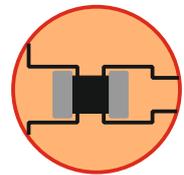
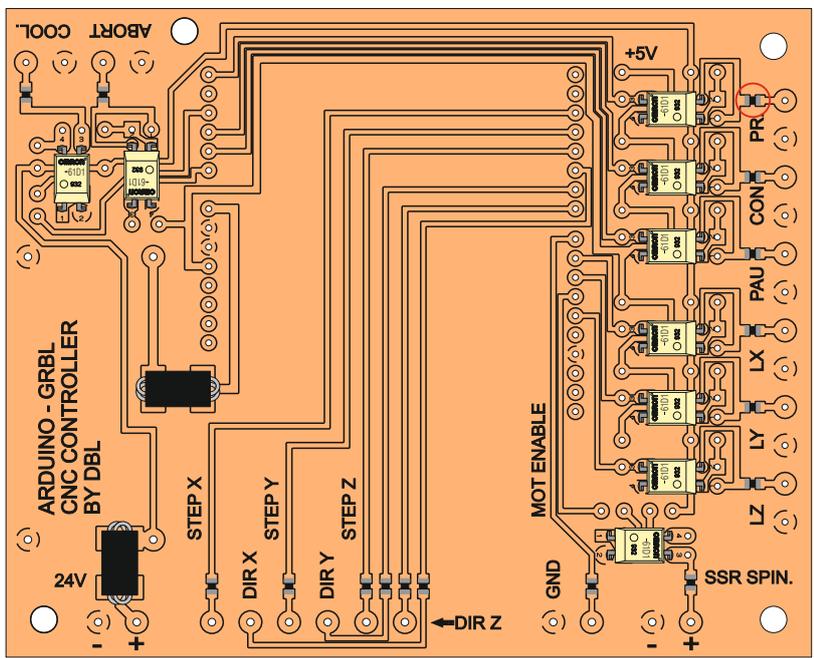
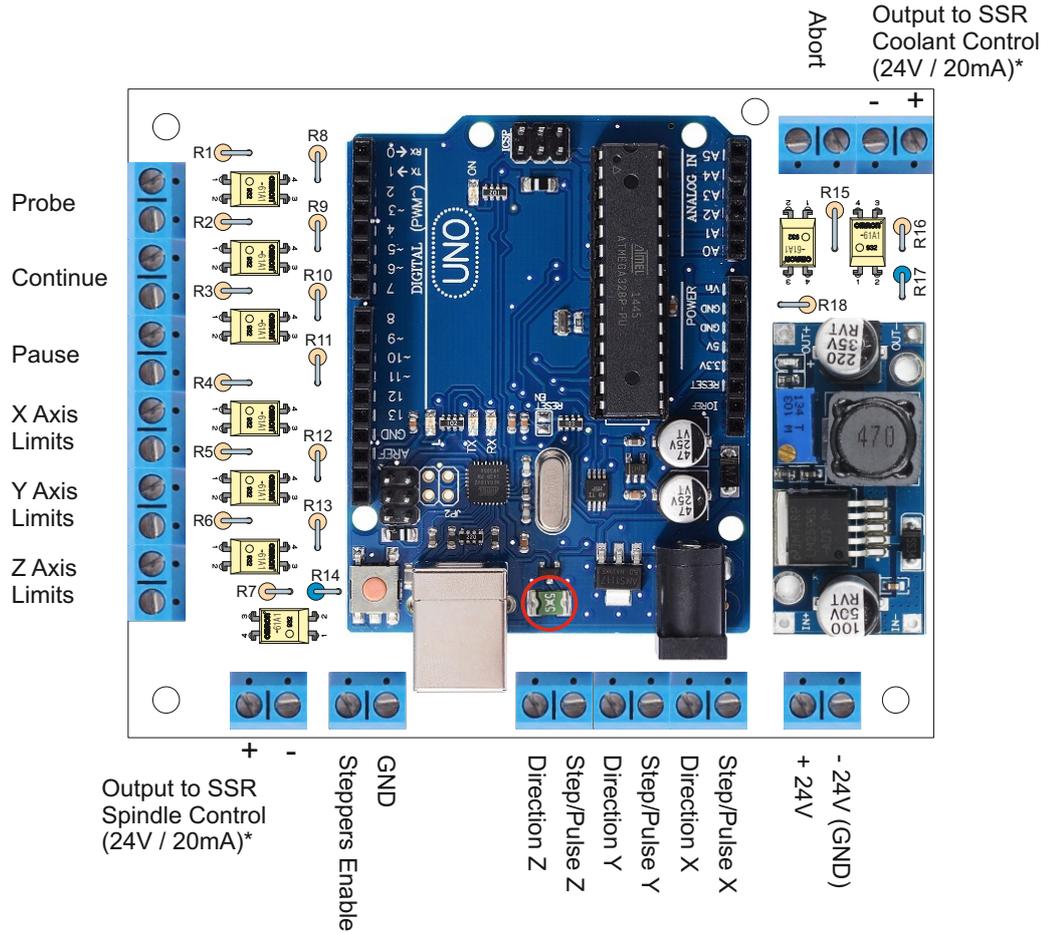


ARDUINO - GRBL CNC CONTROLLER



Ferrite Beads

Note 1: You can choose to mount the Omron optocouplers model 61A1 manually on the top side of the PCB board or the 61D1 model on the bottom side with the other SMD components.

Note 2: Remove the fuse marked with the red circle so that the Arduino board does not keep powered by the USB when disconnecting the 24V power supply.

	Denomination:	Material:	Estim. weight:	Scale:
	CNC CONTROLLER BOARD	SRPB/FG 1 S	n/a	1:1
	Part:	Project:	Date:	
Components location. Assembling.	Leonardo Di Benedetto	ENE'2018		

ARDUINO - GRBL CNC CONTROLLER

COMPONENTS:

Resistors:

R1, R2, R3, R4, R5, R6, R15 = 2K2 Ohms 1W
R8, R9, R10, R11, R12, R13, R18 = 1K Ohms 1/4W
R7, R16 = 1K Ohms 2W (*)
R14, R17 = 360 Ohm 1/4W

Optocouplers:

Omron MOS FET relays G3VM-61A1 for manual assembling
or G3VM-61D1 for SMD.

SMD Ferrite beads:

16 x Ferrites SMD TDK MMZ2012R301A
2 x Ferrites Würth WE-SUKW (Cod. producto: 7427512)

Terminal blocks:

14 x 2 pins PCB Mount Screw Terminal Block pitch 5.08 mm.

Boardss on-board:

Buck converter Lm2596 (**)
Arduino UNO R3 with Firmware GRBL - <https://github.com/gnea/grbl>

Note 3 (*): Resistors R7 and / or R16 can be replaced by
bridges to exit directly from the MOS FET Relay 61A1 / D1.
In this case, the maximum load is 500 mA and the voltage is 24VDC.

Note 4 (**): Do not forget to set the buck converter output to a value
less or equal to 12 Volts before connecting the Arduino board.

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Denomination:	CNC CONTROLLER BOARD	Material:	SRPB/FG 1 S	Estim. weight:	n/a	Scale:	1:1
Part:	Components location. Assembling.	Project:	Leonardo Di Benedetto	Date:	ENE'2018		