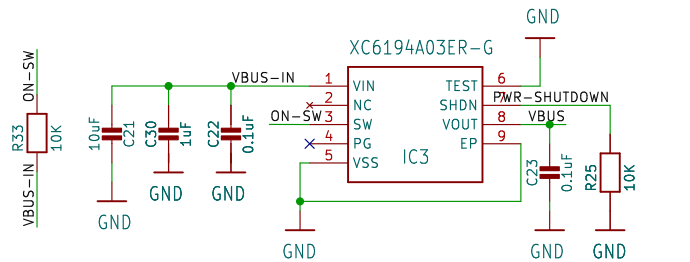


POWER SWITCH

The diagram illustrates a power switch circuit using the XC6194A03ER-G IC. The IC is a 9-pin component with the following pin connections:

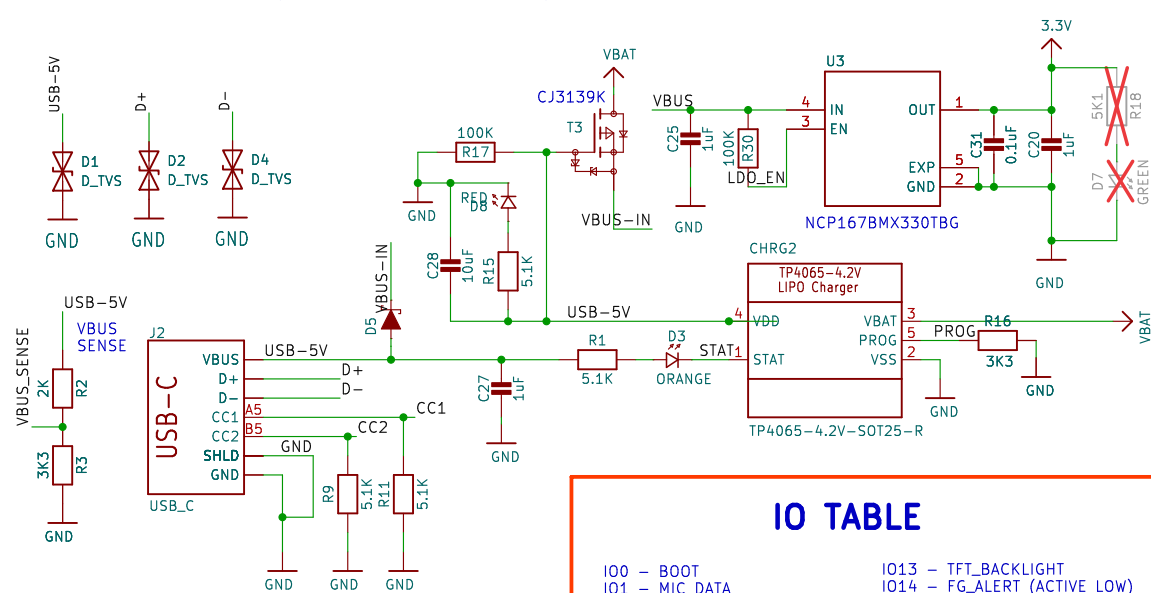
- PIN 1 (VIN):** Connected to the VBUS-IN line.
- PIN 2 (NC):** Not connected.
- PIN 3 (SW):** Connected to the VBUS-IN line through a 10K resistor (R33) and a 10uF capacitor (C21) to ground.
- PIN 4 (PG):** Connected to ground through a 10K resistor (R25).
- PIN 5 (VSS):** Connected to ground.
- PIN 6 (PWR-SHUTDOWN):** Connected to ground.
- PIN 7 (TEST):** Not connected.
- PIN 8 (VOUT):** Connected to the VBUS line through a 10K resistor (R25) and a 1uF capacitor (C23) to ground.
- PIN 9 (EP):** Connected to ground.

The circuit includes several capacitors (C21, C22, C23, C30) and resistors (R25, R33) to ensure proper operation and protection of the IC.



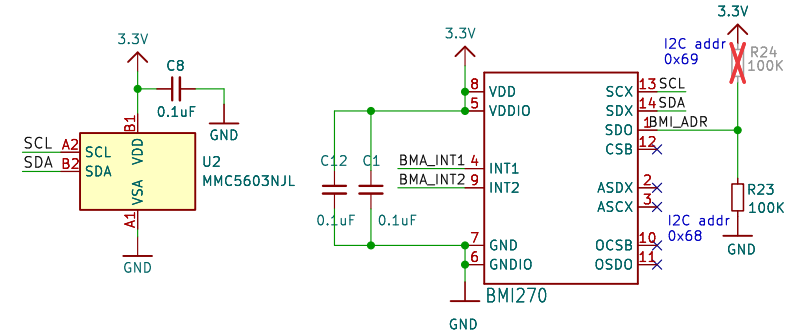
IO TABLE

I00 - BOOT	I013 - TFT_BACKLIGHT
I01 - MIC_DATA	I014 - FG_ALERT (ACTIVE LOW)
I02 - MIC_BCLK	I015 - TFT_DC
I03 - MIC_WS	I016 - TFT_CS
I04 - RTC_INT (ACTIVE LOW)	I017 - TFT_RESET
I05 - I2C2 - SDA (TOUCH)	I018 - BUZZER
I06 - BMI270_INT1	I021 - PWR-SHUTDOWN
I07 - BMI270_INT2	I033 - USER_FLASH_CS
I08 - I2C - SDA	I034 - VBUS_SENSE
I09 - I2C - SCL	I035 - SPI_MOSI
I010 - I2C2 - SCL (TOUCH)	I036 - SPI_SCK
I011 - TOUCH_INT	I037 - SPI_MISO
I012 - TOUCH_RESET	

