

EC2SC

14.4-25 WATT DC-DC CONVERTERS

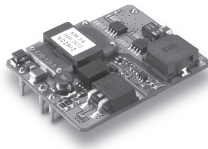


Features

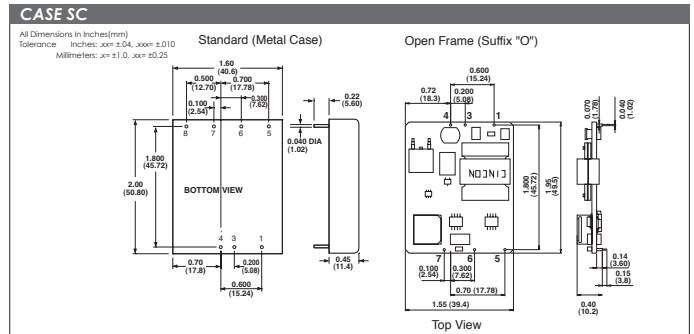
- 14.4-25W Isolated Output
- Efficiency to 90%
- 2" x 1.6" Six-Sided Shield Metal Case or Open Frame Design
- Fixed 300kHz Switching Frequency
- Continuous Short Circuit Protection
- Regulated Outputs
- Remote On/Off Control

MODEL NUMBER	INPUT VOLTAGE	OUTPUT VOLTAGE	OUTPUT CURRENT		INPUT CURRENT		% EFF.	SIZE
			MIN.	MAX.	NO LOAD	FULL LOAD		
EC2SC-12S18	9-18 VDC	1.8 VDC	0mA	8000mA	95mA	1411mA	85	2"x1.6"
EC2SC-12S25		2.5 VDC		8000mA	95mA	1894mA	88	
EC2SC-12S33		3.3 VDC		6000mA	100mA	1875mA	88	
EC2SC-12S05		5.0 VDC		5000mA	105mA	2431mA	89	
EC2SC-12S12		12 VDC		2000mA	60mA	2299mA	87	
EC2SC-12S15	15 VDC	1600mA	85mA	2325mA	86			
EC2SC-24S18	18-36 VDC	1.8 VDC	0mA	8000mA	60mA	714mA	84	2"x1.6"
EC2SC-24S25		2.5 VDC		8000mA	55mA	947mA	88	
EC2SC-24S33		3.3 VDC		6000mA	55mA	927mA	89	
EC2SC-24S05		5.0 VDC		5000mA	60mA	1157mA	90	
EC2SC-24S12		12 VDC		2000mA	30mA	1149mA	87	
EC2SC-24S15	15 VDC	1600mA	50mA	1162mA	86			
EC2SC-48S18	36-75 VDC	1.8 VDC	0mA	8000mA	30mA	357mA	84	2"x1.6"
EC2SC-48S25		2.5 VDC		8000mA	30mA	473mA	88	
EC2SC-48S33		3.3 VDC		6000mA	40mA	463mA	89	
EC2SC-48S05		5.0 VDC		5000mA	40mA	579mA	90	
EC2SC-48S12		12 VDC		2000mA	20mA	568mA	88	
EC2SC-48S15	15 VDC	1600mA	20mA	574mA	87			

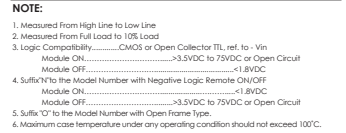
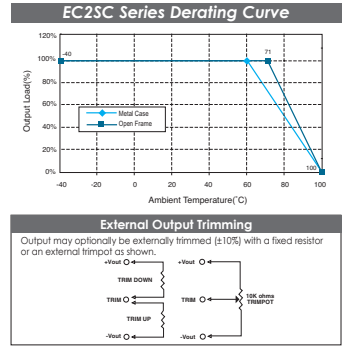
NOTE: 1. Nominal Input Voltage 12, 24 or 48 VDC



Specifications	
INPUT SPECIFICATIONS:	
Input Voltage Range.....	12V.....9-18V 24V.....18-36V 48V.....36-75V
Under Voltage Lockout.....	12Vin Power Up.....8.8V 12Vin Power Down.....8.0V 24Vin Power Up.....17V 24Vin Power Down.....16V 48Vin Power Up.....34V 48Vin Power Down.....32V
Positive Logic Remote ON/OFF (see note 3 & 4)	.....PI Type
Input Filter.....	.....PI Type
OUTPUT SPECIFICATIONS:	
Voltage Accuracy.....	.....±1.0% max.
Transient Response: 75% - 100% Step Load Change	.....<300us
Error Band.....	.....±5% Vout Nominal, Recovery Time
Output Voltage Adjustment Range.....	.....90% - 110%Vo
Ripple & Noise, 20MHz BW (Measured with 0.1µF MLCC)	.....1.8V & 2.5V & 3.3V & 5V.....20mVrms max., 75mVpk-pk max. 12V & 15V.....20mVrms max., 100mVpk-pk max.
Temperature Coefficient.....	.....±0.02%/°C
Line Regulation.....	.....±0.5% max.
Load Regulation.....	.....±0.5% max.
Over Voltage Protection (Zener Diode Clamp)	.....1.8V.....3.3VDC Typ., 2.5V.....3.3VDC Typ. 3.3V.....3.3VDC Typ., 5V.....6.2VDC Typ. 12V.....15VDC Typ., 15V.....18VDC Typ.
Output Current Limit, % Nominal Output.....	.....110% - 150%
Output Short Circuit Protection.....	.....Continuous (Hiccup Mode)
GENERAL SPECIFICATIONS:	
Efficiency.....	.....See Table
Isolation Voltage.....	.....Input/Output.....1500VDC max.
Isolation Resistance.....	.....10 Ohm min.
Switching Frequency.....	.....300kHz, Typical
Operating Ambient Temperature.....	.....-40°C to +85°C
De-Rating:	.....Metal Case: Above 71°C.....Linearly to Zero Power at 100°C.....Open Frame: Above 60°C.....Linearly to Zero Power at 100°C
Case Temperature.....	.....100°C max.
Cooling.....	.....Natural Convection
Storage Temperature.....	.....-55°C to +125°C
Thermal Shutdown, Case Temperature.....	.....110°C Typical
Dimensions:	.....Metal Case: 2.00 x 1.60 x 0.45 inches (50.8 x 40.6 x 11.4mm) .....Open Frame: 1.95 x 1.55 x 0.40 inches (49.5 x 39.4 x 10.2mm)
Metal Case Material:	.....Block Cooled Copper with Non-Conductive Base
Weight:	.....Metal Case: 55g, Open Frame: 25g



All Specifications Typical At Nominal Line, Full Load and 25°C Unless Otherwise Noted.



PIN CONNECTION	
Pin	Function
1	On/Off Control
3	-V Input
4	+V Input
5	Trim
6	-V Output
7	+V Output
8	No Pin