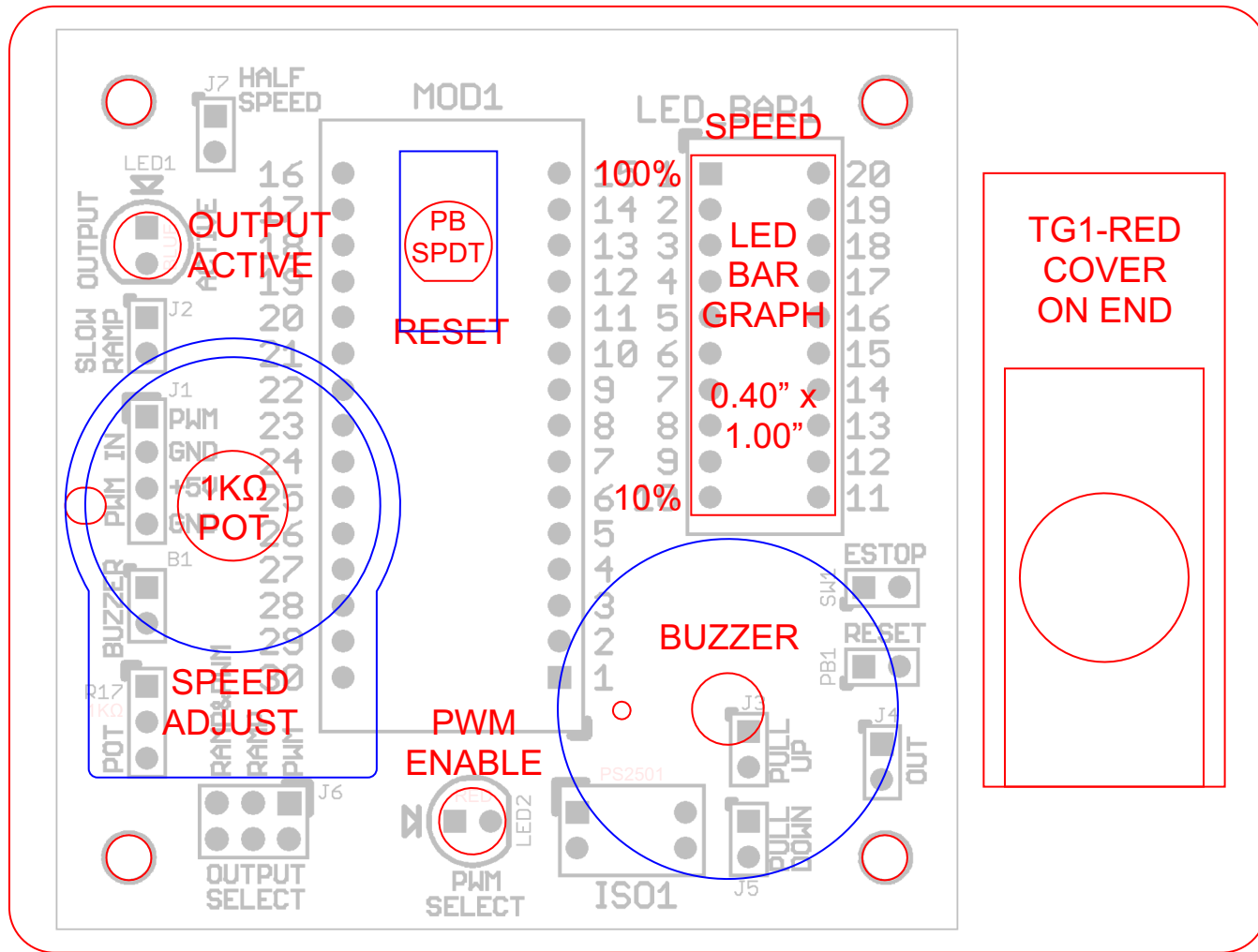
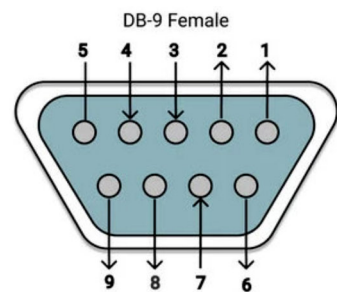


Partlist : Exported from Arduino_Stepper_Motor_Ramp_Card_220709.brd at 7/9/2022 2:55:49 PM : EAGLE Version 5.11.0 Copyright(c) 1988-2010 CadSoft

