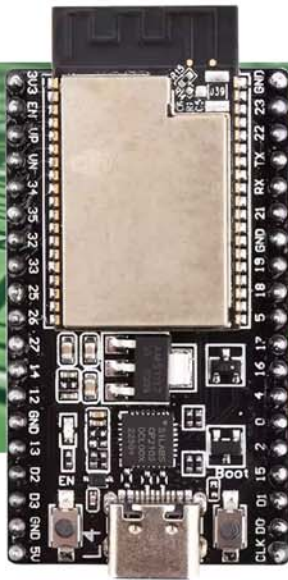


ESP32 DEVELOPMENT BOARD BUILT-IN ANTENNA + SMD 38 PINS HEADER, 8 MB FLASH, DRIVER CP2102, USB-C CONNECTOR



ESP32-DEV-38VE

Introduction :

This development board is equipped with a module based on the LX6 dual-core 32-bit ESP32 microcontroller (4 MB Flash + 8 MB PSRAM), integrating 802.11 b/g/n Wi-Fi and Bluetooth 4.2 communication functions into a single component. The board has 38 pins and incorporates a CP2102 converter, enabling programming via a USB-C connector. It also features a CMS output for connecting an external wired antenna to achieve higher Wi-Fi and Bluetooth signal strength. A power indicator (red LED) and a status indicator (blue LED) are present, along with two micro-buttons to perform a RESET or enter programming mode.

There are numerous Arduino applications available for the ESP32, and the 2.54mm-pitch pins on both sides of the board allow developers to easily connect it to another development board or prototype. This board, based on the ESP32 micro-processor, enables a wide range of wireless applications that combine speed with low power consumption, whether using Wi-Fi, Bluetooth or Zigbee, all integrated into a single component. It can be used to manage wireless sensors, transmit data, music or images in real time, communicate with a router or a mobile phone, or for any other industrial applications.

Technical specifications :

Module: ESP-32VB/VE.

Memory: 4 Mbits Flash + 8 Mbits PSRAM.

Clock frequency: Adjustable from 80 MHz to 240 MHz.

Supported interfaces: UART / GPIO / ADC / DAC / SDIO / PWM / I2C / I2S.

Supports STA / AP / STA+AP modes.

Data rate: 150 Mbps max.

Power supply: 5.0 Vdc (USB-C) or 5.0 Vdc / 3.3 Vdc (pins).

Driver: CP2102.

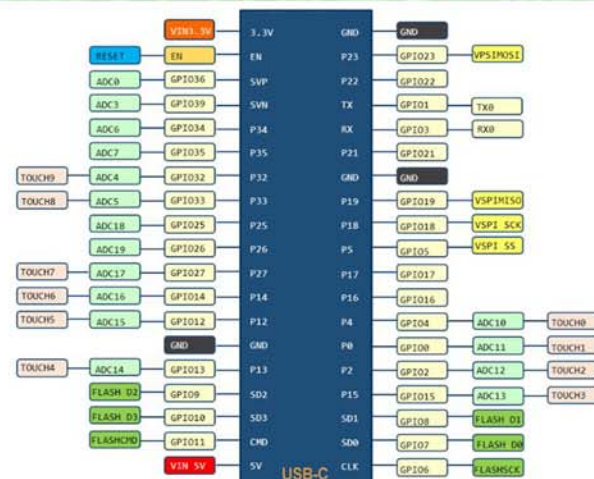
Wi-Fi transmission: 802.11 b/g/n from 2.412 GHz to 2.484 GHz.

Bluetooth transmission: compatible with 4.2 BR/EDR and BLE standards.

Gain with antenna: 20 dBi (TX) and -98 dBm max (RX).

Operating temperatures: -40°C to +85°C. Humidity: <90%.

Board dimensions: 48 x 28 x 15 mm (38 pins). Weight: 10 g.



Items included :

Development board compatible with the ESP32-DevKitC-VB.

Available for download online:

- Arduino or Raspberry Pi IDE software for the ESP32.
- Espressif ESP32-WROVER-E compatible module datasheet.

