

Power supply · regulated, 70 W

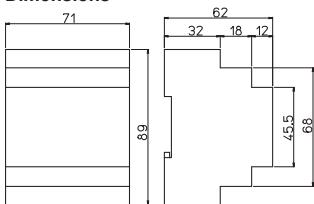
Primary switchmode power supply, PFC, Single-phase, Class 2

Input: wide-range input AC 90–264 V, DC 100–350 V

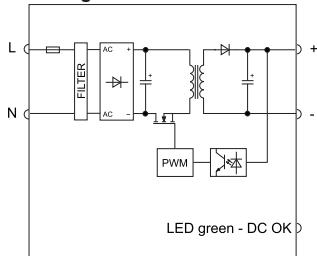
Output: DC 24 V, adjustable



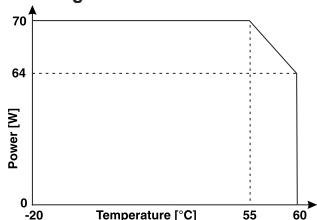
Dimensions



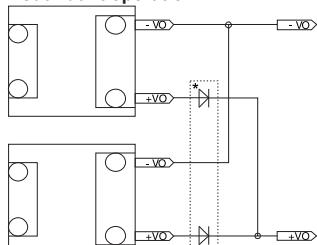
PIN assignment



Derating



Redundant operation



* Redundant Module 722987

Description	Part-No.	Type	PU
Screw terminal			
Output voltage/current	DC 24 V / 3 A	722789	CPSF1-70-24
			1
Input		CPSF1-70-24	
Nominal voltage		AC 115 / 230 V	
Operation voltage range		AC 90–264 V / DC 100–350 V (DC 300 V; UL508)	
Line frequency		47 – 63 Hz	
Rated current		$U_i = \text{AC } 100 \text{ V}: 1.25 \text{ A} / U_i = \text{AC } 240 \text{ V}: 0.80 \text{ A}$	
Inrush current		<30 A	
Internal fuse		T2 A / AC 250 V	
External fuse		Mini-circuit breaker: B 6 A, C 4 A	
Power Factor Correction P.F.C.		>0.6	
Output			
Rated voltage output		DC 24 V	
Rated current output		3 A	
Max. output current		4 A @ 24 V	
Short-circuit current		–	
Voltage trim range		23.5/27.5 V	
Accuracy		–	
Line regulation		–	
Load regulation		<1 %	
Rise time		–	
Temperature coefficient		–	
Ripple & Noise		<60 mV pp	
Hold up time		>10 ms (AC 120 V); >30 ms (AC 240 V)	
Status indication DC ON LED green		yes	
Status indication DC LOW LED red		No	
Parallel/redundant operation		max. 2 devices / via external diodes	
Efficiency		>87 % (AC 120 V); > 89 % (AC 240 V)	
Low power loss		–	
Rated over load protection		yes	
Over voltage protection		yes	
Short circuit characteristics		Hiccup-mode	
General			
Switching frequency		approx. 70 kHz	
Insulation voltage input/output		AC 3.0 kV _{eff}	
Insulation voltage input / ground		class 2, without PE	
Insulation voltage output / ground		class 2, without PE	
Insulation resistance at DC 500 V		– MΩ	
Operation temperature range		-20 °C – 60 °C (derating) (55°C UL508)	
Derating		>55°C: -1.2 W / °C	
Storage temperature range		-25 °C – 85 °C	
M.T.B.F.		750000 h to SN29500 / 250000 h to MIL Standard HDBK 217F	
Relative humidity		20–90% RH, non-condensing	
Dimensions (w × h × d) in mm		71.0 × 89.0 × 62.0	
Cooling		Natural air cooling, 10 mm distance right/left, 20 mm distance above/below	
Housing material		Noryl UL 94-0	
Field installation		rail TS 35 (EN 50022)	
Application height		– m	
Installation position		vertical	
Protection class		IP 20 (IEC529, EN60529)	
IP rating		II (SELV, PELV)	
Oversupply category		II	
Pollution degree		2	
Weight (kg/piece)		0.250	
Termination		Screw terminal: 0.2–2.5 mm ² , max. 0.56 Nm	
Approvals		UL, cUL: UL 508, IEC 950, EN 60950, UL 60950 CE: EN 61000-4-2/3/4/5/6/11, EN 61000-6-2, EN 601000-6-4, EN 50178, EN 61558, EN 61000-3-2, EN 50081-1, EN 50082-2, EN 55022 Class B, EN 55011B	
Monitoring			
DC ON Control (Rdy)		–	
Switching voltage		–	
Switching current		–	
Switching capacity		–	
Insulation voltage		–	