#	Part	Value	Package	Manufacturer	Part Number	Position (mil)
1.	R3 - R13, R15, R16	220	CR0805	KOA SPEER	RK73H2ATTD2200F	(1965 - 2100)
2.	R2, R14	330	CR0805	KOA SPEER	SG73P2ATTD3300F	(435 - 800)
3.	R1	1K	CR0805	KOA SPEER	RK73H2ARTTD1001F	(575 - 1015)
4.	C1	47uF	CC1206	MURATA	GRM31CR61A476KE15L	(375 - 1275)
5.	C2 - C4	100nF	CC1206	KEMET	C1206C104K5RAC7867	(500 - 1275)
6.	Q1	DMN2075U	SOT23_3	DIODES, INC.	DMN2075U-7	(575 - 875)
7.	U1	74LVC1G157GV	SOT23_6	NEXPERIA	74LVC1G157GV-Q100H	(595 - 575)
8.	ISO1	PS2501	DIP4	RENESAS	PS2501-1-F3-H-A	(1595 - 275)
9.	MOD1	ARDUINO_NANO	DIP30W	ARDUINO NANO	A000005	(1095 - 1400)
10.	B1	BUZZER	HDR1X2	CUI, Inc.	CEP-2224	(250 - 900)
11.	SW1	ESTOP	HDR1X2	ARCOLECTRIC	C3900BA (& TG1-RED)	(2290 - 950)
12.	J1	PWM_IN	HDR1X4	WHDTS	XY-PWM	(250 - 1275)
13.	J2	POT_RAMP_SPEED	HDR1X2	SULLINS	PRPC040SAAN-RC	(250 - 1650)
14.	J3	PU_OPT	HDR1X2	SULLINS	PRPC040SAAN-RC	(1920 - 500)
15.	J4	PWM_OUT	HDR1X2	AUTOMATION TECH.	Output to KL-8060E	(2290 - 465)
16.	J5	PD_OPT	HDR1X2	SULLINS	PRPC040SAAN-RC	(1920 - 250)
17.	J6	PWM_SEL	HDR2X3	SULLINS	PRPC015DAAN-RC	(545 - 300)
18.	J7	HALF_SPEED	HDR1X2	SULLINS	PRPC040SAAN-RC	(440 - 2210)
19.	LED1	LED_BLUE	LED_100_AC	WURTH	151051BS04000	(250 - 1900)
20.	LED2	LED_RED	LED_100_AC	WURTH	151051RS11000	(1155 - 300)
21.	LED_BAR1	XGVGX10D	DIP20	SUNLED CO.	XGMDKX10D	(1965 - 1650)
22.	PB1	RESET	HDR1X2	C&K	8125SHZBE	(2290 - 730)
23.	R17	POT_IN	HDR1X3	TWTADE	B1K - X001T2DB5F	(250 - 575)



