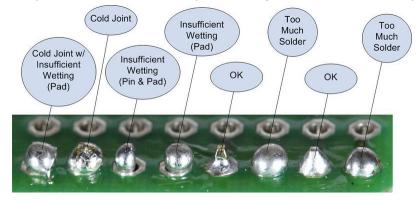
Your solder joints should look like those shown as 'OK' below, they should have that neat conical shape on BOTH sides of the PCB. If they don't look the same on both sides then stop! Work out why from the soldering guides linked and don't continue until you are getting those results. This isn't about perfectionism, you are very likely to end up with a destroyed, damaged or defective unit if you're not hitting that standard.



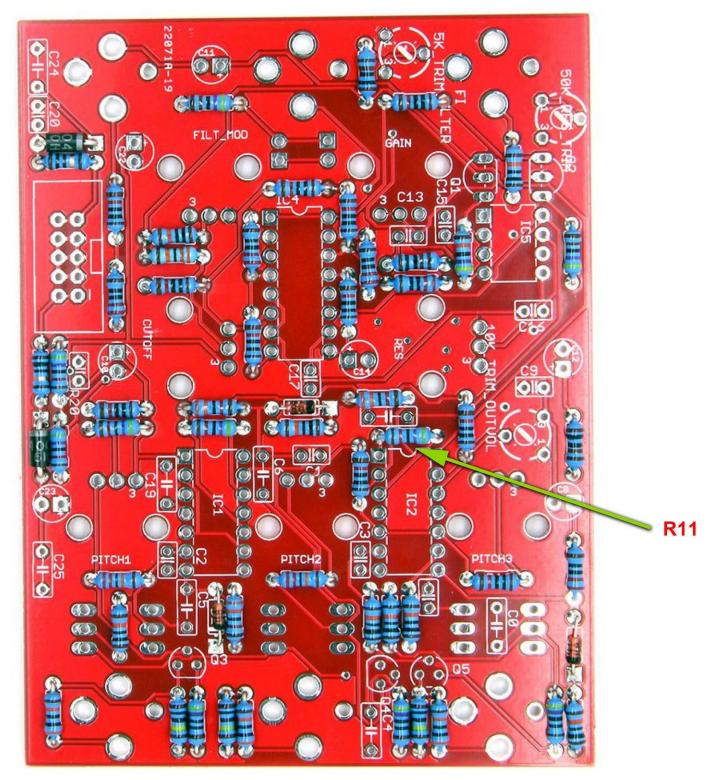
This photo is from the Adafruit guide to excellent soldering - <u>http://bit.ly/1I77tF4</u> and is reproduced under an Attribution-Sharealike creative commons license - <u>http://creativecommons.org/licenses/by-sa/3.0/</u>

1	R2, R7, R12, R22, R24, R27, R28, R29, R30, R31, R41	10k
8	R5, R10, R13, R14, R15, R18, R32, R34	100k
3	R23, R35, R520	1k
3	R44, R48, R49	1M
2	R17, R42	10R
5	R19, R25, R26, R39, R40	220R
2	R3, R8	220k
3	R43, R46, R47	300k
3	R4, R9, R16	33k
1	R33	330K
3	R45, R50, R51	470R
5	R1, R6, R11, R20, R21, (see image on next page for R11)	47k
2	R37, R38	4k7
1	R36	470k

Start off by soldering all the resistors and diodes

3	D1, D2, D3 (SEE IMAGE FOR CORRECT POLARITY!)	1N4148
2	D5, D12 (SEE IMAGE FOR CORRECT POLARITY!)	1n4004

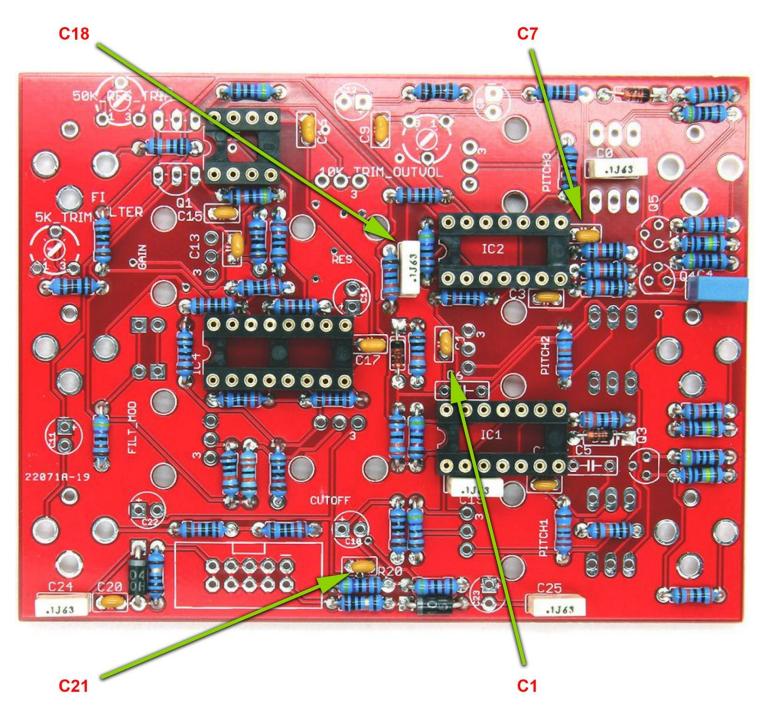
NOTE! The resistor singled out in the image below has a designator which is hard to read on the PCB.



