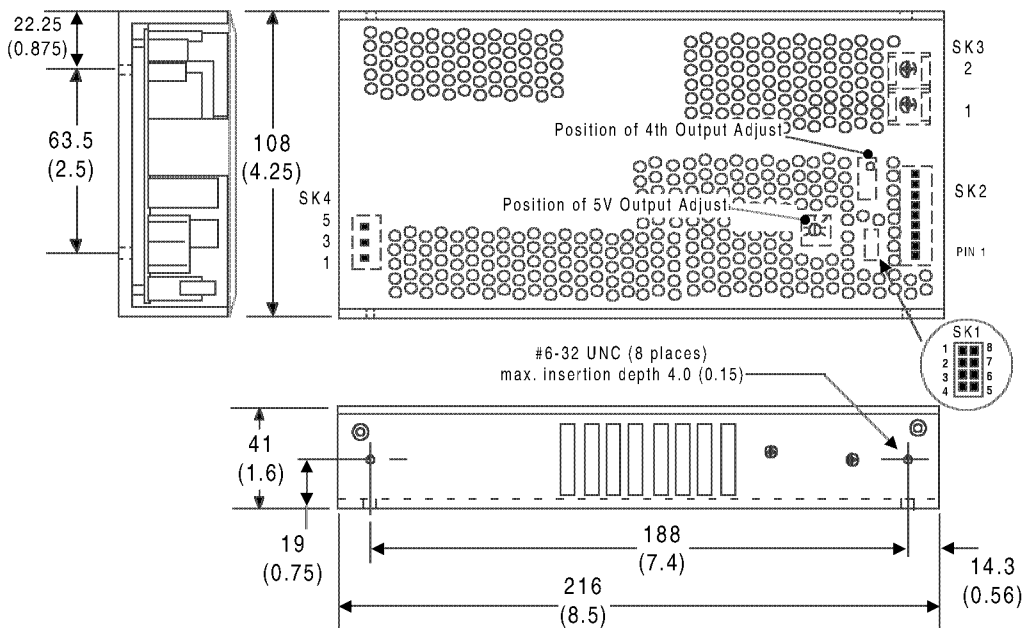


Order Code	Model Number	Output Voltage	Minimum Load ⁵	Maximum Load with Convection Cooling ⁶	Maximum Load w/ 30CFM Air ⁶	Peak Load ¹	Regulation ²	Ripple P/P (PARD) ³
289-5024	LPQ152-C	5 V	2 A	15A	22 A	30A	± 2%	50 mV
		12 V	0.1 A	6 A	8A	10A	± 3%	120 mV
		-12 V	0.1 A	2 A	2.5 A	3A	± 3%	120 mV
		±5-25 V ⁴	0 A	2.5A	3A	3A	± 3%	240 mV max
289-5030	LPQ153-C	5 V	2 A	15 A	22A	30A	± 2%	50mV
		15 V	0.1 A	4.8 A	6.4A	8A	± 3%	150 mV
		-15 V	0.1 A	1.6 A	2 A	2.4A	± 3%	150 mV
		±5-25 V ⁴	0 A	2.5A	3A	3A	± 3%	240 mV max
289-5046	LPQ154-C	5 V	2 A	15 A	22A	30A	± 2%	150 mV
		12 V	0.1 A	6 A	8A	10A	± 3%	120 mV
		-12 V	0.1 A	2 A	2.5 A	3A	± 3%	120 mV
		24 V	0.5 A	3.5A	4.5A	5A	+10/-5%	240 mV

Drawings



Pin Assignments

Connector	LPQ152-C	LPQ153-C	LPQ154-C
SK1 -1	Inhibit -ve	Inhibit -ve	Inhibit -ve
-2	Inhibit +ve	Inhibit +ve	Inhibit +ve
-3	+12V (Fan)	+15V (Fan)	+12V (Fan)
-4	NC	NC	NC
-5	Common	Common	Common
-6	-Sense	-Sense	-Sense
-7	+Sense	+Sense	+Sense
-8	C share	C share	C share
SK2 -1,2	+12 V	+15 V	+12 V
-3,4,5	Common	Common	Common
-6	-12 V	-15 V	-12 V
-7	Power OK	Power OK	Power OK
-8	+5-25 V	+5-25 V	+24 V
-9	-5-25 V	-5-25 V	Common
SK3 TB-1	Common	Common	Common
TB-2	+5 V	+5 V	+5 V
SK4 -1	Ground	Ground	Ground
-3	Line	Line	Line
-5	Neutral	Neutral	Neutral



