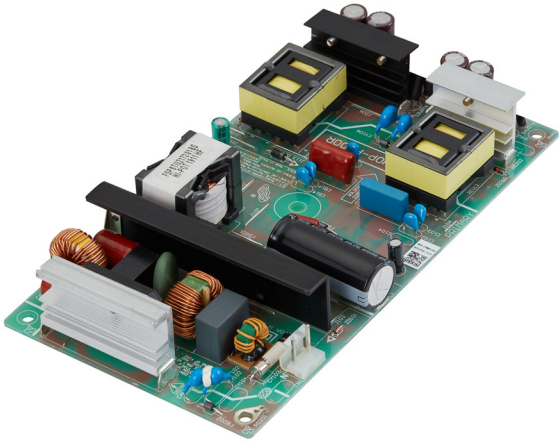


FSP250-2F47-B54H

FEATURES

- Class-I design
- IEC 62368-1 safety standard
- EN 55032 Class B radiated emission
- Isolated between 12V and 54V outputs
- Isolated between PE & RETURN
- Surge protection ± 2 KV diff, ± 4 KV com
- High altitude 5000 meters operation



SAFETY STANDARD DESIGN TO MEET



DESCRIPTION

This AC-DC switching power supplies in a package of 4 x 7.5 inches is an isolated dual outputs 54V & 12V PSU that suitable for PoE switch and networking. This PSU is capable of delivering 250 watts continuous power with 7 CFM forced air condition

INPUT SPECIFICATIONS

Input voltage:	90-264 VAC
Input frequency:	47-63 Hz
Input current:	2.6 A (rms) for 115 VAC 1.3 A (rms) for 230 VAC
Earth leakage current:	1.5 mA max. @ 264 VAC, 63 Hz
Touch current:	250 uA max. @ 264 VAC, 63 Hz

OUTPUT SPECIFICATIONS

Output voltage/current:	See rating chart.
Total output power:	250W @ 7 CFM forced air
Protection:	
Over voltage:	Latch
Short circuit & Over current:	Auto recovery
Over temperature:	Latch
Temperature coefficient:	All outputs $\pm 0.04\%$ / $^{\circ}$ C maximum
Transient response:	Maximum excursion of 5% or better on all models, recovering to 1% of final value within 500 us after a 25% step load change

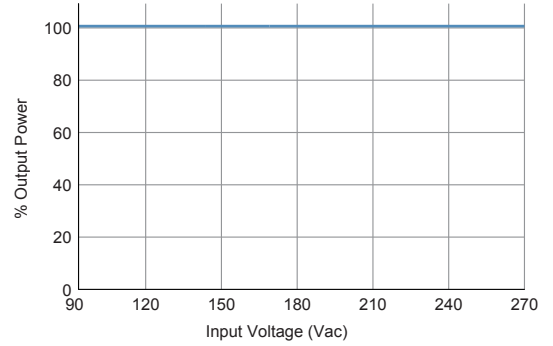
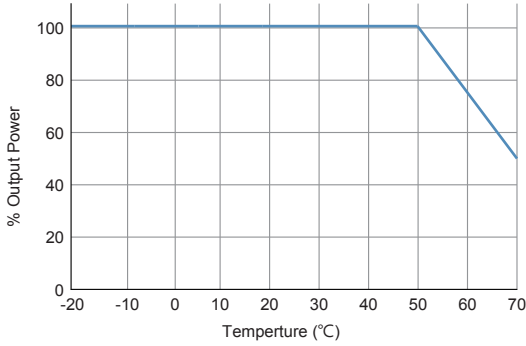
ENVIRONMENTAL SPECIFICATIONS

Operating temperature:	-20 $^{\circ}$ C~+70 $^{\circ}$ C
Storage temperature:	-40 $^{\circ}$ C~+85 $^{\circ}$ C
Relative humidity:	5% to 95% non-condensing
Derating:	Derate from 100% at +50 $^{\circ}$ C linearly to 50% at +70 $^{\circ}$ C, applicable to both convection and forced-air cooling conditions

GENERAL SPECIFICATIONS

Power factor:	0.98 min at 100% load and 115VAC 0.9 min. at 100% load and 230VAC
Efficiency:	86% minimum @ 115Vac
Hold-up time:	10 ms minimum at 115 VAC
Power on time:	1 Sec maxi.
Line regulation:	$\pm 0.5\%$ maximum at full load
Inrush current:	70A max and no damage to PSU
Withstand voltage:	3000 VAC from input to output, 1500 VAC from input to ground, 1500 VAC from output to ground
MTBF:	200,000 hours minimum at full load at 25 $^{\circ}$ C ambient, calculated per TELCORDIA SR-332
EMC Performance	
EN55032:	Class B conducted, class B radiated
FCC:	Class B conducted, class B radiated
VCCI:	Class B conducted, class B radiated
EN61000-3-2:	Harmonic distortion, class D
EN61000-3-3:	Line flicker
EN61000-4-2:	ESD, ± 8 KV air and ± 4 KV contact
EN61000-4-3:	Radiated immunity, 3 V/m
EN61000-4-4:	Fast transient/burst, ± 1 KV
EN61000-4-5:	Surge, ± 2 KV diff, ± 4 KV com
EN61000-4-6:	Conducted immunity, 3 Vrms
EN61000-4-8:	Magnetic field immunity, 1 A/m
EN61000-4-11:	Voltage dip immunity, 30% reduction for 500 ms, criteria A >95% reduction for 10 ms, criteria A >95% reduction for 5000 mS, criteria B

