

BOM: 13cm PA Stage-1, 10 watts peak

<u>Qty</u>	<u>Value</u>	<u>Device</u>	<u>Package</u>	<u>Parts</u>	<u>Example supplier</u>	<u>Order Number</u>
1	NTC0805J5K0	5kohm NTC	SMD 0805	R5	Digikey	541-1128-1-ND or NTC0805J5K0-ND
1	78L05F	78L05F	SOT89	IC1	various	
1	MHT1008N	2,4GHz power LDMOS		T1	Digikey	568-13887-1-ND
1	IRLML2502BPF	N-channel MOSFET	SOT23	Q5	various	
1	250	POTENTIOMETER_SMDUNIV	POTSMD_UNIV	R2	Digikey	SM-42TW102CT-ND
2		SMA Connectors	PCB mount, right angle panel type	X1, X2	Digikey	J10612-ND
3	10p	SMD ceramic cap NPO	SMD 0603	C5, C6, C55	various	
2	1p	SMD ceramic cap NPO	SMD 0603	C2, C4	various	
2	6p8	SMD ceramic cap NPO	SMD 0603	C1, C3	various	
1	10u/10v	SMD ceramic cap X7R/X5R	SMD 0603	C48	various	
3	10u/35v	SMD ceramic cap X7R/X5R	SMD 0805	C7, C8, C47	various	
1	1u/10v	SMD ceramic cap X7R/X5R	SMD 0603	C56	various	
2	10u/35v	SMD electrolytic cap	diameter 10mm	C9, C10	various	
1	100	SMD resistor 0,1 watts	SMD 0603	R3	various	
1	10k	SMD resistor 0,1 watts	SMD 0603	R4	various	
1	270	SMD resistor 0,1 watts	SMD 0603	R24	various	
1	4.7	SMD resistor 0,1 watts	SMD 0603	R1	various	
1	47	SMD resistor 0,1 watts	SMD 0603	R23	various	
1	560	SMD resistor 0,1 watts	SMD 0603	R17	various	

Remarks:

The N-channel MOSFET can be any standard type in SOT23 case if the Gate-to-source Transfer Characteristics shows a voltage below 3V. There are many alternatives like BSS138 and a lot more.

NTC: if these NTCs are not available, simply look for an NTC with 5kOhms in 0805 case

250 ohms Pot: any value between 250 ohms and 1k can be used. The PCB allows also mounting of bigger pots as the one shown here.

C9,10 electrolytic cap: any value between 10uF or 100uF ($\geq 35v$) can be used if the diameter is 10mm smaller caps can also be installed. Even non-SMD types can be installed by bending the wires.