

Instructions

Fill in the cells with the YELLOW highlight. **Do not edit red cells.** WE WILL ADJUST THE MULTIPLIER TO ACCOUNT FOR MULTIPLE BOARDS, YOU SHOULD NOT. Fill out the Digi-Key part # OR the Mouser Part #, DO NOT fill out both. Choose the cheapest distributor that has the part in stock. If the part is not in stock by the time we order parts, there is a risk that we will not purchase it. For any **approved Amazon or Adafruit parts**, leave Digi-key and Mouser Part# columns blank like the example. For **approved Amazon** parts, put the ASIN (under the Product Information Section) for Manufacturer Part # in the format "Amazon - #####". For **approved Adafruit parts**, put the Product ID for Manufacturer Part # in the format "Adafruit - #####".

Total Price for Project

49.5

Qty (for 1 board)	Manufacturer Part #	Digi-key Part#/SKU	Mouser Part#/SKU	Price/unit (\$)	Purchase URL	Reference Designator	Description (include component value if a	Datasheet Link	Multiple	Total Qty	Total Price/part (\$)
1	TPS61023DRLR	296-TPS61023DRLRCT-ND			1.01 https://www.digikey.com/en	U1	IC REG BOOST ADJ 3A SOT563	https://www.ti.com/lit/ds/symlink/tps61023.pdf	2	2	2.02
2	GRM188R60J226MEA0D	490-7611-1-ND			0.14 https://www.digikey.com/en	Cout	CAP CER 22UF 6.3V X5R 0603	https://search.digikey.com/?lang=en&part=GRM188R60J226MEA0D	2	4	0.56
1	CRCW0603100KFKEA	541-100KHTR-ND			0.1 https://www.digikey.com/en	R	100 kOhms ±1% 0.1W, 1/10W	https://www.vishay.com/docs/40472/crcw0603100kfkea.pdf	2	2	0.2
1	CRCW0603453KFKEA	541-453KHCT-ND			0.1 https://www.digikey.com/en	R	453 kOhms ±1% 0.1W, 1/10W	https://www.vishay.com/docs/40472/crcw0603453kfkea.pdf	2	2	0.2
1	IHLP1212AEERR47M11	541-1330-1-ND			1.22 https://www.digikey.com/en	L	470 nH Shielded Molded Induc	https://www.vishay.com/docs/40472/ihlp1212aeerr47m11.pdf	2	2	2.44
1	GRM188R60J226MEA0D	490-7611-1-ND			0.14 https://www.digikey.com/en	Cin	22 µF ±20% 6.3V Ceramic Capa	https://search.digikey.com/?lang=en&part=GRM188R60J226MEA0D	2	2	0.28
1	UJ20-C-H-G-MSMT-3-P16-T	2223-UJ20-C-H-G-MSMT-3-I			0.62 https://www.digikey.com/en	J1	USB-C (USB TYPE-C) USB 2.0 Re	https://www.saeed.com/products/usb-c-to-usb-a-adapter-cable/	2	2	1.24
2	RES 5.1K OHM 1% 1/4W A	13-MFR-25FRF52-5K1CT-ND			0.1 https://www.digikey.com/en	R	5.1 kOhms ±1% 0.25W, 1/4W T	https://www.yageo.com/Products/Resistors/Through-Hole/5.1K-1%-%201%2F4W-0.25W-5K1CT.aspx			
1	LQW18ANR27J00D	490-1181-1-ND			0.14 https://www.digikey.com/en	L	FIXED IND 270NH 110MA 3.40	https://search.digikey.com/?lang=en&part=LQW18ANR27J00D	2	2	0.28
3	CC0603KPX7R9BB101	13-CC0603KPX7R9BB101CT			0.1 https://www.digikey.com/en	C	CAP CER 100PF 50V X7R 0603	https://www.yageo.com/Products/Capacitors/MLCC/CC0603KPX7R9BB101.aspx	2	6	0.6
1	LM4910MM/NOPB		926-LM4910MM/NC		0.73 https://www.mouser.com/ProductDetail/Texas-Instruments/LM4910MM-NOPB	LM4910	Audio Amplifiers 35-mW, ste	https://www.ti.com/lit/ds/symlink/lm4910.pdf	2	2	1.46
4	CRCW060320K0FKEA	541-20.0KHCT-ND			0.1 https://www.digikey.com/en	R	20 kOhms ±1% 0.1W, 1/10W Cl	https://www.vishay.com/docs/40472/crcw060320k0fkea.pdf	2	8	0.8
2	GCM188R71C394KA55D	490-GCM188R71C394KA55			0.13 https://www.digikey.com/en	C	0.39 µF ±10% 16V Ceramic Cap	https://search.digikey.com/?lang=en&part=GCM188R71C394KA55D	2	4	0.52
1	GRT188R71E105KE13D	490-GRT188R71E105KE13D			0.13 https://www.digikey.com/en	C	1 µF ±10% 25V Ceramic Capaci	https://search.digikey.com/?lang=en&part=GRT188R71E105KE13D	2	2	0.26
2	CRCW0603100KFKEA	541-100KHTR-ND			0.1 https://www.digikey.com/en	R	100 kOhms ±1% 0.1W, 1/10W	https://www.vishay.com/docs/40472/crcw0603100kfkea.pdf	2	4	0.4
