

# Bill of Materials

## TI DESIGNS

TIPD155: Two-Channel Combined Voltage and Current Sourcing/Sinking Analog Output

Item #	Quantity	Designator	Value	Description	Manufacturer	Part Number
1	12	C1, C2, C3, C4, C5, C10, C11, C17, C22, C23, C24, C25	0.1uF	CAP, CERM, 0.1uF, 50V, +/-10%, X7R, 0603	MuRata	GRM188R71H104KA93D
2	1	C6	10uF	CAP, CERM, 10uF, 50V, +/-10%, X7R, 1210	MuRata	GRM32ER71H106KA12L
3	2	C7, C8	10uF	CAP, TANT, 10uF, 50V, +/-10%, 0.8 ohm, 7343-43 SMD	Vishay-Sprague	293D106X9050E2TE3
4	1	C9	0.022uF	CAP, CERM, 0.022uF, 16V, +/-10%, X7R, 0603	Kemet	C0603C223K4RACTU
5	2	C12, C13	100pF	CAP, CERM, 100pF, 50V, +/-5%, C0G/NP0, 0603	AVX	06035A101JAT2A
6	3	C14, C18, C19	0.01uF	CAP, CERM, 0.01uF, 50V, +/-5%, X7R, 0603	Kemet	C0603C103J5RACTU
7	1	C15	10uF	CAP, CERM, 10uF, 16V, +/-10%, X7R, 1206	MuRata	GRM31CR71C106KAC7L
8	1	C16	4.7uF	CAP, CERM, 4.7uF, 16V, +/-10%, X7R, 1206	TDK	C3216X7R1C475K
9	2	C20, C21	0.047uF	CAP, CERM, 0.047uF, 50V, +/-10%, X7R, 0603	TDK	C1608X7R1H473K
10	2	C26, C27	0.1uF	CAP, CERM, 0.1uF, 50V, +/-10%, X7R, 0603	Kemet	C0603C104K5RACTU
11	2	D1, D2		Diode, TVS, Uni, 15V, 600W, SMB	Diodes Inc.	SMBJ15A-13-F
12	2	D3, D9		LED, Red, SMD	Lite-On	LTST-C170KRKT
13	1	D4		TVS ESD PROT ULT LOW CAP SOD-923	ON Semiconductor	ESD9L5.0ST5G
14	2	D5, D6		DIODE TVS ARRAY 15V SOD323	Bourns	CDSOD323-T15SC
15	2	D7, D8		Diode, TVS, Uni, 70V, W, SOT-323	Diodes Inc.	DESD1P0RFWQ-7
16	1	FB1		FERRITE CHIP 600 OHM 200MA 0603	MuRata	BLM18HG601SN1D
17	2	FB2, FB3		BEAD FERRITE 500 OHM 3.0A 3216	Bourns Inc.	MH3261-501Y
18	2	J1, J2		CONN HEADER 5POS .100" T/H GLD	Samtec, Inc.	TSW-105-07-G-S
19	1	J3		CONN SOCKET 50PIN .050 R/A SNGL	Mill-Max Manufacturing Corp.	851-43-050-20-001000
20	1	J4		CONN HEADER 2POS .050 T/H GOLD"	Samtec	TMS-102-02-G-S
21	1	J5		TERMINAL BLOCK 3.5MM 3POS PCB	On Shore Technology Inc	ED555/3DS
22	2	J6, J7		TERMINAL BLOCK 3.5MM 2POS PCB	On Shore Technology Inc	ED555/2DS
23	2	Q1, Q2		MOSFET, P-CH, -80V, -1.2A, SOT-23	Vishay-Siliconix	SI2337DS-T1-E3
24	10	R1, R2, R3, R4, R6, R7, R19, R20, R24, R26	100k	RES, 100k ohm, 1%, 0.1W, 0603	Vishay-Dale	CRCW0603100KFKEA
25	4	R5, R8, R11, R33	10.0k	RES, 10.0k ohm, 1%, 0.1W, 0603	Vishay-Dale	CRCW060310K0FKEA
26	1	R9	3.00k	RES, 3.00k ohm, 1%, 0.1W, 0603	Yageo America	RC0603FR-073KL
27	1	R10	11.0k	RES, 11.0k ohm, 1%, 0.1W, 0603	Vishay-Dale	CRCW060311K0FKEA
28	2	R12, R34	3.30k	RES, 3.30k ohm, 1%, 0.1W, 0603	Yageo America	RC0603FR-073K3L
29	4	R13, R14, R17, R18	1.02k	RES, 1.02k ohm, 0.1%, 0.1W, 0603	Yageo America	RT0603BRD071K02L
30	4	R15, R16, R21, R22	750	RES, 750 ohm, 1%, 0.1W, 0603	Vishay-Dale	CRCW0603750RFKEA
31	4	R23, R25, R27, R28	5.10k	RES, 5.10k ohm, 1%, 0.1W, 0603	Yageo America	RC0603FR-075K1L
32	2	R29, R30	8.25k	RES, 8.25k ohm, 0.1%, 0.1W, 0603	Susumu Co Ltd	RG1608P-8251-B-T5
33	2	R31, R32	15	RES, 15.0 ohm, 1%, 0.125W, 0805	Vishay-Dale	CRCW080515R0FKEA
34	2	U1, U2		IC DGLT ISO 4CH LOGIC 16SOIC	Texas Instruments	ISO7641FMDW
35	1	U3		IC, 28-V Input Voltage, 50-mA Voltage Regulator	Texas Instruments	TPS7A4201DGN
36	1	U4		IC DAC 16BIT SRL DUAL 10MSOP	Texas Instruments	DAC8563SDGS
37	2	U5, U6		IC, Industrial Analog Current/Voltage Output Driver	Texas Instruments	XTR300AIRGWR

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