Next solder the Ceramic Capacitors, Film Capacitors and IC Sockets,

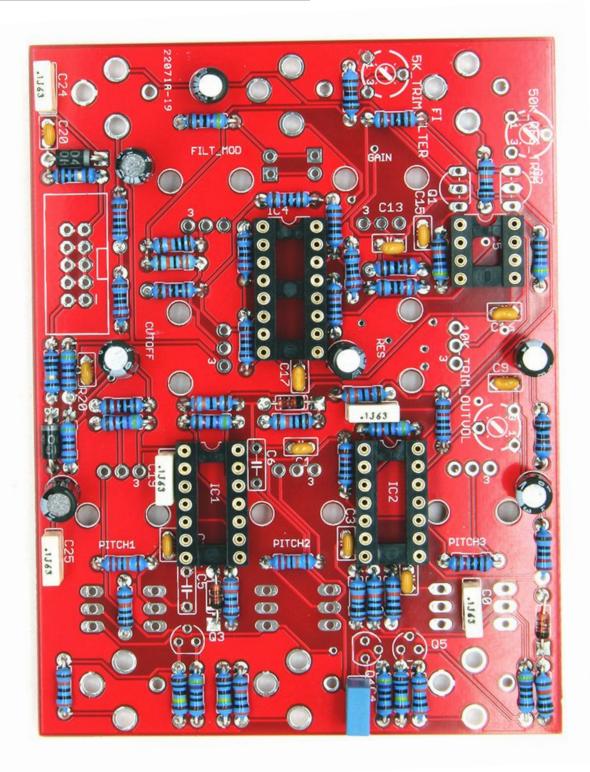
5	C0, C18, C19, C24, C25	100nF
6	C1, C2, C3, C15, C20, C21	4n7
3	C9, C16, C17	1nF
1	C4	470nF
2	C7, C13	47pf

NOTE! The capacitors singled out in the image below have designators which are hard to read on the PCB.



Now solder the black Electrolytic caps, the positive leads are marked by square pads on the PCB - IMPORTANT: <u>DO NOT</u> SOLDER THE GREEN ELECTRO CAPS YET

2	C11, C14	10uF
5	C8, C10, C12, C22, C23	33uF

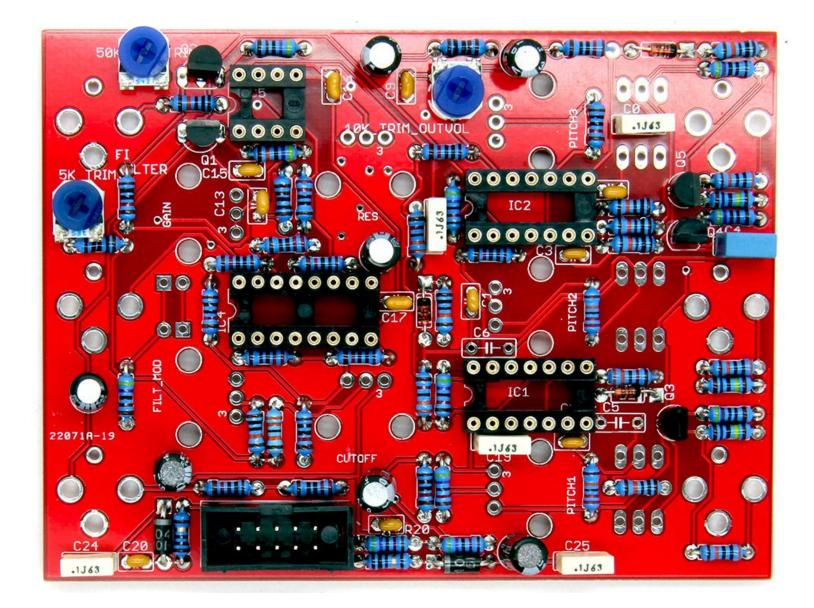


Now solder the transistors - make sure to match the curve of the body with the silkscreen on the PCB.

