

AVO250-48S28B-6L

1/8th brick DC/DC converter

Data Sheet

Total Power: 250 Watts
Input Voltage: 36 - 75V
Single Outputs: 28V



SPECIAL FEATURES

- Wide input range
- Optimised for contact cooling
- Low ripple and noise
- Fixed switching frequency
- High capacitive load capability
- Pre-bias start-up capability
- Basic insulation system
- Output voltage remote sense

SAFETY

- UL, cUL: UL60950
- TUV/CE: IEC/EN60950

Electrical Specifications

Input specification	
Input range	36 Vdc to 75 Vdc
Input surge	100 V for 100 mSec
Efficiency	93%
Control specification	
Enable	TTL compatible positive or negative enable
Output specification	
Output voltage	28 Vdc
Trim range	-64% - +116% of Vout nominal
Output current	9 A
Ripple and noise	30 mV pk-pk nom 200 mV max. pk-pk
Regulation (total error band)	27.2 V to 28.8 V over line, load, life, temperature
Over current protection	18 A max. Typ
Over voltage protection	130% Vout nominal
Over temp protection	120 deg °C
Switching frequency	Fixed to 150 KHz
Isolation voltage	1500 Vdc
Transient response	75 mV deviation, 10 mSec recovery, 25%-50%-25% load 0.1 A/uSec
UVLO Turn-on	34 Vdc Typical
UVLO Turn-off	32 Vdc Typical

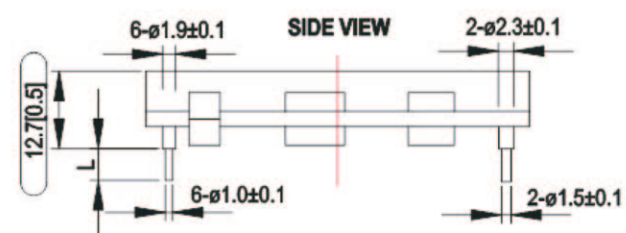
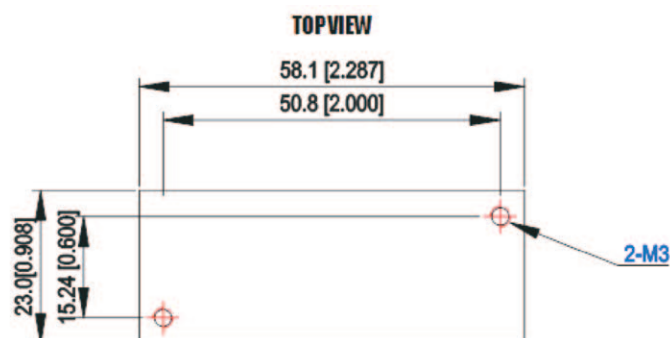
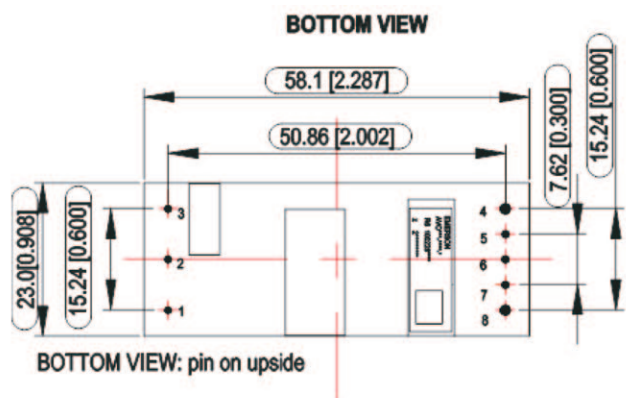
Environmental Specifications

Storage temperature	-40 °C to +105 deg °C
Ambient operating temp	-40 °C to +85 deg °C
MTBF	1.5 Million hours
RoHS Compliant	RoHS6 Compliant

Ordering Information

Model number	Description
AVO250-48S28PB-6L	3.8 mm pin length; positive on/off logic; with base plate; R6 compliant
AVO250-48S28B-6L	3.8 mm pin length; negative on/off logic; with base plate; R6 compliant

Mechanical Drawings



Pin length option

Device code suffix	L
-4	4.8 mm ± 0.25 mm
-6	3.8 mm ± 0.25 mm
-8	2.8 mm ± 0.25 mm
None	5.8 mm ± 0.25 mm

Pin Designations (AVO250-48S28B-6L)

Pin No.	Name	Function
1	V_{in+}	Positive input terminal
2	Remote ON/OFF	ON/OFF control terminal
3	V_{in-}	Negative input terminal
4	V_{o-}	Negative output terminal
5	S-	Negative remote sense
6	Trim	Output voltage trim
7	S+	Positive remote sense
8	V_{o+}	Positive output terminal

Notes:

1. All specifications are subject to change without notice. Mechanical drawings are for reference only.
2. Warranty: 2 years
3. Label and logo appearance may vary from what is shown on mechanical drawings.

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