NOT RECOMMENDED FOR NEW DESIGNS

LAST TIME BUY: 30TH OCT 2020, 3.3SA, 05SA, 15SA, 24SA, 05DA, 12DA, 15DA LAST TIME BUY: 30TH OCT 2020, "-E" & "-ST" VERSION

Features

- AC-DC Power Supply • 5 Watt PCB Mount Package Universal Input Voltage Range
 - **3000VAC Isolation**

Regulated **Converters**

- Low Output Ripple and Noise
- Short Circuit Protected
- UL Approved, CE Marked

Selection Guide

Part Number	Input Range (VAC)	Output Voltage (VDC)	Output Current (mA)	Efficiency (%)	Max Capacitive Load
RAC05-12SA	90-264	12	416	70	4000µF
NRND (Last ti	me buy: 30	th Oct 2020)			
Part Number	Input Range (VAC)	Output Voltage (VDC)	Output Current (mA)	Efficiency (%)	Max Capacitive Load
RAC05-3.3SA	90-264	3.3	1500	62	40000µF
RAC05-05SA	90-264	5	1000	65	19000µF
RAC05-15SA	90-264	15	333	70	3500µF
RAC05-24SA	90-264	24	200	71	900µF
RAC05-05DA	90-264	±5	±500	70	±9500µF
RAC05-12DA	90-264	±12	±200	67	±1400µF
RAC05-15DA	90-264	±15	±160	67	±950µF

*add suffix "-E" for extended temperature range, e.g. RAC05-05SA-E

*add suffix "-ST" for screw terminal module e.g. RAC05-05SA-ST, RAC05-05DA-E-ST

Specifications (typical at 25°C and after warm up time unless otherwise sr

opecifications (typical at 20 0 and a	inter warm up time unless	ourierwise specified)		
Input Voltage Range		90-264VAC or 120-370VDC		
Rated Power		5 Watts max		
Input Frequency Range (for AC Input)	47-440Hz			
Input Current (full load)	115VAC/230VAC	120mA /70mA max.		
No Load Power Consumption	115VAC/230VAC	1.18W max.		
Inrush Current (<2ms)	115VAC	10A max. (-E = 23A max.)		
	230VAC	20A max. (-E = 46A max.)		
Leakage Current		0.75mA max		
Output Voltage Accuracy (full load)		±2%		
Line Voltage Regulation (low line, high line at full load) $\pm 0.3\%$ t				
Load Voltage Regulation (5% to 100% full	l load)	±0.5% typ		
Output Ripple and Noise (20MHz limited)	Ripple	<0.2% Vout + 40mVp-p max		
	Noise	0.5% Vout + 50mVp-p max		
Operating Frequency		100kHz typ		
Efficiency at full Load		see table		
RMS Isolation Voltage (input to output)		3kVAC / 1minute		
Temperature Coefficient		±0.02%/°C typ		
Isolation Resistance		100 M Ω max		
Short Circuit Protection		Hiccup, Automatic Restart		
Operating Temperature Range	Standard	-25°C to +70°C		
(free air convection, with derating)	Suffix -E	-40°C to +70°C		
Storage Temperature Range		-40°C to +85°C		
Humidity		95% RH max		
Case Material		Epoxy with Fibreglass (UL94V-0)		
Package Weight		80g		
Packing Quantity		5 pcs (-ST Version: 1 pc)		
EMC		EN 55022 ClassB / EN 50082-1		
MTBF (+25°C)	using MIL-HDBK-217F	300 x 10 ³ hours		



AC/DC-Converter with 3 year Warranty



5 Watt Single/Dual Output

FERRED ALTERNATIVES consider these alternatives:
RAC10-K/277 Series
RAC05-K/277 Series

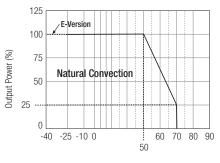


UL-60950-1 Certified



Derating-Graph

(Ambient Temperature)



Ambient Temperature Range (°C)

Refer to Application Notes

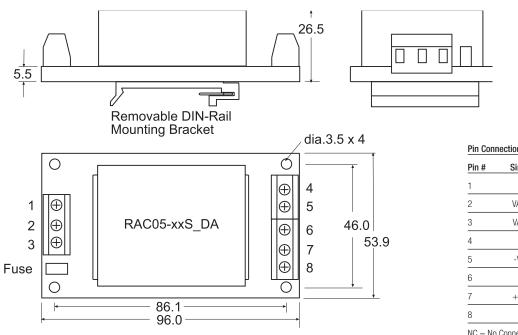
Series

RAC05-S_DA

POWERLINE

AC/DC-Converter

Screw Terminal Module Option (suffix -ST)



Pin #	Single Out	Dual Out
1	FG	FG
2	VAC in (N)	VAC in (N)
3	VAC in (L)	VAC in (L)
4	NC	NC
5	-VDC out	-VDC out
6	NC	Com
7	+VDC out	+VDC out
8	NC	NC

Standard Package Style and Pinning

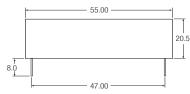
н

1 FG

∘2 N

17.5

17.5



Bottom View

10.0

10.0

1



Pin #	Single Out	Dual Out	
1	FG	FG	
2	VAC in (N)	VAC in (N)	
3	VAC in (L)	VAC in (L)	
4	-VDC out	-VDC out	
5	No Pin	Com	
6	+VDC out	+VDC out	

Pin Connections-

Standard Application Circuit

Suggested fuse rating	L O Fuse	VACin (L)	Vout+	Load	- — —
1A Slow Blow	e O	— FG	(Com)		Load
	N O	VACin (N)	Vout	Load	
				Dual	Single

The product information and specifications may be subject to changes even without prior written notice. The product has been designed for various applications; its suitability lies in the responsibility of each customer. The products are not authorized for use in safety-critical applications without RECOM's explicit written consent. A safety-critical application is an application where a failure may reasonably be expected to endanger or cause loss of life, inflict bodily harm or damage property. The applicant shall indemnify and hold harmless RECOM, its affiliated companies and its representatives against any damage claims in connection with the unauthorized use of RECOM products in such safety-critical applications.