

LTE 60U SERIES 60W MULTIPLE OUTPUT SWITCHING POWER SUPPLY

LTE 80U SERIES 80W MULTIPLE OUTPUT SWITCHING POWER SUPPLY

FEATURES :

DIMENSIONS : 5"x3.2"x1.5"
 DOUBLE SIDE PCB FOR HIGH RELIABILITY
 BUILT-IN CLASS B EMI FILTER (AC OR DC INPUT)
 EN61000-3-2 CLASS A (HARMONIC DISTORTION CORRECTION)
 ADJUSTABLE MAIN OUTPUT
 OVERLOAD PROTECTION
 OVERVOLTAGE PROTECTION
 SHORT CIRCUIT PROTECTION
 DC INPUTS 48VDC FOR DC/DC TYPE (OPTIONAL)
 LOW LEAKAGE CURRENT MEDICAL MODEL (OPTIONAL)
 CE MARKED TO LOW VOLTAGE DIRECTIVE (LVD)



APPLICATION :

COMPUTER PERIPHERALS/LAN & HUB
 TEST & INDUSTRIAL EQUIPMENTS
 MEDICAL INSTRUMENTS

ENVIRONMENTAL :

OPERATING TEMPERATURE : 0°C TO 40°C AMBIENT, DERATED EACH OUTPUT AT 2.5% PER °C FROM 40°C TO 70°C
 STORAGE TEMPERATURE : -40°C TO 85°C
 HUMIDITY : OPERATING, NON-CONDENSING, 5% TO 95%
 VIBRATION : RANDOM OPERATING 2.4 GRMS/MAX. 3 AXES 50~500Hz 10 MINUTES/AXIS
 SHOCK : OPERATING HALF SINE 20 GPK/MAX. 3 AXES 10ms 6 SHOCKS TOTAL

INPUT SPECIFICATIONS :

VOLTAGE 90-264 VAC, UNIVERSAL
 FREQUENCY 47-63Hz
 CURRENT 1.5ARMS. MAX. @115VAC 60W LOAD / 2ARMS. MAX. @115VAC 80W LOAD
 1ARMS. MAX. @230VAC 60W LOAD / 1.3ARMS. MAX. @230VAC 80W LOAD
 INRUSH SURGE CURRENT 35A TYPICAL, COLD START @25°C, 115VAC

OUTPUT SPECIFICATIONS :

OUTPUT WATTAGE 60 WATTS MAX. (CONVECTION RATING)/ 80 WATTS MAX. (WITH 15CFM FORCED AIR)
 VOLTAGE SEE TABLE
 CURRENT SEE TABLE
 LINE REGULATION +/- 1% TYPICAL
 LOAD REGULATION MAIN OUTPUTS +/- 5%, AUX. OUTPUTS +/- 10% TYPICAL (NOTE1)
 NOISE & RIPPLE 1% TYPICAL AT FULL LOAD (NOTE2)
 OVERSHOOT/UNDERSHOOT 10% MAX. @ TURN-ON/ TURN-OFF

GENERAL SPECIFICATIONS :

EFFICIENCY : >70% TYPICAL AT FULL LOAD
 TURN-ON TIME : 3SEC MAX. AT FULL LOAD @ 115VAC
 HOLD-UP TIME : 10mS TYPICAL AT FULL LOAD @ 115VAC
 REMOTE SENSE : 250mV +/- 50mV @ V1 AT FULL LOAD
 MTBF DEMONSTRATED : >100,000 HOURS AT FULL LOAD AND 25°C AMBIENT CONDITIONS

ELECTROMAGNETIC COMPATIBILITY SPECIFICATIONS:

EMI CONDUCTED/RADIATED : FCC & CISPR CLASS B
 DESIGNED TO MEET EN61000-3-3,-4-2,-3,-4,-5,-6,-11



L.T.E. 力英電子
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Switching Mode Power Supply

