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TIDA-01445 REV E1 Bill of Materials

Item #	Designator	Quantity	Value	PartNumber	Manufacturer	Description	PackageReference
1	!PCB1	1		TIDA-01445	Any	Printed Circuit Board	
2	12V Battery, ADC HS CS, ADC LS CS, ADC Pin1, ADC Pin2, Ground, Interlock Input, Internal Power, Int Pin1, Int Pin2	10		1593-2	Keystone	Terminal, Turret, TH, Double	Keystone1593-2
3	C1, C2, C6, C7, C8, C10, C13, C16, C17	9	0.01uF	C0603C103J3GECAUTO	Kemet	CAP, CERM, 0.01 µF, 25 V, +/- 5%, C0G/NP0, AEC-Q200 Grade 1, 0603	0603
4	C3, C4, C9, C12, C18, C19, C20, C21, C22	9	0.022uF	GCM155R71E223KA55D	MuRata	CAP, CERM, 0.022 µF, 25 V, +/- 10%, X7R, AEC-Q200 Grade 1, 0402	0402
5	C5, C11, C14, C15	4	10uF	GRM188R61C106MAALD	MuRata	CAP, CERM, 10 µF, 16 V, +/- 20%, X5R, 0603	0603
6	D1	1	60V	PMEG6010CEJ,115	Nexperia	Diode, Schottky, 60 V, 1 A, SOD-323F	SOD-323F
7	Q1	1	100V	CSD19532Q5B	Texas Instruments	MOSFET, N-CH, 100 V, 17 A, DNK0008A (VSON-CLIP-8)	DNK0008A
8	R1, R5, R20, R21, R26	5	10.2k	CRCW040210K2FKED	Vishay-Dale	RES, 10.2 k, 1%, 0.063 W, 0402	0402
9	R2, R4, R8, R24, R29, R30, R32, R33, R34, R35	10	0	MCR01MZPJ000	Rohm	RES, 0, 5%, 0.063 W, 0402	0402
10	R3, R7	2	2.40k	ERA-3AEB242V	Panasonic	RES, 2.40 k, 0.1%, 0.1 W, AEC-Q200 Grade 0, 0603	0603
11	R6	1	510	CRCW1206510RJNEA	Vishay-Dale	RES, 510, 5%, 0.25 W, 1206	1206
12	R9, R31	2	1.00k	ERA-2APB102X	Panasonic	RES, 1.00 k, 0.1%, 0.063 W, AEC-Q200 Grade 0, 0402	0402
13	R10	1	2.00	RT0603DRE072RL	Yageo America	RES, 2.00, 0.5%, 0.1 W, 0603	0603
14	R11	1	200k	CRCW0402200KFKED	Vishay-Dale	RES, 200 k, 1%, 0.063 W, 0402	0402
15	R12, R13	2	10.0	CRCW040210R0FKED	Vishay-Dale	RES, 10.0, 1%, 0.063 W, 0402	0402
16	R14	1	10k	ERJ-2GEJ103X	Panasonic	RES, 10 k, 5%, 0.1 W, AEC-Q200 Grade 0, 0402	0402
17	R15	1	9.1k	CRCW04029K10JNED	Vishay-Dale	RES, 9.1 k, 5%, 0.063 W, 0402	0402
18	R16	1	1.00k	CRCW04021K00FKED	Vishay-Dale	RES, 1.00 k, 1%, 0.063 W, 0402	0402
19	R17	1	10.0	CRT0603-BY-10R0ELF	Bourns	RES, 10.0, 0.1%, 0.1 W, 0603	0603
20	R18	1	10.0k	TNPW060310K0BEEA	Vishay-Dale	RES, 10.0 k, 0.1%, 0.1 W, AEC-Q200 Grade 1, 0603	0603
21	R19, R23, R25, R27, R28	5	10.0k	RMCF0402FT10K0	Stackpole Electronics Inc	RES, 10.0 k, 1%, 0.063 W, AEC-Q200 Grade 0, 0402	0402
22	R22	1	200k	PVG5A204C03R00	MuRata	Trimmer Potentiometer, 200K, 0.25W, SMD	Trimmer, 4.8,3.9x5.1mm
23	R36	1	20k	CRCW040220K0JNED	Vishay-Dale	RES, 20 k, 5%, 0.063 W, 0402	0402
24	U1	1		TPS2H000BQPWPRQ1	Texas Instruments	40 V/1000 mohm Dual Channels Smart High Side Power Switch, PWP0016J (TSSOP-16)	PWP0016J
25	U2	1		LM2903AVQD	Texas Instruments	Dual Comparator, D0008A	D0008A
26	U3	1		INA225AQDGKRQ1	Texas Instruments	Automotive, 36-V Prog. Gain, Bi-Directional, Zero-Drift, High-Speed Voltage Out Current Sense Amp, DGK0008A (VSSOP-8)	DGK0008A
27	U4	1		TPS7B6950QDBVRQ1	Texas Instruments	Automotive High-Voltage Ultra-Low IQ Low-Dropout Regulator/Fixed 5-V Output Voltage, DBV0005A (SOT-5)	DBV0005A
28	U5	1		TPS7A1601QDGNRQ1	Texas Instruments	Automotive 60V, 5-uA Iq, 100-mA, Low-Dropout Voltage Regulator with Enable and Power Good, DGN0008B (VSSOP-8)	DGN0008B
29	FID1, FID2, FID3	0		N/A	N/A	Fiducial mark. There is nothing to buy or mount.	Fiducial

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