

Buttons and switches, this includes:

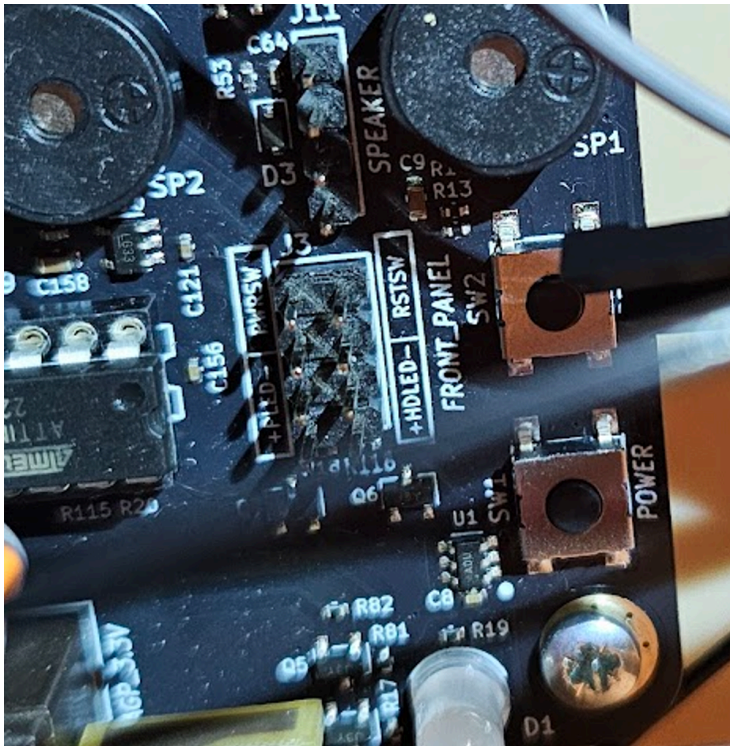


Power switch
Reset switch
MT32Switch x2

Use red/black 2 wired cables with dupont in one end

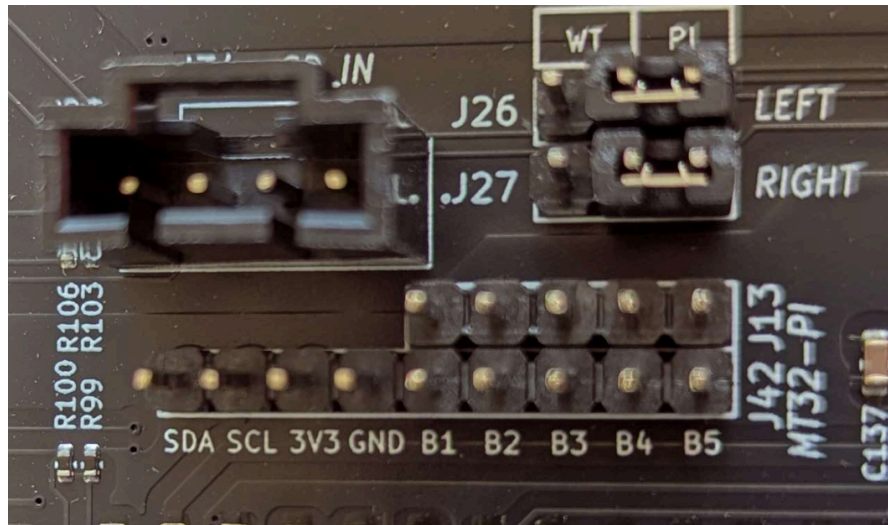


Solder the wire end to the switches. The other end goes into the llama pin headers.



Power switch connect to PWRSW
Reset Switch connects to RSTSW
Polarity does not matter for these.

MT32 Switches goes to the pin header up by the power supply connector.



SYNTH switch goes to B1 and ROM switch goes to B2, i suggest keeping the black wire upwards on the J13 line of pins as that is the ground pins.

WT/PI Switch:

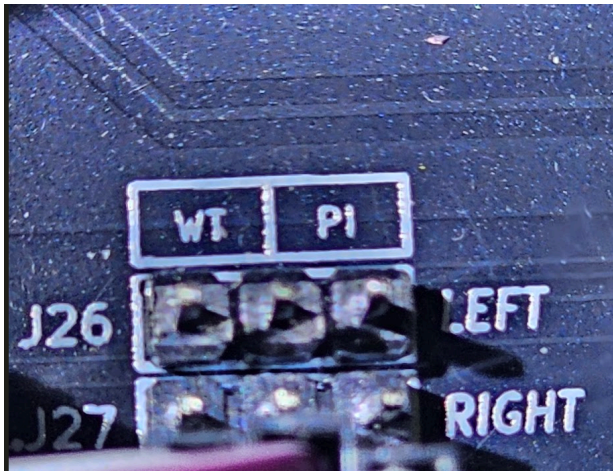
Double throw, double pole switch



This switch has an two poles INPUT in the middle and two doublepole OUTPUTS, one on each side. Use the 3wire cables with 3pin dupont connectors:

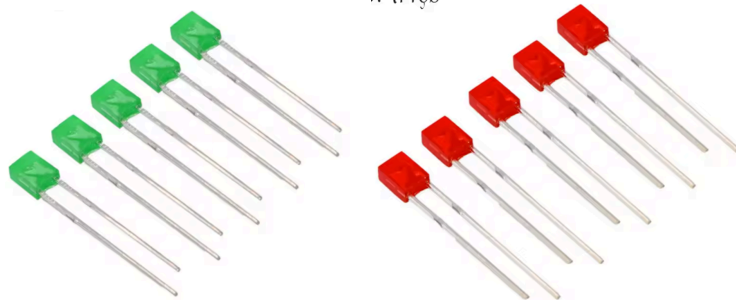
Lets call the switch pins row 1 to 3 with 2 pins on each row, easy enough to understand. Solder from one 3pin dupont cable, lets call this cable J26, RED to row1 pin 1, BLACK to row2 pin 1, YELLOW to row3 pin1. Then lets continue with the next cable, take the second 3pin dupont cable, this one we call J27. Solder its RED to row1 pin2, BLACK to row2 pin2, YELLOW to row3 pin2.

When connecting the switch to the Llama, connect the dupont cable we called J26 to the J26 header on the Llama ITX motherboard and the cable we called J27 to header J27. The RED cable goes to the WT pin, YELLOW to the PI pin, and BLACK the middle pin!



The Switch works “reversed”, so when mounting it in the case when the toggle is in the down position, pointing at PI printed on the case, the wires in the top row will be activated, if function is reversed, just rotate half a turn.

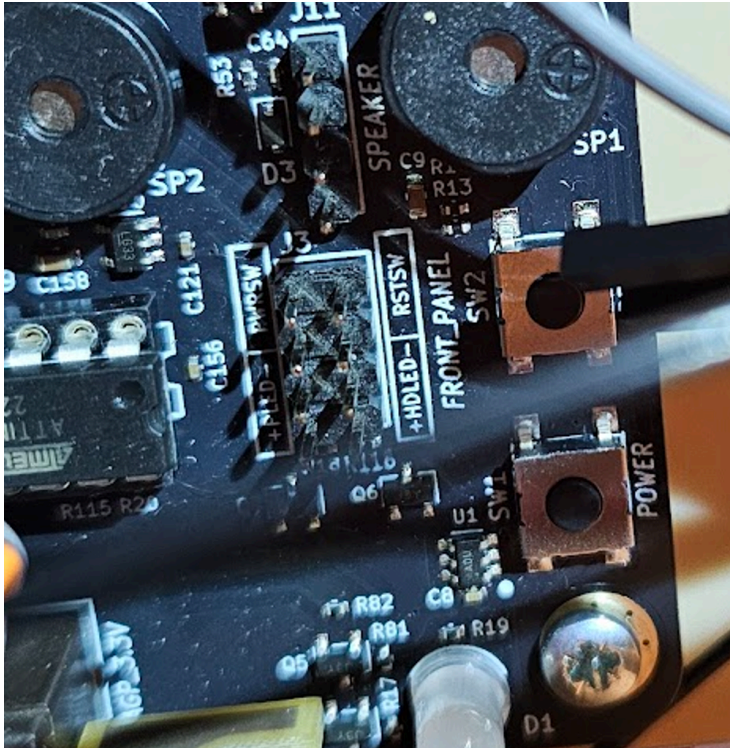
The LEDs:



For the LEDs the two wire cables are to be used

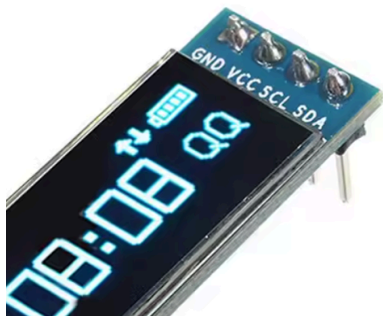


In this instance the polarity DOES matter, the short leg of the LED is the negative and the longer is the positive. For simplicity always use black wire for negative or ground. I suggest cutting back the legs a bit before soldering, and using either heatshrink,



The dupont connector then goes into the +PLED- and the +HDLED- pins on the lama, do mind the polarity!