#MODEL	NO.	VOLTAGE (VDC)	LOAD RANGE (A)						LOAD REGULATION (%) (NOTE 1)	RIPPLE&NOISE (PARD)(mVp-p) (NOTE 2)	
			MIN.		MAX. (NOTE 2)		PEAK (NOTE 3)				
LTE60U / 80U SINGLE OUTPUT VOLTAGE/CURRENT RATING CHARTS											
		60U/80U	60U/80U	60U	80U	60U	80U	60U	80U	60U/80U	60U/80U
S0	1	+3.3V	0	0	12	16	19	19	19	+/- 3%	100mV
S1	1	+5V	0	0	12	16	19	19	19	+/- 3%	100mV
S2	1	+12V	0	0	5	6.7	8	8	8	+/- 3%	120mV
S3	1	+15V	0	0	4	5.34	6.4	6.4	6.4	+/- 3%	150mV
S4	1	+24V	0	0	2.5	3.34	4	4	4	+/- 3%	240mV
S5	1	+48V	0	0	1.25	1.67	2	2	2	+/- 3%	480mV
LTE60U / 80U DUAL OUTPUT VOLTAGE/CURRENT RATING CHARTS											
D01	1	+3.3V	0.6	0.6	6	8	9.6	9.6	9.6	+/- 5%	100mV
	2	+5V	0.6	0.6	6	8	9.6	9.6	9.6	+/- 5%	100mV
D12	1	+5V	0.6	0.6	6	8	9.6	9.6	9.6	+/- 5%	100mV
	2	+12V	0.25	0.25	2.5	3.34	4	4	4	+/- 5%	120mV
D14	1	+5V	0.6	0.6	6	8	9.6	9.6	9.6	+/- 5%	100mV
	2	+24V	0.125	0.125	1.25	1.67	2	2	2	+/- 5%	240mV
D15	1	+5V	0.6	0.8	6	8	8.8	8.8	8.8	+/- 5%	100mV
	2	+48V	0.065	0.065	0.65	1	1.1	1.1	1.1	+/- 5%	480mV
D1B	1	+5V	0.6	0.6	6	8	9.6	9.6	9.6	+/- 5%	100mV
	2	-5V	0.6	0.6	6	8	9.6	9.6	9.6	+/- 10%	100mV
D2C	1	+12V	0.25	0.25	2.5	3.34	4	4	4	+/- 5%	120mV
	2	-12V	0.25	0.25	2.5	3.34	4	4	4	+/- 10%	120mV
D24	1	+12V	0.25	0.25	2.5	3.34	4	4	4	+/- 5%	120mV
	2	+24V	0.125	0.125	1.25	1.67	2	2	2	+/- 10%	240mV
D3D	1	+15V	0.2	0.2	2	2.7	3	3	3	+/- 5%	150mV
	2	+15V	0.2	0.2	2	2.7	3	3	3	+/- 10%	150mV
LTE60U / 80U TRIPLE OUTPUT VOLTAGE/CURRENT RATING CHARTS											
T12C	1	+5V	0.6	0.6	6	8	9	9	9	+/- 5%	100mV
	2	+12V	0.25	0.25	2.5	2.8	3	3	3	+/- 5%	120mV
	3	-12V	0.125	0.125	1	1.25	1.4	1.4	1.4	+/- 10%	120mV
T12B	1	+5V	0.6	0.6	6	8	9	9	9	+/- 5%	100mV
	2	+12V	0.25	0.25	2.5	2.8	3	3	3	+/- 5%	120mV
	3	-5V	0.15	0.15	1.5	2	3	3	3	+/- 10%	100mV
T124	1	+5V	0.6	0.6	6	8	9	9	9	+/- 5%	100mV
	2	+12V	0.125	0.125	1.25	1.5	1.5	1.5	1.5	+/- 5%	120mV
	3	+24V	0.1	0.1	1	1.25	1.4	1.4	1.4	+/- 10%	240mV
T012	1	+3.3V	0.6	0.6	5	7	8	8	8	+/- 5%	100mV
	2	+5V	0.6	0.6	5	7	8	8	8	+/- 5%	100mV
	3	+12V	0.16	0.16	1.6	1.8	2	2	2	+/- 10%	120mV
T14C	1	+5V	0.6	0.6	6	7.5	9	9	9	+/- 5%	100mV
	2	+24V	0.1	0.1	1	1.5	1.8	1.8	1.8	+/- 5%	240mV
	3	-12V	0.05	0.05	0.5	0.7	0.8	0.8	0.8	+/- 10%	120mV
LTE60U / 80U QUAD OUTPUT VOLTAGE/CURRENT RATING CHARTS											
Q012C	1	+3.3V	0.6	0.6	6	7	8	8	8	+/- 5%	100mV
	2	+5V	0.2	0.2	2	3	3.5	3.5	3.5	+/- 5%	100mV
	3	+12V	0.125	0.5	1.25	1.25	1.4	1.4	1.4	+/- 10%	120mV
	4	-12V	0.15	0.15	1.5	1.8	2	2	2	+/- 10%	120mV
Q12C4	1	+5V	0.6	0.6	6	7	8.4	8.4	8.4	+/- 5%	100mV
	2	+12V	0.1	0.1	1	1.2	1.4	1.4	1.4	+/- 5%	120mV
	3	-12V	0.1	0.1	1	1.2	1.4	1.4	1.4	+/- 10%	120mV
	4	+24V	0.05	0.05	0.5	0.8	0.95	0.95	0.95	+/- 10%	240mV
Q12C5	1	+5V	0.4	0.4	4	5	6	6	6	+/- 5%	100mV
	2	+12V	0.1	0.1	1	1.2	1.4	1.4	1.4	+/- 5%	120mV
	3	-12V	0.1	0.1	1	1.2	1.4	1.4	1.4	+/- 10%	120mV
	4	+48V	0.05	0.05	0.5	0.6	0.7	0.7	0.7	+/- 10%	480mV
Q12CB	1	+5V	0.6	0.6	6	8	9	9	9	+/- 5%	100mV
	2	+12V	0.1	0.1	1	1.5	1.6	1.6	1.6	+/- 5%	120mV
	3	-12V	0.1	0.1	1	1.5	1.6	1.6	1.6	+/- 10%	120mV
	4	-5V	0.2	0.2	2	2.5	2.8	2.8	2.8	+/- 10%	100mV
Q13D4	1	+5V	0.4	0.4	4	5	6	6	6	+/- 5%	100mV
	2	+15V	0.1	0.1	1	1.3	1.5	1.5	1.5	+/- 5%	150mV
	3	-15V	0.1	0.1	1	1.3	1.5	1.5	1.5	+/- 10%	150mV
	4	+24V	0.05	0.05	0.5	0.7	0.85	0.85	0.85	+/- 10%	240mV

