

**150W Single Output DC-DC Converter****SD-150 series****■ Features :**

- 2:1 wide input range
- Protections: Short circuit / Overload / Over voltage
- 1500VDC I/O isolation
- Built-in EMI filter, low ripple noise
- 100% full load burn-in test
- 24V and 48V input voltage design refer to LVD
- Low cost
- High reliability
- 2 years warranty

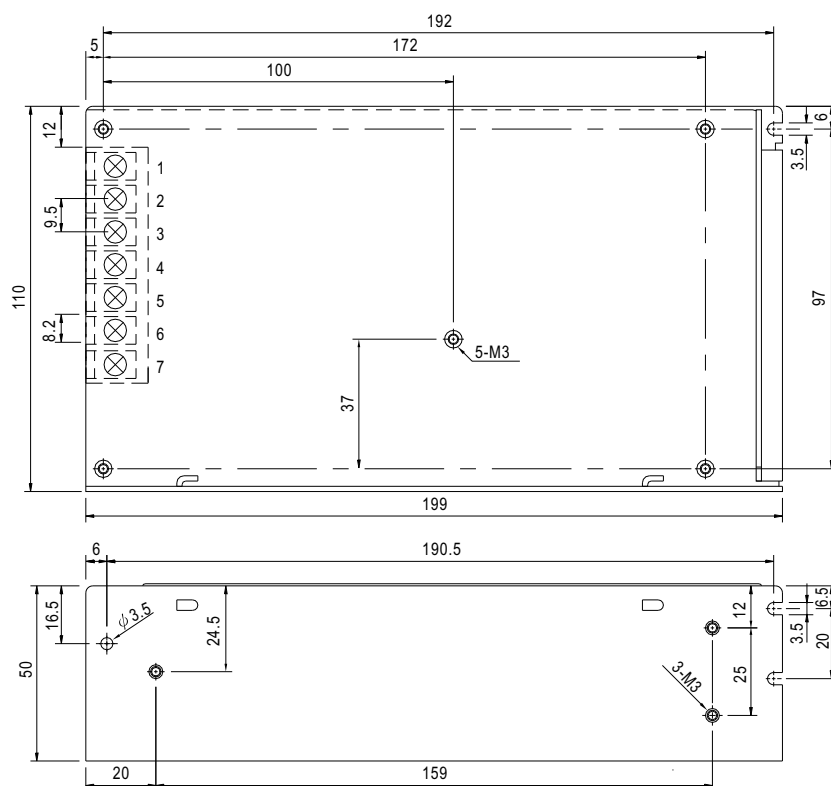
CB (for D type only) **CE****SPECIFICATION**

SPECIFICATION								
MODEL		SD-150B-12	SD-150C-12	SD-150D-12	SD-150B-24	SD-150C-24	SD-150D-24	
OUTPUT	DC VOLTAGE	12V			24V			
	RATED CURRENT	12.5A			6.3A			
	CURRENT RANGE	0 ~ 12.5A			0 ~ 6.3A			
	RATED POWER	150W			151.2W			
	RIPPLE & NOISE (max.) Note.2	120mVp-p			150mVp-p			
	VOLTAGE ADJ. RANGE	11 ~ 16VDC			23 ~ 30VDC			
	VOLTAGE TOLERANCE Note.3	±1.0%			±1.0%			
	LINE REGULATION	±0.5%			±0.3%			
	LOAD REGULATION	±0.5%			±0.3%			
	SETUP, RISE TIME	2s, 50ms(only D mode) at full load						
	HOLD UP TIME (Typ.)	24ms(only D mode) at full load						
INPUT	VOLTAGE RANGE	B:19 ~ 36VDC		C:36 ~ 72VDC	D:72 ~144VDC or 85 ~ 132VAC			
	EFFICIENCY (Typ.)	75%	77%	79%	77%	80%	82%	
	DC CURRENT (Typ.)	6.8A/24V	3.4A/48V	2.7A/96V	6.8A/24V	3.4A/48V	2.7A/96V	
	INRUSH CURRENT (Typ.)	D:22.5A/96VDC						
	LEAKAGE CURRENT	<0.75mA / 120VAC (SD-150D)						
PROTECTION	OVERLOAD	105 ~ 135% rated output power Protection type : Hiccup mode, recovers automatically after fault condition is removed						
	OVER VOLTAGE	16.8V ~ 20V/10% LOAD				31.5 ~ 37.5V/10% LOAD		
		Protection type : Hiccup mode, recovers automatically after fault condition is removed						
ENVIRONMENT	WORKING TEMP.	-10 ~ +60℃ (Refer to output load derating curve)						
	WORKING HUMIDITY	20 ~ 90% RH non-condensing						
	STORAGE TEMP., HUMIDITY	-20 ~ +85℃, 10 ~ 95% RH						
	TEMP. COEFFICIENT	±0.03%/℃ (0 ~ 50℃)						
	VIBRATION	10 ~ 500Hz, 2G 10min./1cycle, 60min. each along X, Y, Z axes						
SAFETY & EMC (Note 4)	SAFETY STANDARDS	IEC60950-1 CB approved by TUV (for D type only)						
	WITHSTAND VOLTAGE	I/P-O/P:1.5KVAC I/P-FG:1.5KVAC O/P-FG:0.5KVAC						
	ISOLATION RESISTANCE	I/P-O/P, I/P-FG, O/P-FG:100M Ohms / 500VDC / 25℃ / 70% RH						
	EMI CONDUCTION & RADIATION	Compliance to EN55022 (CISPR22) Class B						
	EMS IMMUNITY	Compliance to EN61000-4-2,3,4,6,8; ENV50204, light industry level, criteria A						
OTHERS	MTBF	296.2K hrs min.(SD-150B)		289.9K hrs min.(SD-150C)		289K Hrs min.(SD-150D)		MIL-HDBK-217F (25℃)
	DIMENSION	199*110*50mm (L*W*H)						
	PACKING	0.86Kg; 16pcs/14.5Kg/0.95CUFT						
NOTE	1. All parameters NOT specially mentioned are measured at 24,48,96VDC input, rated load and 25℃ of ambient temperature. 2. Ripple & noise are measured at 20MHz of bandwidth by using a 12" twisted pair-wire terminated with a 0.1uf & 47uf parallel capacitor. 3. Tolerance : includes set up tolerance, line regulation and load regulation. 4. The power supply is considered a component which will be installed into a final equipment. The final equipment must be re-confirmed that it still meets EMC directives.							