OLED Display:

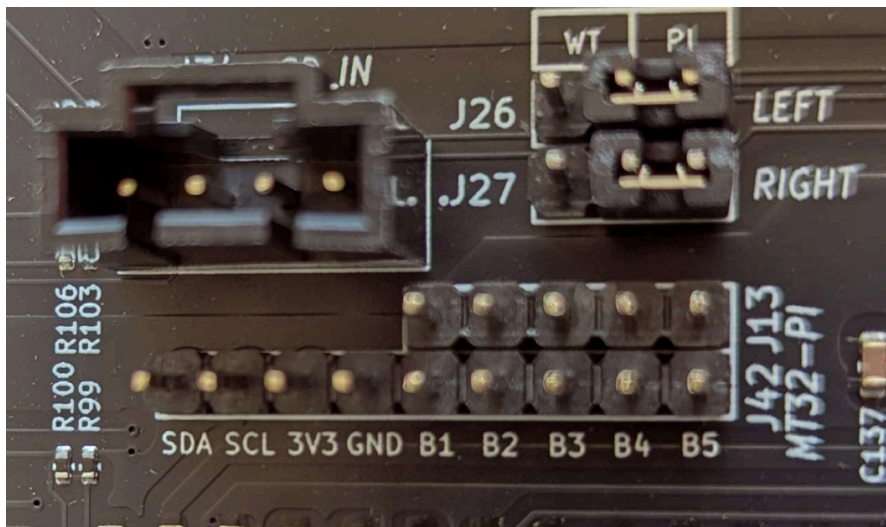


No Soldering is needed for the display, use the 4pin dupont cable:



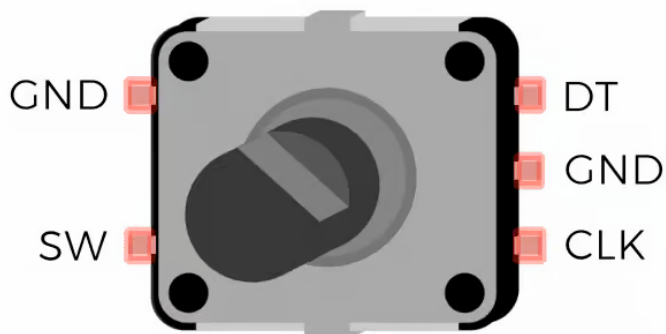
Connect the brown side to GND pin on the display, RED becomes VCC with 5V power so colors match up nicely. (SCL = Orange and SDA = Yellow)

On the llama board the other side of the connector connects on the high pin header just below the ATX power socket:

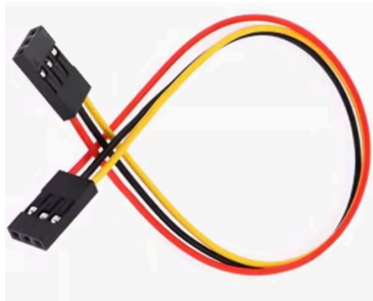


Connect it to the first four pins, be careful to connect the dupont connector in the right orientation. SDA=Yellow, SCL=Orange, 3v3=red, GND=Brown

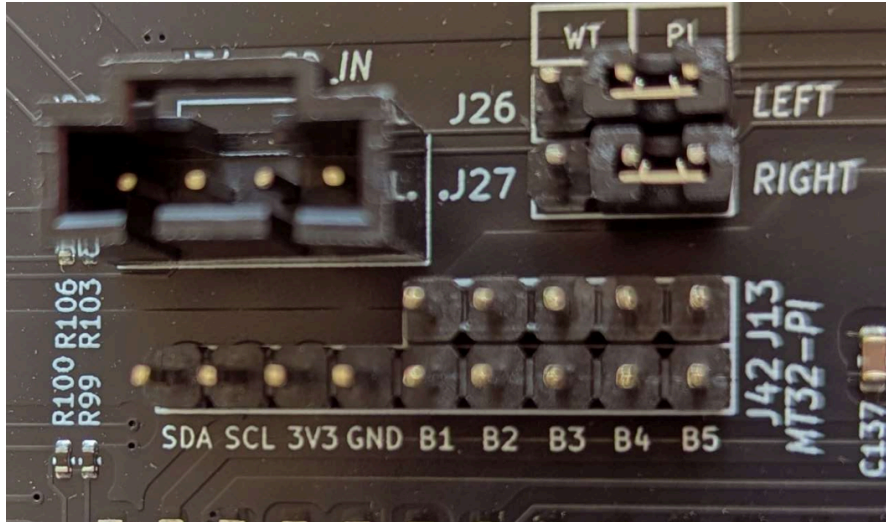
Rotary encoder:



Do note that this image is seen from the front with the rotary shaft towards you. For this we use one 3wire cable with dupont connector and two 1wire dupont.



One end of the wire with the dupont connector goes to the llama board pin header below the ATX connector



B3=Red, B4=Black, B5=Yellow.

Snip of the connector of the other end and solder Yellow(B5) to SW, Black(B4) to CLK, Red(B3) to DT on the rotary encoder.

Solder one of the 1wire cables to each of the GND on the rotary encoder and connect the other the dupont connectors J13 row of B4 and B5