

Unity Rectifier System

The Unity Rectifier System comprises a low profile 1.75" (1 RU) shelf which accommodates up to three 150 watt, -48 or +24 volt hot-swap rectifiers, plus an optional GMT fuse distribution panel. The system is scalable/adaptable for N, N+1 or N+2 configurations. Form C status contacts enable remote alarms for the rectifiers and fuse distribution circuits. Front panel OK/FAIL LED's allow monitoring status of each rectifier individually.



Unity Rectifier System

Shelf	Input	Capacity	Size	Weight		
URS	115/230 VAC Nom.	3 Unity Rectifiers (-48 or +24 V), 1 GMT fuse panel	19/23" Rackmount, 1 RU	6.7 lbs.		
Rectifier	Input Amps @ Full Load 115/230V	Output Voltage	Output Amps Cont.	Watts	Size	Weight
UR48-3	2.2/1.1	-54.4 VDC, adjustable 42-56 VDC	3	150	1 RU	1.9 lbs.
UR24-6	2.2/1.1	+27.2 VDC, adjustable 21-28 VDC	6	150	1 RU	1.9 lbs.
GMT Panel	Nominal Input/Output	Total Fuse Fuse Capacity	Total Current Capacity	Size	Weight	
UFP-5	-48 or +24 VDC	5	20A	1 RU	1 lbs.	

Unity Stand-Alone Rectifier

Rectifier	Input Amps @ Full Load 115/230V	Output Voltage	Amps Cont. Output	Watts	Weight
USAR48-3	2.2/1.1	-54.4 VDC, adjustable 42-56 VDC	3	150	2.8 lbs.
USAR24-6	2.2/1.1	+27.2 VDC, adjustable 21-28 VDC	6	150	2.8 lbs.

Features

- 150 watt rectifier units - 48 or 24 volt, slide and lock into the Unity Shelf
- Shelf accommodates up to three rectifiers—450 watts total—plus an optional five-position GMT fuse panel
- Scalable/adaptable hot swap configuration: N, N+1, N+2
- Front panel status indicators, output voltage test points and adjustment potentiometers
- Individual or summary rectifier alarm contacts; Form C
- Summary fuse panel alarm contacts; Form C
- 115/230 VAC shelf/rectifier input
- GMT fuse panel: Five positions, easy rear panel wiring to loads, fuse access at front

Unity Rectifiers

Models: UR48-3, UR24-6

Input Voltage/Frequency/PF: 85-264 VAC* / 47-63 Hz. / .96-.98

Input Amperage: 2.2 amps @ 115V, 1.1 amps @ 230V

Output Voltage/Amperage*:

UR48-3: -54.4 VDC, adjustable 42-56 VDC, 3 amps continuous

UR24-6: +27.2 VDC, adjustable 21-28 VDC, 6 amps continuous

*100 % output power available from 105 to 264 VAC; Derate output linearly from 100% @ 105 VAC to 80% @ 85 VAC

Efficiency: 83% per rectifier

Regulation/Ripple: +/-2% / UR24-6: 150 mV, UR48-3: 230 mV

Protection: Over-voltage, current limiting, over-temp, forced air cooling

Alarms/Indicators: Output failure contacts; Form C

Front panel LED indications: "DC OK/DC FAIL"

Front panel voltage test points and adjustment

Operating Temperature: -10°C to +60°C; 100 % load to +50°C; Derate linearly to 80% load @ 60°C

Design Standards: EN55022 Class B, EN61000-4-2,3,4,5,6,8,11, EN61000-3-2,3, UL 1950

Approvals: UL Recognized 60950

Unity Rectifier Shelf

Model: URS

Input: 115/230 VAC nominal

Capacity: Up to Three Unity Rectifiers, -48 or +24 volt and one GMT Fuse Panel (UFP-5)

Mounting: 19" or 23" rack; center or flush mount

Unity Fuse Distribution Panel

Model: UFP-5

Voltage: -48 VDC or +24 VDC nominal (selectable by jumper)

Current: 20 amps max. total

Capacity: Five GMT fuses, 10 amps max. per individual fuse

Available Amperages: 1, 3, 5, 7.5, 10, 15 Amps

Alarms/Indicators:

Output failure summary alarm contacts; Form C

Front panel blown fuse summary LED indicator

Unity Stand-Alone Rectifier

For applications that do not require rack-mounting or redundancy, the Unity is available as a stand-alone rectifier. A versatile flange permits a myriad of mounting options, such as on the side of rack rails, inside cabinets, on walls or under shelves, maximizing use of restricted spaces.

The unit comes with a 6' power cord and a rear-mounted terminal block for easy wiring.

Performance specifications are identical to single Unity Rectifiers detailed on this page.



Models: USAR48-3 and USAR24-6



Powering the Network