OUTPUT POWER DERATING CURVE



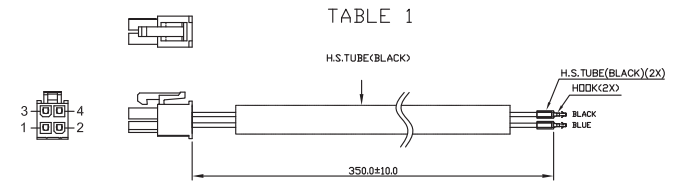
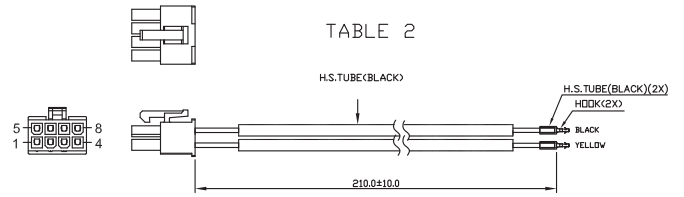
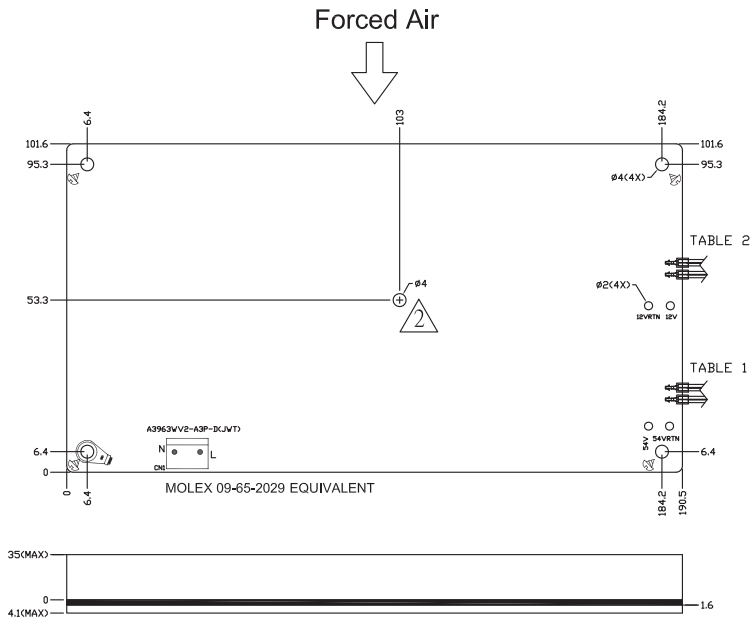
OUTPUT VOLTAGE/CURRENT RATING CHART

Model	Output Voltage	Min. Load	Max. Load (7 CFM)	Output Power	Ripple & Noise	Load Regulation	Efficiency 115 / 230 Vac
FSP250-2F47-B54H	54 V	0 A	2.78 A	250W	400 mV	±3%	86 / 89%
	12V	0 A	8.33 A		250 mV	±5%	

NOTES:

- Maximum output watts is 250W with 7 CFM forced air provided by user.
- Ripple and noise is maximum peak to peak voltage value measured at output within 20 MHz bandwidth, at rated line voltage and output load ranges, and with a 10 µF tantalum capacitor in parallel with a 0.1 µF ceramic capacitor across the output.

MECHANICAL SPECIFICATIONS



Input connector:
 JWT A3963WV2-A3P-D or EQU

Pin No.	Function
1	Neutral
2	NC
3	Line

TABLE 1:
 Housing: Molex 39-01-2045 or EQU.
 Terminal: Molex 39-00-0038 or EQU.

Pin No.	Function
1, 2	+54 RTN
3, 4	+54V

TABLE 2:
 Housing: Molex 39-01-2085 or EQU.
 Terminal: Molex 39-00-0038 or EQU.

Pin No.	Function
1, 2	+12V
3, 4	+12V
5, 6	+12V RTN
7, 8	+12V RTN

NOTES:

- Dimension (L*W*H): 190.5 * 101.6 * 36.6 mm / 7.5" * 4" * 1.44"
- To ensure compliance with level B emissions, connect the three PCB mounting holes with metallic standoffs to the chassis.
- Weight: 430 grams (0.947 lbs.) approx.