

## TIDA-00807 REV E2 Bill of Materials

Designator	Quantity	Value	PartNumber	Manufacturer	Description	PackageReference
C1	1	2200pF	GRM188R71C222KA01D	MuRata	CAP, CERM, 2200 pF, 16 V, +/- 10%, X7R, 0603	0603
C2	1	0.47uF	C0603C474K9RACTU	Kemet	CAP, CERM, 0.47 uF, 6.3 V, +/- 10%, X7R, 0603	0603
C3, C4, C6, C7, C11, C13, C15, C20, C21, C23, C24	11	0.1uF	06033C104JAT2A	AVX	CAP, CERM, 0.1uF, 25V, +/-5%, X7R, 0603	0603
C5	1	4.7uF	GRM188R60J475ME19D	MuRata	CAP, CERM, 4.7 uF, 6.3 V, +/- 20%, X5R, 0603	0603
C8, C9, C14, C18, C22	5	0.01uF	C1608C0G1E103J	TDK	CAP, CERM, 0.01uF, 25V, +/-5%, C0G/NP0, 0603	0603
C10	1	0.015uF	GRM188R71E153KA01D	MuRata	CAP, CERM, 0.015 uF, 25 V, +/- 10%, X7R, 0603	0603
C12, C16, C17, C19	4	100pF	06033C101KAT2A	AVX	CAP, CERM, 100pF, 25V, +/-10%, X7R, 0603	0603
C25	1	4.7uF	C2012X5R1H475K125AB	TDK	4.7uF ±10% 50V X5R Ceramic Capacitor	0805
C26, C29	2	33 uF	T491D336M010AT	Kemet	CAP TANT 33UF 10V 20% 2917	7343 (D)
C27	1	10uF	1210YD106KAT2A	AVX	CAP, CERM, 10uF, 16V, +/-10%, X5R, 1210	1210
C28	1	1uF	C0603C105K4PACTU	Kemet	CAP, CERM, 1uF, 16V, +/-10%, X5R, 0603	0603
D1	1	Green	LG L29K-G2J1-24-Z	OSRAM	LED, Green, SMD	1.7x0.65x0.8mm
D2	1	3.3V	PESD3V3L1BA	NXP Semiconductor	DIODE, TVS, BIDIRECTIONAL, 3.3VWVM, 26VC, SOD323	SOD323
D3	1	3.6V	MMSZ4685T1G	ON Semiconductor	Diode, Zener, 3.6 V, 500 mW, SOD-123	SOD-123
D4, D5, D6, D7, D8, D9	6	Green	150060GS75000	Würth Elektronik	LED, Green, SMD	LED_0603
FB1, FB2	2	42 OHM	FBMJ2125HS420-T	TAIYO YUDEN	FERRITE BEAD, 42 OHM, 4 A, DCR0.008 OHM, SMT-0805	0805
J1, J2	2		5-146278-4	TE Connectivity	Header, 100mil, 4x1, Tin, TH	Header, 4x1, 100mil, TH
J3, J5	2		OSTVN02A150	On-Shore Technology	Terminal Block, 2.54mm, 2x1, Brass, TH	Terminal Block, 2.54mm, 2-pole, Brass, TH
J4	1		ED120/2DS	On-Shore Technology	TERMINAL BLOCK 5.08MM VERT 2POS, TH	TERM_BLK, 2pos, 5.08mm
JP2	1		5-146280-2	TE Connectivity	Header, 100mil, 2x1, Gold, TH	2x1 Header
L1	1	3.3uH	B82422H1332K	EPCOS Inc	Inductor, Chip, 3.3uH 770MA 1210 10%	1210
L2	1	2.2uH	744030002	Würth Elektronik	Inductor, Shielded Drum Core, Metal Composite, 2.2 uH, 0.74 A, 0.14 ohm, SMD	3.5x0.95x3.3mm
R1, R2, R33, R35, R37, R39, R67, R68	8	47.0k	RC0603FR-0747KL	Yageo America	RES, 47.0 k, 1%, 0.1 W, 0603	0603
R3	1	680	RC0603FR-07680RL	Yageo America	RES, 680, 1%, 0.1 W, 0603	0603
R4, R5, R11, R12	4	4.70k	RC0603FR-074K7L	Yageo America	RES, 4.70 k, 1%, 0.1 W, 0603	0603
R6, R44	2	30.0k	RC0603FR-0730KL	Yageo America	RES, 30.0 k, 1%, 0.1 W, 0603	0603
R7, R9, R15, R17, R20, R27, R38	7	100	CRCW0603100RFKEA	Vishay-Dale	RES, 100 ohm, 1%, 0.1W, 0603	0603
R8, R10	2	220	RC0603FR-07220RL	Yageo America	RES, 220, 1%, 0.1 W, 0603	0603
R13, R45, R49, R50, R63, R64, R65, R66	8	0	ERJ-3GEY0R00V	Panasonic	RES, 0, 5%, 0.1 W, 0603	0603

