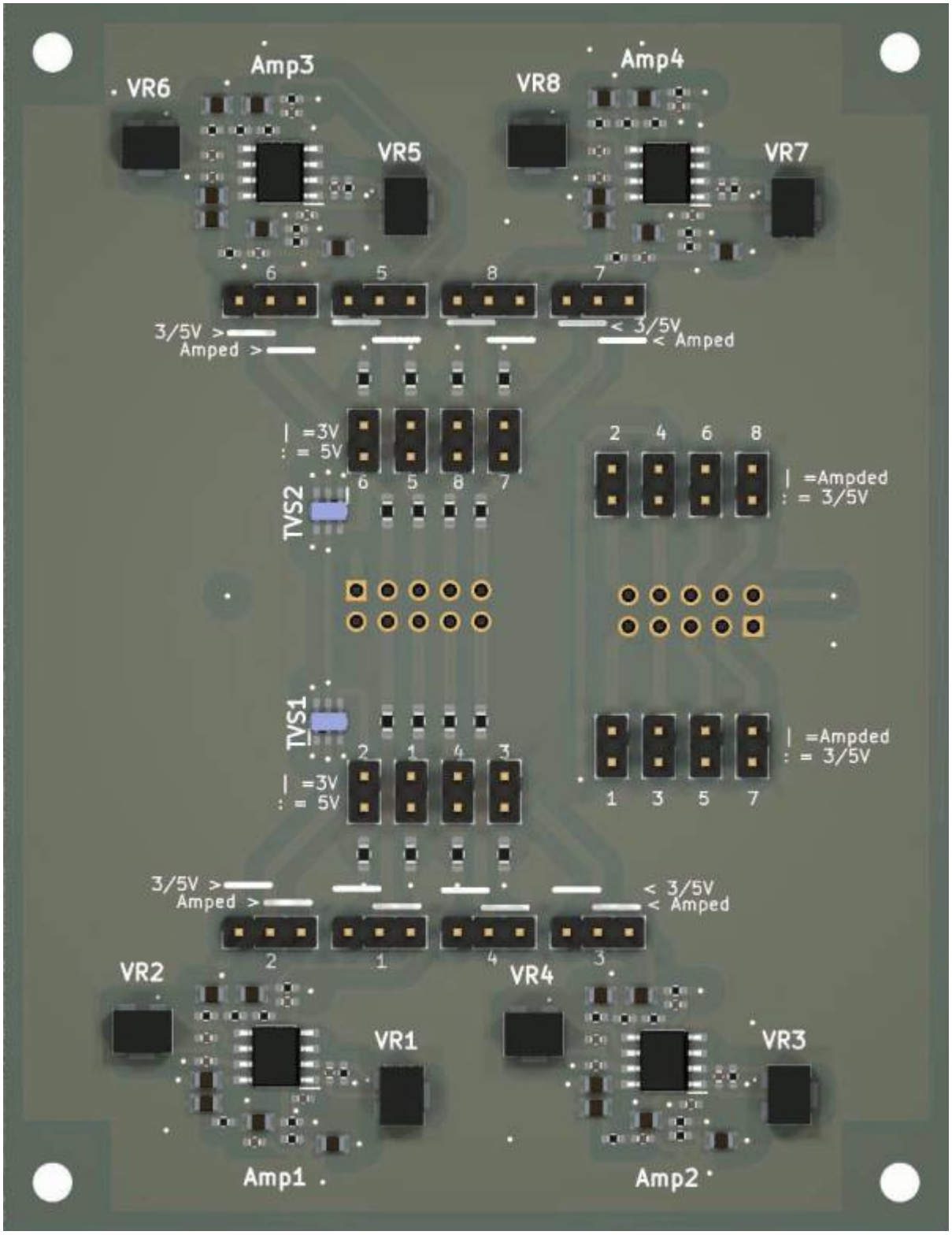
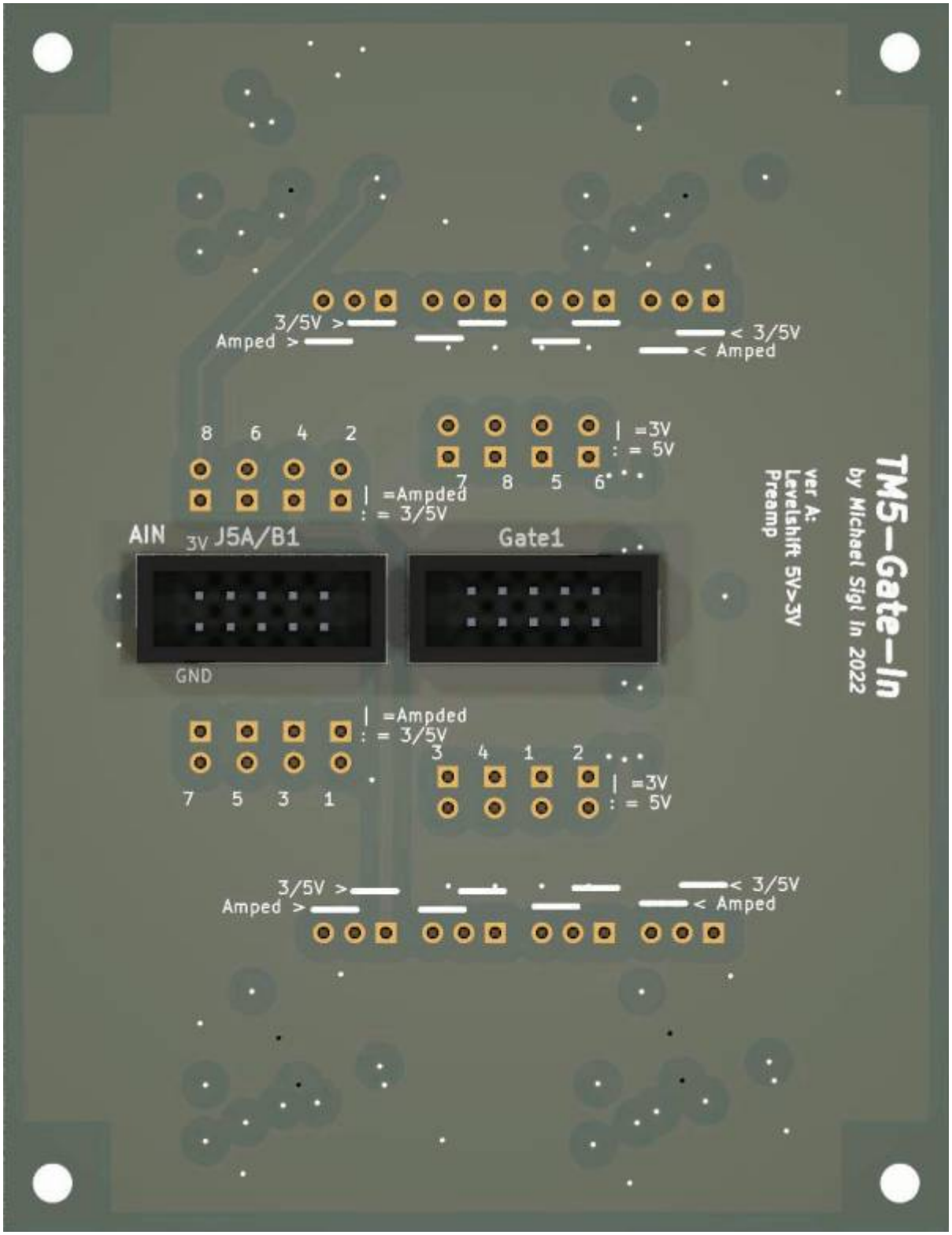
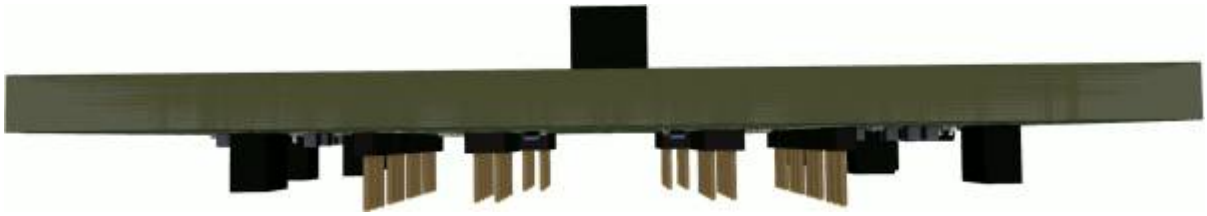
TM5 Gate/Trigger Input





