

POE Power Supply BOM

Texas Instruments

PMP511 Rev B							10/17/03
Qty	RefDes	Part Number	Value	Description	Mfr	Size	
1	C16	Std	330pF	Capacitor, Ceramic, 330pF, 50V, C0G, 5%	Std	603	
1	C19	Std	560pF	Capacitor, Ceramic, 560pF, 50V, C0G, 5%	Std	603	
1	C18	Std	680pF	Capacitor, Ceramic, 680pF, 50V, C0G, 5%	Std	603	
1	C21	Std	8200pF	Capacitor, Ceramic, 8200pF, 50V, X7R, 10%	Std	603	
3	C17, C20, C22	Std	0.033uF	Capacitor, Ceramic, 0.033uF, 25V, X7R, 10%	Std	603	
2	C15, C23	Std	1uF	Capacitor, Ceramic, 1uF, 16V, X7R, 10%	Std	805	
1	C7	Std	0.1uF	Capacitor, Ceramic, 0.1uF, 100V, X7R, 10%	Std	1206	
1	C13	C3225X5R1C106M	10uF	Capacitor, Ceramic, 10uF, 16V, X5R, 20%	TDK	1210	
3	C8, C9, C10	C3225X5R0J226M	22uF	Capacitor, Ceramic, 22uF, 6.3V, X5R, 20%	TDK	1210	
1	C14	1812CG472MAT	4700pF	Capacitor, Ceramic, 4700pF, 2KV, X7R, 20%	AVX	1812	
2	C11, C12	EEVFK0J331P	330uF	Capacitor, Aluminum, SM, 330uF, 6.3V	Panasonic	8x6.2mm	
1	C5	EEVFK1J680P	68uF	Capacitor, Aluminum, SM, 68uF, 63V	Panasonic	10x10mm	
2	D5, D8	BAS16LT1		Diode, Switching, 200mA, 75V, 225mW	On Semi	SOT-23	
2	D6, D7	BZX84C18LT1	18V	Diode, Zener, 18V, 225mW	On Semi	SOT-23	
1	D3	MURS120T3		Diode, UltraFast Rectifier, 1A, 200V	On Semi	SMB	
1	L1	P0770.103	10uH	Inductor, SMT, 10uH, 1.1A, 160milliohm	Pulse	4.45x6.6mm	
1	L3	P0751.102	1uH	Inductor, SMT, 1uH, 6.8A, 10milliohm	Pulse	9.4x12.95mm	
1	R12	Std	0	Resistor, Chip, 0 Ohms	Std	603	
1	R7	Std	10	Resistor, Chip, 10 Ohms, 1/16W, 5%	Std	603	
1	R6	Std	20	Resistor, Chip, 20 Ohms, 1/16W, 5%	Std	603	
1	R13	Std	249	Resistor, Chip, 249 Ohms, 1/16W, 1%	Std	603	
2	R9, R17	Std	499	Resistor, Chip, 499 Ohms, 1/16W, 1%	Std	603	
1	R14	Std	1K	Resistor, Chip, 1.00K Ohms, 1/16W, 1%	Std	603	
1	R11	Std	9.09K	Resistor, Chip, 9.09K Ohms, 1/16W, 1%	Std	603	
1	R10	Std	10K	Resistor, Chip, 10.0K Ohms, 1/16W, 1%	Std	603	
1	R16	Std	20K	Resistor, Chip, 20.0K Ohms, 1/16W, 1%	Std	603	
1	R19	Std	23.7K	Resistor, Chip, 23.7K Ohms, 1/16W, 1%	Std	603	
1	R15	Std	40.2K	Resistor, Chip, 40.2K Ohms, 1/16W, 1%	Std	603	
1	R18	Std	51.1K	Resistor, Chip, 49.9K Ohms, 1/16W, 1%	Std	603	
1	R5	Std	40.2K	Resistor, Chip, 40.2K Ohms, 1/10W, 1%	Std	805	
1	R2	Std	100K	Resistor, Chip, 100K Ohms, 1/10W, 1%	Std	805	
1	R8	Std	0.82	Resistor, Chip, 0.82 Ohms, 1/2W, 1%	Std	2010	
3	J2, J3, J4	ED1514		Terminal Block, 2-pin, 6-A, 3.5mm	OST	0.27 x 0.25"	
1	Q1	Si4840DY		MOSFET, N-ch, 40V, 14A, 9milliOhms	Vishay	SO-8	
1	Q2	Si4848DY		MOSFET, N-ch, 150V, 3.7A, 85milliOhms	Vishay	SO-8	
1	T1	PA0691		Transformer, Flyback, 2 Primary, 2 Secondary Custom	Pulse	0.675x0.875x0.33	
1	U4	H11A817AS		IC, Optocoupler, 5300V, 80-160% CTR	Fairchild	0.405 x 0.190	
1	U5	TLV431ACDBVR		IC, Shunt Regulator, 1.24V Ref, 6V, 10mA, 1%	TI	SOT23-5	
1	U3	UCC3809P-2		IC, Economy Primary-Side Controller	TI	MSOP-8	
PoE Controller							
2	C4, C6	Std	0.1uF	Capacitor, Ceramic, 0.1uF, 100V, X7R, 10%	Std	1206	
2	D1, D2	DF01S		Diode, Bridge Rectifier, 1A, 100V	Diodes, Inc.	DF-S	
1	D4	1SMB54AT3		Diode, TVS, 54V, 600W	On Semi	SMB	
1	J1	520252		Connector, Modular, 8 Position	AMP	0.705x0.82	
1	J5	PTC36SAAN		Header, 6 Pin, 100mil Spacing, (36 Pin Strip)	Sullins	0.1x0.6	
1	L2	P0354	1.17mH	Inductor, Common Mode, 1.17mH, 1.22A	Pulse	0.5x0.5"	
1	R1	Std	24.9K	Resistor, Chip, 24.9K Ohms, 1/16W, 1%	Std	603	
1	R3	Std	1M	Resistor, Chip, 1.00M Ohms, 1/16W, 1%	Std	603	
1	R4	Std	357	Resistor, Chip, 357 Ohms, 1/16W, 1%	Std	603	
1	T2	H2019		Transformer, Center-Tapped, VoIP	Pulse	0.5x0.37	
1	U2	TPS2370PW		IC, Hot SwapSwitch for PoE Power Devices	TI	TSSOP8-PW	
1.8V LDO							
1	C1	Std	0.015uF	Capacitor, Ceramic, 0.015uF, 50V, X7R, 10%	Std	603	
2	C2, C3	Std	10uF	Capacitor, Ceramic, 10uF, 6.3V, X5R, 20%	Std	805	
1	U1	TPS79618KTT		IC, Ultra Low-Noise, High PSRR, Fast RF 1A LDO Linear	TI	DDPAK-5	

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Mailing Address: Texas Instruments
Post Office Box 655303 Dallas, Texas 75265

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