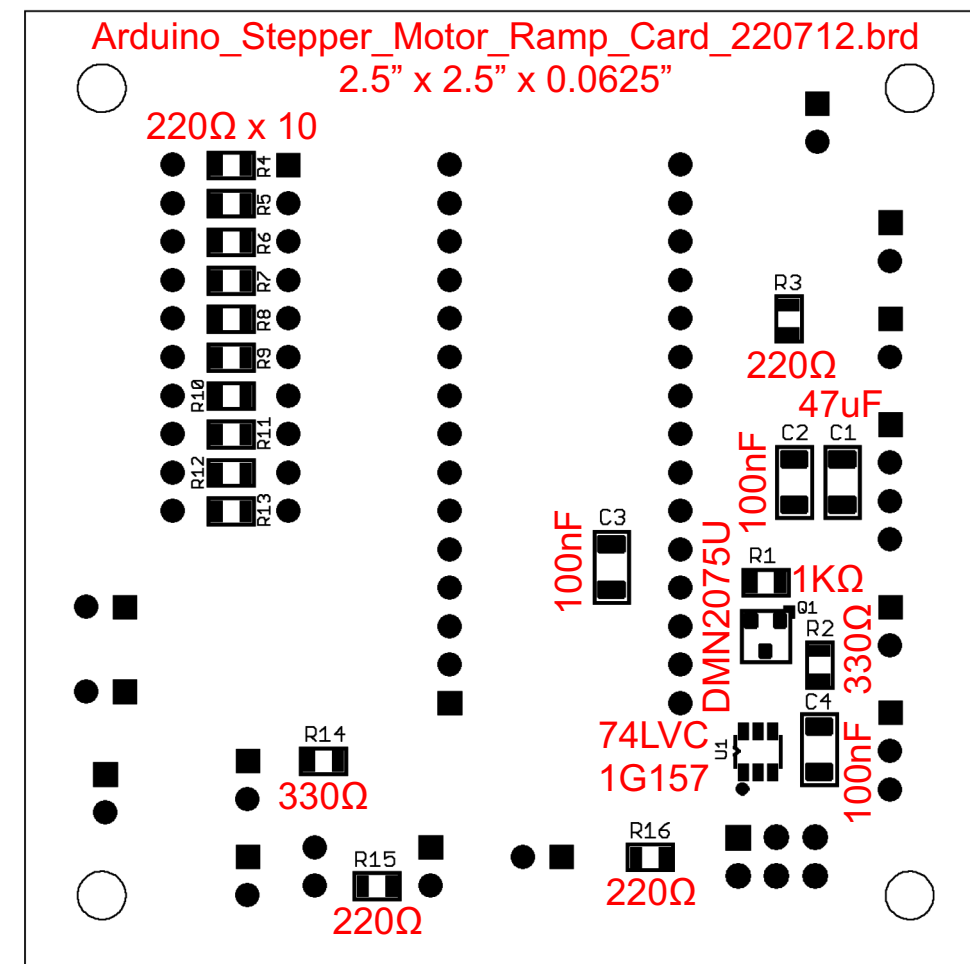
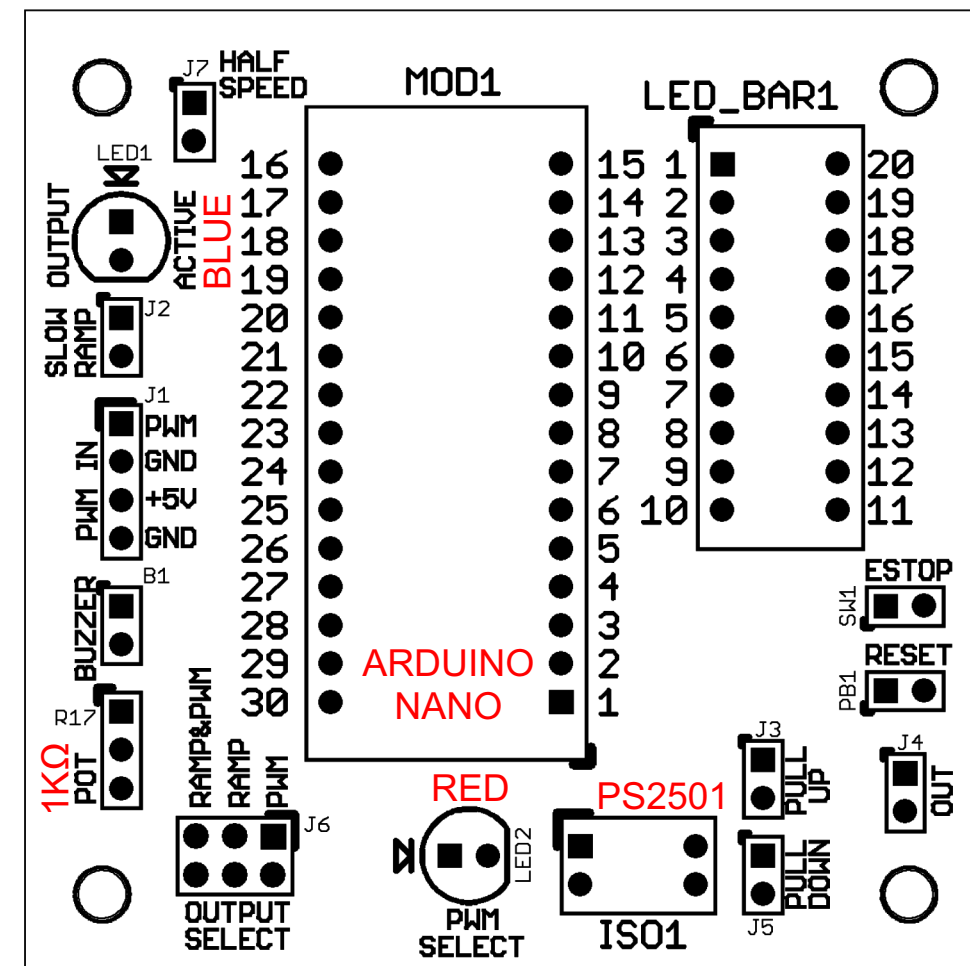
Box Inside Dimensions = 3.50" x 2.75" x 1.10"

