



REV: 09232011

RECTIFIER ENERGY SYSTEM

PRODUCT FEATURES:

- 7 Bay / 1400 Amp Power Shelf
- Hot Swap / N + 1 Redundant Rectifiers
- Active Current Sharing Between Rectifiers
- Full Featured Status and Alarms
- Full Featured Battery Charger & Monitor
- RS485 Serial Interface
- Front Panel LED Indicators
- DC Distribution Panel
- Designed for Worldwide Safety Approvals
- Works with DRM-4200 Rectifier Modules
- Works with CPRC Control Module



INPUT SPECIFICATIONS:

VOLTAGE	3Ø 176V to 286 VAC
FREQUENCY	47-63Hz
INRUSH	≤ 100A (peak) @ 230VAC
CURRENT	54A @ 230VAC Full Load per module
EFFICIENCY	88% typical
HARMONICS	EN61000-3-2 Class D Compliant (>99% PF)
LEAKAGE CURRENT	< 100mA per module

OUTPUT SPECIFICATIONS:

ADJUSTMENT RANGE	-54VDC to -55VDC
MINIMUM LOAD	140 Amps
LINE REGULATION	± 1% max, over entire input range
LOAD REGULATION	± 1% max
TEMP REGULATION	± 1% max
RIPPLE	250mVp-p max
SETPOINT ACCURACY	± .5%
EXCURSION	± 5% max, 90% Step Load
RECOVERY	500us max
OVER CURRENT	105-120% (Auto-Recovery)
OVER VOLTAGE PROTECTION	106-108% (Recycle input to reset)

SAFETY STANDARDS:

UL / CUL	60950-1 (Designed to Meet)
CB	EN60950-1 (Designed to Meet)
CE MARK	Low Voltage Directive (Designed to Meet)

GENERAL SPECIFICATIONS:

OPERATING TEMPERATURE	-20°C ~ +50°C
STORAGE TEMPERATURE	-40°C ~ +80°C
OPERATING HUMIDITY	10% ~ 90% RH (non-condensing)
STORAGE HUMIDITY	5% ~ 95% RH (non-condensing)
NOISE	≤ 65dBA
SIZE (INCHES)	70.866" x 29.52" x 27.55"

EMISSIONS:

