

IA599-01-01H

FPS1000 SERIES SPECIFICATIONS:		FPS1000-12	FPS1000-24	FPS1000-48	
1	Rated output voltage	V	12	24	48
2	Output voltage set point	V	12+/-1%	24+/-1%	48+/-1%
3	Output voltage range	V	10.5~13.2	21.5~29	43~58
4	Maximum Output Current (Refer to Fig.1)	A	72	40	21
5	Maximum output power	W	864	960	1008
6	Input voltage / frequency range (*1)	---	85~265Vac continuous, 47~63Hz, Single phase		
7	Maximum input current (at 100/200Vac)	A	12.0/6.0		
8	Power Factor (Typ)	---	>0.98 at 115/230V and maximum output power		
9	Efficiency (Typ) (*2)	%	81/83%	84/86%	85/88%
10	Inrush current (*3)	A	Less than 40A		
11	Hold-up time	mS	20mS typical at 100Vac input, rated output voltage and less than 80% of rated load.		
12	Maximum line regulation (*5)	---	0.40%		
13	Max load regulation (*6)	---	0.80%		
14	Output Ripple and noise PtP (*4)	mV	150	200	300
15	Temperature stability	---	0.05% of rated Vout for 8hrs after 30min warm-up. Constant line,load and temperature.		
16	Temperature coefficient	PPM/°C	200		
17	Remote sensing (*7)	---	Possible. Refer to Instruction Manual.		
18	Parallel operation (*9)	---	Possible. Refer to Instruction Manual.		
19	Series operation	---	Possible. Refer to Instruction Manual.		
20	Over current protection	---	104%~125% of maximum output current. Refer to Fig. 1		
21	Over voltage protection (*8)	V	14.3~15.7	31~34	62~66
22	Over temperature protection	---	Inverter shut down method, automatic reset.		
23	Remote On/Off control	---	By electrical signal or dry contact. ON: 0~0.6V or short. OFF: 2~15V or open.		
24	DC OK signal	---	Open collector signal. On when Vout>80+/-5% rated output. Max.sink current: 10mA		
25	Over-Temp. warning	---	Open collector signal. Refer to Instruction Manual		
26	AC fail signal	---	Open collector signal. Refer to Instruction Manual		
27	Auxiliary power supply	---	11.2~12.5VDC. 0.25A Maximum output current.		
28	Vout voltage trimming	---	Possible, via Vout Trim pin in the I/O connector. Refer to Instruction Manual.		
29	Front panel indicators	---	AC OK, DC OK, DC FAIL		
30	I ² C Interface	---	Optional. Refer to Instruction Manual.		
31	Operating temperature- models without IEC inlet	---	0~50°C: 100% load. Derate 2%/°C, 50°C to 60°C, Derate 2.5%/°C, 60°C to 70°C.		
	models with IEC inlet	---	0~50°C: 100% load. Derate 2%/°C, 50°C to 60°C.		
32	Storage temperature	---	-30~85°C		
33	Operating humidity	---	10~90% RH, no condensation.		
34	Storage humidity	---	10~95% RH, no condensation.		
35	Cooling	---	By internal Fans. Variable speed control.		
36	Vibration	---	Built to meet ETS 300 019		
37	Shock	---	Built to meet ETS 300 019		
38	Conducted emission	---	Built to meet EN55032B, FCC part 15J-B, VCCI-B		
39	Radiated emission (*10)	---	Built to meet EN55032B, FCC part 15J-B, VCCI-B		
40	Applicable safety standards	---	IEC 62368-1 UL62368-1 CSA22.2 No.62368-1 EN62368-1.		
41	Withstand voltage	---	Input-Output: 3000Vrms, 1min. Input-Ground: 2000Vrms, 1min. Output-Ground:500Vrms, 1min.		
42	Isolation resistance	---	More than 100Mohm at 25°C and 70% RH. Output-Ground: 500Vdc		
43	Leakage current	---	Less Than 1.1mA at 230Vac		
44	Weight (Typ)	Kg	2.0		
45	Size (W*H*D)	---	127x41x290mm. Refer to Outline Drawing.		

Notes:

- *1: For cases where conformance to various safety standards (UL, EN etc.) is required, to be described as 100-240Vac (50/60Hz).
- *2: At 100/200Vac, rated load and 25°C ambient temperature.
- *3: Not applicable for the noise filter inrush current less than 0.2mS.
- *4: Measured with JEITA RC-9131A 1:1 probe, 20MHz B.W.
- *5: From 85~132Vac or 170~265Vac, constant load.
- *6: From No-load to Rated load, constant input voltage. Measured at the sensing point in Remote sense.
- *7: Remote sensing can compensate up to 1V drop on each load wire.
- *8: Inverter shut down method. Reset by AC voltage recycle or by On/Off control.
- *9: Derate Maximum output power by 10% for input voltage less than 100V_{RMS}.
- *10: For FPS1000-12/P(S), when used not with FPS-S1U or FPS-T1U racks, an EMI suppressor clamp should be attached to the AC cable, as close as possible to the AC inlet, to meet class B.

Model	FPS1000-12	FPS1000-24	FPS1000-48
V1 (V)	12	24	48
V2 (V)	13.2	29	58
I1 (A)	66	33	17.25
I2 (A)	72	40	21

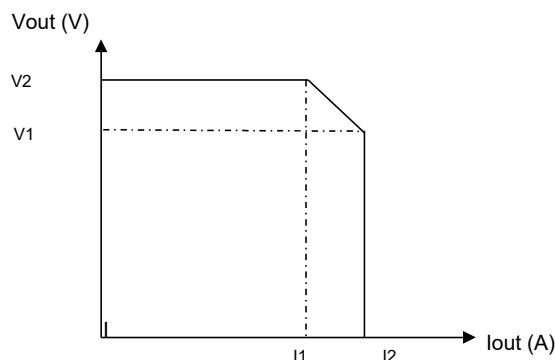


Fig. 1: Rated output current