this is one essential part for my triggermatrix5
* Levelshift from 5V to the for the MCU required 3V, with a Resistor Divider
* Overvoltage Protectect with TVS-Diodes
* Preamp-Section

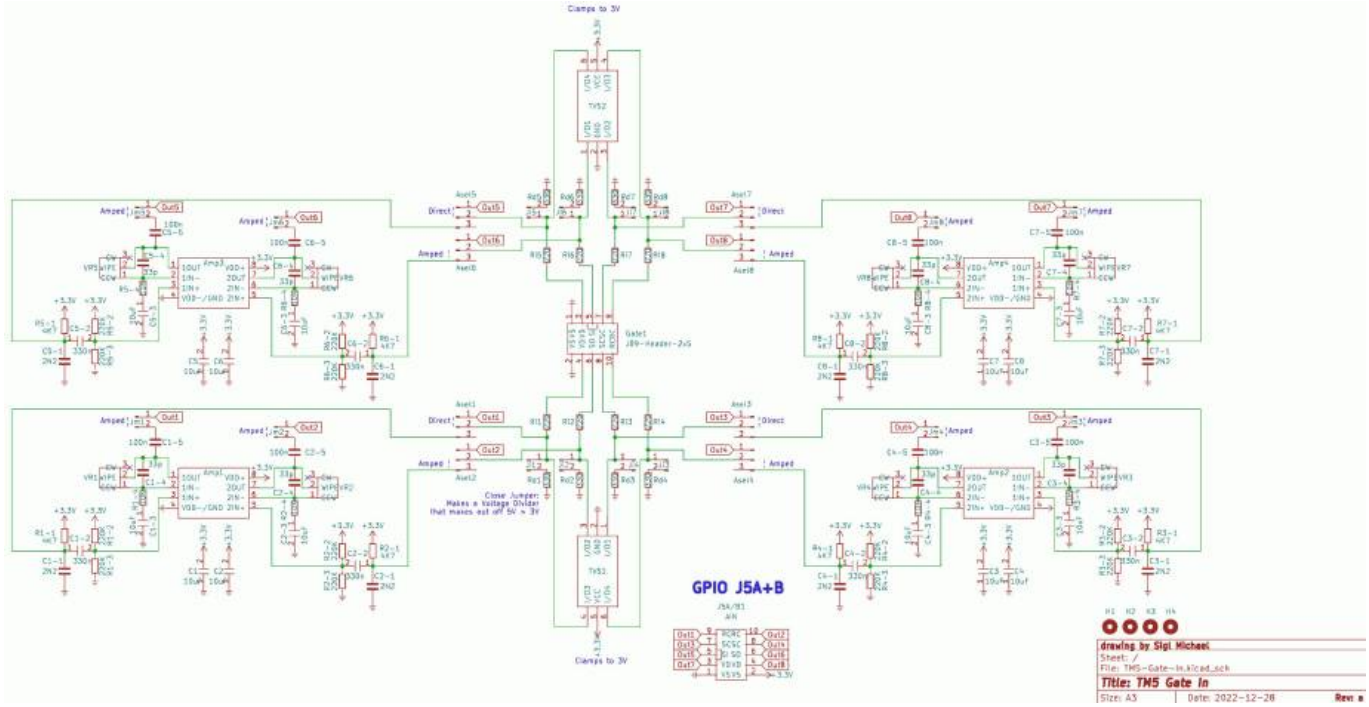
5V, 3V or Pre-Amped input - can be set vie Jumpers and Potentiometers, the PCB itself should be mounted on the Groundplate off the housing, the housing should have a service-plate to access this Settings!:



8 Channels, are managed here, so in order to have 16channels, you need 2 off this PCBs
if you dont want a Preamp, then dont stuff the Preamp-section > this will make this PCB a lot off cheaper!

Shematic

tm5-gatein-schema.pdf



Building and BOM

BOM

Follwing list is for reference, and debugging only, **no need to order them!** all the parts are already soldered on the PCB!