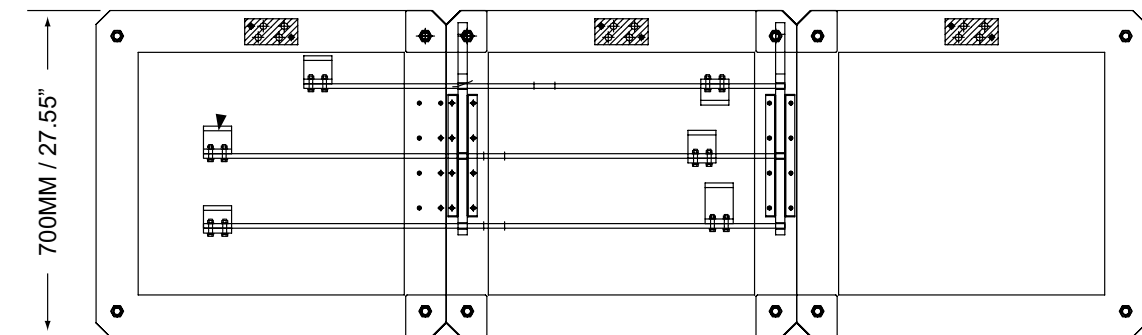
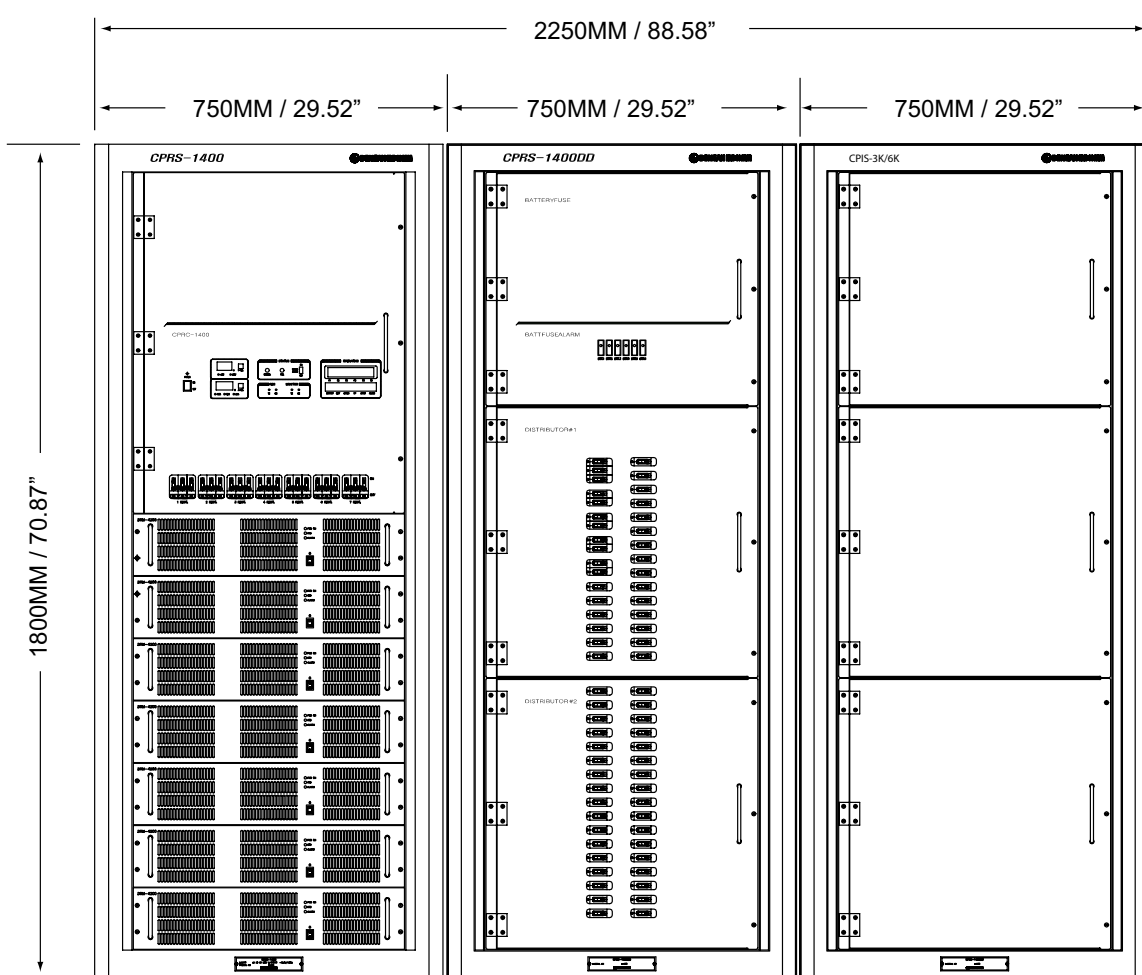
EMISSIONS	EN55022 Level A (Conducted)
ELECTROSTATIC DISCHARGE	EN61000-4-2, 4kV Contact / 8kV Air
RADIATED SUSCEPTIBILITY	EN61000-4-3, 26-1000MHz, 10V/M, 80%AM
EFT / BURSTS	EN61000-4-4, 2kV
SURGES	EN61000-4-5, 2kV Earth, 1kV Line-Line
CONDUCTED IMMUNITY	EN61000-4-6, 0.15-800MHz, 10V 80%
VOLTAGE DIPS	EN61000-4-10, 95% Dip & 10ms, 30% Dip & 500ms
VOLTAGE INTERRUPTIONS	EN61000-4-11, 95% reduction, 5ms
FLUCTUATIONS & FLICKER	EN61000-3-3

STATUS & CONTROL SPECIFICATIONS:

