



Title		
Size	Number	Revision
A3		
Date	10/22/2013	Sheet of
File	C:\Users\PCB1\SchDoc	Drawn By:

Comment	Description	Designator	Footprint	LibRef	Quantity
approved sub OK	Capacitor SMD Cer 22uF 10% 16V X7R 1206	C1, C3, C6, C8, C9, C10, C11, C13, C14, C15, C16	CAPR2.54-5.1x3.2	CAPC_22u_1206_16V	11
10μ	Capacitor THT Alum Elec 33uF 20% 200V	C2, C4, C7, C12	CAPE5.0mm	CAPE_33u_200V_THT	4
47μ	Capacitor THT Alum Elec 33uF 20% 200V	C5	CAPE5.0mm	CAPE_33u_200V_THT	1
Header 7X2	Header, 7-Pin, Dual row	Con1	HDR2X7	Header 7X2	1
USB-B	Connector THT Type B USB connector	CON2	USB_TypeB_Tyco	USB_TypeB	1
20.00MHz	Resonator Ceramic 20.00 MHz	Cr1	Crystal THT	Crystal_20MHz	1
Diode 1N5817	Schottky Rectifier	D1, D3	Diode 1N5817	Diode 1N5817	2
Diode 1N4148	High Conductance Fast Diode	D2	DIO7.1-3.9x1.9	Diode 1N4148	1
PIC18F2550-I/SP	High Performance, Enhanced Flash, USB Microcontroller with nanoWatt Technology, 32K Flash, 28-Pin SPDIP, Industrial Temperature Range	IC1	SPDIP300-SP28	PIC18F2550-I/SP	1
24C512-Through Hole	512Kbit (64K x 8), Two-wire Serial EEPROM, 2.5V, 8-Pin PDIP, Plastic Dual In-line Package	IC2, IC3	8P3	24C512-Through Hole	2
680uH		L1	CAPE3.5-5.0MM_Rad_10x14mm	Inductor 680uH	1
YELLOW	=Description	LED1	LED	LED	1
RED	=Description	LED2	LED	LED	1
Green	=Description	LED3	LED	LED	1
MCP6002		OP1	8P3	MCP6002	1
BS250P	P-Channel MOSFET	Q1, Q2	TO-92	BS250P	2
2N7000	N-Channel MOSFET	Q3	TO-92	2N7000	1
Carbon Film	Resistor THD 0.0 Ohm 0.25W Jumper	R1, R2, R3, R4, R5, R6, R7, R8, R9, R10, R11, R12, R13, R14, R15, R16, R17, R18, R19, R20, R21, R22, R23, R24, R25, R26, R27, R28, R29, R30, R31, R32	RES 0.25W	RES_0R_Axial_0.25W	32
SW_THT_PB_8.0mm	Switch Tact THD 8.0mm Stem	S1	Switch	SW_THT_PB_8.0mm	1
2N3906	PNP General Purpose Amplifier	T1, T2, T5, T7	TO-92	2N3906	4
2N3904	NPN General Purpose Arr	T3, T6, T8	TO-92	2N3904	3