

CP-SNT 160W 3 Phase Switchmode Power Supply



The 3 phase CP-SNT 160W is a compact switchmode power supply that continues our tradition of more power from smaller packages.

Requiring just 58.4mm (2.3") of DIN rail, the CP-SNT 160W has the following features:

- 380-480VAC input 50/60Hz
- multiple output terminals
- input and output plug-socket connectors
- over current protection
- output status LED
- output voltage adjustment
- fault relay output (Form C)
- load sharing
- high outrush (surge) capability

Canada

Weidmuller Ltd.
10 Spy Court
Markham, Ontario L3R 5H6
Telephone: (800) 268-4080
Facsimile: (905) 475-2798
Email: info1@weidmuller.ca
Website: www.weidmuller.ca

Mexico

Weidmuller, S.A. de C.V.
Ave. Ingenieros Civiles #204
Conjunto Industrial Chachapa
72990 Puebla, Pue. Mexico
Telephone: (222) 286 62 47
Facsimile: (222) 286 62 42

United States

Weidmuller Inc.
821 Southlake Blvd.
Richmond, Virginia 23236
Telephone: (800) 849-9343
Facsimile: (804) 379-2593
Email: info@weidmuller.com
Website: www.weidmuller.com

Specifications

992534 0324 24Vdc @ 6.5A - 480Vac Input

| | | | |
|---|-----------------------|---------------------------------------|--|
| Input Voltage | Minimum | 342 Vac | |
| | Typical | 480Vac | |
| | Maximum | 528Vac | |
| Input Current | Minimum Vin | 0.34A | |
| | Typical Vin | 0.36A | |
| | Maximum Vin | 0.43A | |
| Input Protection | Fuse | Yes | 3 x T2A 250V |
| | Inrush Current | 5.7A | Thermistor Limited |
| | Overvoltage | Varistor | |
| Switching Frequency Output | Voltage Nominal | 24Vdc | |
| | Voltage Adj. Range | 22.5-28.5Vdc | |
| | Current nominal | 6.5A | |
| | Current Surge | 13A | |
| | Current Surge Time | 1 sec | |
| | Surge Cycle Time | 10 sec | |
| | Max. Load Capacitance | 10,000µF | |
| | Typical Vin | 83% | |
| | Typical Vin | 1% (p-p) max. | |
| | Load (10 -100%) | 3% | |
| Efficiency @ max. load Maximum Ripple Regulation | Line | 0.50% | |
| | Short Circuit | Yes | |
| | Over Voltage | Yes | |
| Protection | Under Voltage | Yes | |
| | Over Temperature | No | |
| | Minimum Vin | 15mS | |
| Hold Time | Typical Vin | 50mS | |
| | Maximum Vin | 70mS | |
| | Storage | -40 to 85 °C | |
| Temperature Range | Operating | -20 to 50 °C | Full Load Vertical 65°C |
| | Storage | 20 to 90% | Non-condensing |
| Humidity | Operating | 20 to 85% | Non-condensing |
| | Input to Output | 3KV | |
| Galvanic Isolation | Input/Output to Rail | 3KV | |
| | Input to Ground | 1.5KV | |
| | Output to Ground | 500V | |
| | Input | 26-12AWG | |
| Wire Size | Output | 26-12AWG | |
| | I/O | 26-12AWG | |
| | LxWxD | 5.44 x 2.3 x 7 (138.2 x 58.4 x 177.8) | |
| Dimensions (mm) | | | |
| Weight (kg) | | 2.2lbs (.993kg) | |
| Mounting | | TS35 or Chassis | Chassis mountable with optional bracket part #7920560000 |
| | | | Form C, 125Vac and 30Vdc @ 1A rating |
| Special Features | | Fault Relay | Open loop |
| | | Load sharing | Unit typically cycles 0.9s ON and 2.5s OFF. |
| | | Automatic Restart | |
| Approvals/Certifications | | CE, cULus Listed | |

Output Voltage



Output

Adjustable via trimpot located on front cover, from 22.5 to 28.5Vdc

Surge

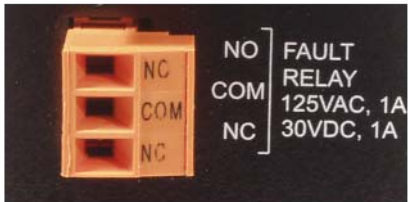
13A for 1 second

Unit will shutdown if surge exceeds 1 second

Overload

Automatic restart if overloaded. Unit restarts after approximately 4 seconds.

