



Bill of Materials for the NCL30486LED1GEVB Evaluation Board

Designator	Quantity	Description	Value	Tolerance	Footprint	Manufacturer	Manufacturer Part Number	Substitution Allowed	Lead Free
C1	1	Capacitor	100nF		18 x 6, 15LS	Digikey	890334025017CS	Yes	Yes
C2	1	Capacitor	220nF		18 x 6, 15LS	Digikey	890334025027CS	Yes	Yes
C4	1	Capacitor	470nF		18 x 8, 15LS	Digikey	890334025039CS	Yes	Yes
C3,C14, C23	3	Capacitor	2.2nF		9, 10LS	Digikey	DE1E3KX222MA4BP01F	Yes	Yes
C5, C15	2	Capacitor	100pF 50V		0603	Digikey	885012006057	Yes	Yes
C6	1	Capacitor	47nF 50V		0603	Digikey	885012206093	Yes	Yes
C7	1	Capacitor	680nF 50V		1206	Digikey	885012208092	Yes	Yes
C8, C17	2	Capacitor	10uF35V		6.3 x 12.5, 2.5LS	Digikey	8.60131E+11	Yes	Yes
C9	1	Capacitor	10nF 1000V		1206	Digikey	8.85342E+11	Yes	Yes
C11	1	Capacitor	4.7nF 630V		7.3 x 3.5, 5LS	Digikey	B32529C8472J000	Yes	Yes
C12,C13	2	Capacitor	1000uF 50V		16 x 26.5, 7.5LS	Digikey	860160680034	Yes	Yes
C16, C18	2	Capacitor	1uF 50V		1206	Digikey	885012208093	Yes	Yes
C19, C20, C21	3	Capacitor	1nF 50V		0603	Digikey	885012006063	Yes	Yes
C22	1	Capacitor	100nF 50V		0603	Digikey	885012206095	Yes	Yes
D1	1	Diode	600V 4A		SIP	ON Semiconductor	GBU4J	No	Yes
D2, D6, D7	3	Diode	250V 0.2A		SOD-123	ON Semiconductor	MMSD103T1G	No	Yes
D3	1	Diode	200V 1A		SMB	ON Semiconductor	MURS160T3G	No	Yes
D4,D5	2	Diode	400V 4A		CASE 267	ON Semiconductor	MUR440RLG	No	Yes
D8	1	Diode	11V Zener		SOD-123	ON Semiconductor	MMSZ5241B	No	Yes
D9	1	Diode	27V Zener		SOD-123	ON Semiconductor	MMSZ5254B	No	Yes
F1	1		1A6 Slo		8.35 x 4	Digikey	0697H1600-02	Yes	Yes
J1	1		CON3		Block	Digikey	691131710003	Yes	Yes
J2	1		CON4		Block	Digikey	691131710004	Yes	Yes
L1	1	Inductor	10mH		23.5 x 16	Digikey	7446221010	Yes	Yes
L2	1	Inductor	1mH		18D, 20H	Digikey	AIUR-15-102K	Yes	Yes
L3	1	Inductor	330uH		7.8D, 7.5H	Digikey	744732331	Yes	Yes
L4	1	Inductor	10uH		7.8D, 10H	Digikey	744779100	Yes	Yes
MOV1	1		300 V		9D x 5.6T, 5LS	Digikey	V300LA4P	Yes	Yes
Q2	1		650V 10.2A .38		TO-220FP	ON Semiconductor	FCPF380N65FL1	No	Yes
Heatsink	1				stamped	Digikey	507302B00000G	Yes	Yes
R1	1	Resistor	100 0.25W		1206	Digikey	ERJ-8ENF1000V	Yes	Yes
R2	1	Resistor	22 0.25W		1206	Digikey	ERJ-8ENF22R0V	Yes	Yes

R5	1	Resistor	82k 0.1W		0603	Digikey	ERJ-3EKF8202V	Yes	Yes
R6	1	Resistor	56k 0.25W		1206	Digikey	ERJ-8ENF5602V	Yes	Yes
R7	1	Resistor	12k 0.1W		0603	Digikey	ERJ-3EKF1202V	Yes	Yes
R8	1	Resistor	1.3k 0.25W		1206	Digikey	ERJ-8ENF1301V	Yes	Yes
R9, R28	2	Resistor	22 0.25W		1206	Digikey	ERJ-8ENF22R0V	Yes	Yes
R10	1	Resistor	1k 0.25W		1206	Digikey	ERJ-8ENF1001V	Yes	Yes
R11	1	Resistor	0.36 1W		2512	Digikey	ERJ-1TROFR36U	Yes	Yes
R12	1	Resistor	0.36 1W		2512	Digikey	ERJ-1TROFR39U	Yes	Yes
R13	1	Resistor	47k 1W		2512	Digikey	ERJ-1TNF4702U	Yes	Yes
R15	1	Resistor	100k 0.1W		0603	Digikey	ERJ-3EKF1003V	Yes	Yes
R16	1	Resistor	16k 0.1W		0603	Digikey	ERJ-3EKF1602V	Yes	Yes
R17	1	Resistor	47k 0.1W		0603	Digikey	ERJ-3EKF4702V	Yes	Yes
R18	1	Resistor	3.6k 0.1W		0603	Digikey	ERJ-3EKF3601V	Yes	Yes
R19	1	Resistor	750k 0.1W		0603	Digikey	ERJ-3EKF7503V	Yes	Yes
R20	1	Resistor	105k 0.1W		0603	Digikey	ERJ-3EKF1053V	Yes	Yes
R21, R22, R23	3	Resistor	56k 0.1W		0603	Digikey	ERJ-3EKF5602V	Yes	Yes
R24	1	Resistor	47k 0.1W		0603	Digikey	ERJ-3EKF4702V	Yes	Yes
R25	1	Resistor	1k 0.1W		0603	Digikey	ERJ-3EKF1001V	Yes	Yes
R26, R27	2	Resistor	499k 0.25W		1206	Digikey	ERJ-8ENF4993V	Yes	Yes
T1	1		60W XFMR		PQ2620 Ext Rail	Würth	750318263	Yes	Yes
U1	1		NCL30486		SOIC-8	ON Semiconductor	NCL30486A2	No	Yes
U2	1		Isolator		SOIC-8	Digikey	SI8710AC-B-ISR	Yes	Yes
U3	1		Regulator		SOIC-8	ON Semiconductor	LP2951	No	Yes
U4	1		Comparator		TSOP-6	Texas Instruments	TLV1805DBVR	Yes	Yes