



MPLP 2500 - xx

Input voltage: 230 V,AC

**Output voltages (DC):
24 V, 48 V, 60 V, 110 V, 220 V**

Output power: 2.500 W

MAIN CHARACTERISTICS

- **High fidelity**
- **Robust design**
- **High efficiency**
- **Passive cooling**

APPLICATION

This device is designed to be used in industrial modular systems of uninterrupted power supply of DC voltages that are demanded to function as high efficiency systems. It is designed for long lasting function and life time without specific need for the maintenance.

DEVICE TYPES

Type	MPLP 2500 - 24	MPLP 2500 - 48	MPLP 2500 - 60	MPLP 2500 - 125	MPLP 2500 - 220
Output voltage, nominal	24 VDC	48 VDC	60 VDC	125 VDC	220 VDC
Output voltage, real, at 20°C	27,2 VDC	54,5 VDC	68,1 VDC	136,2 VDC	245,2 VDC
Output current	60 A	50 A	40 A	20 A	10 A

DESCRIPTION

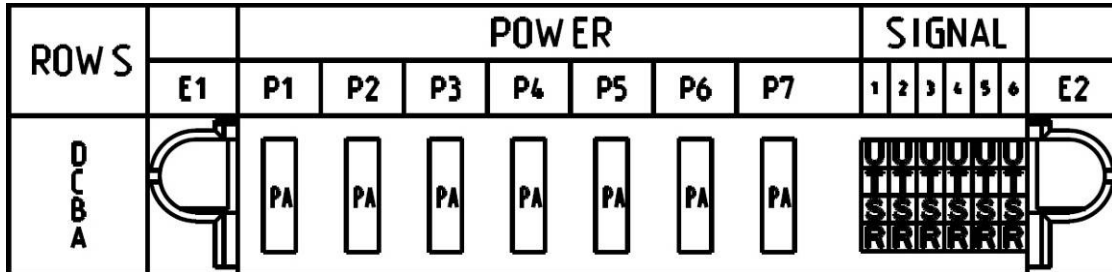
This device has inbuilt the set for the power factor correction and input power shaping in the correct sinus form. There is inbuilt the regulator that makes the input voltage changing depending on the battery ambiental temperature. The rectifier shows very good dynamic responses on the input voltage changes and load changes as well. Charging characteristics are IU or IUUo with precise current limit.

There is the communication microprocessor set inbuilt, which enables the communication with the microprocessor unit of the uninterruptible power supply system. Correctly chosen and defined topology, precisely chosen and dimensioned the components, wide function temperature range, robust design, natural cooling without fan, guarantee very high efficiency of this devices.

TECHNICAL DATA

Series:	MPLP 2500
Output power:	2.500 W (1500 W at 24 V output)
Input voltage:	230 V, 50Hz (195 V,AC - 275 V,AC)
Start voltage:	184 V,AC
Input undervoltage:	164 V,AC
Power decreasing:	164 V,AC < U _{ul} 195 V,AC, linear
Nominal input current:	10.87 A,AC, sinus
Input power factor:	>0.99 @ P >20%, >0.9995 @ P >95%
Efficiency:	≥95% @ P =50%
Internal input fuse:	16A fast (6.3 x 32mm)
Internal output fuse:	fast (6.3 x 32mm)
RSO input and output protection:	yes
O-Ring diode:	MOSFET in positive (+) line at 24 V and 48 V output Diode at 110 V and 220 V output
Input surge protection:	yes
Stability of output voltage:	-1%, passive current sharing
Short circuit protection:	yes, continuous short circuit 1 x I _n
Charging characteristics:	IU curve towards DIN 41772 / DIN 41773
Temp. power decreasing:	from 70°C up to 80°C linear
Output voltage ripple:	≤ 0,1 % (V _v @ P =50%), ≤ 0,02% (V _{ef} @ P =50%),
Design:	PFC predregulator + LLC regulator
Display:	2 x 4 16 segment alphanumeric display U _{ul} , U _{izl} , I _{izl} , P _{izl} , P _{izl} %, temp, errors
Remote signaling:	malfunction, relay contacts: (1A @30 V,DC / 0.5A @60 V,DC)
Communication:	CAN-Bus
Connector:	FCI_51939-137LF
Parallel output connection:	possible, current splitting difference ≤ 3% I _n
Ambiental temperature:	(in function) - 30°C to + 55°C, (in storage) - 40°C to + 85°C
Max. inbuilt height:	2.500 m
Construction:	plug-in module for 19" system, 6 U (HE) x 21 TE
Dimensions (l/w/h):	305 mm x 106 mm x 262 mm
Cooling:	passive, natural air circulating cooling
Casing type / protection:	IP 20
Weight:	6.35 kg

CONNECTORS



CONNECTOR X102	CONNECTION
P1	Grid, L
P2	Grid, N
P3	Earth
P4	Output, + V,DC
P5	Output, + V,DC
P6	Output, 0 V,DC
P7	Output, 0 V,DC

	1	2	3	4	5	6
D	REMOTE SENSE +		REL NC	CODE 2	MODULE ALARM	CAN VCC
C		PRESENCE IN	REL COM	CODE 1	TEMP ALARM	CAN H
B		PRESENCE OUT	REL NO	CODE GND	AC FAIL	CAN L
A	REMOTE SENSE -			MODULE DISABLE	SIGNAL GROUND	CAN GND

LED INDICATION

LED	Color		Function
ON	●	green	Input voltage OK (criteria: $195 \text{ VAC} \leq U_{i1} \leq 275 \text{ VAC}$)
U_{i21}	●	green	Output voltage OK
$U_{i21} >$	●	red	Overvoltage of output voltage (criteria: $U_{i21} > 1,12 U_n$)
Greška	●	red	Common alarm (input undervoltage, non correct ripple form and input frequency, input overvoltage, output overvoltage, internal communication error, remote sense error, non valid CAN address, overheating, short circuit,

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