

# **UNIVERSAL INPUT HARMONIC CORRECTION (PFC) AC-DC MEDICAL & ITE APPLICATION EXTERNAL DESKTOP SWITCHING ADAPTER 180-250 WATTS GREEN POWER SINGLE OUTPUT TPEMP250G SERIES**



## **FEATURES:**

- ACCOMMODATE UNIVERSAL AC INPUT
- NO LOAD POWER CONSUMPTION <0.5W
- MEET MEDICAL STANDARDS IEC60601-1 & ITE STANDARDS IEC60950-1
- EMI MEET EN55011 & EN55022 / FCC CLASS B
- MEET UNIVERSAL SAFETY STANDARDS
- CE MARKING COMPLIANCE

## **SPECIFICATION**

### **INPUT SPECIFICATION**

**Input Voltage:** Typical 90-264Vac with PFC.  
**Input Connector:** 3 pole AC inlet IEC320-C14(DT7)  
**Input Frequency:** 47-63Hz.  
**Inrush Current:** 12.5Arms at 230Vac  
**Input Current:** Typical 2.4A at 115Vac  
 Typical 1.3A at 230Vac  
**Dielectric Withstand:** Meet IEC60601-1 & IEC60950-1.  
**EMI:** Meet EN55011 & EN55022 FCC Class B.  
**Hold-up Time:** Typical 20mS at 115Vac and 230Vac.  
**Power Factor & Harmonic Correction:**  
 Meet IEC 61000-3-2, PF typical 0.96-0.99 at full load.  
**Over Temp. Protection:** Installed by NTC.  
**Earth Leakage Current:** Less than 0.3mA.  
**No Load Power:** Less than 0.5W at 230Vac.  
**LED Indicator:** Optional.

### **OUTPUT SPECIFICATION**

**Output Voltage:** See Ratings Chart.  
**Output Current:** See Ratings Chart.  
**Output Wattage:** 180-250Watt. (See Input Voltage Derating).  
**Output Connector:** Optional.  
**Line Regulation:** Typical  $\pm 1\%$ .  
**Load Regulation:** Typical  $\pm 3\%$ .  
**Noise & Ripple:** Typical 1% peak to peak.  
**OVP:** Built-in. (Latch)  
**Adjustability:** Not available.  
**Over Temp. Protection (OTP):** Installed.  
**Overload Protection (OLP):**  
 Fully protected against output overload and short circuit.  
 OLP set at about 110-130% rating output wattage.  
 Consult the factory for OLP setting.

### **GENERAL SPECIFICATION**

**Efficiency:** Typical 89% (various with output voltage).  
**Switching Frequency:** 85-100KHz  
**Circuit Topology:** Half-Bridge ZVS Circuit.  
**Transient Response:** Output voltage returns in less than 1mS following a 25% load change.  
**Safety Standard:** Meet Medical IEC60601-1 & ITE IEC60950-1 Class I.  
**Operating Temperature:** 0 to +40°C.  
**Storage Temperature:** -20 to +85°C.  
**Cooling:** Free air convection.  
**Construction:** Impact resistant plastic enclosure case.  
**Power Density:** 3.78Watt/Cubic Inch.  
**Desktop Format.**

NOTE: (1) All measurements are at nominal input, full load, and +25°C unless otherwise specified.

(2) Load regulation is measured at 115Vac or 230Vac in percentage indicate the change in output voltage as the load varied from half load to full load( $\pm\%$ )

(3) The exact obtainable load regulation depends upon the output cord selected and load current.

(4) Due to requests in market and advances in technology, specifications subject to change without notice

(5) Derating is needed under low input voltages 90-110Vac.. Please refer to the Input Voltage Derating for more details.



For the details of safety approval, please consult the factory

# OUTPUT VOLTAGE/CURRENT RATINGS CHART

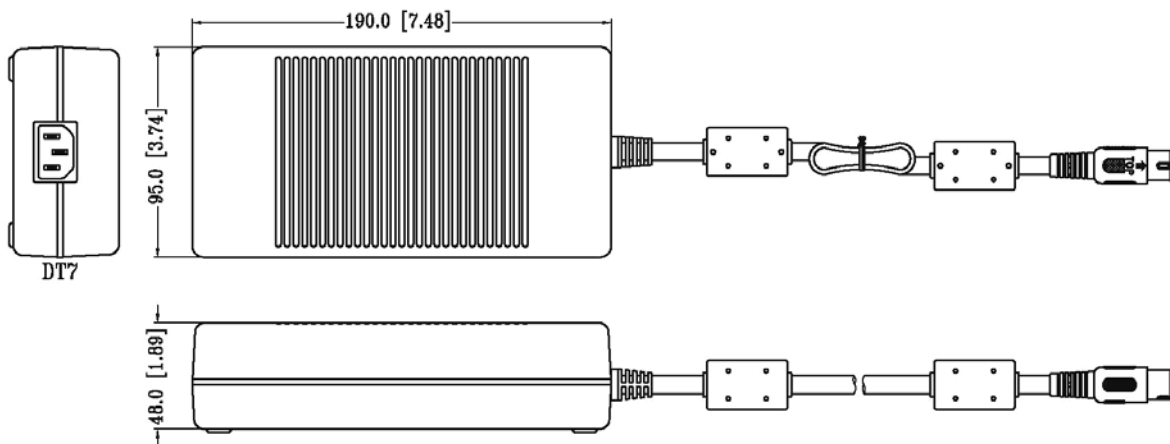
## SINGLE OUTPUT

MODEL NO.	AC INLET	O/P VOLTAGE	O/P CURRENT	
			Typical	Max.
TPEMP250G-S120166-7	IEC320-C14(DT7)	12Vdc	15.00A	16.6A
TPEMP250G-S240104-7	IEC320-C14(DT7)	24Vdc	9.58A	10.4A
TPEMP250G-S480052-7	IEC320-C14(DT7)	48Vdc	4.80A	5.2A

Remark: For LED Indicator, add suffix '(A)' to model number.

**MECHANICAL DIMENSIONS: MM [INCHES]**

**WEIGHT: 1216.5g (42.91Oz)**



## Input Voltage Derating

