1. Why do we need to update the firmware

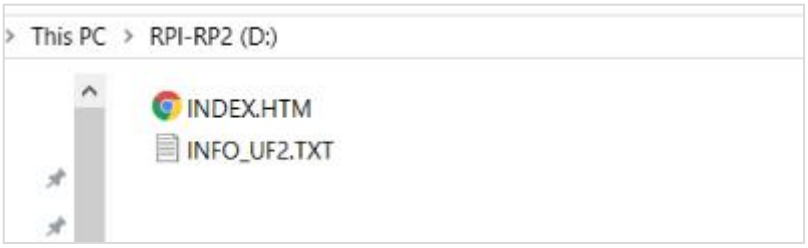
Raspberry Pi Pico can be programmed in C language and MicroPython language, and Pico does not have MicroPython firmware when it leaves the factory, it is necessary to download MicroPython firmware before using MicroPython programming.

Note: The firmware of MicroPython only needs to be downloaded once, and there is no need to download it again when using MicroPython to program. If you have downloaded the .uf2 program firmware programmed in C language, the MicroPython firmware will be overwritten. Next time you want to use MicroPython, you need to follow the steps below to update the Pico firmware.

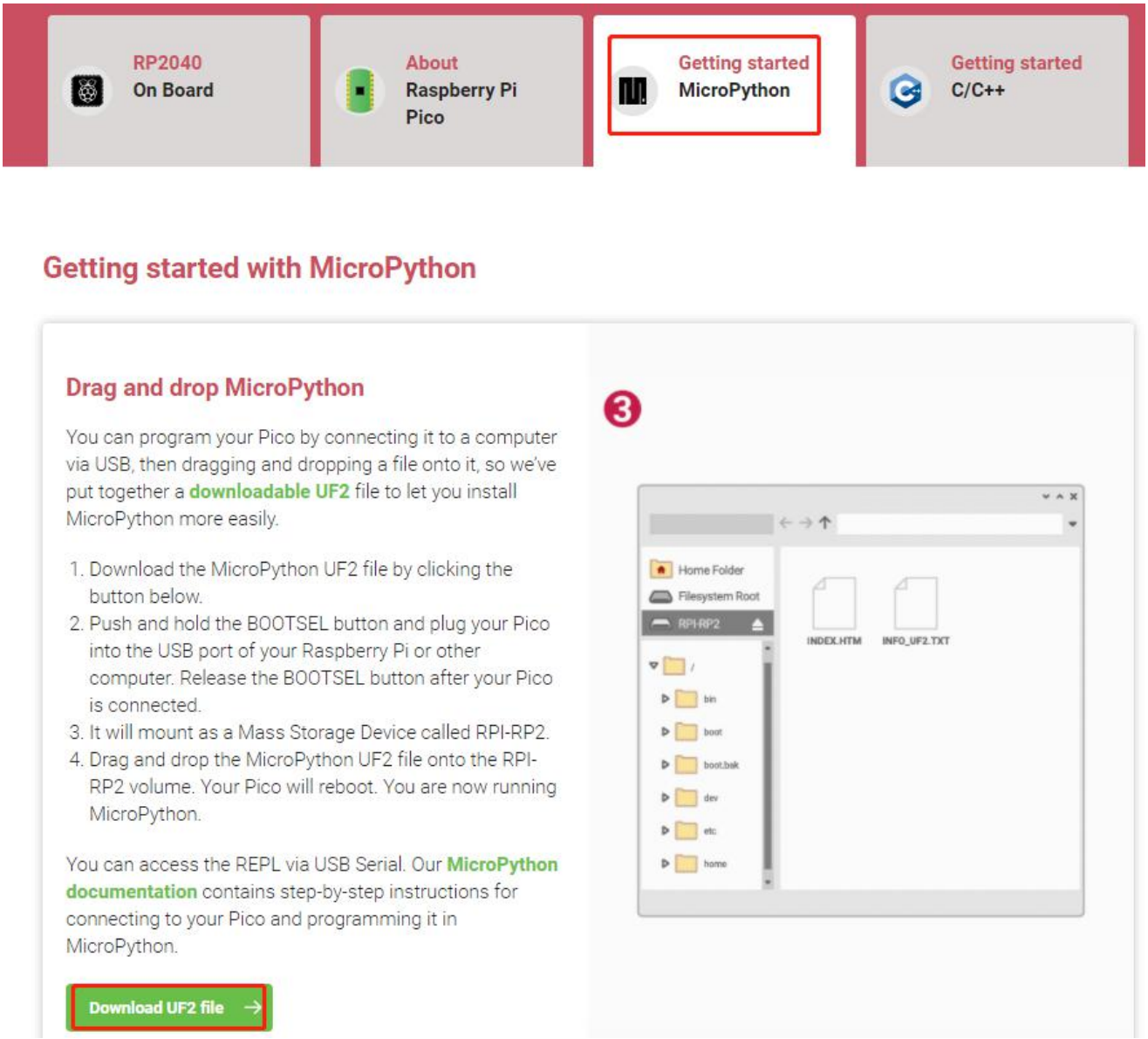
2. Steps of writing MicroPython firmware

① Press and hold the "BOOTSEL" button on the Raspberry Pi Pico board. Then, connect the Pico board to the computer through the MicroUSB cable. Next, release the button. Open the **[Device manager]** on your computer, and the computer will automatically recognize a removable disk (RPI-RP2), as shown below.

