PMP11090 REV A Bill of Materials

Designator	Quantity	Value	PartNumber	Manufacturer	Description	PackageReference
!PCB1	1		PMP11090	Any	Printed Circuit Board	
C1	1	10uF	UVR1V100MDD1TA	Nichicon	CAP, AL, 10uF, 35V, +/-20%, TH	CAPPR2-5x11
C2	1	22pF	06035A220JAT2A	AVX	CAP, CERM, 22pF, 50V, +/-5%, C0G/NP0, 0603	0603
C3, C7	2	8.2uF	400AX8.2M8X16	Rubycon	CAP ALUM 8.2UF 400V 20% RADIAL	8x11
C4, C8	2	15uF	400AX15M10X16	Rubycon	CAP ALUM 15UF 400V 20% RADIAL	10x16mm
C5	1	150uF	UPW1V151MPD	Nichicon	CAP ALUM 150UF 35V 20% RADIAL	8.0x10.5mm
C6	1	1uF	08055C105KAT2A	AVX	CAP, CERM, 1uF, 50V, +/-10%, X7R, 0805	0805
C100	1	0.1uF	06033C104JAT2A	AVX	CAP, CERM, 0.1 µF, 25 V, +/- 5%, X7R, 0603	0603
C101	1	1uF	C0603C105K4PACTU	Kemet	CAP, CERM, 1 µF, 16 V, +/- 10%, X5R, 0603	0603
D1, D101	2	100V	1N4148W-7-F	Diodes Inc.	Diode, Ultrafast, 100V, 0.15A, SOD-123	SOD-123
D2	1	800V	ES1K-TP	Diodes Inc.	DIODE GEN PURP 800V 1A DO214AC	SMA
D3	1	1000V	DF10SA	Vishay-Semiconductor	Diode, Switching-Bridge, 1000 V, 1 A, DF-S	DF-S
D4	1	800V	MURS480ET3G	ON Semiconductor	DIODE GEN PURP 800V 4A SMC	SMC
D100	1	12V	1SMA5927BT3G	ON Semiconductor	Diode, Zener, 12 V, 1.5 W, SMA	SMA
D102	1	56V	MMSZ5263BT1G	ON Semiconductor	Diode, Zener, 91 V, 500 mW, SOD-123	SOD-123
F100	1		37202500001	Littelfuse	Fuse, 0.25 A, 250 V, TH	TR5 fuse 8.5mm DIA
L1	1	1mH	7447462102	Wurth Elektronik	Inductor, Unshielded Drum Core, Ferrite, 1 mH, 0.25 A, 4.38 ohm, TH	D6 x 8.5mm
L2	1	10uH	RFS1317-104KL	Coilcraft	Inductor, Shielded, Ferrite, 100 µH, TH	13.3mm DIA
Q1	1	800V	SPP02N80C3	Infineon Technologies	MOSFET N-CH 800V 2A TO-220AB	TO-220AB
R1	1	76.8k	CRCW060376K8FKEA	Vishay-Dale	RES, 76.8 k, 1%, 0.1 W, 0603	0603
R2, R6	2	100k	CRCW1206100KFKEA	Vishay-Dale	RES, 100 k, 1%, 0.25 W, 1206	1206
R3	1	301	CRCW0603301RFKEA	Vishay-Dale	RES, 301 ohm, 1%, 0.1W, 0603	0603
R4	1	15.4k	CRCW060315K4FKEA	Vishay-Dale	RES, 15.4 k, 1%, 0.1 W, 0603	0603
R5	1	0.68	ERJ-8RQFR68V	Panasonic	RES, 0.68, 1%, 0.25 W, 1206	1206
R7	1	0.75	CSR1206FKR750	Stackpole Electronics Inc	RES, 0.75, 1%, 0.5 W, 1206	1206
R8, R9, R11, R12, R14, R15, R16, R17	8	1.0Meg	CRCW06031M00JNEA	Vishay-Dale	RES, 1.0 M, 5%, 0.1 W, 0603	0603
R100, R102	2	1.50k	CRCW12061K50FKEA	Vishay-Dale	RES, 1.50 k, 1%, 0.25 W, 1206	1206
R101	1	100	CRCW1206100RFKEA	Vishay-Dale	RES, 100, 1%, 0.25 W, 1206	1206
TP1, TP2, TP5	3	Red	5000	Keystone	Test Point, Miniature, Red, TH	Red Miniature Testpoint
TP3, TP4, TP6	3	Black	5001	Keystone	Test Point, Miniature, Black, TH	Black Miniature Testpoint
U1	1		UCC28710D	Texas Instruments	Constant-Voltage, Constant-Current Controller With Primary-Side Regulation, D0007A	D0007A
U100	1		TLV70450DBVT	Texas Instruments	Single Output LDO, 150 mA, Fixed 5 V Output, 2.5 to 24 V Input, with Ultra-Low IQ, 5-pin SOT-23 (DBV), -40 to 125 degC, Green (RoHS & no Sb/Br)	DBV0005A
C9	0	1uF	08055C105KAT2A	AVX	CAP, CERM, 1uF, 50V, +/-10%, X7R, 0805	0805
C10	0	22uF	GRM31CR60J226KE19L	MuRata	CAP, CERM, 22 µF, 6.3 V, +/- 10%, X5R, 1206	1206
L3	0	10uH	LPS4018-103MLB	Coilcraft	Inductor, Shielded Drum Core, Ferrite, 10 µH, 1.25 A, 0.2 ohm, SMD	LPS4018
R10, R13	0	22	M251206BB2209JP500	Vishay-Dale	RES SMD 22 OHM 5% 1/4W 1206	1206
R18	0	2.00Meg	CRCW06032M00FKEA	Vishay-Dale	RES, 2.00 M, 1%, 0.1 W, 0603	0603
R19	0	100k	CRCW0603100KJNEA	Vishay-Dale	RES, 100 k, 5%, 0.1 W, 0603	0603
R20	0	383k	CRCW0603383KFKEA	Vishay-Dale	RES, 383 k, 1%, 0.1 W, 0603	0603
U2	0		TPS62175DQC	Texas Instruments	28V, 0.5A Step-Down Converter with Sleep Mode, DQC0010A	DQC0010A

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.

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