

FEATURES

- Output voltage of 24
 V DC
- Output current of 13
 A
- Power rating of 300
 W
- PCB mounting type
- 199 mm (length) x 99 mm (width) x 50 mm (depth)
- Efficiency rating of 87%
- Operating temperature of -30°C to +70°C

RS PRO, 300W Embedded Switch Mode Power Supply SMPS, 24V dc, Enclosed

RS Stock No.: 161-8229



RS Professionally Approved Products bring to you professional quality parts across all product categories. Our product range has been tested by engineers and provides a comparable quality to the leading brands without paying a premium price.



Product Description

This 300 W embedded switch-mode power supply (SMPS) is the just right for the job. This electronic circuit with switching regulator is part of our trusted RS PRO range. While mains electricity is supplied as AC, some electronic equipment and most battery-powered devices require DC. SMPSs have grown in popularity against traditional power converters in recent years for their compact size and overall improved efficiency.

General Specifications

Mounting Type	PCB
Package Type	Enclosed
MTBF	200000 h
Applications	Industrial control system, Mechanical and electrical equipment

Electrical Specifications

Input Specification	
Voltage Range	120Vdc to 370V dc, 90Vac to 264Vac
Frequency	47 to 63Hz
AC Current Rating	< 4.5A
Inrush Current	<50A@230Vac, <30A@115Vac
Leakage Current (max.)	Input-Output:<0.25mA, Input-PG:<1.0mA

Embedded Switch Mode Power Supplies (SMPS)



Output Specification	
Number of Outputs	1
DC Voltage	24V
Ripple & Noise (max.)	<150mVp-p
Rated Current	13A
Rated Power	300W
Voltage Tolerance	±1.0%
Line Regulation	±0.5%
Load Regulation	±1.0%

Voltage Adj. Rang	5%~10% of Rated Output Voltage
Rise Time	<2 Seconds - 230Vac at 100% Load
Hold Up Time	>10mS - 230Vac at 100% Load
Overload Protection	105~150% rated output current
Short Circuit Protection	Yes
Isolation Resistance	> 100M Ohms

Mechanical Specifications

Overall Dimensions	199mm x 99mm x 50mm
Overall Length	199mm
Overall Depth	99mm
Overall Width	50mm
Weight	11.6kg

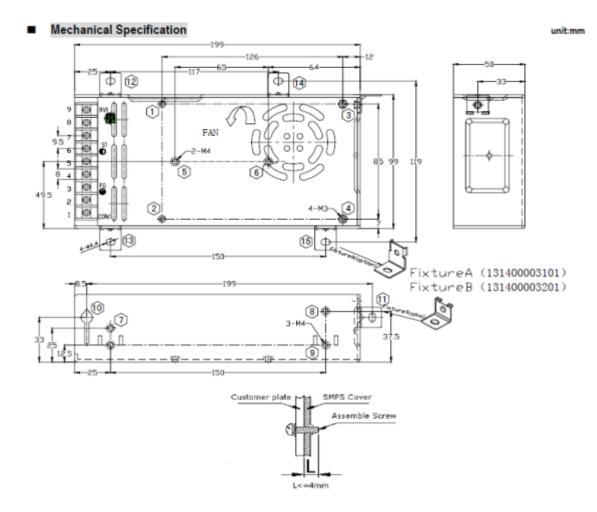
Operation Environment Specifications

Operating Humidity	20% to 90% RH non-condensing
Cooling	Natural convection
Operating Temperature Range	-20°C to +65°C
Storage Temperature Range	-40°C to 85°C
Altitude During Operation	5000m
Vibration Resistance	10 ~ 500Hz, 2G, 10 minute cycle, X, Y, Z 60 minute in each direction



Approvals

Safety Standard	UL60950-1, EN60950-1: 2006 IEC 60950-1:2005
EMC Emission	Compliance to EN55022 Class B



Embedded Switch Mode Power Supplies (SMPS)



Block Diagram

