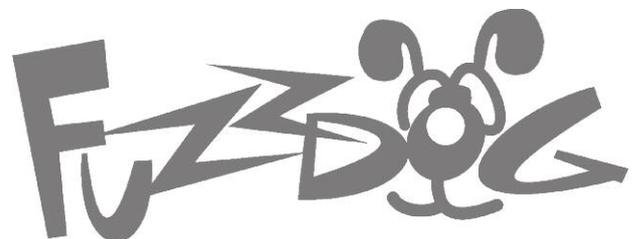
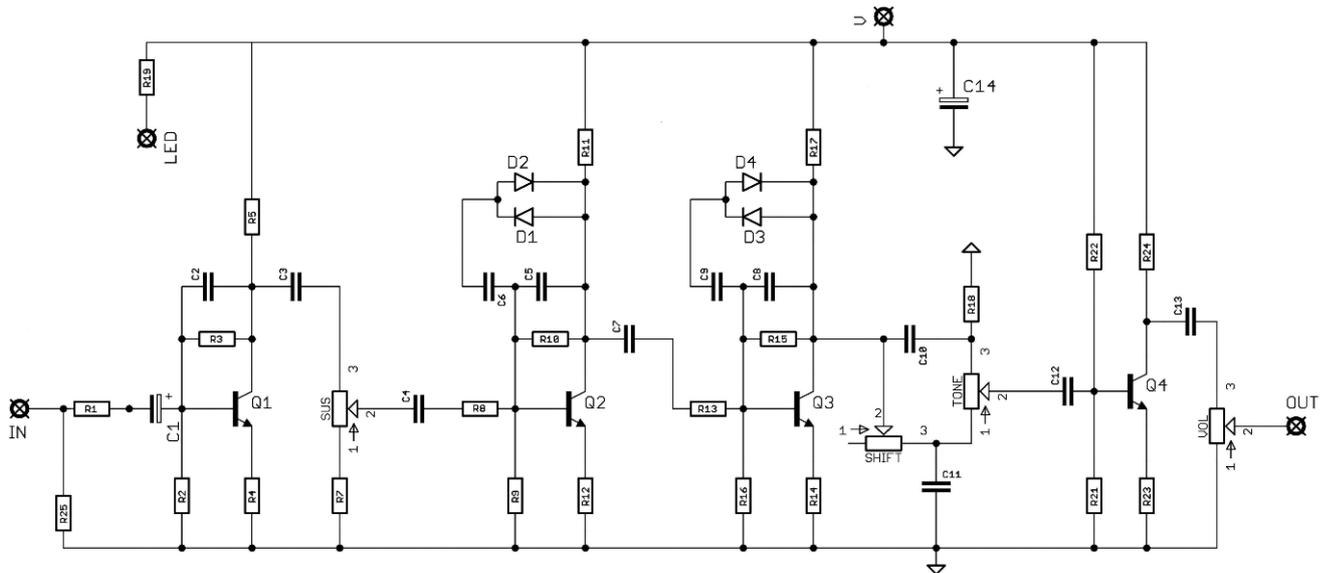


Lester Fuzz

Ramesses' less
tweaky brother



Schematic



R1	39K	C1	100n*	Q1-4	MPSA12
R2	100K	C2	560p	D1-2	1N4148
R3	470K	C3	100n	D3-4	1N4001
R4	100R	C4	100n	D5-7	empty
R5	15K	C5	560p	SHIFT	50KB
R6	empty	C6	100n	SUST	100KA
R7	1K	C7	100n	TONE	250KB
R8	15K	C8	560p	VOL	100KA
R9	100K	C9	100n	HI-LO	Jumper**
R10	470K	C10	1n	DIODE	Jumper**
R11	15K	C11	10n		
R12	100R	C12	100n		
R13	15K	C13	100n		
R14	100R	C14	100u elec		
R15	470K				
R16	100K				
R17	15K				
R18	470K				
R19	CLR (2K2)				
R21	100K				
R22	470K				
R23	1K2				
R24	15K				
R25	2M				

*It's preferable to use a 2.5mm pitch cap for C1, or you can just bend the legs on a 5mm pitch cap.

As this is built on the Ramesses PCB there are unused component spaces, and a couple of jumpers are required. See next page.

The power and signal pads on the PCB conform to the FuzzDog Direct Connection format, so can be paired with the appropriate daughterboard for quick and easy offboard wiring.

Be very careful when soldering the transistors and diodes. They're very sensitive to heat. You should use some kind of heat sink (crocodile clip or reverse action tweezers) on each leg as you solder them. Keep exposure to heat to a minimum (under 2 seconds).

Snap the small metal tag off the pots so they can be mounted flush in the box.

The cathode (striped end) of the diodes go into the square pads. The anode (long leg) of electrolytic capacitors go into the square pads. C14 can be placed flat across the PCB as shown in the cover image to ensure plenty of clearance in the enclosure.

Pots mounts on the back side of the board. You can use vertical-mount pots or just wire up 'normal' ones.

