

SPECIFICATION

High Quality Switching Power Adapter

**Universal AC Input
65W 24VDC
Single Output**

P/N: A240027EPI

**** Specification Approval****

This specification (total 7 pages including cover page) is approved in it's entirety by:

Company Name

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Signature

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1-0 SCOPE

THE PURPOSE OF THIS DOCUMENT IS TO SPECIFY A SINGLE INPUT, SINGLE OUTPUT SWITCHING POWER SUPPLY TO BE USED WITH INFORMATION TECHNOLOGY EQUIPMENT.

2-0 INPUT REQUIREMENTS

2-1 INPUT VOLTAGE

100 TO 240 \pm 10% Vac, FULL RANGE

2-2 INPUT FREQUENCY

47 TO 63Hz

2-3 INPUT CURRENT

1.5 A MAX., AT 115Vac, FULL LOAD

0.75 A MAX., AT 230Vac, FULL LOAD

2-4 EFFICIENCY

87% MIN. AT FULL LOAD, NOMINAL LINE, MEASURED AFTER MINUTES FULL LOAD BURN-IN

NO LOAD POWER CONSUMPTION: 0.3W MAX; MEETS CEC EFFICIENCY LEVEL V

2-5 INRUSH CURRENT

50A MAX. AT 115Vac, COLD START

100A MAX. AT 230Vac, COLD START

2-6 HOLD UP TIME

10mS MIN. AT FULL LOAD, NOMINAL LINE

2-7 CONFIGURATION

3-WIRE INPUT AC LINE (LINE, NEUTRAL, FG)

2-8 INPUT FUSE

THE HOT LINE SIDE OF THE INPUT SHALL HAVE A FUSE

2-9 LINE REGULATION: THE MAXIMUM VOLTAGE CHANGE ON DC OUTPUT

SHALL BE WITHIN TOLERANCE WHEN AC INPUT VOLTAGE VARIES WITHIN THE RANGE SPECIFIED IN 2-1

2-10 INPUT PROTECTION DEVICE

AN ADEQUATE INTERNAL FUSE ON THE AC INPUT LINE SHALL BE PROVIDED

2-11 POWER LINE NOISE

THE POWER SUPPLY WILL HAVE AN ON BOARD AC FILTER THAT WILL MEET CONDUCTED NOISE SPECIFICATIONS OF FCC AND CISPR

2-12 HI-POT TESTS

PRIMARY-SECONDARY 3KVac FOR 1 MINUTE (LEAKAGE CURRENT 10mA)

2-13 INSULATION RESISTANCE

INSULATION RESISTANCE SHALL BE MORE THAN 10Mohm AT 500Vdc BETWEEN PRIMARY LINE, NEUTRAL LIVE AND SECONDARY BETWEEN PRIMARY LINE NEUTRAL LINE AND FRAME GROUND (F.G)

3-0 OUTPUT REQUIREMENTS

3-1 DC OUTPUT

OUTPUT VOLTAGE	TOLERANCE	OUTPUT CURRENT	
	(ACCURACY)	MIN.	MAX.
+24Vdc	± 5%	0	2.7A

OUTPUT PIN OF THE MOUNTING CONNECTOR(FRONT VIEW)



3-2 LOAD REGULATION

VOLTAGE	TOLERANCE	REGULATION
+24Vdc	± 5%	22.8 – 25.2Vdc

3-3 DYNAMIC LOAD REGULATIONS

+/-5% EXCURSION FOR 50% - 100% OR 100%-50% LOAD CHANGE FOR +24Vdc AT ANY FREQUENCY UP TO 250Hz (DUTY 50%)

3-4 RIPPLE & NOISE

THE POWER SUPPLY SHALL NOT EXCEED THE FOLLOWING LIMITS ON THE INDICATED VOLTAGES FOR 60Hz OR 50Hz RIPPLE , SWITCHING FREQUENCY RIPPLE AND NOISE AND DYNAMIC LOAD VARIATIONS MEASURED WITH A 20MHz BANDWIDTH

Voltage	Ripple & Noise
+24Vdc	400mV

© RIPPLE & NOISE ARE MEASURED AT THE END OF OUTPUT CABLES WHICH ARE ADDED A 0.1uF CERAMIC CAPACITOR AND A 10uF ELECTROLYTIC CAPACITOR

