

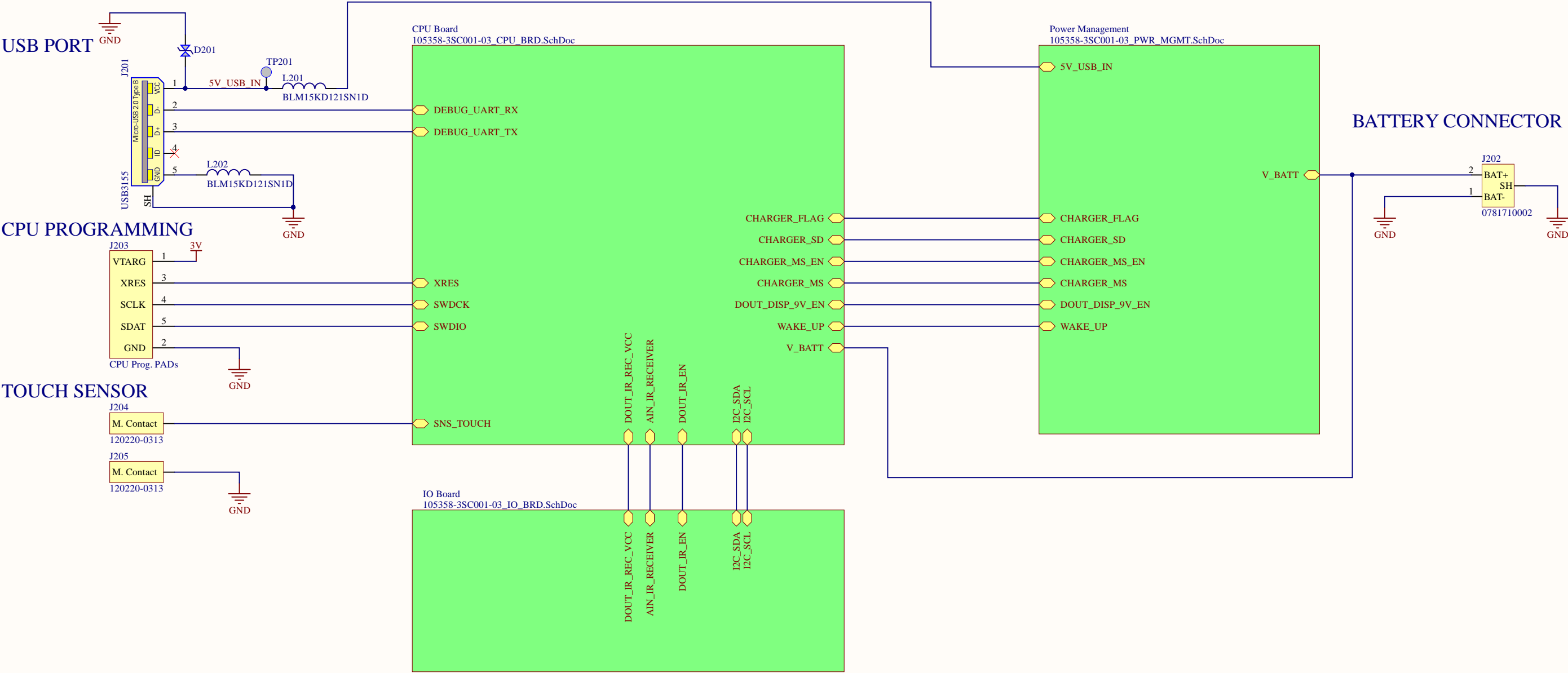
# Electronics Functional Prototype I - Mini

