

PFE700SA SERIES

AC / DC Single Output: 700 Watts



General Specifications

Input Voltage	85 ~ 264 VAC, 47 ~ 63Hz
Input Current	8.0A / 4.0A (100 / 200VAC)
Power Factor	0.95
Output Voltage	See table
Output Power	700 watts
Efficiency	Typically 89%
Output V Accuracy	±1%
Ripple & Noise	4V
Regulation Line & Load	50-57V
Over Current Protection	105% ~140% with auto recovery.
Over Voltage Protection	60-69V Inverter shutdown, recycle input to restart.
Over Temperature Protection	Yes
Parallel Operation	YES – refer to manual
Series Operation	Yes – refer to manual
Operating Temperature	-40°C to +100°C baseplate temperature
Humidity	20 ~ 95% RH No dewdrop
Cooling	Baseplate / Conduction, refer to manual
Tem. Coeff	0.02% / °C
Isolation	Input-Output: 3.0KVAC Input-Baseplate: 2.5KVAC Output-Baseplate: 1.5KVDC
Vibration / Shock	10-55Hz (sweep for 1min) 196.1m / s ²
Safety	Approvals UL60950-1, EN60950-1
Size & Weight	116.8 x 61 x 12.7mm 200g

Features

- Full brick AC/DC Power Module in one package
- Non regulated 50-57V output
- Harmonic input correction: EN61000-3-2
- Universal input 85~264vac with PFC
- Wide baseplate temperature -40°C to +100°C
- OVP, OCP and Over temperature protection
- Safety UL60950, EN60950
- Fully isolated input-output
- External components required for operation, refer to instruction manual.
- PCB mounting

Description

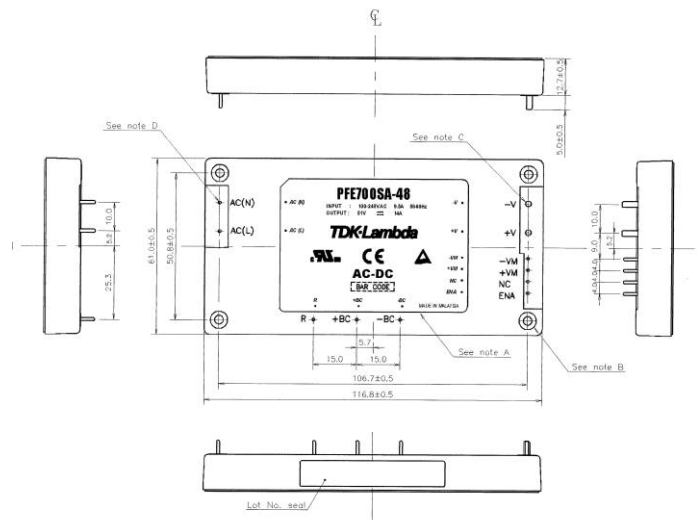
The **PFE700SA** series is a 2nd generation "Full Brick" AC input power supply module, capable of operating up to +100°C base plate temperature.

It offers a **single device** containing power factor correction, primary secondary isolation, offering up to 50% space savings over previous power module solutions. These power modules meet the needs of many industrial, datacom and telecom applications particularly where high operating temperatures are required and space is at a premium.

The 48V output is a semi regulated supply, intended for driving regulated dc/dc converters.