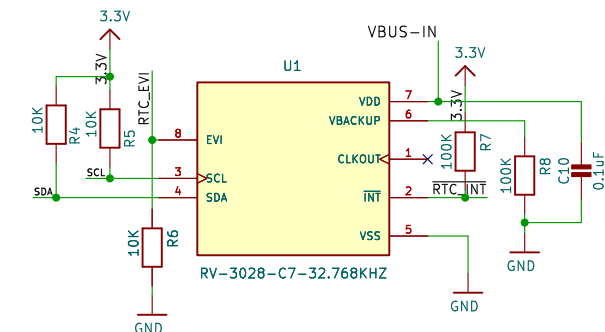
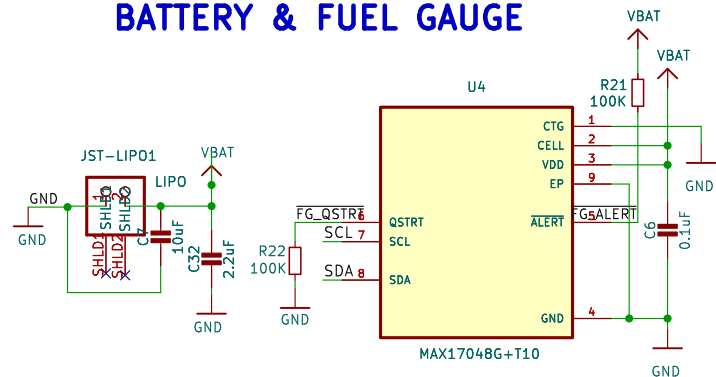


IMU + MAGNETOMETER

The diagram illustrates the connection of an IMU (MMC5603N) and a Magnetometer (BMA270) to an I2C bus. The IMU is connected to SCL (A2) and SDA (B2) lines. The Magnetometer is connected to SCL (13) and SDA (14) lines. Both devices are powered by 3.3V and GND. The diagram includes pin numbers and component values like capacitors and resistors.

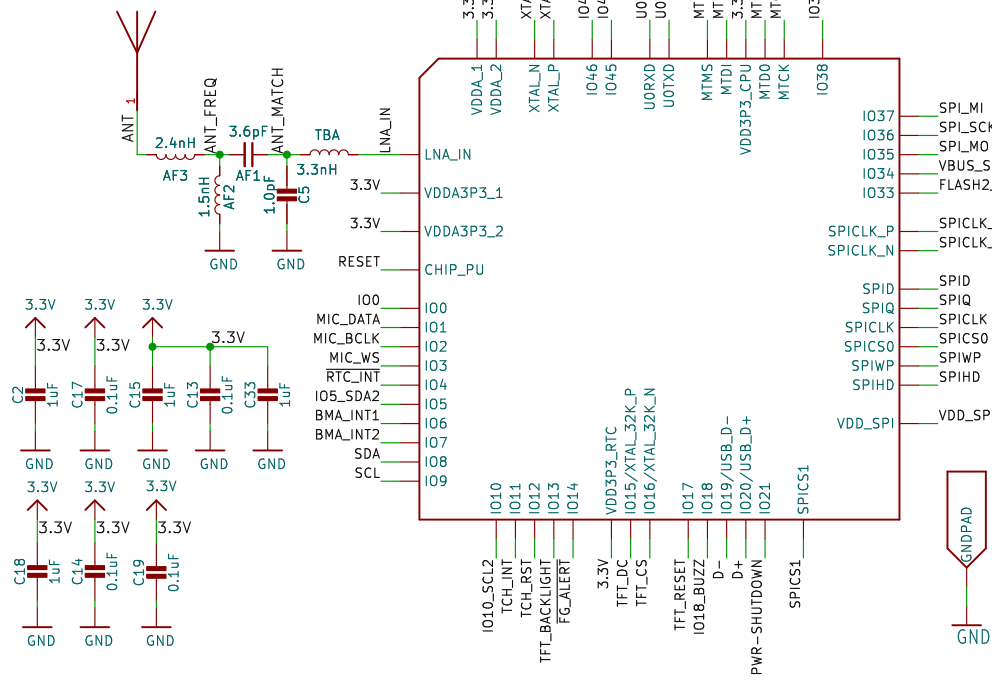
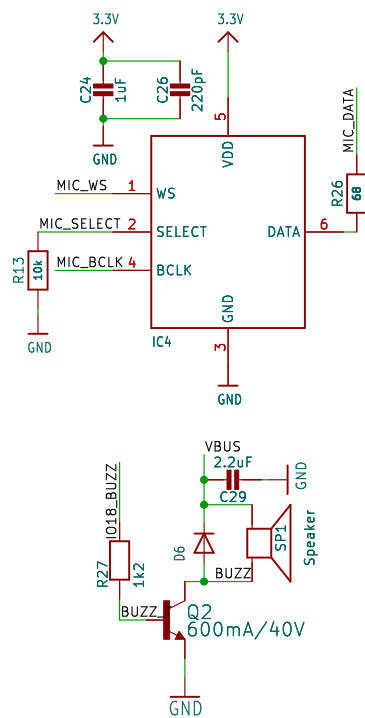


