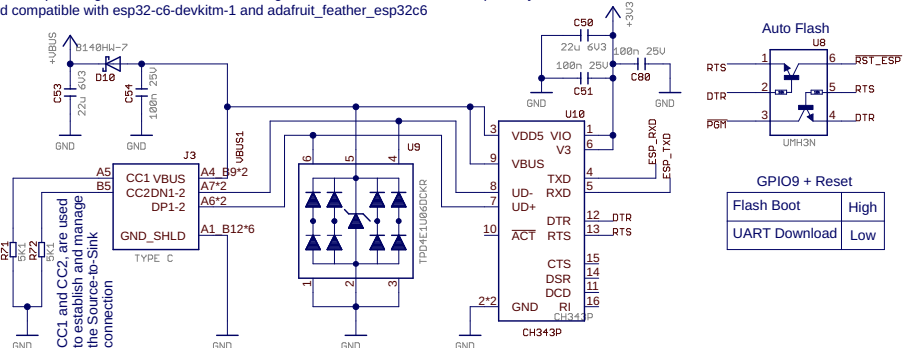
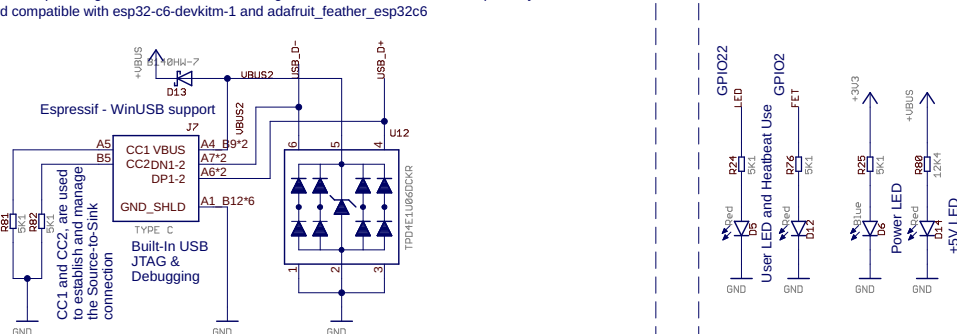


USB UART providing Arduino/PlatformIO Flashing ESP32-C6 DEV MODULE Compatibility
Board compatible with esp32-c6-devkitm-1 and adafruit_feather_esp32c6



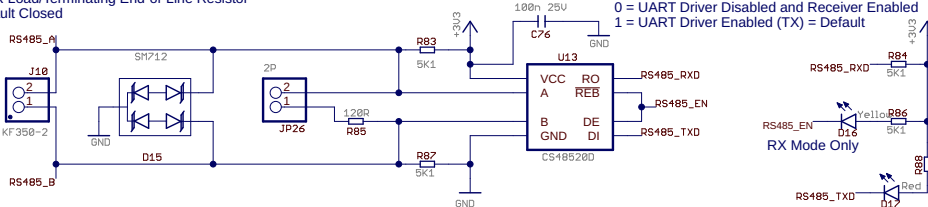
USB 1 | USB UART | Serial Monitoring | USB Flashing | Debug | ESD

USB UART providing Arduino/PlatformIO Flashing ESP32-C6 DEV MODULE Compatibility
Board compatible with esp32-c6-devkitm-1 and adafruit_feather_esp32c6

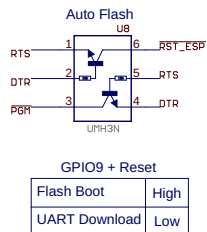


USB 2 | USB UART | Serial Monitoring | USB Flashing | Debug | ESD | JTAG

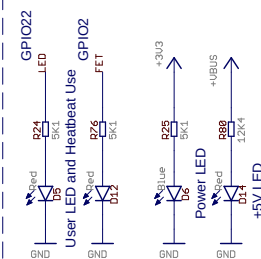
120R Load/Terminating End-of-Line Resistor
Default Closed



