs   |
| Dimensions mm (W×D×H)             | 106×286×41  |

## R483000

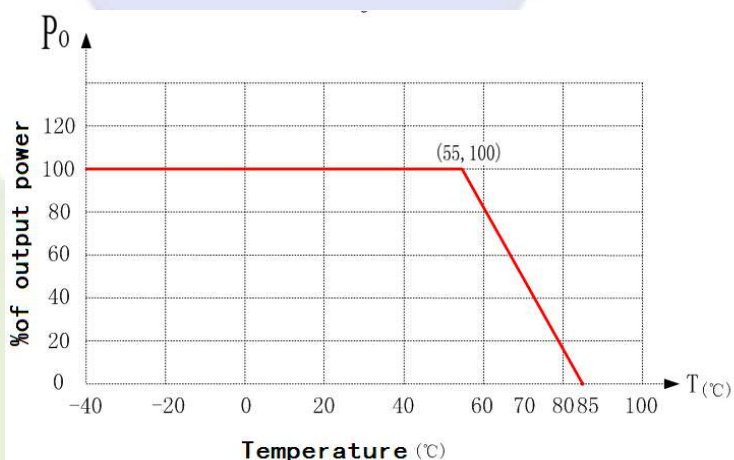
|              |       |
|--------------|-------|
| Weight (kgs) | 1.9kg |
|--------------|-------|

### Indicator functional specification

| Indicator                     | Normal | Anomaly  | Abnormal cause   |
|-------------------------------|--------|----------|--|
| Working indicator (green LED) | On     | Off      | The power supply is not working                                      |
|                               |        | Flashing | The control module operates the rectifier module                     |
| Alarm indicator (yellow LED)  | Off    | On       | AC input overvoltage, under voltage, short circuit, over temperature |
|                               |        | Flashing | Communication interrupt  |
| Fault indicator (red LED)     | Off    | On       | Rectifier module fault, PFC output overvoltage                       |
|                               |        | Flashing | Rectifier module fan fault   |

### Characteristic Curve of Rectifier Module

#### Output Power-Ambient



#### Output Current -Input Voltage

