



Read this document carefully before using this device. The guarantee will be expired by damaging of the device if you don't attend to the directions in the user manual. Also we don't accept any compensations for personal injury, material damage or capital disadvantages.

ENDA ERCA1 Rail Mountable Proportional Solid State Relays With Integrated Heat Sink

Thank you for choosing ENDA ERCA1 Proportional Solid State Relays.

- * 25-40-50-70A AC load current.
- * 280-480-500V AC load voltage.
- * 4-20 mA input signal.
- * LED status indicator for input signal.
- * AC voltage can be controlled with the phase angle.
- * For peak voltage with varistor protection.
- * Rail mountable.
- * CE marked according to European Norms.

ORDER CODE		ER		C		A		1		-		5		50		PA		-F	
Product Basic Code		Rail mountable		ER												Option		Fan	
Input signal		4-20mA		C												Switching		Phase angle	
Load voltage		AC		A												Load Current		25A AC	
Number of pole		Single pole		1												Load voltage		180-300V AC	
																		40	
																		50	
																		70A AC	
																		2	
																		4	
																		5	



R^{HS}
Compliant

ENVIRONMENTAL CONDITIONS	
Ambient/storage temperature	-25... +60 °C / -30... +100 °C (Shouldn't be icing and condensation in ambient.)
Relative humidity	50% Relative humidity for +40°C temperature increases up to 90% at +20°C. (Shouldn't be condensation)
Pollution degree	2
Overvoltage category	II
Altitude	Max. 1000m
Protection	IP20 According to EN60529
Do not use the device in locations subject to corrosive and flammable gases.	

OUTPUT	ERCA1-225PA	ERCA1-240PA	ERCA1-425PA	ERCA1-440PA	ERCA1-550PA-F	ERCA1-570PA-F
Order code						
Load Current, AC51/25°C (Arms)	25	40	25	40	50	70
Load voltage (Vrms)	180 - 280		180 - 480		180 - 500	
Overload current t=1s/25°C (Arms)	85	150	70	110	180	400
Non rep.surge current/25°C (Arms)	250	400	190	290	270	600
On-state voltage drop (Vrms)	1,6		1,8		1,8	
Leakage current (mArms)	5		8		10	15
I ² t for fusing t=10ms (A ² s)	340	880	265	610	720	4000
Frequency (Hz)	50- 60		50 - 60		50 - 60	
Power factor (CosΦ)	>0,75		>0,75		>0,50	
Minimum operating current (mArms)	160		200		300	400

INPUT	
Input signal	4-20 mA (Device may be damaged at >30mA and above currents)
Transmission signal	>4,1 mA
Drop-out signal	<4,1 mA
Turn-on time	15ms
LED indicator	Lights up in proportional with input signal
Dynamic input impedance	>550 Ω
Protection	Protection against the inverse of the input signal is connected.

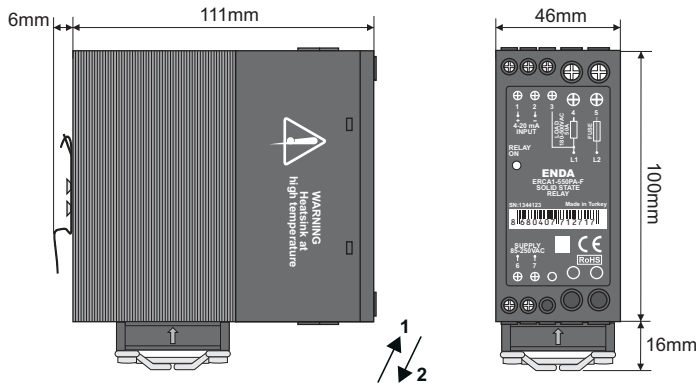
GENERAL			
Order code	ERCA1-x25PA	ERCA1-x40PA	ERCA1-5xxPA
Dimensions	G24xY84xD97mm	G30xY84xD115mm	G46xY100xD124mm
Weight	Approx. 203 g (After packaging)	Approx. 280 g (After packaging)	Approx. 450 g (After packaging)
Isolation Voltage	2500 Vrms between I/O terminals for 1 min.		
Connection	M4 screw-type (Can be connected 2x4mm ² or insulated cable terminal can be connected with 1x6mm ² cable.)		For power line 16mm ² cable (with 25mm ² cable terminal). Cable, for signal line can be connected with 4mm ² cable.
Terminal screw torque	Max. 1,2Nm		
Product standard	EN 60947-4-3		
Mounting	Rail mountable (EN60715, TH35 or G-32)		
Enclosure material	Self extinguishing plastics (According to EN 60695-11-10 V-O)		
Fan (option)	none	none	Thermostat-controlled, operates at 50°C.