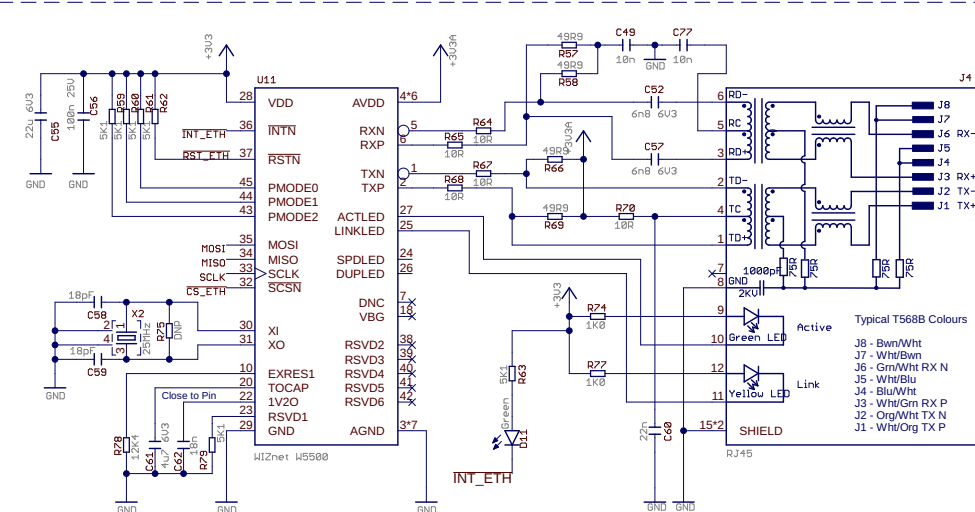
RS-485 | Asymmetrical TVS | EFT | ESD | EOL Load Termination



GPIO9 + Reset
Flash Boot High
UART Download Low



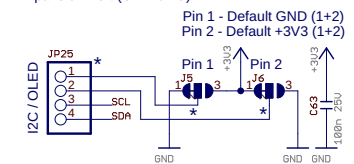
LED



Ethernet | WIZnet W5500

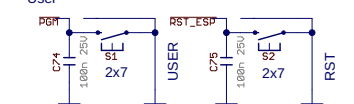
Current Max
W5500 132mA

Expansion Port (OLED/I2C) OLED Pin Configuration

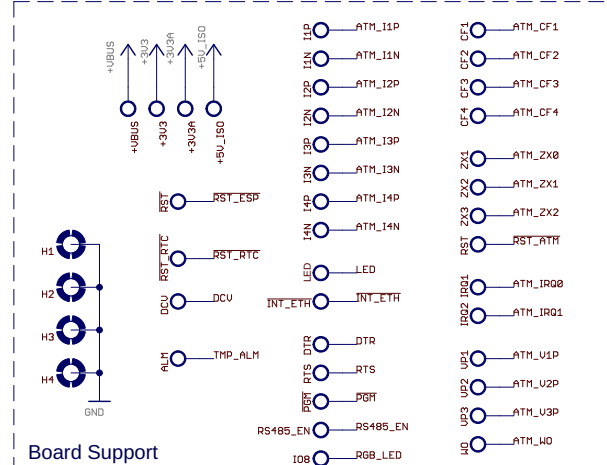


OLED | I2C

User Button is Dual Purpose
* Force PGM Mode
* User



Tactile Switches



Board Support

EPEM is a new ESP32-C6 Ethernet variant of the original popular IPEM ESP32 board.

For further information, please see our WIKI pages. [ditronix.net](https://www.ditronix.net)

EPEM is an IoT Power Energy Monitor. This schematic and PCB serves ATM90E36 variant.



Production Release 90E36

(C)2018-2025 Ditronix | Dave Williams | G8PUO



EPEM SDK Board
[ditronix.net](https://www.ditronix.net)
Ditronix Ltd - UK

EPEM ESP32-C6 ATM90E36 1.2509.103		
ATM90E36-ETHERNET-IOT-POWER-ENERGY-MONITOR-BOARD-(P2)		
Sheet: 2/2	Drug/Chk: Dave Williams	19/09/2025 17:21