## Schematic version 105358-3SC001-03-A

Block diagram  
105358-3SC001-03\_BlockDiagram.SchDoc

- 2 Block Diagram
- 3 Power Management
- 4 CPU
- 5 IR Barrier

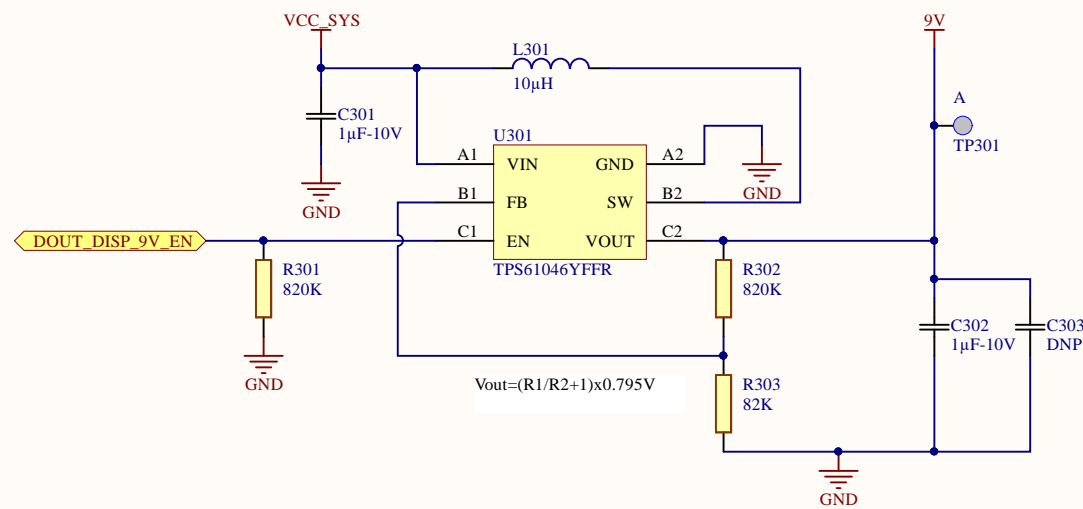
# Block Diagram



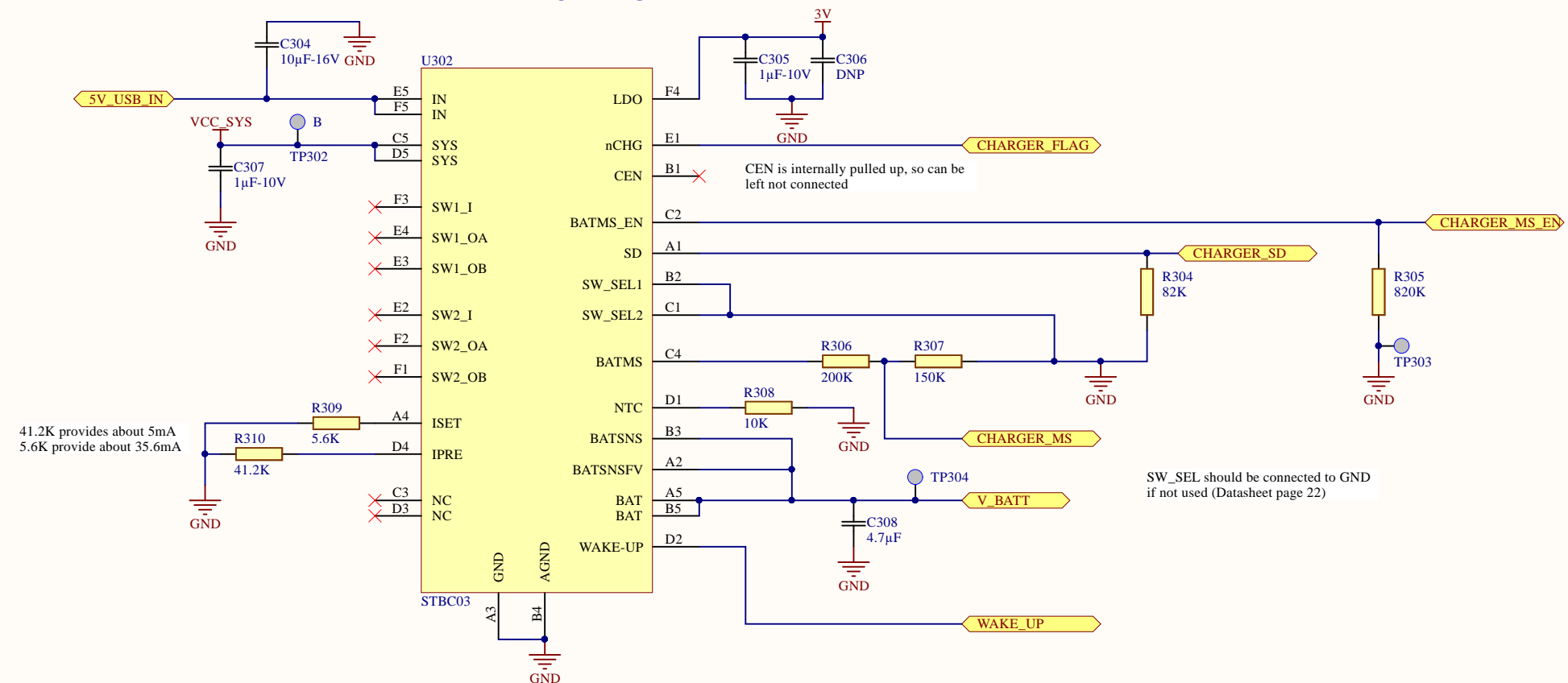
FID FID FID FID  
FIDU201 FIDU202 FIDU203 FIDU204

