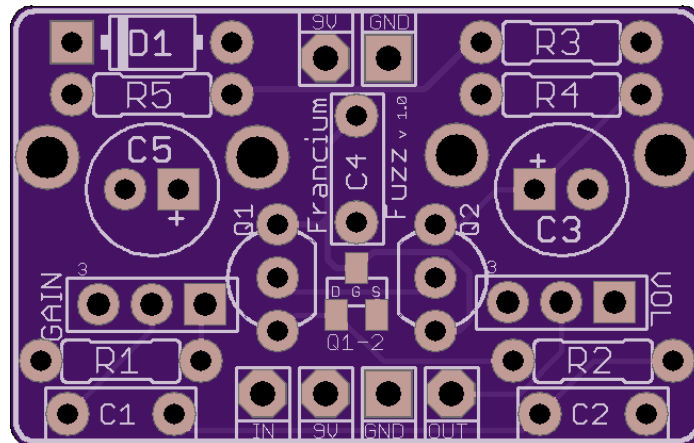


## Quantum Effects Francium Fuzz Based on the EQD Bellows



This is a pcb for a EQD Bellows boost without their switching system and with the addition of some standard power filtering and reverse voltage protection.

Thanks to storyboardist (<http://effectslayouts.blogspot.co.at/>) for tracing and posting the schematic!

Q1-2 is a smd version of the FET as through hole parts are becoming harder to source. Just use either the smd or through hole version. Apparently J201 transistors work fine for Q1 as an alternative.

The board is designed to fit into a 1590a. I don't have a drill template but the pots are 19.5 mm apart. Offboard wiring is per usual. consult madbeans wiring tutorial for details ([http://www.madbeanpedals.com/tutorials/downloads/MBP\\_FootswitchWiring.pdf](http://www.madbeanpedals.com/tutorials/downloads/MBP_FootswitchWiring.pdf))

**The layout is yet unverified. If anyone does, please let me know!**

**This pcb layout is intended for DIY use only. Commercial use of this design is prohibited!**

## BOM

Resistors		Capacitors	
<b>R1</b>	10k	<b>C1</b>	22n
<b>R2</b>	10k	<b>C2</b>	1n
<b>R3</b>	22k	<b>C3</b>	100u
<b>R4</b>	200R	<b>C4</b>	68n
<b>R5</b>	33-300R	<b>C5</b>	100u
Pots		Transistors	
<b>Vol</b>	100kA	<b>Q1/Q1-2</b>	PF5102/SMD
<b>Gain</b>	100kB dual	<b>Q2</b>	MPSA13
Diodes			
<b>D1</b>	1N5817		

## Schematic