3-5 OVER CURRENT PROTECTION

THE POWER SUPPLY SHALL NOT BE DAMAGED BY A OVER CURRENT FROM THE OUTPUT TO RETURN LINE, PROTECTION TO BE INVOKED IF CURRENT EXCEEDS MAX. RATING BY ABOUT 5% OR MORE (MEASURED AT 110VAC INPUT)

OUTPUT VOLTAGE	Max.
+24Vdc	8.0A

3-6 OVER-VOLTAGE PROTECTION

26V MAX. (DO NOT TEST WITH EXTERNAL DC SOURCE)

3-7 SHORT-CIRCUIT PROTECTION

A SHORT CIRCUIT PLACE AT ANY OUTPUT WILL CAUSE NO DAMAGE TO THIS ADAPTER

3-8 OPEN CIRCUIT PROTECTIONS

WHEN PRIMAYY POWER IS SUPPLIED WITH NO LOAD ON ANY OUTPUT LEVEL, NO DMAGES OR HAZARDOUS CONDITIONS SHOULD OCCUR

3-9 STABILITY

2% MAX. AT CONSTANT LOAD WITH CONSTANT INPUT (AFTER 30 MINUTES OF OPERATION)

3-10 DROP-OUT(POWER LINE DISTURBANCE)

OUTPUT VOLTAGES SHALL REMAIN WITHIN THE SPECIFIED REGULATION RANGE, THROUGH THE ABSENCE OF A LINE INPUT DURING 1/2 CYCLE, AT FULL LOAD AND MIN.AC LINE INPUT

3-11 ESD REQUIREMENTS

THE ADAPTOR SHALL MEET IEC PUB. 801-2 (ESD) LEVEL 4 REQUIREMENTS

3-12 SURGE IMMUNITY

THE ADAPTOR SHALL WITHSTAND IEC PUB. 801-5 (SURGE) LEVEL 4 REQUIREMENTS

3-13 COOLING

COOLING SHALL BE NATURAL CONVECTION COOLING, THE POWER SUPPLY MUST BE CAPABLE OF OPERATION WHEN MOUNTED EITHER VERTICALLY OR HORIZONTALLY

3-14 GROUND CONTINUITY TEST

25A/100m ohm / 3 sec

3-15 LEAKAGE CURRENT

0.25mA MAX.

3-16 LED DISPLAY

DESCRIPTION	GREEN LED
POWER ON	ON
POWER OFF	OFF

4-0 ENVIRONMENTAL REQUIREMENTS

4-1 TEMPERATURE

OPERATION: 0 TO 40°C

STORAGE: - 20 TO 85°C

4-2 HUMIDITY

OPERATION: 10% ~ 90%RH

STORAGE: 5% ~ 95%RH

4-3 VIBRATION AND SHOCK

NO EVIDENCE OF ANY MECHANICAL OR FUNCTIONAL DAMAGE AFTER THE VIBRATION AND SHOCK TESTING

4-4 ALTITUDE

OPERATION: 10,000 FEET

STORAGE: 40,000 FEET

5-0 EMI/EMC REQUIREMENTS

THE RADIATED AND CONDUCTED EMISSIONS OF THIS AC ADAPTER COMPLIES WITH THE REQUIREMENTS OF THE FCC PART 15, CLASS B & CISPR CLASS B