# Power Management

## BOOST CONVERTER



## BATTERY CHARGER



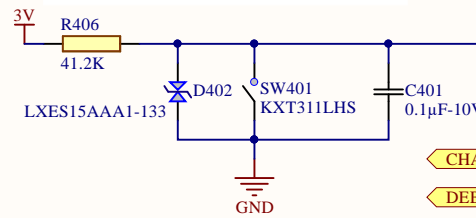
# CPU

to operate at 2mA  
Green requires 1.9V > R550 Ohm  
Red requires 1.6V > R685 Ohm

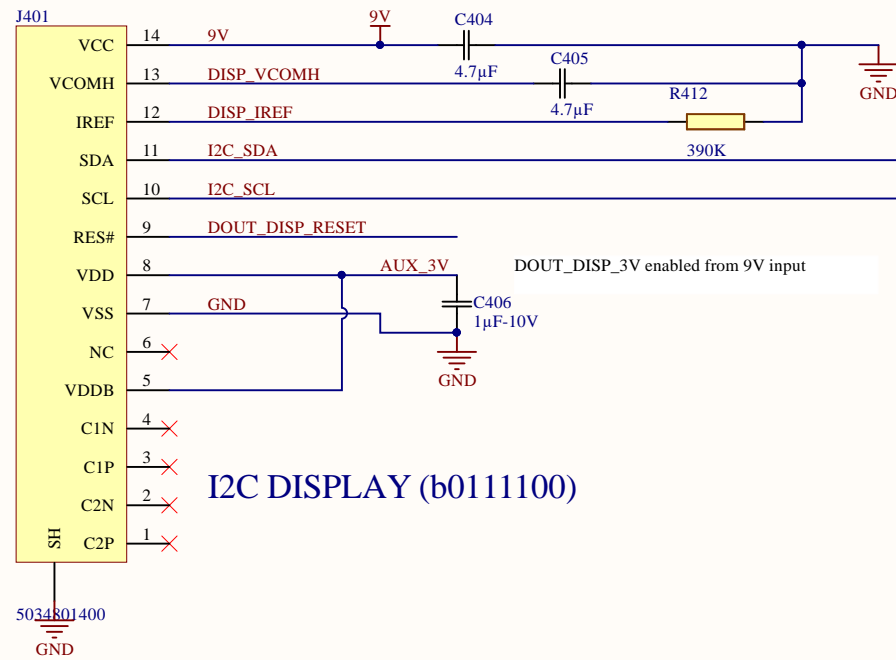
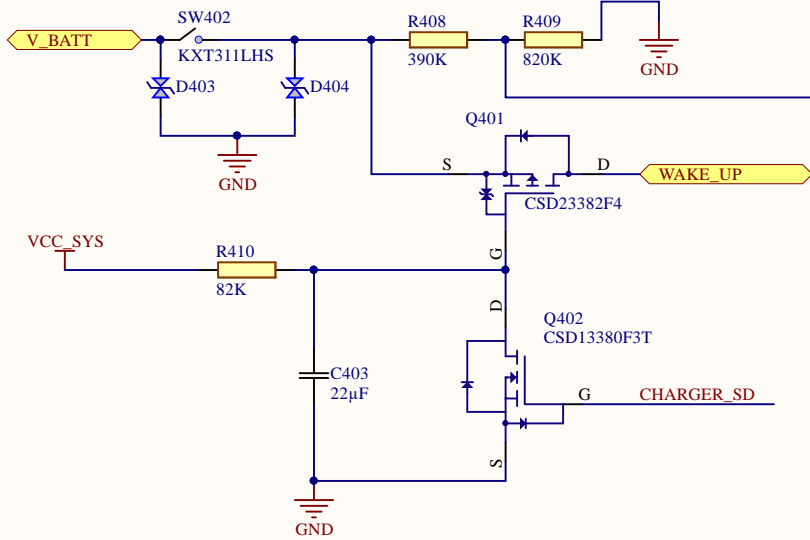
▲ GPIOs from expander moved to Module