■ Mechanical Specification

Case No. 906 Unit:mm



Terminal Pin No. Assignment

Pin No.	Assignment	Pin No.	Assignment
1,2	INPUT ※	4,5	DC OUTPUT -V
3	FG $\perp$	6,7	DC OUTPUT +V

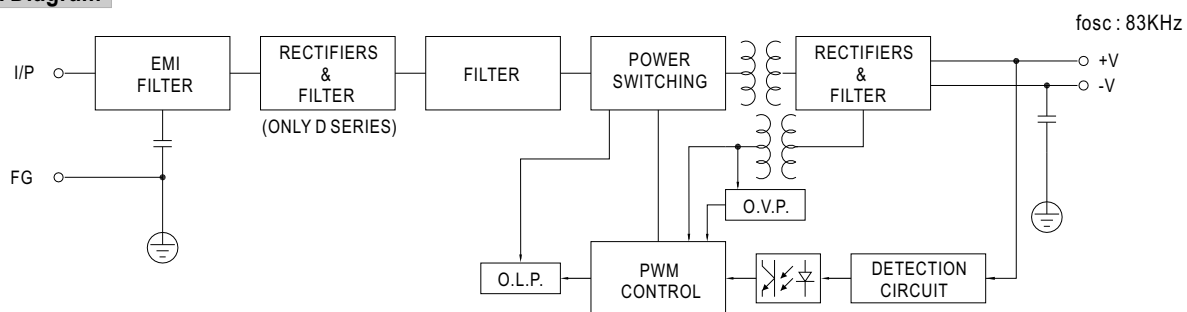
※ SD-150B,C

Pin No.	Assignment
1	DC INPUT V+
2	DC INPUT V-

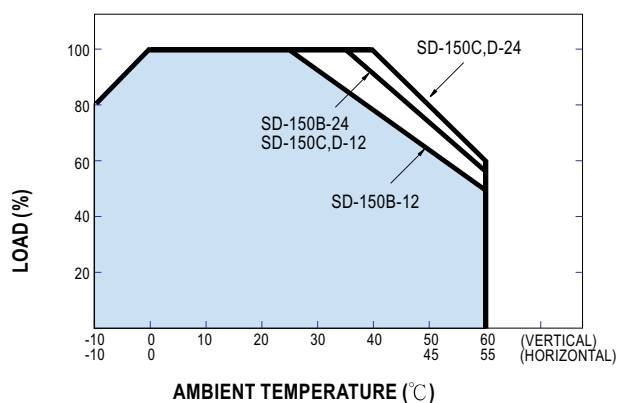
※ SD-150D

Pin No.	Assignment
1,2	AC/DC INPUT

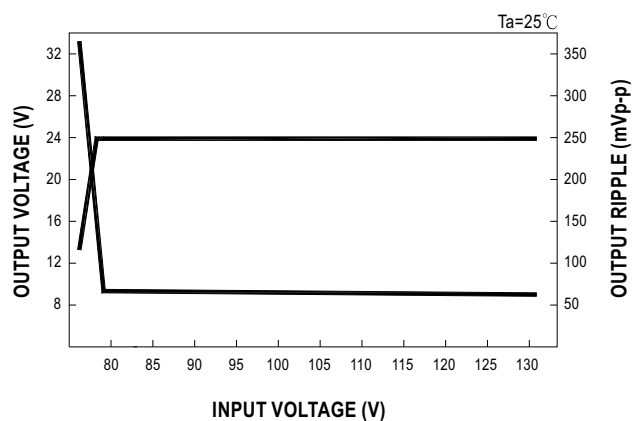
■ Block Diagram



Derating Curve



■ Static Characteristics (24V)



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Komponenten für Steuerungsbau und Industrieelektronik

File Name:SD-150-SPEC 2009-04-21