

Filename: PMP10397RevA_Bom.xls
 Variant: 001
 Generated: 9/18/2014 3:52:46 PM
 SVN path: \$URL:::
 SVN rev: \$Rev:: \$

\$

85VAC to 528VAC Flyback with BJT switch

Designator	Quantity	Value	Description	PackageReference	PartNumber	Manufacturer	Alternate PartNumber	Alternate Manufacturer
IPC81	1		Printed Circuit Board		PMP10397	Any	-	-
C1, C5	2	15uF	CAP ALUM 15UF 400V 20% RADIAL	RCAP, 10x25mm	UVC2G150MPD	Nichicon		
C2	1	470uF	CAP ALUM 470UF 10V 20% RADIAL	RCAP 8x11.5mm	10YXF470MEFC8X11.5	Rubycon		
C3	1	4.7uF	CAP, CERM, 4.7 uF, 10 V, +/- 10%, X5R, 0603	0603	CGB3B1X5R1A475K055AC	TDK		
C4	1	22uF	CAP, CERM, 22 uF, 10 V, +/- 20%, X5R, 0603	0603	CL10A226MP8NJUNE	Samsung		
C6	1	2200pF	CAP, CERM, 2200 pF, 250 V, +/- 20%, E, Disc 10x8mm	Disc 10x8mm	DE1E3KX222MA5BA01	MuRata		
C7	1	100uF	CAP ALUM 100UF 25V 20% RADIAL	RCAP 8x11.5mm	UMA1E101MDD1TP	Nichicon		
C8	1	2.2uF	CAP, CERM, 2.2 uF, 25 V, +/- 10%, X5R, 1206	1206	GRM316R61E225KA12D	MuRata		
C9	1	4.7uF	CAP, CERM, 4.7 uF, 25 V, +/- 10%, X5R, 0805	0805	C2012X5R1E475K125AB	TDK		
C10	1	4.7uF	CAP, CERM, 4.7 uF, 50 V, +/- 10%, X5R, 1206	1206	GRM319R61H475KA12	MuRata		
D1	1	100V	Diode, Schottky, 100V, 1A, SMA	SMA	SS1H10-E3/61T	Vishay-Semiconductor		
D2	1	200V	DIODE ZENER 200V 3W DO214AC	SMA	3SMAJ5956B	Micro Commercial Co		
D3	1	1000V	Diode, Switching-Bridge, 1000V, 1A, DF-S	DF-S	DF10SA	Vishay-Semiconductor		
D4	1	1.7V	Diode, Ultrafast, 1000V, 1A, SMA	SMA	US1M-13-F	Diodes Inc.		
D5	1	200V	DIODE SCHOTTKY 200V 1A SMA	SMA	SS1200-LTP	Micro Commercial Componen		
D6	1		DIODE SWITCH 200V 200MA SOD323	SOD-323	BAS20HT1G			
F1	1		Fuse, 0.25 A, 250 V, TH	TR5 fuse 8.5mm DIA	37202500001	Littelfuse		
J1	1		HEADER, .312 VERT 3POS	19.7x10.7 x8.5 mm	1-1318301-3	TE Connectivity		
L1, L2	2	100uH	Inductor, Unshielded Drum Core, Ferrite, 100uH, 0.8A, 0.457 ohm, TH	D6 x 8.5mm	7447462101	Würth Elektronik eiSos		
Q1	1	2V	TRANSISTOR NPN 800V 3A I2PAK	TO-126	FJ15603DTU	Fairchild		
R1, R3, R4, R6	4	4.7Meg	RES, 4.7Meg ohm, 5%, 0.25W, 1206	1206	CRCW12064M70JNEA	Vishay-Dale		
R2	1	511	RES, 511, 1%, 0.1 W, 0603	0603	CRCW0603511RFKEA	Vishay-Dale		
R5	1	1.00k	RES, 1.00k ohm, 1%, 0.125W, 0805	0805	CRCW08051K00FKEA	Vishay-Dale		
R7	1	2.0k	RES, 2.0k ohm, 5%, 0.125W, 0805	0805	CRCW08052K00JNEA	Vishay-Dale		
R8, R10, R12	3	1.5Meg	RES, 1.5 M, 5%, 0.25 W, 1206	1206	CRCW12061M50JNEA	Vishay-Dale		
R9	1	0	RES, 0.5%, 0.25 W, 1206	1206	RC1206JR-070RL	Yageo America		
R11	1	73.2k	RES, 73.2 k, 1%, 0.1 W, 0603	0603	CRCW060373K2FKEA	Vishay-Dale		
R13	1	324	RES, 324, 1%, 0.25 W, 1206	1206	CRCW1206324RFKEA	Vishay-Dale		
R14	1	15.8k	RES, 15.8 k, 1%, 0.1 W, 0603	0603	CRCW060315K8FKEA	Vishay-Dale		
R15	1	3.0	RES, 3.0 ohm, 5%, 0.125W, 0805	0805	CRCW08053R00JNEA	Vishay-Dale		
T1	1	165uH	Transformer, Flyback, TH	23.3x18.75x33 mm	BILLY-LONG-TRAFFO	Texas Instruments		
TP1, TP3	2	Red	Test Point, TH, Miniature, Red	Keystone5000	5000	Keystone		
TP2, TP4	2	Black	Test Point, TH, Miniature, Black	Keystone5001	5001	Keystone		
U1	1		Constant-Voltage, Constant-Current Controller With Primary-Side Regulation, BJT Drive, DBV0006A	DBV0006A	UCC28722DBV	Texas Instruments		None

Notes:

Unless otherwise noted in the Alternate PartNumber and/or Alternate Manufacturer columns, all parts may be substituted with equivalents.