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R14, R16, R18, R25, R26, R28, R36	7	10.0k	CRCW060310K0FKEA	Vishay-Dale	RES, 10.0k ohm, 1%, 0.1W, 0603	0603
R19	1	470	RC0603FR-07470RL	Yageo America	RES, 470 ohm, 1%, 0.1W, 0603	0603
R21	1	30.0k	RC0603FR-0730KL	Yageo America	RES, 30.0k ohm, 1%, 0.1W, 0603	0603
R22, R23	2	22.0	RC1206FR-0722RL	Yageo America	RES, 22.0 ohm, 1%, 0.25W, 1206	1206
R24	1	27.0k	RC0603FR-0727KL	Yageo America	RES, 27.0k ohm, 1%, 0.1W, 0603	0603
R29, R31, R43, R47, R61, R69	6	100k	CRCW0603100KFKEA	Vishay-Dale	RES, 100k ohm, 1%, 0.1W, 0603	0603
R30, R32, R34	3	332k	ERJ-8ENF3323V	Panasonic	RES, 332k ohm, 1%, 0.25W, 1206	1206
R40	1	10k	CRCW060310K0FKEA	Stackpole Electronics Inc	RES, 10.0k ohm, 1%, 0.1W, 0603	0603
R41, R42	2	2.80k	CRCW12062K80FKEA	Vishay-Dale	RES, 2.80k ohm, 1%, 0.25W, 1206	1206
R46	1	1.00Meg	CRCW06031M00FKEA	Vishay-Dale	RES, 1.00Meg ohm, 1%, 0.1W, 0603	0603
R48	1	1.02	RC1206FR-071R02L	Yageo America	RES, 1.02 ohm, 1%, 0.25W, 1206	1206
R52	1	0	CRCW08050000Z0EA	Vishay-Dale	RES, 0 ohm, 5%, 0.125W, 0805	0805
R55, R56, R57, R58, R59, R60	6	220	CRCW0603220RJNEA	Vishay-Dale	RES, 220 ohm, 5%, 0.1W, 0603	0603
U1	1		MSP430FR5728IPWR	Texas Instruments	MIXED SIGNAL MICROCONTROLLER, PW0028A	PW0028A
U2	1		SN74LVC1G3157DBVR	TEXAS INSTRUMENTS	IC, SWITCH, SPDT, SOT23-6	DBV
U3	1		DAC101C081CIMK	Texas Instruments	10-Bit Micro Power Digital-to-Analog Converter with an I2C-Compatible Interface, 6-pin Tiny SOT23	MK06A
U4	1		LMT87LPM	Texas Instruments	Analog Temperature Sensors with Class-AB Output, LP0003A	LP0003A
U5	1		DRV5032FBDBZR	Texas Instruments	Ultra-Low Power Digital-Switch Hall Effect Sensor, DBZ0003A	DBZ0003A
U6, U8	2		OPA2317IDR	Texas Instruments	Low-Offset, Rail-to-Rail I/O Operational Amplifier Precision Catalog, D0008A	D0008A
U7	1	LM4041BID BZ	LM4041BIDBZ	TI	IC, Micropower Shunt Voltage Reference 100 ppm/°C, 45µA-12mA, Adjustable	SOT23
U9	1		LMV331IDBV	Texas Instruments	Single General Purpose Low-Voltage Comparator, DBV0005A	DBV0005A
U10	1		TPS62740DSSR	Texas Instruments	360nA IQ Step Down Converter for Low Power Applications, DSS0012A	DSS0012A
R51, R53, R54, R62	0	0	ERJ-3GEY0R00V	Panasonic	RES, 0, 5%, 0.1 W, 0603	0603

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