3·3v

Joystick_Y

GND

3·3v

Joystick_X

GND

3·3v   3·3v

180   180

Backlight

DTC114EE

GND

Backlight (A6)
Button_2 (A5)
Button_1 (A4)

Joystick_Y (A2)
Joystick_X (A1)

GND
3·3v

Button_1 ⊳ GND

Button_2 ⊳ GND

Parts list:
- 1x STM32F109C8 Blue Pill
- 1x Joystick JH-D202X-R2/R4
- 2x Buttons with backlight
- 2x 180 Ohm resistor
- 1x DTC114EE transistor

* Optionally Boost Converter Module
  if LEDs are higher voltage rated