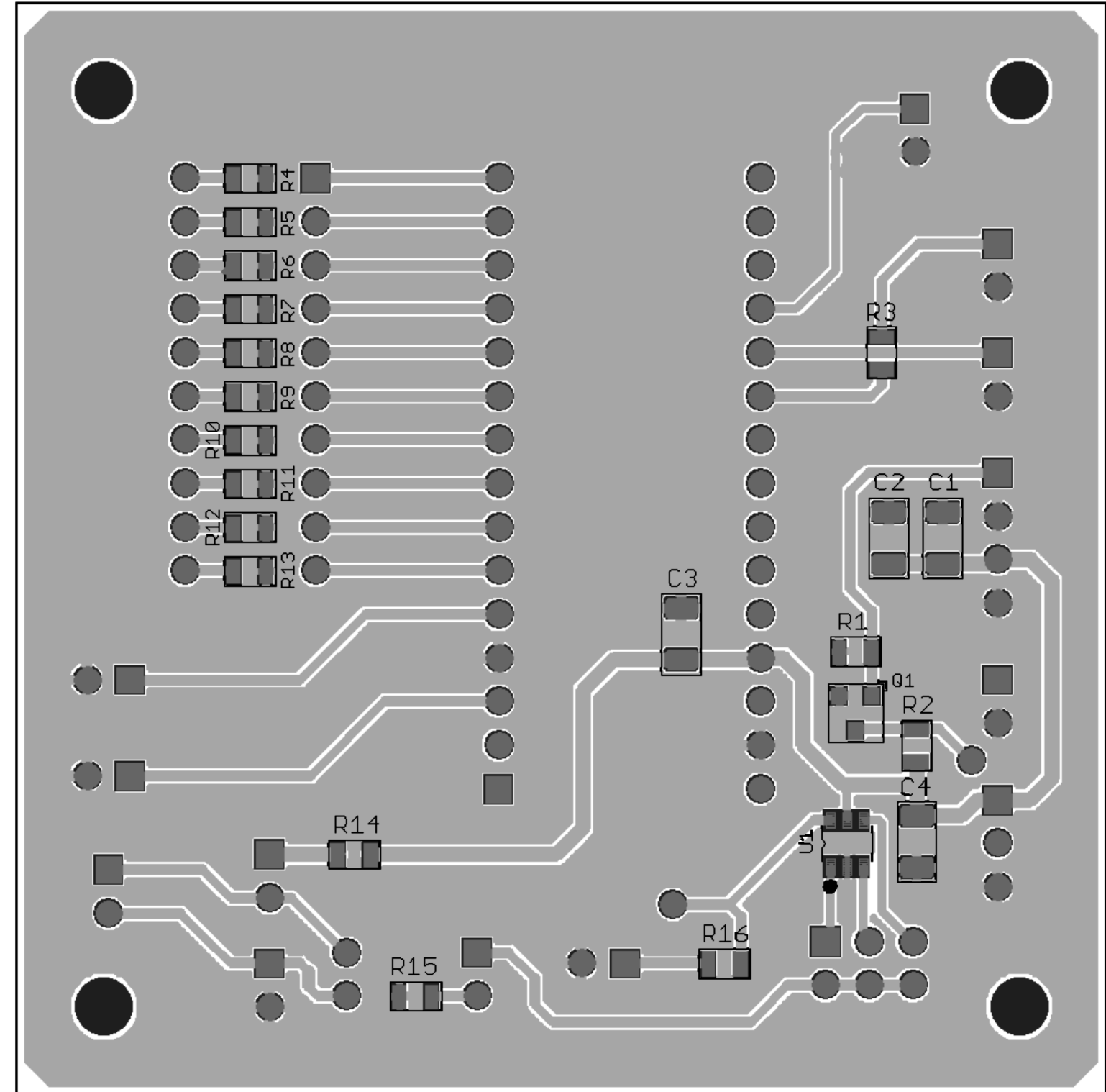