Comment	Designator	Footprint	LCSC
10uF	C1-18,C34-54	0805_C	CL21A106KAYNNNE
100n	C19-33	0402_C	C307331
-	CS1,LCD1-18,inB10,outB10,in15	PinHead-SMD-2,54mm Pitch	C192300
SN74HC541	IC1-7	SOIC127P780X200-20N	C116811

Comment	Designator	Footprint	LCSC
74HC595	IC8-10	SOIC-16	C5947
220 OHM	R1-54	0402_R	C25091
1K OHM	R55-96	0402_R	C11702

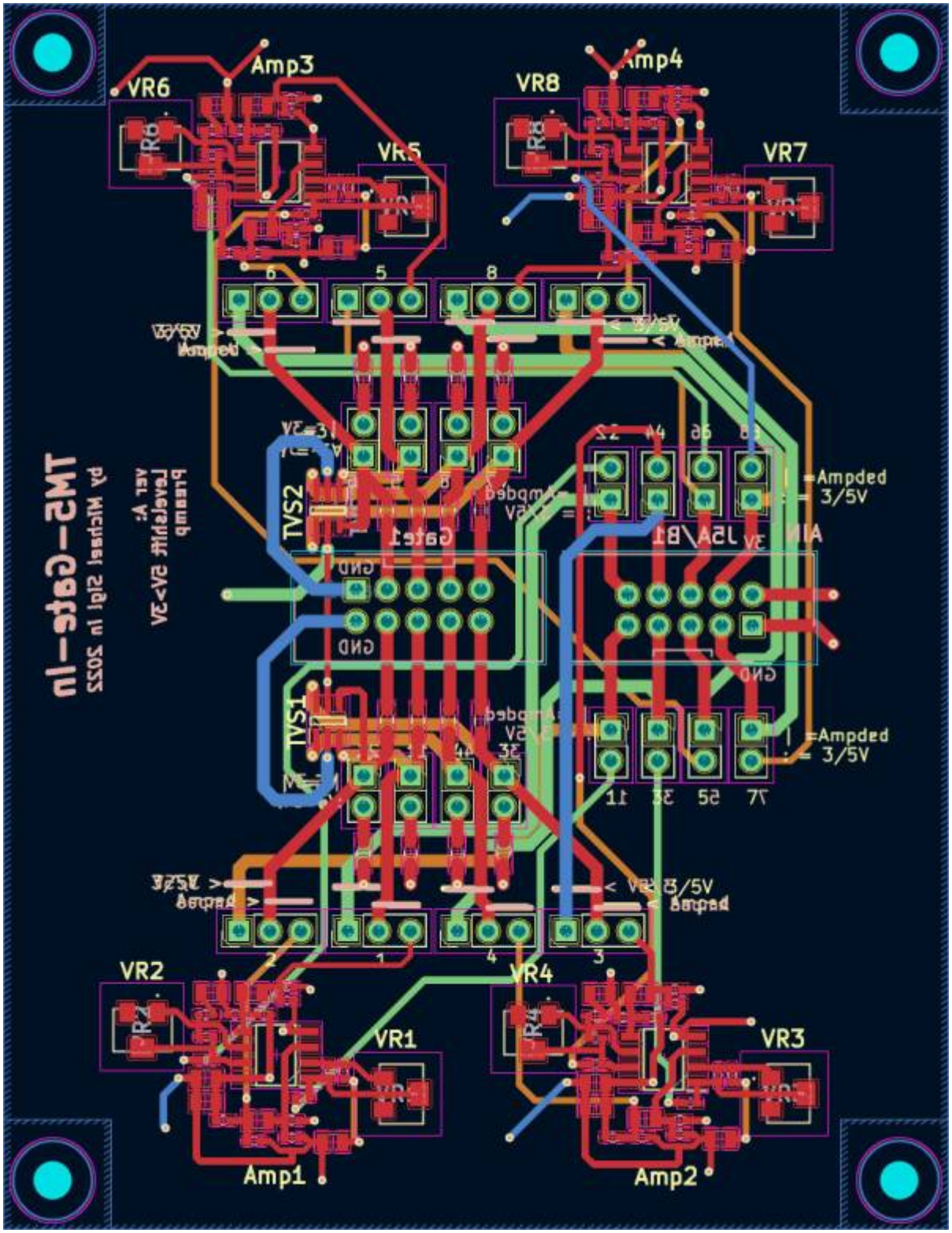
Order-List

This Quantitys are for ONE Board, you may need 2 Boards...

copy following list into this mouser.com-Link

```
517-30310-6002|5
```

Order from Reichelt:
3x 2x20Pin Male 2,54mm Headers
4x PinHeader 2x5Pin FeMale
32x Jumper



To Do

waiting for the assembled Prototype

Community users working on it

- **Phatline** = PCB & Shematic, UI-Programming, Documentation...

Just let a Private message on the forum to user already involved.
or join the forum: Triggermatrix 5

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Last update: **2022/12/29 12:13**