		1				
2	Q1, Q2	BC560				
3	Q3, Q4, Q5	BF256				
			BC	560 x 2		
			DC			
	(and the second s	N				1
		2207				
	.1763			 O 		ப
			HINKER (2
			ETI T MOD			
	9		FILT_MOD		2 2 0-1	
	Gu					3
			3			
		Sol 1				E
		Só-La ann		0 1	i o o	
				0		
] 🦉 🚊 🔍		0.5	0 0 Co	//
	<u>.</u>			O Res	• • //6	
			- <u>- </u>			2
	ल ब	Renues	innia att			
		Cimes d	INNES CIT	.1363		
	(D (G)					iii
		စစစ္ခမ္မ	o = o	Fo Io	0 000	5
		3 4 5 0		3		6
						2
		PITCH1			O PITCH3	2
	.1563				O PTTTTS	
	-	@ <u>&</u> @ +				5
					O IN	P
		© 👸 🛈 (*				
	R			•	05	
			🖉 🎬 🌰 `	0		2
		😺	3 3 3		V () ()	S.
	BF256 x 3					

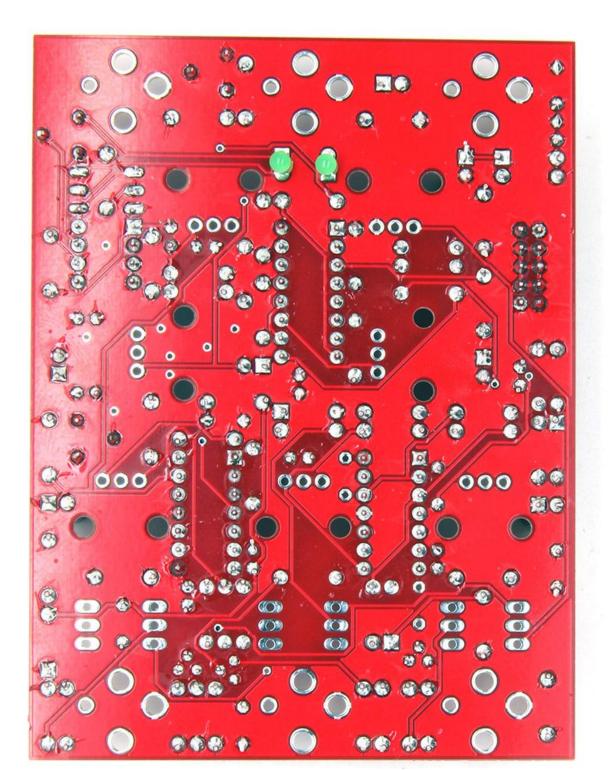
Now solder the three trimmers and the power header, make sure that the indent on the power header matches the pcb silkscreen, facing <u>away</u> from the nearest edge of the PCB.

1	10K TRIMMER - OUTVOL	10k
1	50K TRIMMER - RES	50k
1	5K TRIMMER - FILTER	5k



Now it's time to solder the two green LEDs. These are soldered on the Frontpanel side of the pcb. The LEDs are not designed to be visible through the Frontpanel, they are purely used for their sonic effect in the circuit, so they should be soldered flush to the pcb. IMPORTANT: The longer lead of the LED must go to the square pads on the pcb.

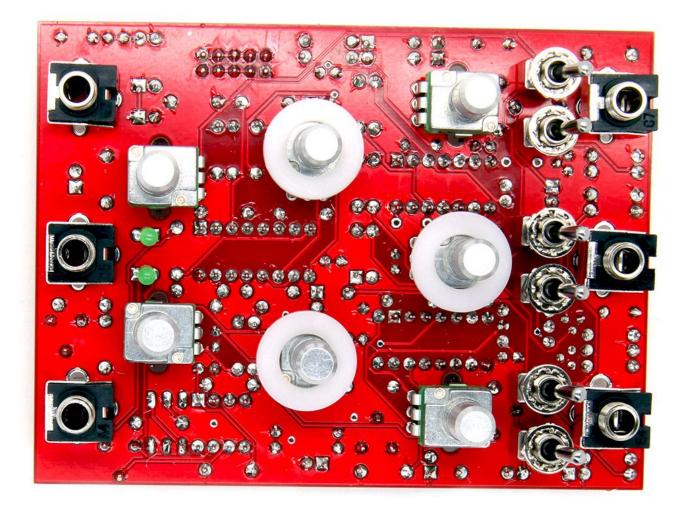
_	
2	Green 3mm LED



Next place all the Frontpanel hardware but DO NOT SOLDER ANYTHING YET. Make sure the switches have both nuts and washer screwed on. All potentiometers and switches are the same value and type. Next place the three plastic washers on the pots and carefully position the panel onto the PCB.