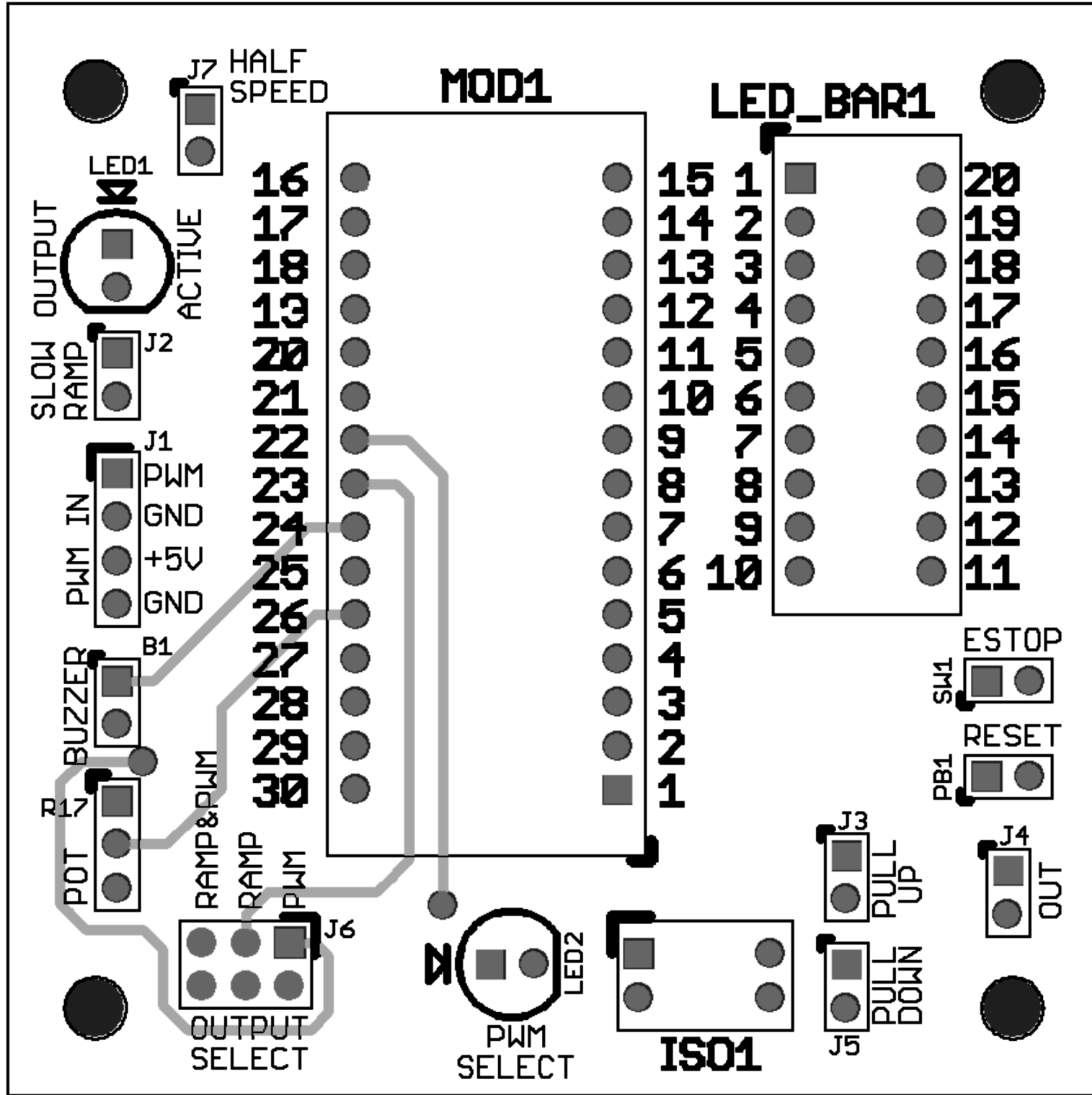


