



Bill of Materials for the MULTI-SENSE-GEVB Evaluation Board

Designator	Quantity	Description	Value	Tolerance	Footprint	Manufacturer	Manufacturer Part Number	Substitution Allowed	Lead Free
C1, C2	2	MLC capacitor 47µF 6.3V X5R 20% Würth Electronics	47uF			Würth Elektronik	885012107006	Yes	Yes
C3, C4, C5, C9, C10, C12, C13	7	MLC capacitor 100nF 16V X7R 10% Würth Electronics	100nF			Würth Elektronik	885012205037	Yes	Yes
C6	1	MLC capacitor 100pF 10V NP0 5% Würth Electronics	100pF			Würth Elektronik	885012005013	Yes	Yes
C7, C8	2	MLC capacitor 2µ2 10V X7T 20% Murata	2u2			Murata	GRM155D71A225ME15D	Yes	Yes
C14, C15	2	MLC capacitor 6.8pF 16V NP0 ±0.5pF Würth Electronics	6.8uF			Würth Elektronik	885012005024	Yes	Yes
CABLE1	1	flat ribbon cable 2x6pins 2.54mm pitch length 10-15cm socket-socket plug						Yes	Yes
CON1	1	SMD header 14 pins 1.27 mm Würth Elektronik				Würth Elektronik	62101421021	Yes	Yes
HEADER1	1	Header 2x6 100mil PTH Samtec, TSW series						Yes	Yes
J1, J2, J3	3	Würth Elektronik 1.27mm Jumper 1x2 WR-PHD						Yes	Yes
L1	1	WE MAPIS SMD Power Inductor 10µH 0.85 A Würth Elektronik				Würth Elektronik	74438335100	Yes	Yes
M1	1	Electret condenser microphone 2pin SMD DB Unlimited						Yes	Yes
PMOD1	1	Header right angle 2x6 pins PTH 2.54 mm pitch Würth Elektronik				Würth Elektronik	61301221021	Yes	Yes
Q1, Q2	2	Transient Voltage Suppressor, Low Capacitance, for High Speed Data Lines ON Semiconductor				ON Semiconductor	NUP420W1T2G	No	Yes
Q3	1	I2C port expander 16 channels ON Semiconductor				ON Semiconductor	PCA9655EMTTXG	No	Yes
Q4	1	Dual SPST Analog Switch Low Voltage Single Supply 20 Ohms ON Semiconductor				ON Semiconductor	NLAS323USG	No	Yes
Q5	1	Microphone Pre-Amplifier with Digital Output				ON Semiconductor	FAN3852UC16X	No	Yes
Q6	1	Ultra low noise LDO with 2V8 output and enable ON Semiconductor				ON Semiconductor	NCP163AMX280TBG	No	Yes
Q7	1	Digital 4-in-1 sensor with gas, humidity, pressure and temperature measurement Bosch Sensortec				Bosch Sensortec	BME680	Yes	Yes
Q9	1	Intelligent 9-axis absolute orientation sensor				Bosch Sensortec	BNO055	Yes	Yes
R1, R2, R8, R9, R13, R14	6	SMD thick film resistor 0R 0402 1A Panasonic	oR			Panasonic	ERJ2GE0R00X	Yes	Yes
R3, R4	2	SMD thick film resistor 1R0 0402 5% 100 mW Panasonic	1R0			Panasonic	ERJ2GEJ1R0X	Yes	Yes
R5, R10, R11	3	SMD thick film resistor 4k7 0402 1% 100 mW Panasonic	4k7			Panasonic	ERJ2RKF4701X	Yes	Yes
R15	1	SMD thick film resistor 3k3 0402 1% 100 mW Panasonic	3k3			Panasonic	ERJ2RKF3301X	Yes	Yes
R16, R17	2	SMD thick film resistor 2k7 0402 1% 100 mW Panasonic	2k7			Panasonic	ERJ2RKF2701X	Yes	Yes
R18	1	SMD thick film resistor 10k 0402 1% 100 mW Panasonic	10k			Panasonic	ERJ2RKF1002X	Yes	Yes
X1	1	XTAL 32.768kHz 10ppm 7pF Abracon				Abracon	ABS07AIG-32.768kHz-7-1-T	Yes	Yes