6-0 SAFETY APPROVALS

THIS AC ADAPTER IS DESIGNED APPROVED BY FOLLOWING STANDARDS EN60950-1

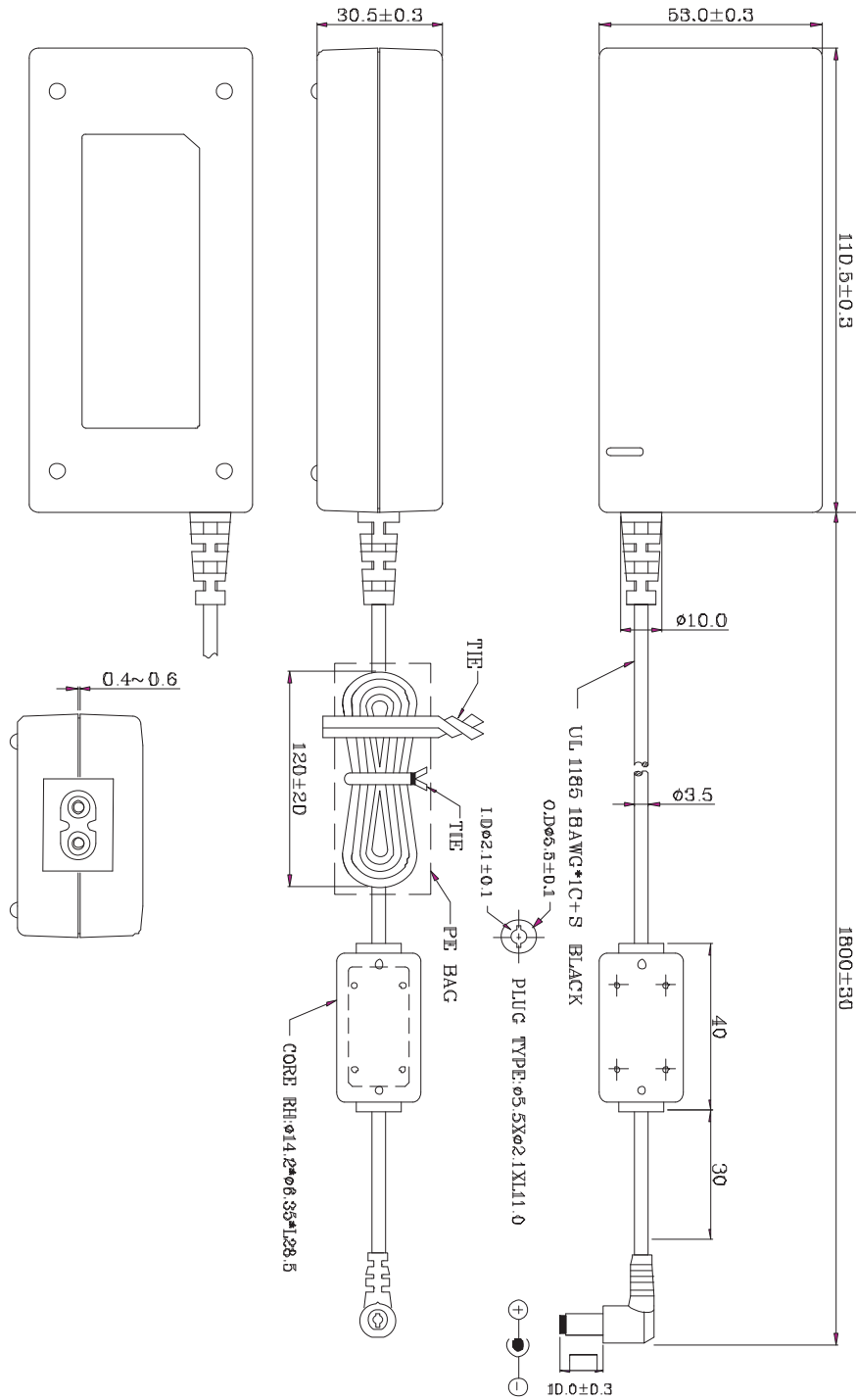
6-1 LISTED BY UL, CUL, NEMKO CB, GS, CE, FCC, PSE

7-0 MECHANICAL FEATURES

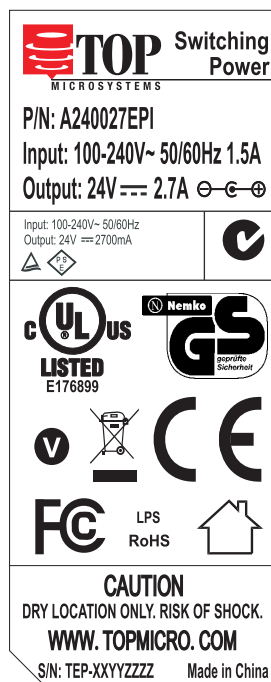
7-1 WEIGHT

250 GRAMS

8-0 MECHANICAL DRAWING



9-0 LABEL



NOTES

1. MATERIAL: Color WHITE WITH BLACK WORDS
2. LABEL MUST MEET SAFETY REQUIREMENTS AS FOLLOWS.
UL- RECOGNIZED COMPONENT (PGDQ2)
" MARKING AND LABELING SYSTEMS "
CSA- CERTIFIED TYPE OR MEET THE APPLICABLE CRITERIA
3. ALL PARTS SHOULD BE RoHS COMPLIANT
4. SIZE : 69.5*27.5mm (+0.2-0 mm)