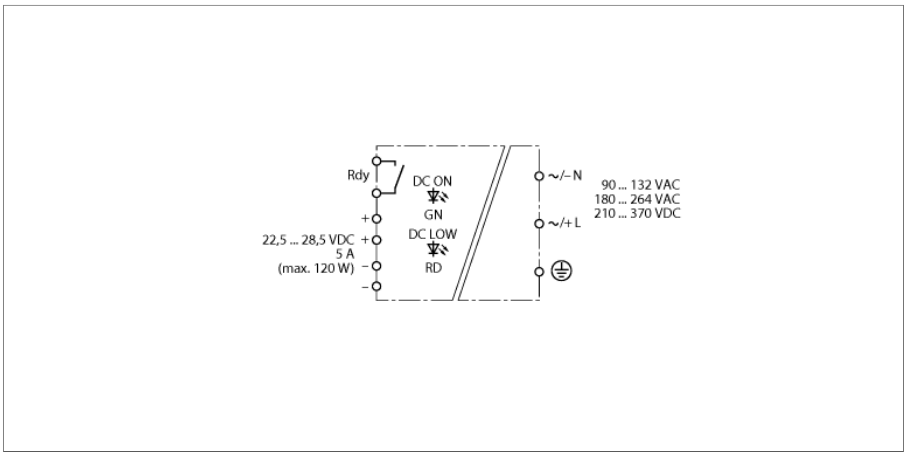
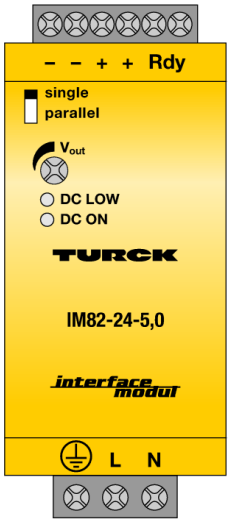
Switching Power Supply Module
IM82-24-5.0





The IM82-24-5,0 power supply unit is designed for DC consumers, in particular for the supply of switching and monitoring devices of the TURCK IM, IME, IMS and IMC interface module series.

The power supply provides 24 VDC output voltage and 5.0 A output current. With the potentiometer V_{out} the output voltage can be adjusted in a range between 22.5…28.5 VDC. The device provides safety extra-low voltage (SELV) according to EN 60950.

The power supply can be set to single or parallel operating mode.

- Output voltage adjustable 22.5…28.5 VDC
- Nominal current 5 A
- Single/parallel operating mode
- Surge protection
- Removable terminals
- Universal operating voltage
- Mains failure bridging up to 30 ms
- High efficiency
- Natural air cooling
- Power-good relay
- cULus listed
- Safety extra-low voltage SELV IEC/ EN 60950
- SEMI-F47

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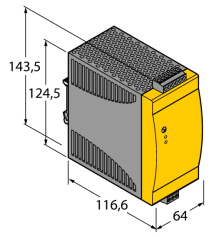
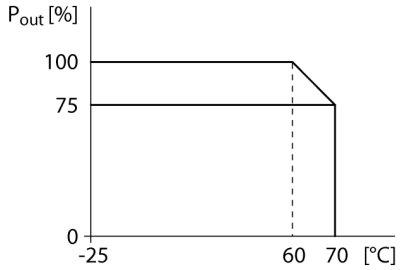
Type	IM82-24-5.0
ID	7545042
Nominal voltage	Universal voltage supply unit
Operating voltage	90…132 VAC and 186…264 VAC
Frequency	47…73 Hz
Operating voltage U_B	210…370 VDC
Power consumption	≤ 145 VA
PFC	0.7
Efficiency	86 %
External fuse	B5A
Internal fuse	T 3.15 A/250 VAC
Inrush current	Ui = 115 VAC, 24 A; Ui = 230 VAC, 48 A
Mains buffering	Ui = 115 VAC, 25 ms; Ui = 230 VAC, 30 ms
Output circuits	
Nominal output voltage	24 V
Adjustment range	22.5…28.5 V
Nominal current	5 A
Output circuits (digital)	relay (NO), > 17.6 … 19.4V
Output switching voltage relay	≤ 60 VDC / ≤ 250 VAC
Switching current per output	≤ 0.3 A
Overload protection	105…145 %
Surge limiting	125…145 %
Parallel mode	yes, switchover initiated by a switch, max. 3 devices each with 90 % load current
Ripple	50 mV
Pollution degree	2
Surge category	II
Short-circuit behaviour	Current limiting
Response characteristic	
Limit frequency	≤ 80000 Hz
Galvanic isolation	
Test voltage	3.0 kV
Displays/Operating elements	
Operational readiness	Green
Error indication	red
Mechanical data	
Protection class	IP20
Flammability class acc. to UL 94	V-0
Ambient temperature	-25…+70 °C
Storage temperature	-25…+85 °C
Derating	-2.5 %/°C from 60 °C
Dimensions	143.5 x 64 x 116.6 mm
Weight	978 g
Mounting instructions	DIN rail (NS35)
Housing material	Metal, Polycarbonate/ABS
Electrical connection	Screw terminals
Terminal cross-section	0.2…2.0 mm²
Tightening torque	0.5 Nm

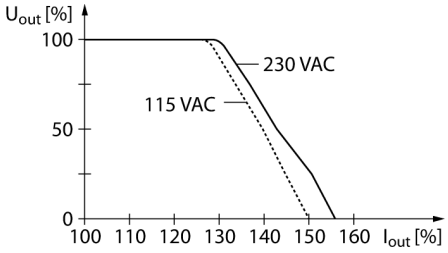
Dimensions



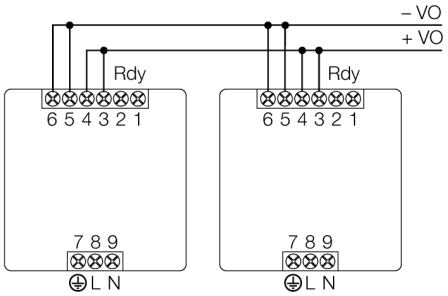
Derating



Short-circuit behaviour



Parallel operation



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