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Installation Notes

LPQ150-C Series

150 Watts

Quad Outputs



Input Specifications

Input range	85 VAC to 132 VAC / 170-264 automatically selected 220 to 370 VDC
Frequency	47 - 63 Hz
Inrush current	< 38 A peak
Efficiency	70% typical at full load
EMI filter	Meets FCC Class B CISPR 22 Class B (includes EN55022 class B and VDE 0878 PT3 class B)
Electromagnetic compatibility	Meets IEC801-2 level 3, IEC801-4 level 3 and IEC801-5 level 3
Safety ground leakage current	< 0.5mA @ 50/60Hz, 264Vac input

Output Specifications

Maximum total wattage	Without cover: 110 W convection; 150 W with 30 CFM forced air. With cover: 75W convection; 130W with 30CFM forced air.
Adjustment range	± 5% on main 5 - 25V on output 4 on LPQ152/3
Cross regulation	±2% on output 1 ±3% on outputs 2, 3 & 4
Hold-up time	20 ms at 110W load and 115 VAC nominal line
Overload protection	Short circuit protection on all outputs. Auto recovery. Total power limited @ 110% to 145% above peak rating
Overvoltage protection	5V output: 5.7 to 6.7 Vdc. Recycle AC to reset.

Environmental

Operating temperature: 0°C to 50°C ambient;
derate at 2.5% / °C from 50°C to 70°C
Storage temperature: -40°C to 85°C
Thermal regulation: ± 0.04% / °C
MTBF: > 100,000 hours at full load and
25°C ambient conditions

Notes (refer to table)

1. Peak current lasting < 30 seconds with a maximum 10% duty cycle.
2. At 25°C including initial tolerance, line voltage, load currents and output voltages adjusted to factory settings.
3. Peak-to-peak with 20 MHz bandwidth and 10 µF in parallel with a 0.1 µF capacitor.
4. Output 4 is fully floating. It can be referenced positive or negative. It is also fully user adjustable between 5 and 25V, factory set at 5V.
5. Minimum load required for correct operation of power supply. Do not use without minimum load connected.
6. Total power drawn must not exceed 110W with convection cooling or 150W fan cooled.

Mating Connectors

(SK4) AC Input:	Housing	Molex 09-91-0500 (Or. Code. 173-3098)
Contacts:	18/24 AWG	Molex 08-50-0106 (Or. Code. 173-3284)
(SK3) Main DC Output:	M4 spade (Or. Code. 841-996)	
(SK2) Aux DC o/p:	Housing	Molex 09-91-0900 (Or. Code. 173-3133)
	/ Power OK	(10-way)
(SK1) Auxiliary:	Housing	Molex 51110-0851 (Or. Code. 842-810)
Contacts:	28/30 AWG	Molex 50394-8051 (Or. Code. 842-854)

Notes

- 1 Specifications subject to change without notice.
- 2 All dimensions are in mm and (inches).
- 3 Output Common capacitively coupled to chassis earth.
- 4 This power supply must be earthed for safe operation via SK4-1 connector.
- 5 Specifications are for convection rating without cover unless otherwise stated.
- 6 Weight 0.80 kg / 1.75 lb.

Safety

VDE	0805/EN60950 (IEC950)
UL	UL1950
CSA	CSA 22.2-234 Level 3
NEMKO	EN 60950/EMKO-TUE (74-sec) 203
BABT	EN60950/BS7002
CB	Certificate and report
CE	This product is CE marked following the provisions of the Low Voltage Directive 73/23/EEC

Auxiliary Connections

1. Remote sense - optional connection- can compensate for up to 0.5V drop; internal local sense connected if not used. Protected against reverse connection.
2. Power OK signal; -TTL compatible signal goes high 50-150ms after switch on. Goes low >1.5 ms before loss of regulation
3. Remote inhibit is via isolating optocoupler, external 5V @ 10mA required to inhibit output.
4. Paralleling power supplies - when the 'C share' signal is connected between two power supplies the main 5V outputs will current share.



Warning: Hazardous mains voltages present within this unit. Please see enclosed 'Astec Installation and Operating Instructions'. Use of optional cover kit is recommended for safe operation.

Fusing

Input fuse 5A 20mm Quick Acting HBC mains fuse - only replace with same type and rating to maintain safety standards.