

GROUP BUY N°2 **UPDATE** (April 2018)

Thank you for buying this PCB, I hope you will enjoy building and listening this EL34 Baby Huey amplifier. For your convenience, I add again the last BOM, these values are only suggestions, I am using 6CA7 output tubes, Hammond transformers and 385 V DC high voltage, you may adapt it depending of your configuration... Please use the forum to discuss various options:

<http://www.diyaudio.com/forums/tubes-valves/72536-el84-amp-baby-huey-183.html>

Cheers,

Marc

Components List Amplifier EL34, 6CA7

(April 11, 2018)

Reference	Value	Manufacturer code	Suppliers
R1	12k, 0.6W	Vishay MBB02070C1202FC100	Mouser
R2	470, 0,6W	Vishay MBB02070C4700FC100	Mouser
R3, R4	1k, 0.6W	Vishay MBB02070C1001FC100	Mouser
R5	500, trimmer	Bourns 3386P-DF6-501LF	Mouser
R7, R8, R32, R37	220k, 0.6W	Vishay MBB02070C2203FC100	Mouser
R9, R10	47k, 2W	Vishay CPF2-47K	Mouser
R11, R12	4,7k, 0.6W	Vishay MBB02070C4701FC100	Mouser
R13	39k, 2W	Vishay CPF2-39K	Mouser
R14, R15, R28, R40	270, 2W	Vishay CPF2-270	Mouser
R16	15k, 0.6W	Vishay MBB02070C1502FC100	Mouser
R17	10k, 0,6W	Vishay MBB02070C1002FC100	Mouser
R18	680, 0,6W	Vishay MBB02070C6800FC100	Mouser
R20, R21	1M, 0.6W	Vishay MBB02070C1004FC100	Mouser
R22	20k or 50k pot. log.	Panasonic EVU-E2AF25B24	Mouser
R27	10, 4W	TE connectivity SBCHE410RJ	Mouser
R31, R36	100, 0,6W	Vishay MBB02070C1000FCT00	Mouser
R33, R38	390, 0,5W	Vishay MBB02070C3900FC100	Mouser
R34, R35	220, 0,6W	Vishay MBB02070C2200FC100	Mouser
R39	33k, 0,6W	Vishay MBB02070C3302FC100	Mouser
R41, R42	50k, trimmer	Vishay T93YB503KT20	Mouser
R43, R44	10 Ω , 1%, 2W	Vishay CPF2-10	Mouser
C1, C2	100nF, 400V	Vishay MKT1813410405	Mouser
C5	100nF, 400V 47nF, 630V	Vishay MKT1813410405 Vishay MKT1813347635	Mouser
C3	22pF	Vishay K220J10C0GF5UH%	Mouser
C6	220uF, 400V 120uF, 500V	Nichicon LGL2G221MELA25 Nichicon LGN2H121MELA35	Mouse

C7	100uF, 400V 47uF, 500V	Nichicon UPZ2G101MHD Nichicon UCY2H470MHD	Mouser
C10, C11	150uF, 100V or 330uF, 100V ₁	United EKZN101ELL151MJ25S Nichicon UFW2A331MHD	Mouser
C12	1uF, 100V	EPCOS B32522C1105K189	Mouser
CX1	10 nF or 100 nF, 1000V	Murata RDER72J104K4M1H03A	Mouser
Q1, Q2, Q7, Q8, Q9, Q10	2N5551	Fairchild 2N5551 (Vce = 160 V minimum !)	Mouser
Q5, Q6	STU9HN65M2 FQFP2N60C ₂	STMicro STU9HN65M2 On Semi FQFP2N60C	Mouser
D1, D2, D3, D4, D5, D8	1N4007, UF4007	Fairchild UF4007	Mouser
D6, D7	1N4742A Zener 12 V	Fairchild 1N4742A	Mouser
LED1	standard red LED	Broadcom HLMP-1700	Mouser
X1	5 contact 5.08 mm	FCI 20020316-H05	Mouser
X2, X3, X4, X5, X6	2 contact 5.08 mm	FCI 20020316-H02	Mouser
V1	ECC83, 12AX7	JJ, EH, Sovtek, etc...	BanzaiMusic ³
V2 ₃ , V3 ₃	EL34, 6AC7 ₄	JJ, EH, Tungsol, etc...	BanzaiMusic
1 socket noval		SKU17658	BanzaiMusic
2 sockets octal		SKU17652	BanzaiMusic

What I have used in my board, recommended...

What you need if you are using more than 400 V...

¹ Better filter but a bit tight with 330 µF!

² The **STU9HN65M2** can be soldered on the top of the board, it is small enough
The **FQFP2N60C** must be soldered under the board, be careful with pin out!

³ Vacuum tubes suppliers:

- Banzai music* (Germany) <https://www.banzaimusic.com/home.php>
- Vintage HiFi* (Italy) <http://www.tubes.it/en/>
- Tube depot (U.S.A.) <https://www.tubedepot.com/>
- The tube store (Canada) <http://www.thetubestore.com/>
- Antique Electronic Supply* (U.S.A.) https://www.tubesandmore.com/products/vacuum_tubes

⁴ Other compatible tubes may be used:

- **6V6** with **8k** (10 to 15 W) output transformer (Hammond 1608, 1620, 1650E, Toroidy EL84 PP)
- **6L6**, **6L6GC**, **KT66** with **6,6k** (20 to 25 W) output transformer (Hammond 1620, 1650FA, Toroidy EL34 PP)
- **EL34**, **6CA7**, **6550**, **KT88** with **4,3k** (60 W) output transformer (Hammond 1650N, Toroidy KT88 PP)