While cleaning the device, solvents (thinner, benzene, acid etc.) or corrosive materials must not be used.

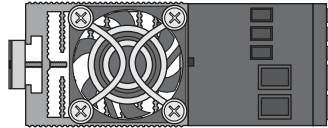
DIMENSIONS

For ERCA1-550PA-F ;

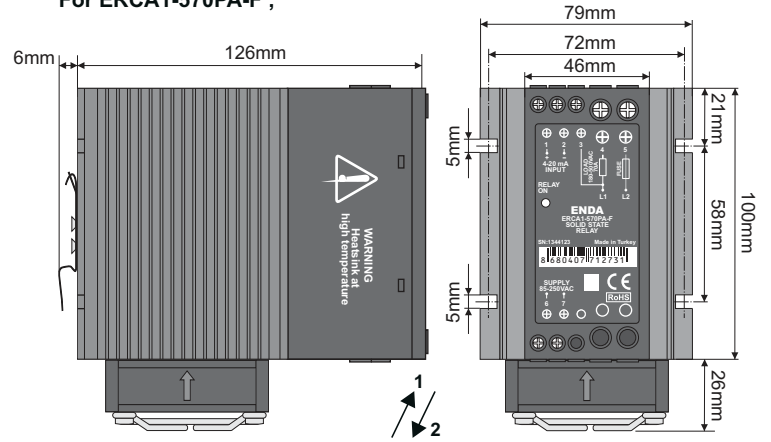


- For removing the device from the panel;
Pull up in direction 1

- For mounting the device to the panel;
Push down in direction 2

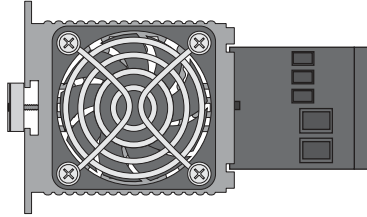


For ERCA1-570PA-F ;

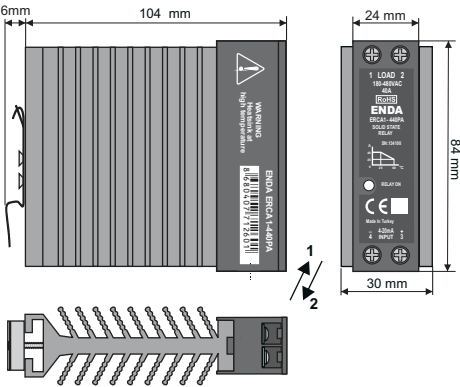


- For removing the device from the panel;
Pull up in direction 1

- For mounting the device to the panel;
Push down in direction 2

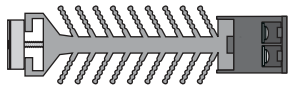


For ERCA1-x40PA ;

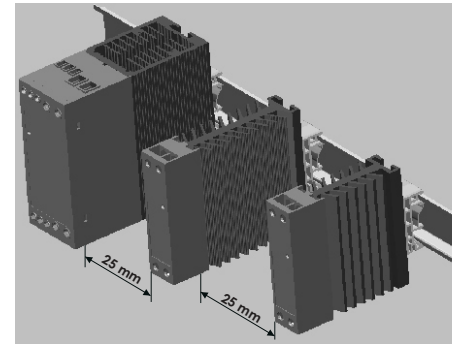
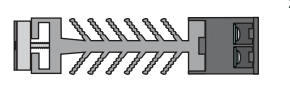
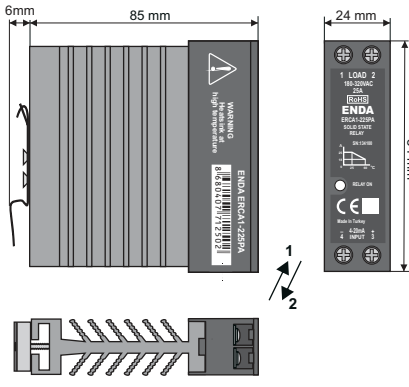


- For removing the device from the panel;
Pull up in direction 1

- For mounting the device to the panel;
Push down in direction 2



For ERCA1-x25PA ;



APPLICATIONS