NOTE: 1. CROSS/LOAD REGULATION IS TESTED AT 10% TO 100% OF RATED LOAD AND OTHER OUTPUTS ARE SET AT 50% OF RATED LOAD.
 2. PEAK-TO-PEAK FOR 60W(CONVECTION RATING) / 80W(WITH 15CFM FORCED AIR) @115VAC MIN.; MEASUREMENTS WITH A 20MHz BANDWIDTH AND TERMINATED WITH A 10uF ELECTROLYTIC CAP. IN PARALLEL WITH A 0.1uF CERAMIC CAP.
 3. PEAK CURRENT LASTING <30 SECONDS WITH A MAXIMUM 10% DUTY CYCLE. (FOR REFERENCE)

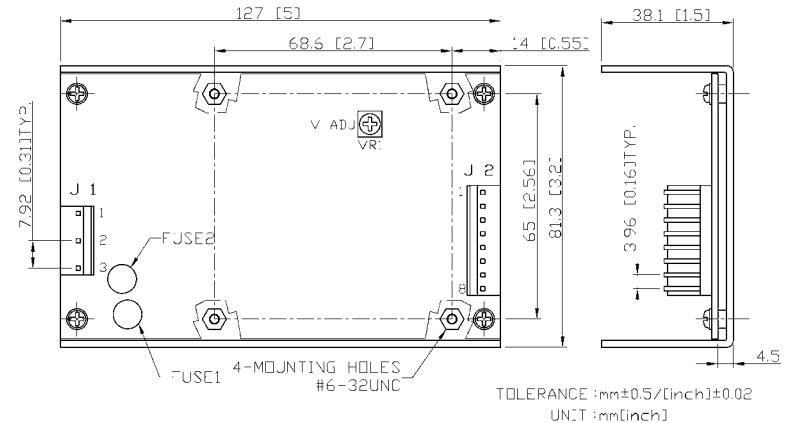
PIN ASSIGNMENTS

J 1		AC INPUT VERSION		DC INPUT VERSION	
PIN1	FG	PIN1	NC		
PIN2	NEUTRAL	PIN2	NEGATIVE(-)		
PIN3	LINE	PIN3	POSITIVE(+)		

J 2		1 OUTPUT		3,4 OUTPUTS (V4 POSITIVE)	
PIN1-PIN3	V1	PIN1	V2		
PIN4-PIN6	RET	PIN2-PIN3	V1		
PIN7-PIN8	NC	PIN4-PIN5	RET		
2 OUTPUTS (OPTIONAL) (V2 POSITIVE)		PIN6	V3		
PIN1-PIN2	V2(+)	PIN7	V4(+)		
PIN3-PIN4	RET	PIN8	RET		
3,4 OUTPUTS (V4 NEGATIVE)					
PIN5-PIN6	RET	PIN1	V2		
PIN7-PIN8	V1	PIN2-PIN3	V1		
2 OUTPUTS (OPTIONAL) (V2 NEGATIVE)		PIN4-PIN5	RET		
PIN1-PIN2	RET	PIN6	V3		
PIN3-PIN4	V2(-)	PIN7	RET		
PIN5-PIN6	RET	PIN8	V4(-)		
3,4 OUTPUTS (V4 NEGATIVE)					
PIN7-PIN8	V1	PIN1	V2		
2 OUTPUTS (V2 ISOLATED)		PIN2-PIN3	V1		
PIN1-PIN2	V2	PIN4-PIN5	RET		
PIN3-PIN4	V2 RET	PIN6	V3		
PIN5-PIN6	V1 RET	PIN7	V4		
PIN7-PIN8	V1	PIN8	V4 RET		

MECHANICAL DRAWING (5"x3.2"x1.5")

I/O CONNECTORS : MOLEX EQUIVALENT



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