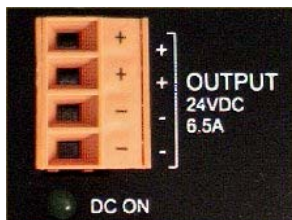
Relay Output



Contacts rated 30VDC 1A or 125VAC, 1A maximum, Form 'C' SPDT.

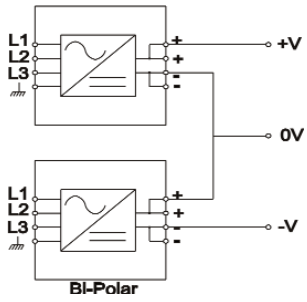
Relay is energized when power supply is operating under normal conditions.

Load Sharing

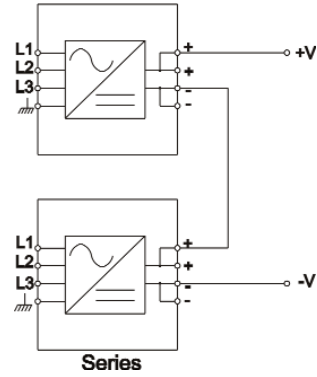
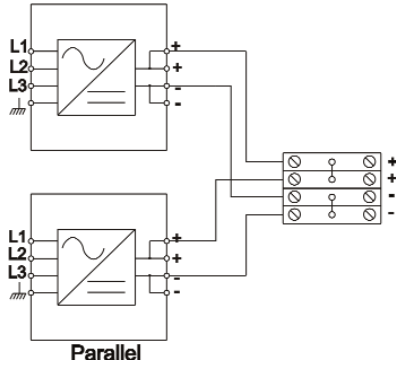


Maximum 2 units can be connected in parallel for load sharing. Derate supplies to 80% capacity (5.2A) when load sharing. Follow these directions for correct operation.

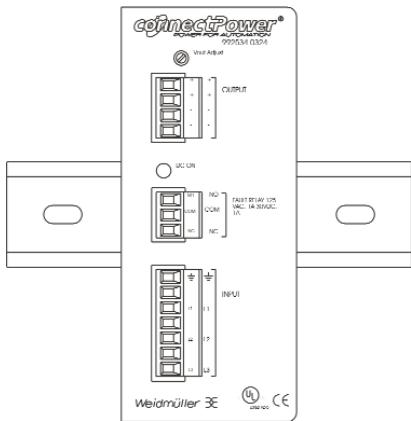
1. Adjust the output voltage of each power supply to the same value before connecting them in parallel ($\pm 200\text{mV}$).
2. Connect wires of the same length from each power supply to terminal blocks.
3. Connect the load(s) at these terminal blocks.



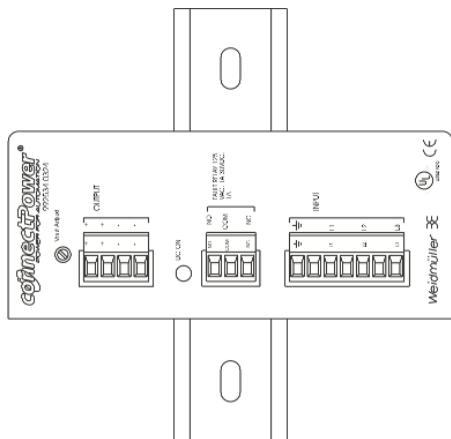
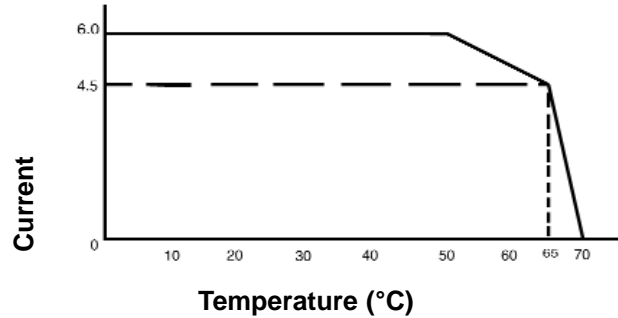
- \perp (earth) terminal should be connected to earth ground for safe operation.
- Outputs of power supplies can be connected in parallel.
- Outputs of power supplies can be connected in series.
- Outputs of power supplies can be connected to produce a bi-polar output.
- Power supply should be mounted allowing for natural air flow through the ventilation holes.



9925340324 Temperature Ratings



| O/P Current | Temperature |
|-------------|-------------|
| 6.5A | 50°C |
| 4.5A | 65°C |



| O/P Current | Temperature |
|-------------|-------------|
| 4.6A | 50°C |
| 2.5A | 65°C |

