

# DC-DC Converters

Communication sites require isolated DC Converters to provide excellent voltage regulation, low noise, and high efficiency voltage conversion. Reliability is vital under continuous duty operation and high ambient temperatures. All these aspects were incorporated in the design of our rackmount DC Converters.



These units accept a wide input range at 24 or 48 VDC nominal, positive or negative ground, and produce pure 12 or 24 volt power. The solid state circuitry is conservatively designed and semi-conductors are selected and tested to withstand 200% of normal operating power.

Output voltage is maintained within 1% for all line and load conditions and the output is well filtered, allowing use with sensitive transceivers and telecom equipment.

## Features

- 48, 24 volt inputs; 12, 24 volt outputs; positive, negative or floating ground
- Input/Output chassis isolation – 250 VDC
- 400 watt output
- Rated for continuous duty at full load
- Excellent regulation under all line/load conditions
- Low ripple provides noise free output
- High efficiency – 87% typical
- Easily adapts to both 19" and 23" racks, center mount (6" from front)
- Output volt and ammeter
- Output voltage adjustment on front panel
- Low profile – occupies two RU (one RU space above and below recommended for cooling)

Model	Input		Output			Dimensions			Weight	
	Voltage (VDC)	Max. Amps	Voltage (VDC)	Output Adjustment	Amperage (Continuous)	H	W	D	Lbs	Kg.
48-12-30RM	40 - 60	12	13.6	12.6 - 14.5	30	3.5"	19"	8.9"	10	4.6
48-24-15RM	40 - 60	12	27.2	25.2 - 29.0	15	3.5"	19"	8.9"	10	4.6
24-12-30RM*	20 - 30	26	27.2	12.6 - 14.5	30	3.5"	19"	8.9"	10	4.6
24-48-8RM	20 - 30	26	54.4	50.4 - 58.0	8	3.5"	19"	8.9"	10	4.6

\* Special order - contact factory for availability

## Specifications

### Performance

**Regulation:** 1% line/load

**Ripple:** +/- 1/2% peak-peak max.

**Idle Current:** 48V: <100 mA, 24V: 300 mA

**Efficiency:** 85% typical @ 50% load.

**Operating Temperature:** -20 to 50° C; Derate linearly from 100% @ 50° C to 50% @ 70° C

**Isolation:** 250 volts input-output-chassis

### Mechanical

- Powder coated aluminum front panel, vinyl coated aluminum case
- Mounting brackets provided for 19" or 23" rackmount, center or front
- Easy access terminal blocks on back of unit, with protective cover
- Front panel switch guard provided
- Output voltage adjustment potentiometer recessed in front panel

### Protection

- Input and Output circuit breaker
- Current limited/short circuit proof
- High/low input voltage shutdown
- Fail-safe components guard against output over-voltage condition
- Automatic high temperature power reduction starting at 65° C heat sink temp
- Automatic thermal shut down and recovery @ 80° C heat sink temp. (automatic reset @ 55° C heat sink temp.)
- Reverse polarity protection

### Options

- Operation as battery charger and/or parallel redundant operation
- Output Failure Alarm Contacts; Form C



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