RS485	Serial Alarm & Status Interface
AC FAIL	Alarm Activate when $175 \leq AC \leq 290$
OUTPUT LOW VOLTAGE	Alarm Active when output $\leq 43V \pm .5$
BATTERY LOW VOLTAGE	Alarm Active when battery voltage $< 44V \pm .2$
BATTERY DISCONNECT	Alarm Active when battery voltage $< 42V \pm .2$
BATTERY CELL CHECK	Operated by command via panel or RS232
RECTIFIER FAIL	When any Rectifier fails to operate properly
FAN FAIL	When internal fans fail to operate



OUTLINE DRAWING:



CPRS- 1400

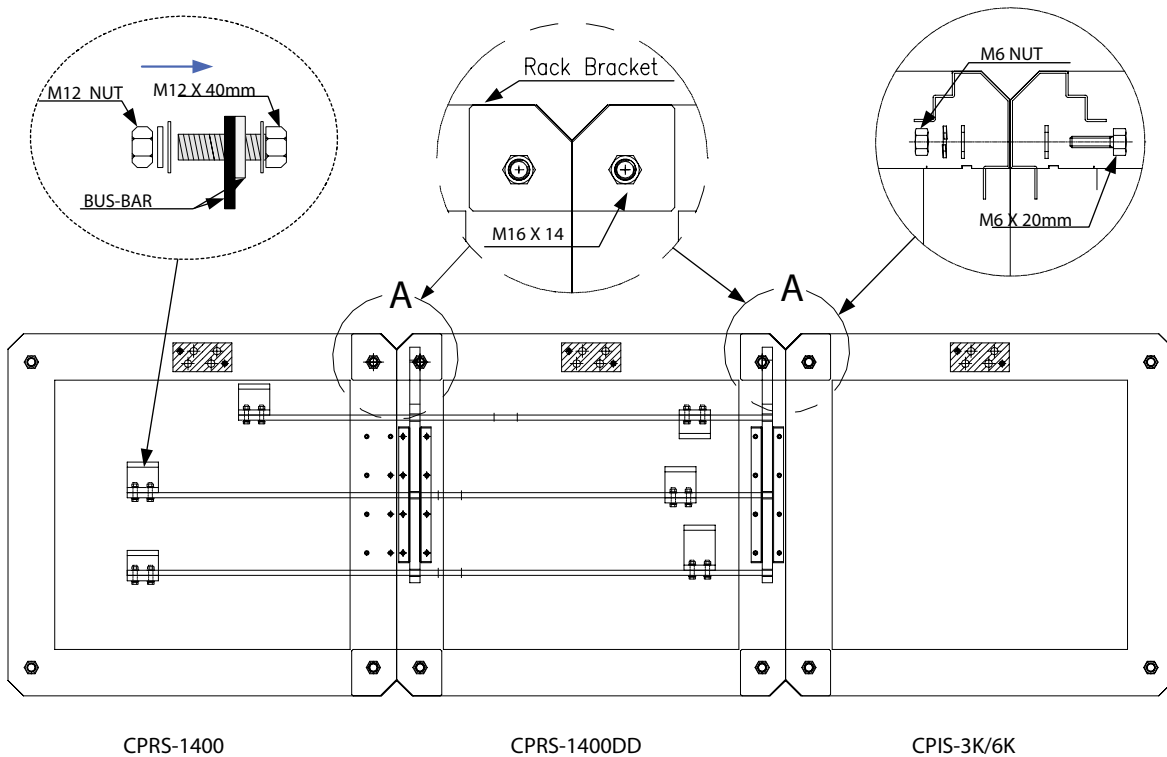
CPRS- 1400DD

CPIS- 3K/6K

RECTIFIER ENERGY SYSTEM

OUTLINE DRAWING:

This rectifier has been designed with 23 inch rack, and fixed with anchor bolts. The installation place should be clean and dry, and provide minimum of 50cm of space at the front and rear side of the rack. Front side of the rack should be easy to ventilate air. All other parts than rectifier modules have been fully installed. (Options are not the case.)



OUTLINE DRAWING:

Rectifier System Block Diagram