- **For full application notes, contact our office.**

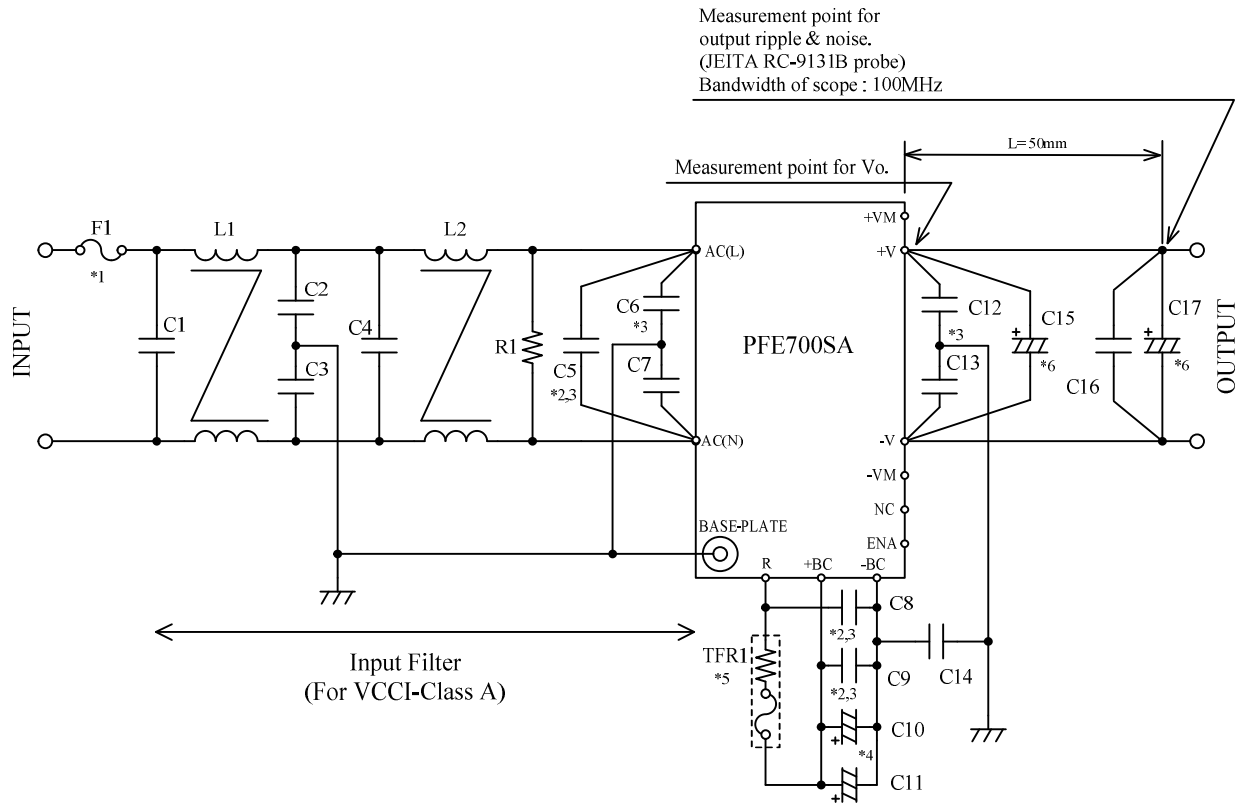
Model	Output		Voltage Range	Power W
	V	A		
PFE500SA-48	51V	14.0A	50-57V	700W



PFE700SA

C275-01-02

BASIC CONNECTION



F1	AC250V 15A	C11	450V 390uF
C1	AC250V 1uF (Film)	C12	0.033uF
C2	4700pF	C13	0.033uF
C3	4700pF	C14	1000pF
C4	AC250V 1uF (Film)	C15	100V 220uF (Elec.)
C5	AC250V 1uF (Film)	C16	100V 2.2uF (Ceramic)
C6	1000pF	C17	100V 220uF (Elec.)
C7	1000pF	R1	0.5W 470kΩ
C8	450V 1uF (Film)	TFR1	10Ω 139°C (Res., Thermal fuse)
C9	450V 1uF (Film)	L1	6mH
C10	450V 390uF	L2	6mH

==NOTES==

- *1. Use an external fuse of fast blow type for each unit.
- *2. The allowable ripple current of capacitor must be more than 3A(rms).
- *3. Put this capacitor near the terminal as close as possible.
- *4. The maximum capacitance that can be used is less than 1200uF(Rated capacitance).
Avoid the connection of capacitance which is more than above, else it will lead to module to damage.
- *5. The inrush current at AC throw in can be suppressed by the external Resistor (Built-in thermal fuse) connected between the R and +BC terminals.
- *6. If the ambient temperature is less than -20°C, use twice the recommended capacitor above.
- *7. Refer to instruction manual for further details.