## RESET SWITCH

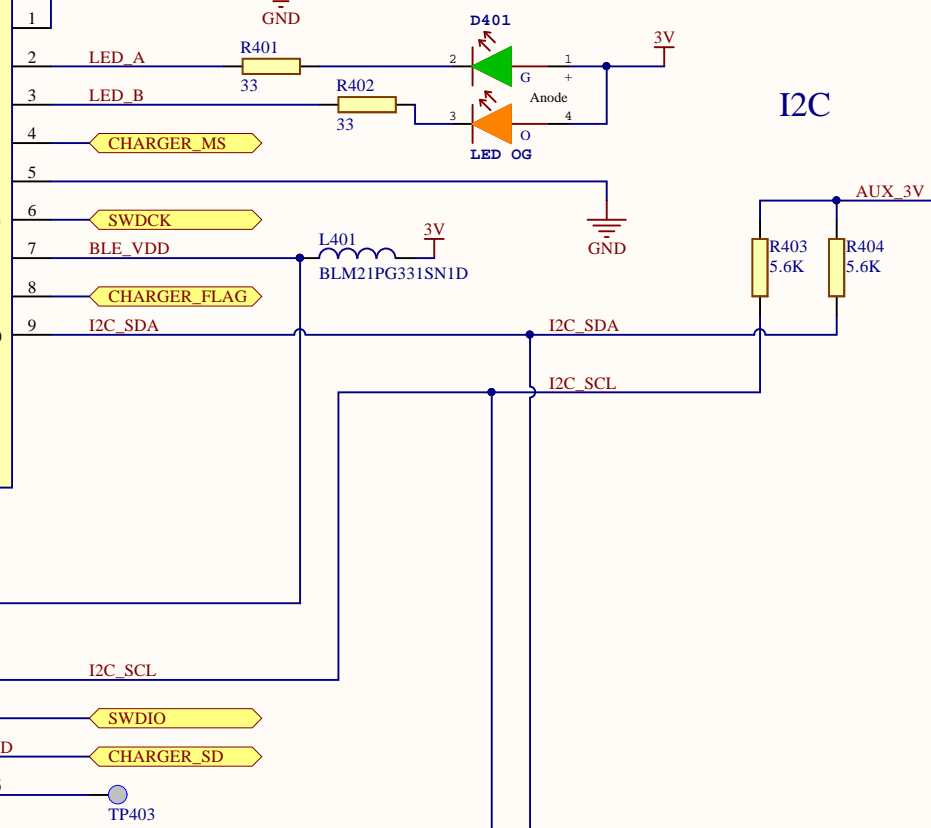
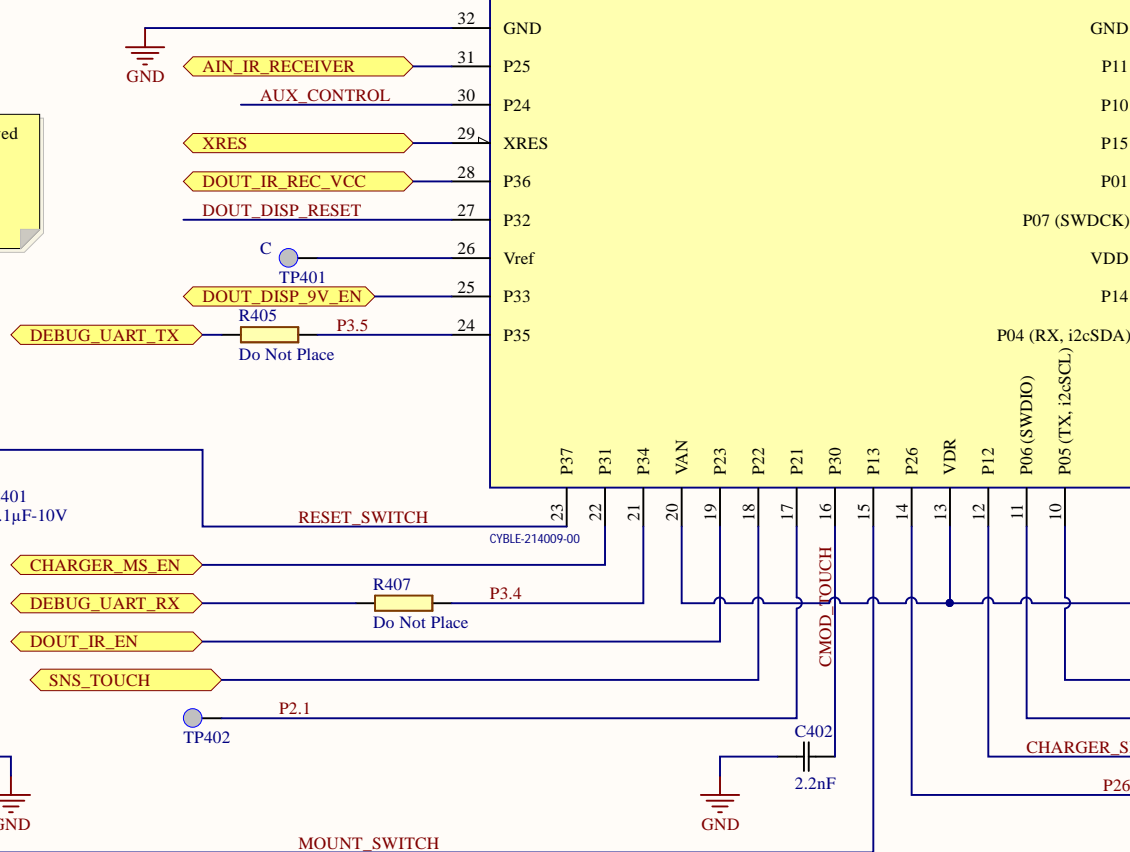
Bounce time: 10ms using 41.2KOhm and 0.1μF



## MOUNTING SWITCH



## I2C DISPLAY (b0111100)



## I2C



## I2C EEPROM

Device select code when addressing the memory array (b1010000)  
Device select code when accessing the Identification page (b1011000)

# IR Barrier

## LIGHT BARRIER