IMPORTANT NOTICE FOR TI REFERENCE DESIGNS

Texas Instruments Incorporated ("TI") reference designs are solely intended to assist designers ("Buyers") who are developing systems that incorporate TI semiconductor products (also referred to herein as "components"). Buyer understands and agrees that Buyer remains responsible for using its independent analysis, evaluation and judgment in designing Buyer's systems and products.

TI reference designs have been created using standard laboratory conditions and engineering practices. **TI has not conducted any testing other than that specifically described in the published documentation for a particular reference design.** TI may make corrections, enhancements, improvements and other changes to its reference designs.

Buyers are authorized to use TI reference designs with the TI component(s) identified in each particular reference design and to modify the reference design in the development of their end products. HOWEVER, NO OTHER LICENSE, EXPRESS OR IMPLIED, BY ESTOPPEL OR OTHERWISE TO ANY OTHER TI INTELLECTUAL PROPERTY RIGHT, AND NO LICENSE TO ANY THIRD PARTY TECHNOLOGY OR INTELLECTUAL PROPERTY RIGHT, IS GRANTED HEREIN, including but not limited to any patent right, copyright, mask work right, or other intellectual property right relating to any combination, machine, or process in which TI components or services are used. Information published by TI regarding third-party products or services does not constitute a license to use such products or services, or a warranty or endorsement thereof. Use of such information may require a license from a third party under the patents or other intellectual property of the third party, or a license from TI under the patents or other intellectual property of TI.

TI REFERENCE DESIGNS ARE PROVIDED "AS IS". TI MAKES NO WARRANTIES OR REPRESENTATIONS WITH REGARD TO THE REFERENCE DESIGNS OR USE OF THE REFERENCE DESIGNS, EXPRESS, IMPLIED OR STATUTORY, INCLUDING ACCURACY OR COMPLETENESS. TI DISCLAIMS ANY WARRANTY OF TITLE AND ANY IMPLIED WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, QUIET ENJOYMENT, QUIET POSSESSION, AND NON-INFRINGEMENT OF ANY THIRD PARTY INTELLECTUAL PROPERTY RIGHTS WITH REGARD TO TI REFERENCE DESIGNS OR USE THEREOF. TI SHALL NOT BE LIABLE FOR AND SHALL NOT DEFEND OR INDEMNIFY BUYERS AGAINST ANY THIRD PARTY INFRINGEMENT CLAIM THAT RELATES TO OR IS BASED ON A COMBINATION OF COMPONENTS PROVIDED IN A TI REFERENCE DESIGN. IN NO EVENT SHALL TI BE LIABLE FOR ANY ACTUAL, SPECIAL, INCIDENTAL, CONSEQUENTIAL OR INDIRECT DAMAGES, HOWEVER CAUSED, ON ANY THEORY OF LIABILITY AND WHETHER OR NOT TI HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES, ARISING IN ANY WAY OUT OF TI REFERENCE DESIGNS OR BUYER'S USE OF TI REFERENCE DESIGNS.

TI reserves the right to make corrections, enhancements, improvements and other changes to its semiconductor products and services per JESD46, latest issue, and to discontinue any product or service per JESD48, latest issue. Buyers should obtain the latest relevant information before placing orders and should verify that such information is current and complete. All semiconductor products are sold subject to TI's terms and conditions of sale supplied at the time of order acknowledgment.

TI warrants performance of its components to the specifications applicable at the time of sale, in accordance with the warranty in TI's terms and conditions of sale of semiconductor products. Testing and other quality control techniques for TI components are used to the extent TI deems necessary to support this warranty. Except where mandated by applicable law, testing of all parameters of each component is not necessarily performed.

TI assumes no liability for applications assistance or the design of Buyers' products. Buyers are responsible for their products and applications using TI components. To minimize the risks associated with Buyers' products and applications, Buyers should provide adequate design and operating safeguards.

Reproduction of significant portions of TI information in TI data books, data sheets or reference designs is permissible only if reproduction is without alteration and is accompanied by all associated warranties, conditions, limitations, and notices. TI is not responsible or liable for such altered documentation. Information of third parties may be subject to additional restrictions.

Buyer acknowledges and agrees that it is solely responsible for compliance with all legal, regulatory and safety-related requirements concerning its products, and any use of TI components in its applications, notwithstanding any applications-related information or support that may be provided by TI. Buyer represents and agrees that it has all the necessary expertise to create and implement safeguards that anticipate dangerous failures, monitor failures and their consequences, lessen the likelihood of dangerous failures and take appropriate remedial actions. Buyer will fully indemnify TI and its representatives against any damages arising out of the use of any TI components in Buyer's safety-critical applications.

In some cases, TI components may be promoted specifically to facilitate safety-related applications. With such components, TI's goal is to help enable customers to design and create their own end-product solutions that meet applicable functional safety standards and requirements. Nonetheless, such components are subject to these terms.

No TI components are authorized for use in FDA Class III (or similar life-critical medical equipment) unless authorized officers of the parties have executed an agreement specifically governing such use.

Only those TI components that TI has specifically designated as military grade or "enhanced plastic" are designed and intended for use in military/aerospace applications or environments. Buyer acknowledges and agrees that any military or aerospace use of TI components that have **not** been so designated is solely at Buyer's risk, and Buyer is solely responsible for compliance with all legal and regulatory requirements in connection with such use.

TI has specifically designated certain components as meeting ISO/TS16949 requirements, mainly for automotive use. In any case of use of non-designated products, TI will not be responsible for any failure to meet ISO/TS16949.