2	125uF capacitors								2	4	0
2	BLM18BD252SN1D	490-1028-1-ND			0.1 https://www.digikey.com/en	F	2.5 kOhms @ 100 MHz 1 Signa	https://www.murata.com/en-us/products/inductors/bleed-through-inductors/bleed-through-inductor-blm18bd252sn1d	2	4	0.4
1	TNPW080510K0BYEN	541-4414-1-ND			0.94 https://www.digikey.com/en	R	10 kOhms ±0.1% 0.26W Chip R	https://www.vishay.com/docs/40472/tnpw080510k0byen.pdf	2	2	1.88
1	54-00174	839-54-00174CT-ND			0.78 https://www.digikey.com/en	J	3.50mm (0.141", 1/8", Mini Pl	https://tensility.com/products/mini-usb-c-to-usb-a-adapter-cable/	2	2	1.56
3	ESD Diodes?								2	6	0
1	LM4890MX/NOPB	296-47333-1-ND			1.29 https://www.digikey.com/en	U	Amplifier IC 1-Channel (Mono)	https://www.ti.com/lit/ds/symlink/lm4890.pdf	2	2	2.58
1	CMS-28588N-L152	102-3850-ND			3.9 https://www.digikey.com/en	?	Amplifier IC 1-Channel (Mono)	https://www.ti.com/lit/ds/symlink/cms-28588n-l152.pdf	2	2	7.8
2	CRCW060320K0FKEA	541-20.0KHCT-ND			0.1 https://www.digikey.com/en	R	20 kOhms ±1% 0.1W, 1/10W Cl	https://www.vishay.com/docs/40472/crcw060320k0fkea.pdf	2	4	0.4
2	GRT188R71E105KE13D	490-GRT188R71E105KE13D			0.13 https://www.digikey.com/en	C	1 µF ±10% 25V Ceramic Capaci	https://search.digikey.com/?lang=en&part=GRT188R71E105KE13D	2	4	0.52
1	GCM188R71C394KA55D	490-GCM188R71C394KA55			0.13 https://www.digikey.com/en	C	0.39 µF ±10% 16V Ceramic Cap	https://search.digikey.com/?lang=en&part=GCM188R71C394KA55D	2	2	0.26
2	PEC12R-4220F-N0024	PEC12R-4220F-N0024-ND			1.28 https://www.digikey.com/en	SW	Rotary Encoder Mechanical 24	https://www.bourns.com/products/rotary-encoders/pec12r-4220f-n0024	2	4	5.12
1	C503B-RAN-CZ0C0AA2	C503B-RAN-CZ0C0AA2CT-N			0.18 https://www.digikey.com/en	D	Red 624nm LED Indication - Dis	https://download.mouser.com/20180801/C503B-RAN-CZ0C0AA2CT-N.pdf	2	2	0.36
2	222AMVBAR	CT3088CT-ND			0.26 https://www.digikey.com/en	SW	Tactile Switch SPST-NO Top Act	https://www.ctcomponents.com/products/tactile-switches/222amvbar	2	4	1.04
1	RK73H1HRTTCM60R4F	660-RK73H1HRTTCM60R4			0.16 https://www.mouser.com/ProductDetail/KOA-Electronics/RK73H1HRTTCM60R4F	R	60 ohm resistor	https://www.koa-electronics.com/products/passive/resistors/thin-film-resistors/rk73h1hrttcm60r4f.html	2	2	0.32
1	EA DOGS164W-A	1481-1306-ND			8 https://www.digikey.com/en		Character Display Module Tran	https://www.lcd-module.com/products/character-display-module-transmission/	2	2	16
2	GRT188R71E105KE13D	490-GRT188R71E105KE13D			0.13 https://www.digikey.com/en	C	1 µF ±10% 25V Ceramic Capaci	https://search.digikey.com/?lang=en&part=GRT188R71E105KE13D		0	0
1	ESP32-S3-WROOM-1U-N4	1965-ESP32-S3-WROOM-1L			2.95 https://www.digikey.com/en	U	Bluetooth, WiFi 802.11b/g/n, E	https://www.espressysystems.com/en/products/esp32-s3-wroom-1u-n4/		0	0
1	TNPW080510K0BYEN	541-4414-1-ND			0.94 https://www.digikey.com/en	R	10 kOhms ±0.1% 0.26W Chip R	https://www.vishay.com/docs/40472/tnpw080510k0byen.pdf		0	0
1	GRT188R71E105KE13D	490-GRT188R71E105KE13D			0.13 https://www.digikey.com/en	C	1 µF ±10% 25V Ceramic Capaci	https://search.digikey.com/?lang=en&part=GRT188R71E105KE13D		0	0
1	222AMVBAR	CT3088CT-ND			0.26 https://www.digikey.com/en	SW	Tactile Switch SPST-NO Top Act	https://www.ctcomponents.com/products/tactile-switches/222amvbar		0	0
2	CC0603KRX7R7BB104	311-1088-1-ND			0.1 https://www.digikey.com/en	C	0.1 µF ±10% 16V Ceramic Capa	https://www.yageo.com/Products/Capacitors/MLCC/CC0603KRX7R7BB104.aspx		0	0
	SI4735-D60-GU	336-2140-ND			2.96 https://www.digikey.com/en	U	- RF Receiver AM, FM, SW-LW :	https://www.skyworksinc.com/products/rf-receivers/si4735-d60-gu/		0	0