BATTERY & FUEL GAUGE



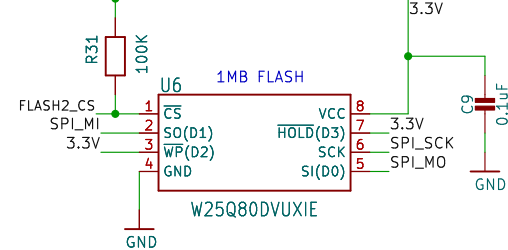
AUDIO

The diagram illustrates the AUDIO module's internal circuitry. At the top, a 3.3V supply is connected to the microphone input section. A 1μF capacitor (C24) and a 220pF capacitor (C26) are used for signal conditioning. The microphone input is connected to the WS pin of IC4. The SELECT pin of IC4 is connected to the MIC_SELECT signal. The BCLK pin of IC4 is connected to the MIC_BCLK signal. The DATA pin of IC4 is connected to the MIC_DATA signal. The IC4 is also connected to a 3.3V supply and GND. The output of IC4 is connected to a speaker (SP1) through a 600mA/40V MOSFET (Q2). A 1kΩ resistor (R27) is connected to the speaker. A 2.2μF capacitor (C29) is connected to the VBUS supply. A buzzer (BUZZ) is connected to the speaker output. A 10kΩ resistor (R13) is connected to the MIC_BCLK signal. A 10kΩ resistor (R26) is connected to the MIC_DATA signal.



USER FLASH

The diagram illustrates the connection of a 1MB FLASH chip (U6, W25Q80DVUXIE) to a 3.3V supply and ground. The chip is connected via a 100K resistor (R31) to the 3.3V supply. The chip's pins are labeled: 1 (CS), 2 (SPI_M), 3 (3.3V), 4 (GND), 5 (SCK), 6 (SCL), 7 (VCC), 8 (HOLD). A 0.1uF capacitor (C9) is connected between the 3.3V supply and ground.



BUTTONS

POWER

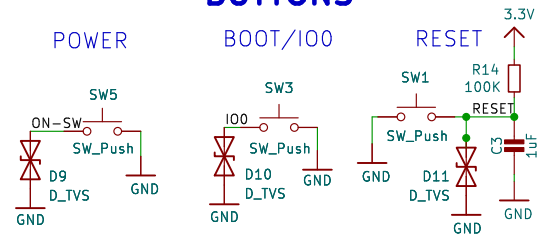
ON-SW SW5
D9 D_TVS
GND

BOOT/I/O0

100 SW3
D10 D_TVS
GND

RESET

SW1 R14 100K
RESET
SW_Push
D11 D_TVS
GND



SCREEN + TOUCH

TFT Backlight PWM control
Default is OFF so screen
is off when watch sleeps.

J3
Conn_01x18_Pin

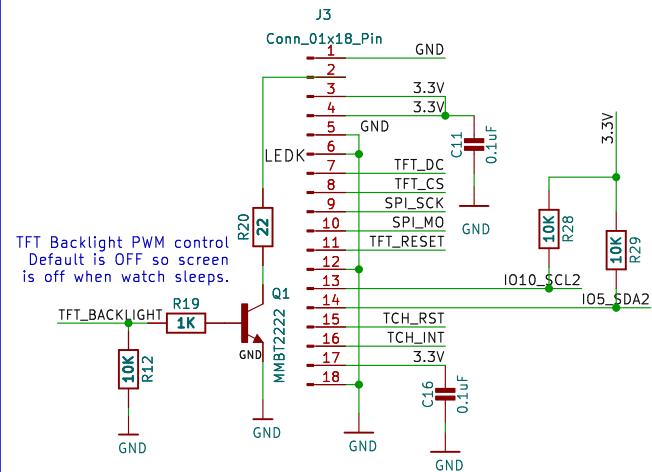
LEDK
TFT_DC
TFT_CS
SPL_SCK
SPI_M0
TFT_RESET
IO10
SCL2
IO5
SDA2
TCH_RST
TCH_INT

R12 10K
R19 1K
R20 22K
R28 10K
R29 10K

C11 0.1uF
C16 0.1uF

3.3V
GND

MMBT2222 Q1



Id: 1/1