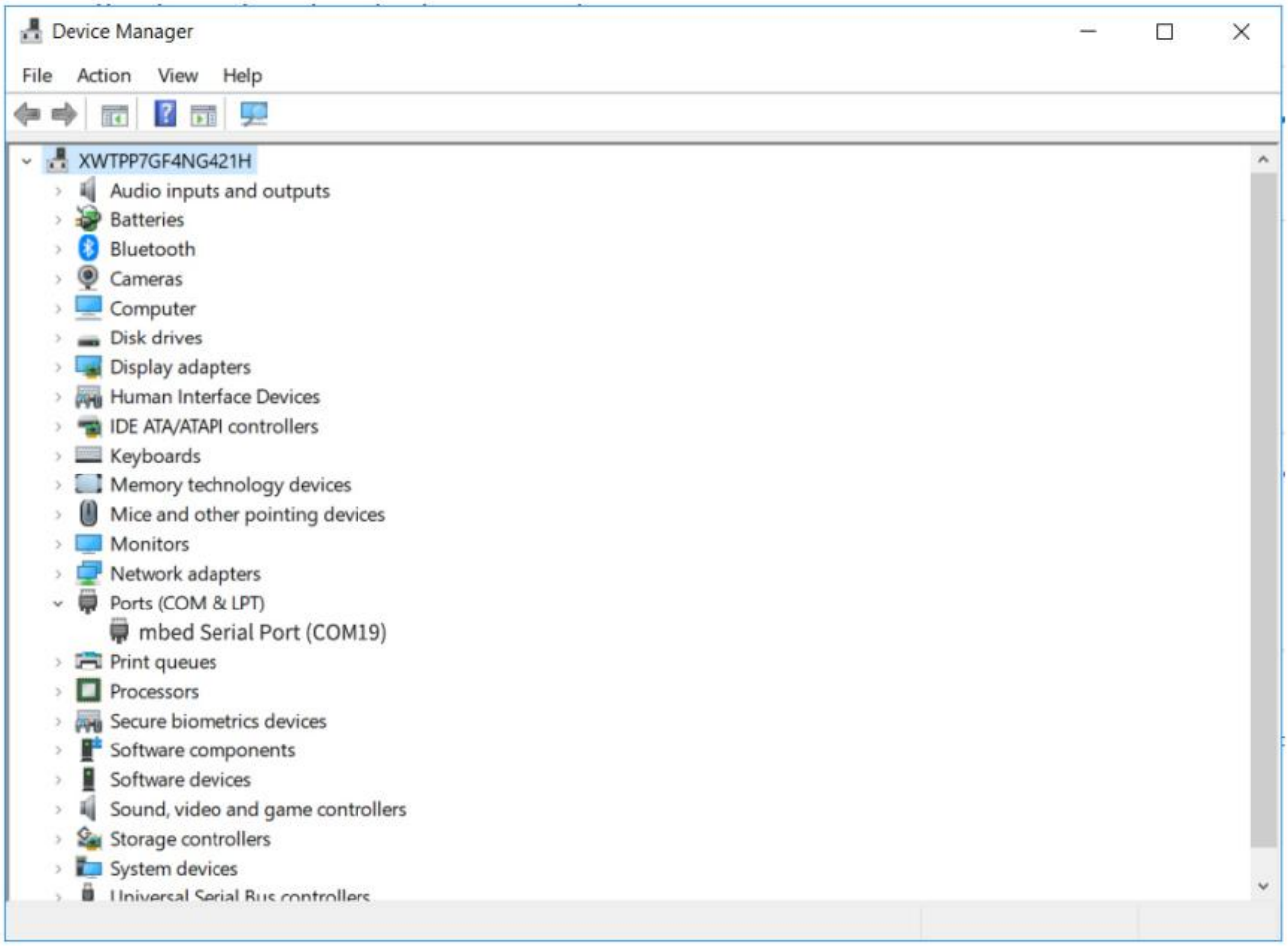
② Open the RPI-RP2 drive letter, we can see that there are two files. Double-click the "INDEX.HTM" file to open the Pico webpage of the Raspberry Pi website.



③ Select Getting started MicroPython, and then click to download the UF2 file.



④After the download is complete, we can get a file (***.uf2 format). Copy this .uf2 firmware to the drive letter of the RPI-RP2. After the copy is complete, the Pico board will automatically restart, and the Pico will be recognized by the computer as a virtual serial port. As shown below.


Device Manager
File Action View Help
XWTPP7GF4NG421H
Audio inputs and outputs
Batteries
Bluetooth
Cameras
Computer
Disk drives
Display adapters
Human Interface Devices
IDE ATA/ATAPI controllers
Keyboards
Memory technology devices
Mice and other pointing devices
Monitors
Network adapters
Ports (COM & LPT)
mbed Serial Port (COM19)
Print queues
Processors
Secure biometrics devices
Software components
Software devices
Sound, video and game controllers
Storage controllers
System devices