DB9.2	+5_IN	J1.3
DB9.4	PWM_IN	J1.1
DB9.5	GND_IN	J1.2
DB9.7	OUT_POS	J4.1
DB9.8	OUT_NEG	J4.2

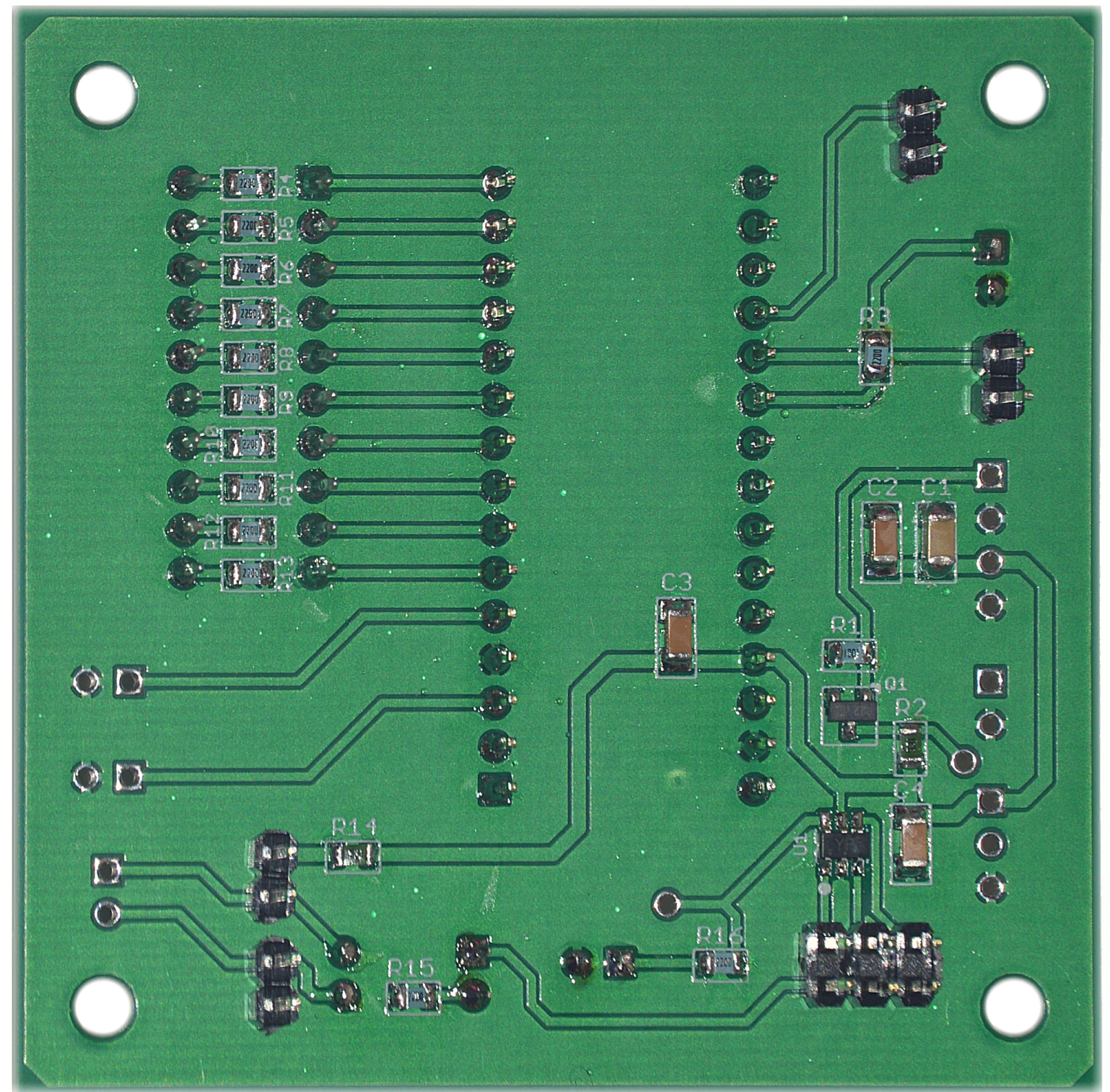
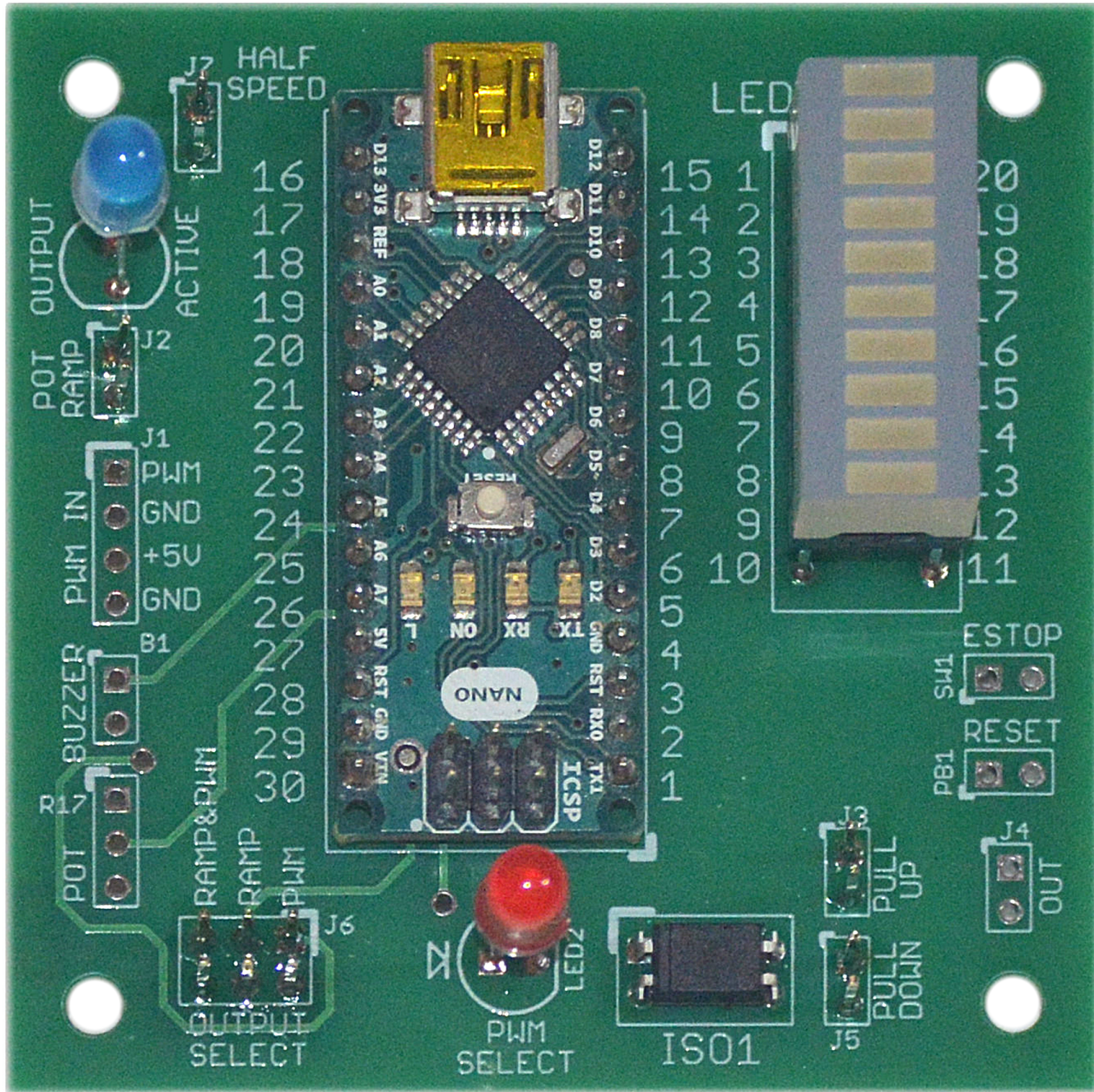
NOTES:

