Qty	Reference	Value	Footprint
26	C1,C2,C3,C4,C9,C10,C11,C15,C16,C18,C19,C20,C24,C 30,C35,C36,C38,C39,C40,C41,C42,C43,C44,C45,C46,C	100nF	Capacitor_SMD:C_0603_1608Metric
7	47 C5,C6,C7,C12,C13,C14,C48	220nF	Capacitor_SMD:C_0603_1608Metric
1	C8	470pF	Capacitor_SMD:C_0603_1608Metric
1	C17	10uF	Capacitor_SMD:CP_Elec_6.3x5.4
1	C21	47uF	Capacitor_SMD:CP_Elec_5x5.3
5	C22,C25,C29,C31,C33	1uF	Capacitor_SMD:C_0603_1608Metric
2	C23,C26	12pF	Capacitor_SMD:C_0603_1608Metric
2	C27,C28	20pF	Capacitor_SMD:C_0603_1608Metric
2	C32,C34	2.2uF	Capacitor_SMD:C_0603_1608Metric
1	C37	47uF	Capacitor_SMD:CP_Elec_5x5.4
2	C49,C54	3.3nF	Capacitor_SMD:C_0603_1608Metric
2	C50,C55	680pF	Capacitor_SMD:C_0603_1608Metric
2	C51,C56	330pF	Capacitor_SMD:C_0603_1608Metric
2	C52,C57	47pF	Capacitor_SMD:C_0603_1608Metric
1	C53	10nF	Capacitor_SMD:C_0603_1608Metric
8	D1,D2,D3,D4,D7,D8,D9,D10	LED	LED_SMD:LED_0603_1608Metric
4	D5,D6,D11,D12	1N4148WS	Diode_SMD:D_SOD-323_HandSoldering
6	D13,D16,D25,D26,D31,D32	1N5819W	Diode_SMD:D_SOD-123
1	D14	SS14	Diode_SMD:D_SMA
1	D15	SMBJ40A	Diode_SMD:D_SMA
11	D17,D18,D19,D20,D21,D22,D23,D24,D27,D28,D30	BAT54S	Package_TO_SOT_SMD:SOT-23
1	D29	1N4148W	Diode_SMD:D_SOD-123
1	F1	0.5A	Fuse:Fuse_1206_3216Metric
1	F2	1206	Fuse:Fuse_1206_3216Metric
1	J2	STLink	Connector_PinHeader_2.54mm:PinHeader_1x04_P2.54 mm_Vertical
1	J3	TYPE-C 16PIN 2MD(073)	Connector_USB:USB_C_Receptacle_GCT_USB4105-xx- A_16P_TopMnt_Horizontal
1	J5	THD2528-11SD-GF	MSD_1_A:CUI_MSD-1-A
3	J6,J7,J8	Conn_01x02	Connector_PinHeader_2.54mm:PinHeader_1x02_P2.54 mm_Vertical
1	J9	1554458-2	15544582
1	JP1	Ignition Voltage	Jumper:SolderJumper- 3_P1.3mm_Open_RoundedPad1.0x1.5mm
3	LED1,LED2,LED3	RED	LED_SMD:LED_0603_1608Metric
5	Q1,Q2,Q3,Q4,Q6	Q_NMOS_GDS	Package_TO_SOT_SMD:TO-252-3_TabPin2
5	Q5,Q7,Q8,Q9,Q10	AO3400A	Package_TO_SOT_SMD:SOT-23
9	R1,R2,R3,R4,R15,R16,R19,R20,R43	100k	Resistor_SMD:R_0603_1608Metric
14	R5,R6,R7,R8,R17,R18,R21,R22,R29,R37,R41,R42,R47,R49	1k	Resistor_SMD:R_0603_1608Metric
4	R9,R10,R23,R24	2.4k	Resistor_SMD:R_0603_1608Metric
6	R11,R12,R25,R26,R87,R88	470r	Resistor_SMD:R_0603_1608Metric
9	R13,R28,R44,R65,R66,R71,R72,R73,R74	470	Resistor_SMD:R_0603_1608Metric
9	R14,R67,R68,R69,R70,R75,R76,R77,R78	910	Resistor_SMD:R_0603_1608Metric
2	R27,R64	10K	Resistor_SMD:R_0603_1608Metric
1	R30	3.9k	Resistor_SMD:R_0603_1608Metric
8	R31,R32,R34,R38,R39,R40,R48,R92	470R	Resistor_SMD:R_0603_1608Metric
9	R33,R45,R59,R62,R63,R84,R85,R90,R94	10k	Resistor_SMD:R_0603_1608Metric
3	R35,R36,R91	2.49k	Resistor_SMD:R_0603_1608Metric

5	R46,R60,R61,R89,R93	100R	Resistor_SMD:R_0603_1608Metric
3	R50,R51,R57	220R	Resistor_SMD:R_0603_1608Metric
4	R52,R53,R54,R55	15R	Resistor_SMD:R_2512_6332Metric
2	R56,R86	2k7	Resistor_SMD:R_0603_1608Metric
1	R58	1M	Resistor_SMD:R_0603_1608Metric
2	R79,R80	5.1K	Resistor_SMD:R_0603_1608Metric
2	R81,R82	22R	Resistor_SMD:R_0603_1608Metric
1	R83	4.7K	Resistor_SMD:R_0603_1608Metric
4	R95,R98,R102,R105	100K	Resistor_SMD:R_0603_1608Metric
2	R96,R103	470K	Resistor_SMD:R_0603_1608Metric
2	R97,R104	12K	Resistor_SMD:R_0603_1608Metric
4	R99,R100,R101,R106	33K	Resistor_SMD:R_0603_1608Metric
2	SW1,SW2	SW_Push	Button_Switch_SMD:SW_SPST_CK_RS282G05A3
1	U1	STM32F407VGTx	Package_QFP:LQFP-100_14x14mm_P0.5mm
2	U2,U4	TC4424AVOA	TC4424AVOA:SOIC127P599X175-8N
1	U3	AMS1117-3.3	Package_TO_SOT_SMD:SOT-223-3_TabPin2
2	U5,U6	MCP6004	MCP6004T_I_SL:SOIC127P600X175-14N
1	U7	MCP2551-I-SN	Package_SO:SOIC-8_3.9x4.9mm_P1.27mm
1	U8	LM2940S-5.0	Package_TO_SOT_SMD:TO-263-3_TabPin2
1	U9	MCP6004	
1	Y1	8Mhz	Crystal:Crystal_SMD_5032-2Pin_5.0x3.2mm
1	Y2	32.768KHz	Crystal:Crystal_SMD_3215-2Pin_3.2x1.5mm