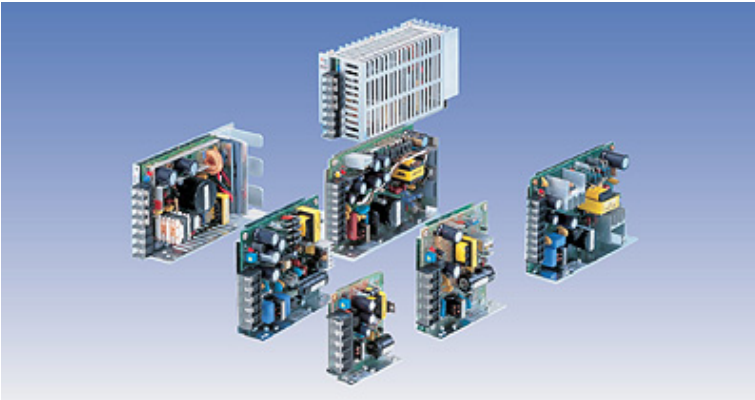


30 WATT AC-DC CONVERTER ERT-00B SERIES



General Description

"ER"-Series AC/DC Switching power supplies are open frame, low cost with high efficiency. 65 different models are available from low to medium power. A low power modules use a simple RCC circuit while high power supplies employ a forward converter.

Features

1. Open Frame
2. Cost Effective
3. High Efficiency
4. No derating without cover and horizontal mounting
5. Input 170-264Vac
6. EMI : complies with FCC/A, FCC/B for ERD & ERE
7. Over voltage protection

Cover(add suffix "-P")

***"P" model dimension is same as "without cover" model

Specifications<AC/DC>	Model										
	ERT**B 30WATTS/3OUTPUTS			ERT01B	ERT03B	ERT04B					
Input Voltage	AC200V(DC260V)										
Input Range	AC 170-264V(DC 220-350V)										
Input Frequency	50/60Hz										
Input Frequency Range	47-440Hz										
Phase	Single										
Inrush Current *1	30A(maximum)at AC200V										
Efficiency [%] (typical) *2	71			70			68				
Output Characteristic											
Output Voltage [V]	5	+12	-12	5	+12	-5	5	+15	-15		
Output Current [A]	0.5-3	1.2	0.3	0.5-3	1.2	0.3	0.5-3	0.5	0.5		
Voltage Adjust Range	V1:+3%/-0% of Rated Output Voltage(at no load within the input range) V2:fixed with tolerance of +/-3.5% (at no load within the input range)										
Ripple and Noise [mVp-p](maximum) *3	100	170	170	100	170	100	100	200	200		
Regulation											
a.Statistic Line Regulation [mV](maximum)	25	60	60	25	60	25	25	75	75		
b.Statistic Load Regulation [mV](maximum)	50	120	120	50	120	50	50	150	150		
c.Temperature Coefficient *4	0.03%/°C										
d.Drift[mV](maximum) *5	40	75	75	40	75	40	40	90	90		
e.Dynamic Load Regulation [mV](typical) *6	not specified										
f.Recovery Time *6	not specified										
Rise up time	200mS(maximum) at 25°C and rated input/output										
Hold up time	20mS(minimum) at 25°C and rated input/output										
Functions											
Overcurrent Protection Current[A]	≥ 115% of Rated Output			V1:Current Limiting with automatic recovery V2,V3:by the regulator I.C's characteristics							
Overvoltage Protection Voltage[V]	≥ 115% of Rated Output			V1:Zener diode clamping V2,V3:not available							
Remote Sense	not available										
Remote On/Off	not available										
Environmental											
Operating Temperature	-5 to +50°C [enclosed type:-5 to 50°C at vertical mount/-5 to 40°C at horizontal mount]										
Operating Humidity	85% RH(non-condensing)										
Storage Temperature	-20 to +85°C										
Storage Humidity	85% RH(non-condensing)										
Withstanding Voltage	Primary-Secondary AC2,500V for 1minute Primary-Frame Ground AC2,500V for 1minute Secondary-Frame Ground AC500V for 1minute										
Isolation Resistance	Primary-Secondary-Frame Ground 50MΩ(minimum) by DC500V insulation tester										
Vibration	5-10Hz:10mm double amplitude,10-55Hz:19.6m/s ² ,20minutes' period for 60minutes each along X,Y,Z axes(non-operating)										
Shock	294m/s ²										
Cooling	Convection										
? Leakage Current	1mA(maximum) at 25°C ,rated input/output and rated input frequency										
? Line conducted noise	Built to meet FCC Part15-B Class B										
? Safety											
? Weight (typical)	400g/enclosed type:490g										
? MTBF [H]	600,000										
? Switching Frequency[kHz](typical) *7	30										

Conditions:

- *1 at cold start
- *2 at DC260V input and rated output
- *3 measured by a bayonet probe at output connector at 0 to 100MHz bandwidth
- *4 at -5 to +50°C/enclosed type: at -5 to +40°C
- *5 for 7hour period after 1hour warm-up at 25°C and rated input/output
- *6 when output current changed from 25% to 75% of rated output current rapidly at AC100V input
- *7 variable on input voltage and load conditions