1. E-Stop Switch with safety cover 1-3/4" x 3/4" x 1.25" height.

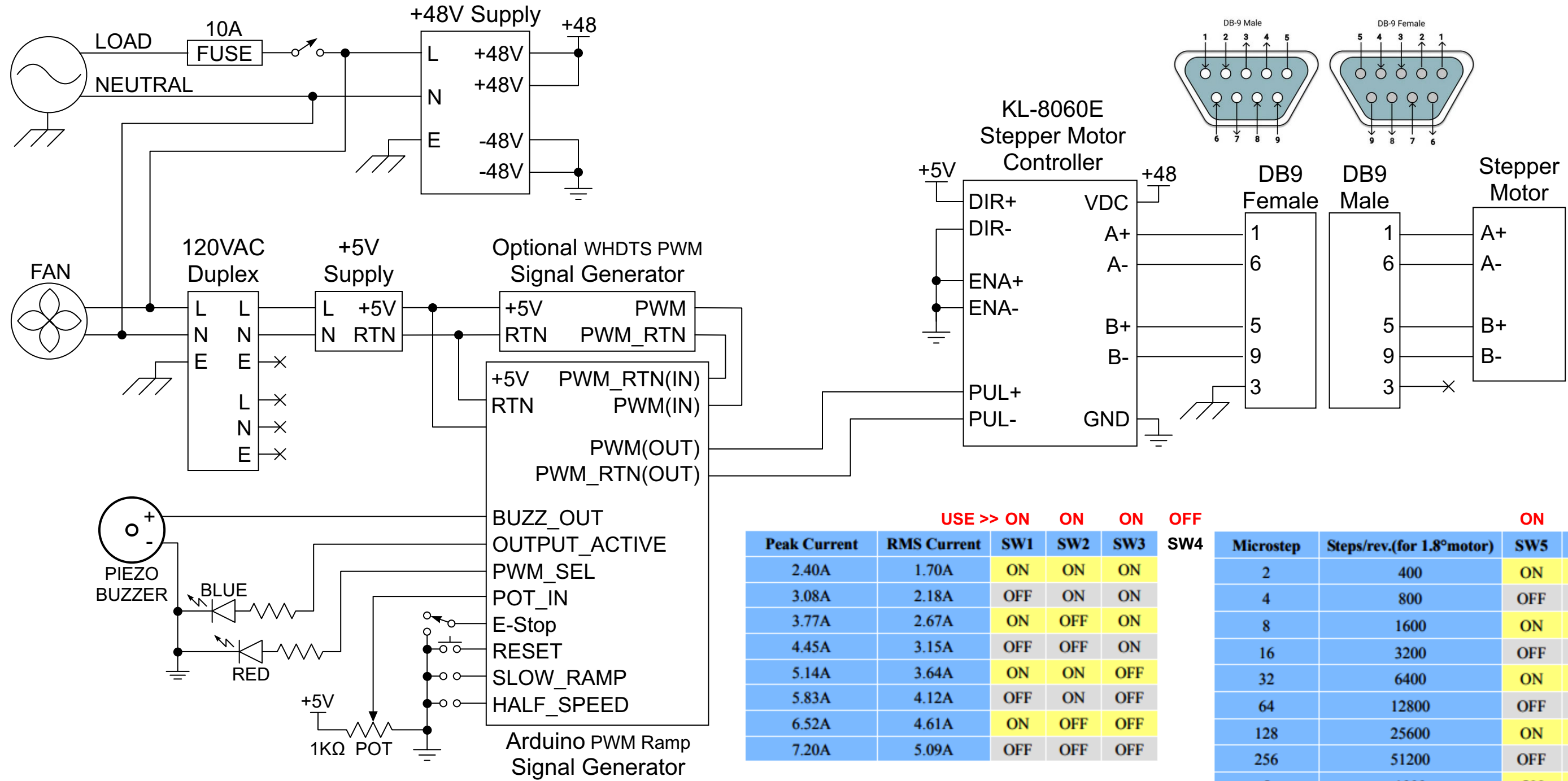




Arduino Ramp Driver 2-Layer PCB Layout : Top And Bottom Sides : 2.5" x 2.5"



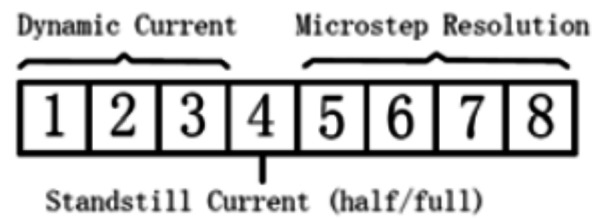
Arduino Ramp Driver 2-Layer PCB Layout : Top And Bottom Sides : 2.5" x 2.5"



Peak Current	RMS Current	USE >> ON	ON	ON	OFF
		SW1	SW2	SW3	SW4
2.40A	1.70A	ON	ON	ON	
3.08A	2.18A	OFF	ON	ON	
3.77A	2.67A	ON	OFF	ON	
4.45A	3.15A	OFF	OFF	ON	
5.14A	3.64A	ON	ON	OFF	
5.83A	4.12A	OFF	ON	OFF	
6.52A	4.61A	ON	OFF	OFF	
7.20A	5.09A	OFF	OFF	OFF	

Microstep	Steps/rev.(for 1.8°motor)	ON	ON	ON	ON
		SW5	SW6	SW7	SW8
2	400	ON	ON	ON	ON
4	800	OFF	ON	ON	ON
8	1600	ON	OFF	ON	ON
16	3200	OFF	OFF	ON	ON
32	6400	ON	ON	OFF	ON
64	12800	OFF	ON	OFF	ON
128	25600	ON	OFF	OFF	ON
256	51200	OFF	OFF	OFF	OFF
5	1000	ON	ON	ON	OFF
10	2000	OFF	ON	ON	OFF
20	4000	ON	OFF	ON	OFF
25	5000	OFF	OFF	ON	OFF
40	8000	ON	ON	OFF	OFF
50	10000	OFF	ON	OFF	OFF
100	20000	ON	OFF	OFF	OFF

KL-8060E Stepper Motor Controller DIP Switch Settings



7.2.2 Idle Current Configuration

SW4 is used to set motor idle current percentage. At OFF position it means the standstill current is set to be 50% of the selected output current. At ON position it means standstill current is set to be the same as the selected dynamic current. The current automatically reduced to 50% of the selected dynamic current 0.4 second after the last pulse.