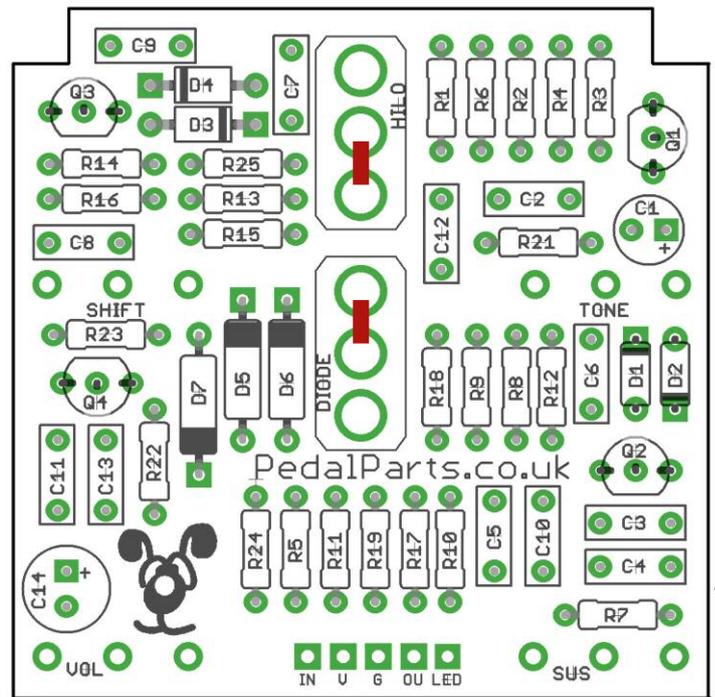
You should solder all components before you solder the pots. Once they're in place you'll have no access to much of the underside of the board.

It's useful to place the pots in the holes in the enclosure when soldering to make sure you get them all the right height and position. Solder one leg of each pot first, then check them for position. Melt and adjust if necessary. Get them all even before soldering the other two pins of each. Same goes for the toggle switches. Don't worry too much about getting them straight with your first stab at soldering them. Get them in place with a single pad filled with solder, then melt and reposition before soldering the other pads.

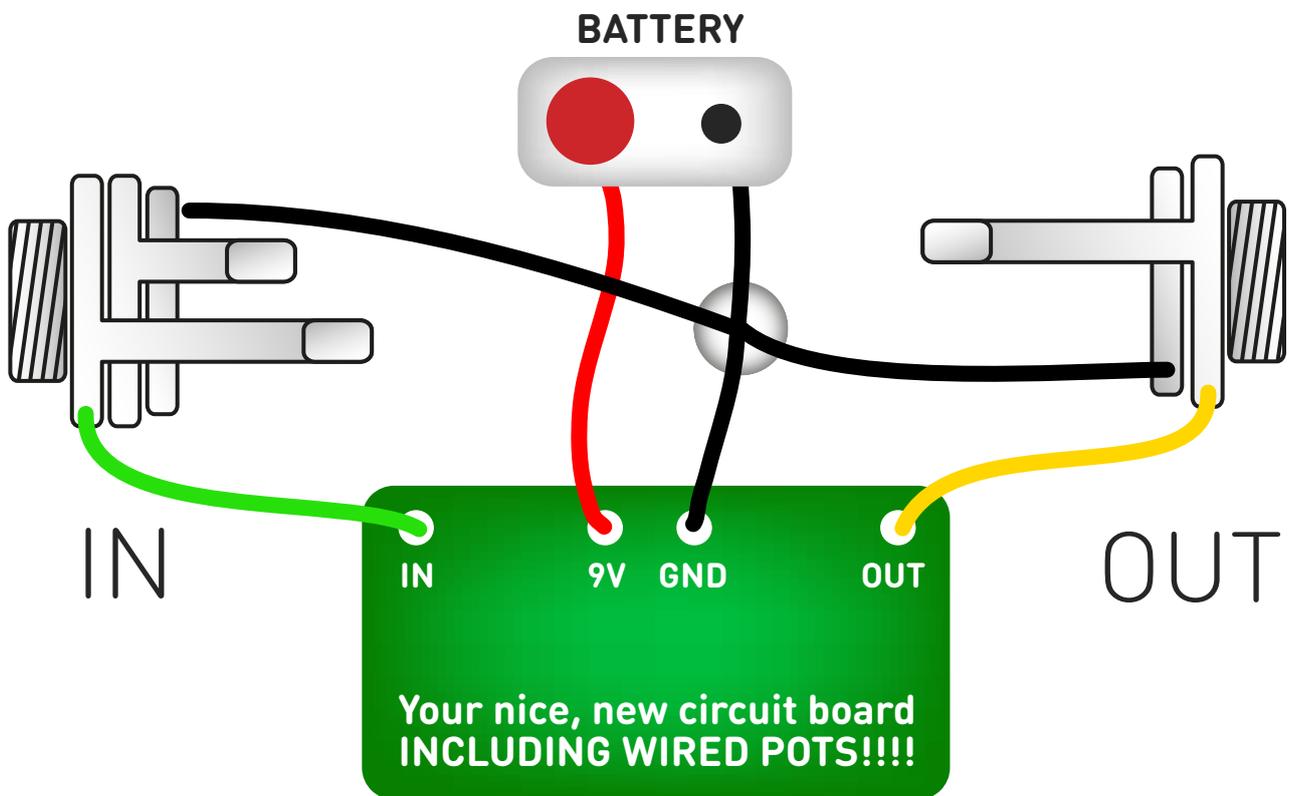
If your pots have plastic covers, sweet. If not, be careful to keep the bases away from the PCB pads. Slip some thick card between the pots and the PCB while you solder them in to space them nicely.

