

eSure™ Rectifier

R48-2000e

DC Power
for Business-Critical Continuity™

eSure™ Rectifier -48 V DC, 2000 W

Features and Benefits

- Optimized depth-reduced footprint allows installation in short-depth racks and cabinets
- DSP (Digital Signaling Processor)-means fewer components, optimized operation and active load sharing for increased reliability
- Compliant with global standards-delivers quality, performance and reliability no matter what the application or location demands
- High efficiency, 96.5%-reduces power consumption for lower operating costs
- Hot pluggable-facilitates future extensions
- Wide input voltage range-operates in the most demanding environments where input voltage changes
- Wide temperature operating range (-40°C / -40 °F to +80°C / 176°F) -meets the harshest climatic environment requirements

Description

The eSure™ R48-2000e rectifier converts standard AC supply voltages into stable nominal-48V DC voltage adjustable to the needs of the application. The R48-2000e is a constant power rectifier designed with the latest patented switch-mode technology using DSP (Digital Signaling Processor) functionality for efficient operation.

For a higher load capacity, rectifiers can be connected in parallel and intelligent control can be added with the help of a separate controller.



R48-2000e

NetSure® Certified

eSure™ Rectifier

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Technical Specifications, R48-2000e

AC Input

Input Voltage, Nominal	200 to 250 V AC
Input Voltage, Permitted Variation	85 to 300 V AC
Line Frequency	45 to 65 Hz
Max Input Current	13 A
Power Factor	0.99
THD (Total Harmonic Distortion)	<5% from 50 to 100% of rated load

DC Output

Output Voltage, Adjustment Range	-42 to -58 V DC
Output Power	2000W@Vout >48VDC
Output Power, Derated for Input Voltage	See Diagram
Output Current	41.7A@-48VDC
Output Current limit set Point	0 to 41.7A
Efficiency	96.5% peak
Psophometric noise (system)	<2 mV typical <38 dBnc typical
Temperature Derating	See diagram

Control and Monitoring

Rectifier Alarm and Signaling	Alarm and status reported via CAN bus to system Controller
Visual Indications	Green LED: Normal Operation Yellow LED: Alarm Red LED: Failure Flashing Red LED: Fan Failure

Environmental

Temperature Range, Operating	-40 to +80°C, -40 to +176°F
Temperature Range, Storage	-40 to +80°C, -40 to +176°F
Relative Humidity	0 to 95%
Altitude	2000 m, 6560 ft at full power
EMC	ETSI EN 300 386 class B, FCC CFR 47 Part 15 class B, Telcordia GR-1089-CORE class B
Safety	IEC 60950, EN 60950, UL 60950

Mechanics

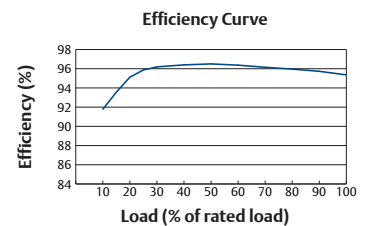
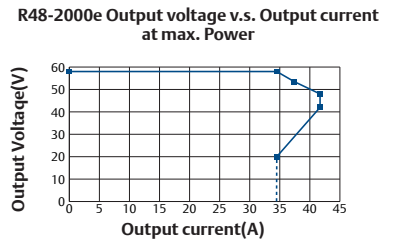
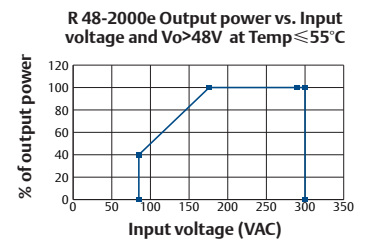
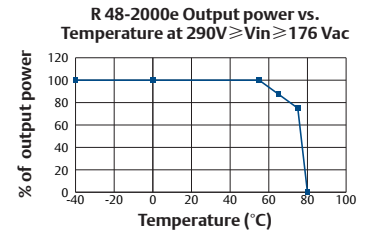
Dimensions (H×W×D)	86 × 84.5 × 272mm / 3.39 × 3.33 × 10.71 inches
Weight	2.4kg/5.3lbs

Other parts

Controller Units	See separate ACU/ACU+ and SCU/SCU+ datasheets
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Ordering information

Description	Product Code
Rectifier 48V,2000W	1R482000eXXX



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■ Connectivity
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■ Infrastructure Management & Monitoring
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