IMPORTANT: before you solder any pots, make sure that you place the Frontpanel and screw nuts and washers on to <u>ALL</u> of the pots. You may have to push the pots up through the panel slightly to get this to work.

It's very important to do this, if you fail to do so you may not have enough thread to fit the nuts and washers after soldering.

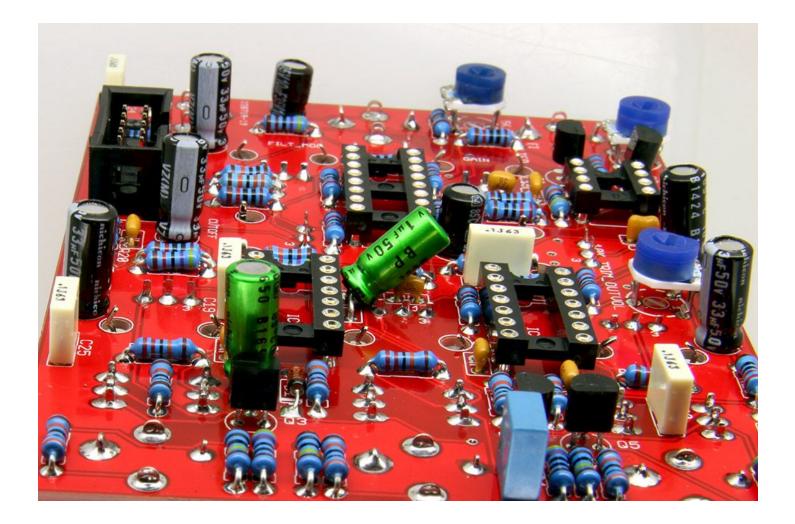


Once you have placed the the Frontpanel and screwed nuts and washers onto <u>ALL</u> of the pots (unlike the photo) you can then solder in the pots, jacks and switches. The switches DO NOT have nuts on the front of the panel, they sit free.

Drone	Skorn da Bas & Abstract rythms g	sk jenerator
Frekañs		Dasson
Modulañ		Ampled
Enkas aodio	Diskas aodio	Enkas modulañ
0	TouellSkouarn	0

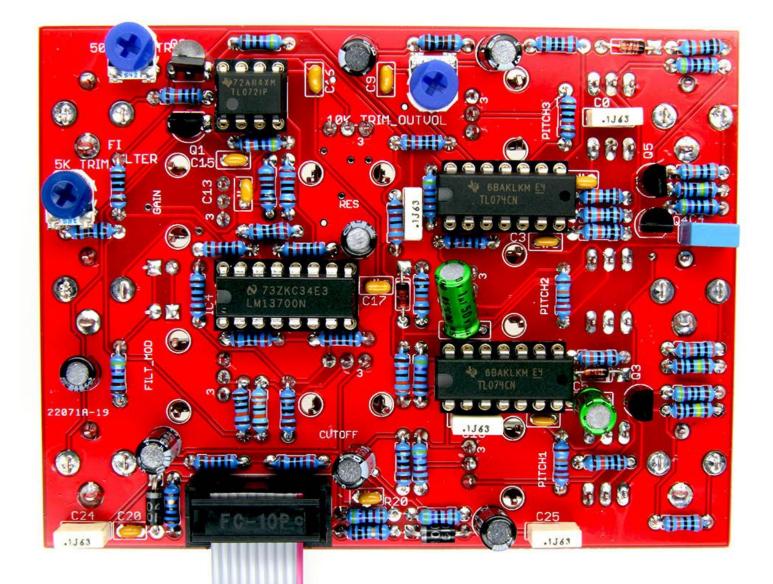
Now remove the panel and solder in the Green Electrolytic capacitors. These are bipolar capacitors, so unlike the other Electro caps it does not matter which way round they are soldered in. C6 will sit at a slight angle, this is fine - just make sure that the leads are not in contact with any other components around them.

C5, C6 1uF



Now, paying attention to orientation, fit the IC's into their sockets as shown.

2	IC1, IC2	TL074
1	IC4	LM13700N
1	IC5	TL072



Now finally place the Frontpanel and after securing all nuts and washers - put on the seven knobs.

You are now ready to power up and calibrate - calibration info can be found here: <u>http://www.touellskouarn.fr/download/user_manuals/eurorack_modules/Skorn_da_bask_usermanual.pdf</u>