Don't forget those jumpers

Add jumpers in place of the switches on the PCB as shown in red above.



Test the board!



UNDER NO CIRCUMSTANCES will troubleshooting help be offered if you have skipped this stage. No exceptions.

Once you've finished the circuit it makes sense to test it before starting on the switch and LED wiring. It'll cut down troubleshooting time in the long run. If the circuit works at this stage, but it doesn't once you wire up the switch - guess what? You've probably made a mistake with the switch.

Solder some nice, long lengths of wire to the board connections for 9V, GND, IN and OUT. Connect IN and OUT to the jacks as shown. Connect all the GNDs together (twist them up and add a small amount of solder to tack it). Connect the battery + lead to the 9V wire, same method. Plug in. Go!

If it works, crack on and do your switch wiring. If not... aw man. At least you know the problem is with the circuit. Find out why, get it working, THEN worry about the switch etc.

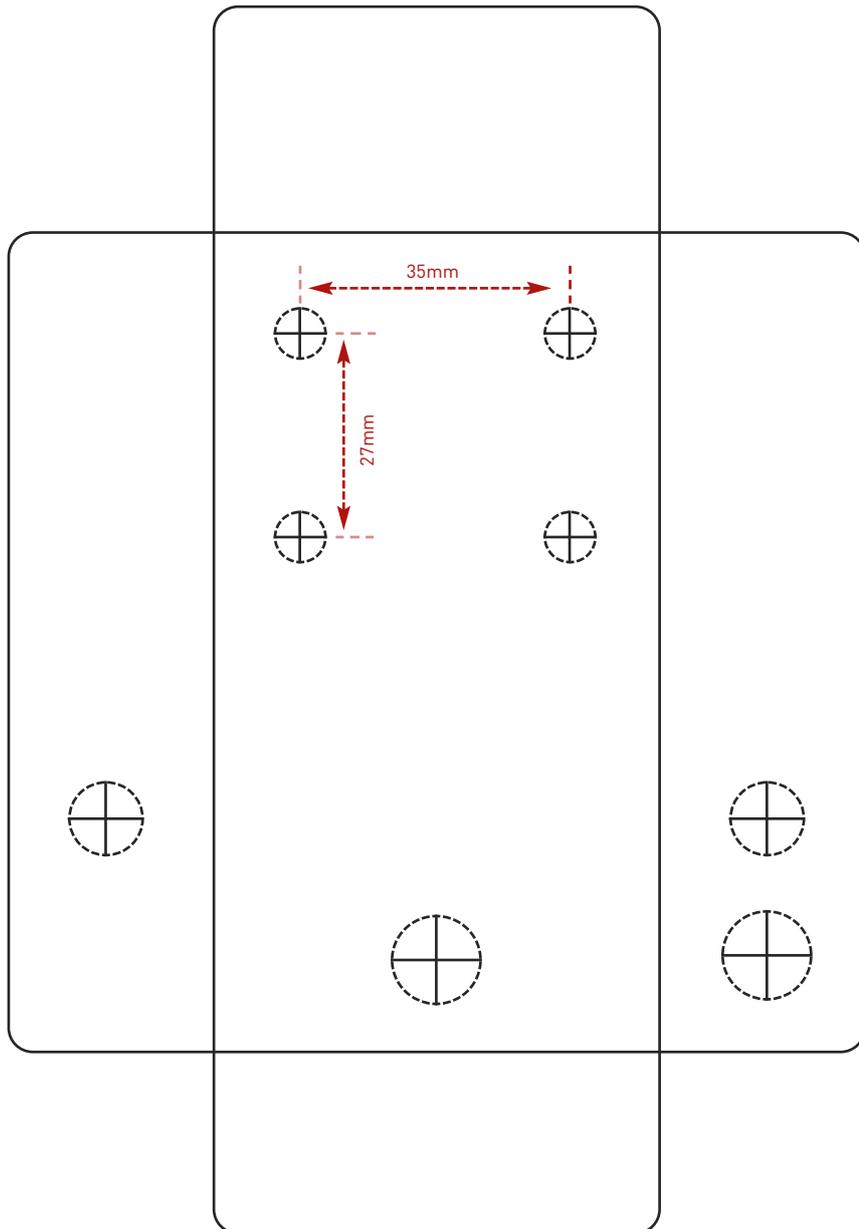
Drilling template

Hammond 1590B

60 x 111 x 31mm

Recommended drill sizes:

Pots	7mm
Jacks	10mm
Footswitch	12mm
DC Socket	12mm



This template is a rough guide only. You should ensure correct marking of your enclosure before drilling. You use this template at your own risk.

Pedal Parts Ltd can accept no responsibility for incorrect drilling of enclosures.

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