

FEATURES:

- Wide input range
- Continuous short-circuit protection, self recover
- I/O isolation voltage 1.5KV
- Working temperature: -40°C~+105°C
- No additional components required
- Stable performance and high reliability (MTBF≥2 million hours)
- Industry standard pin-out
- Flame-retardant case to meet UL94-V0 requirements
- SMD package

Selection Guide

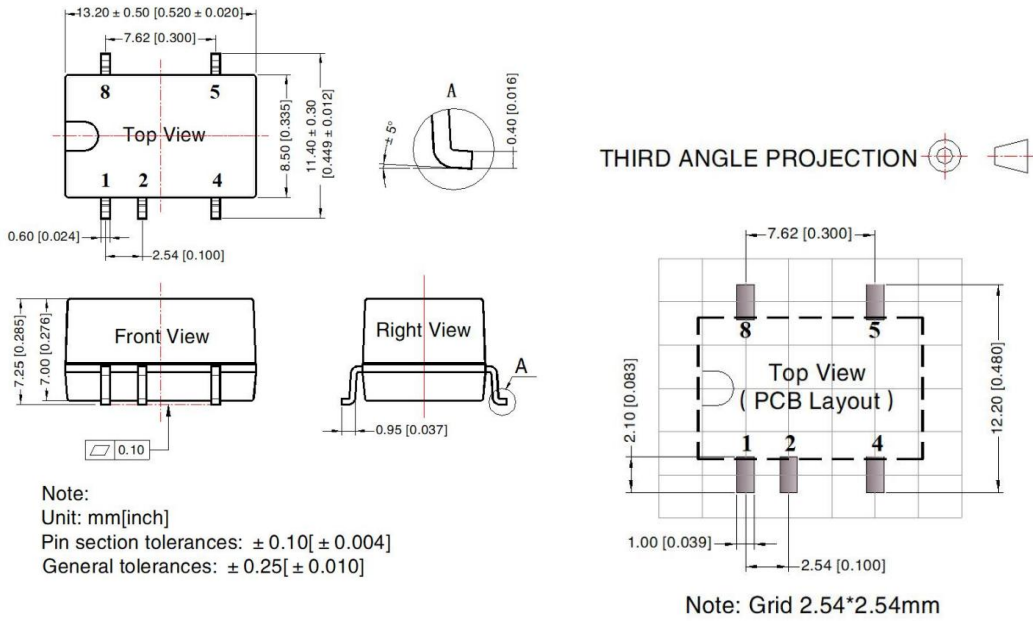
Part No.	INPUT		OUTPUT			Full Load Efficiency (%/Typ)	Capacitive Load(μF)
	Normal (Vdc)	Range (Vdc)	Voltage (Vdc)	Min current (mA)	Max current (mA)		
B0303XT-1WR3	3.3	2.97-3.63	3.3	30	303	77	2400
B0305XT-1WR3			5	20	200	82	2400
B0309XT-1WR3			9	12	111	84	1000
B0312XT-1WR3			12	9	84	84	560
B0315XT-1WR3			15	7	67	84	560
B0324XT-1WR3			24	43	42	84	220
B0503XT-1WR3	5	4.5-5.5	3.3	30	303	74	2400
B0505XT-1WR3			5	20	200	82	2400
B0509XT-1WR3			9	12	111	83	1000
B0512XT-1WR3			12	9	84	83	560
B0515XT-1WR3			15	7	67	83	560
B0524XT-1WR3			24	43	42	85	220
B1203X5-W2R3	12	10.8-13.2	3.3	7	76	66	2400
B1203XT-1WR3			3.3	30	303	76	2400
B1205XT-1WR3			5	20	200	82	2400
B1209XT-1WR3			9	12	111	83	1000
B1212XT-1WR3			12	9	84	83	560
B1215XT-1WR3			15	7	67	83	560
B1224XT-1WR3			24	43	42	85	220
B1505XT-1WR3	15	13.5-16.5	5	20	200	82	2400
B1509XT-1WR3			9	12	111	82	1000
B1515XT-1WR3			15	7	67	83	560

customized accepted ,pls contact sales for details

Input Specifications

Input Filter	Capacitive Filter	
Ctrl	NONE	
	NONE	

Hot Plug	Unavailable		
Output Specifications			
Item	Typ	Max	Test Conditions
Voltage Accuracy	±1%	±3%	input voltage range and load
Line Regulation	±0.2%	±0.5%	Input voltage from low to high voltage, full load
Load Regulation	±0.5%	±1%	10% to 100% full load
Ripple&Noise	50mVp-p	150mVp-p	20MHz Bandwidth, full load
General Specifications			
Switching Frequency	300KHz(Typ)	100% full load, nominal input voltage	
Short-Circuit Protection	Continuous, self-recovery		
Case Temperature Rise	15°C (Typ)		
Temperature Coefficient	0.03%/°C	100% full load	
Pin Soldering Resistance Temperature	300°C	Soldering spot is 1.5mm away from case for 10 seconds	
Isolation (Input-Output)	1.5KVDC	Input-output electric strength test for 1 minute with a leakage current	
Insulation Resistance (Input-Output)	1000MΩ	Input-output resistance 500Vdc	
Operating Temperature	-40~+105°C		
Storage Temperature	-55~+125°C		
Storage Humidity	<95%	Non-condensing	
Cooling Method	Free air convection		
Case Material	Black plastic; flame-retardant and heat-resistant (UL94 V-0)		
Weight	1.3g (Typ)		
**Unless specified, otherwise all other parameters are tested under the following conditions: nominal input voltage, pure resistive load, 25°C room temperature environment.			
Dimensions and Recommended Layout			



Pins

Pin	Mark		
1	GND		
2	Vin		
4	0V		
5	+Vo		
8	NC		

Recommended Circuit



Recommended input and output capacitor values

Vin	Cin	Vout	Cout	
5VDC	4.7uF/16V	3.3/5VDC	10uF/16V	
		9VDC	4.7uF/16V	
		12VDC	2.2uF/25V	
		15VDC	1uF/25V	
		24VDC	0.47uF/50V	

Noted

1. Input current: Ensure that the output current of the power supply meets the instantaneous starting current of the power module (that is, twice the average input current of the power module).
2. Output load requirements: Avoid no-load use. When the actual power consumption of the load is less than 10% of the rated output power of the module or no load occurs, connect an external resistance to the output end (the sum of the external resistance and the load power is

greater than or equal to 10% of the rated load) or select a module with a smaller rated power.

3. The external capacitance of the output end should not be too large; otherwise, the module may be overcurrent or poorly started. For details, see the external capacitance recommendation table.

4. External LC filter circuit can be connected for occasions with high ripple noise requirements.