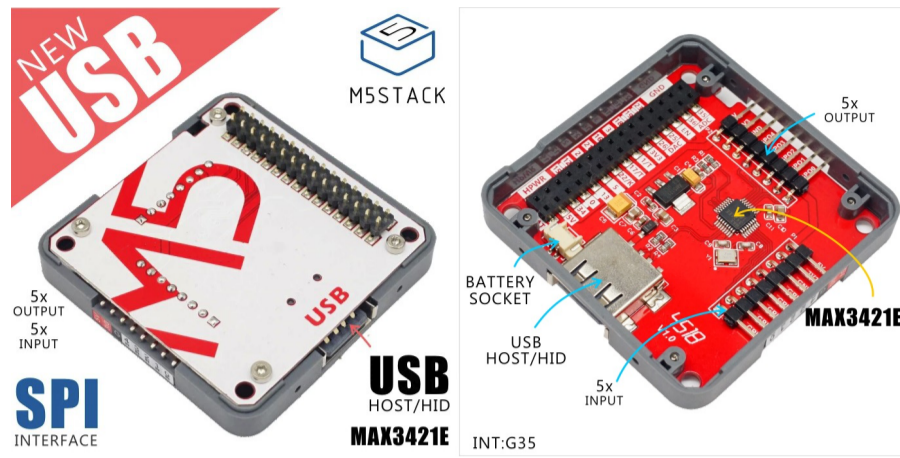


Module USB



Description

USB is a USB driver module, integrated **MAX3421E** which adds USB host or peripheral capability to any system with an SPI interface. Ever up for adding the standard USB features on your project? this M5 module is the perfect solution.

Series Protocol: SPI

Product Features

- 1x UAB stadard A port
- 10x extended GPIO pins
- extended 3v3, 5v & GND
- Product Size: 54.2mm x 54.2mm x 12.8mm
- Product weight: 14.5g

Including

- 1x M5Stack USB Module

Applications

- USB keylogger
- Read and write U disk using M5Core

EasyLoader



1. EasyLoader is a simple and fast program burner. Every product page in EasyLoader provides a product-related case program. It can be burned to the master through simple steps, and a series of function verification can be performed. (**Currently EasyLoader is only available for Windows OS**)

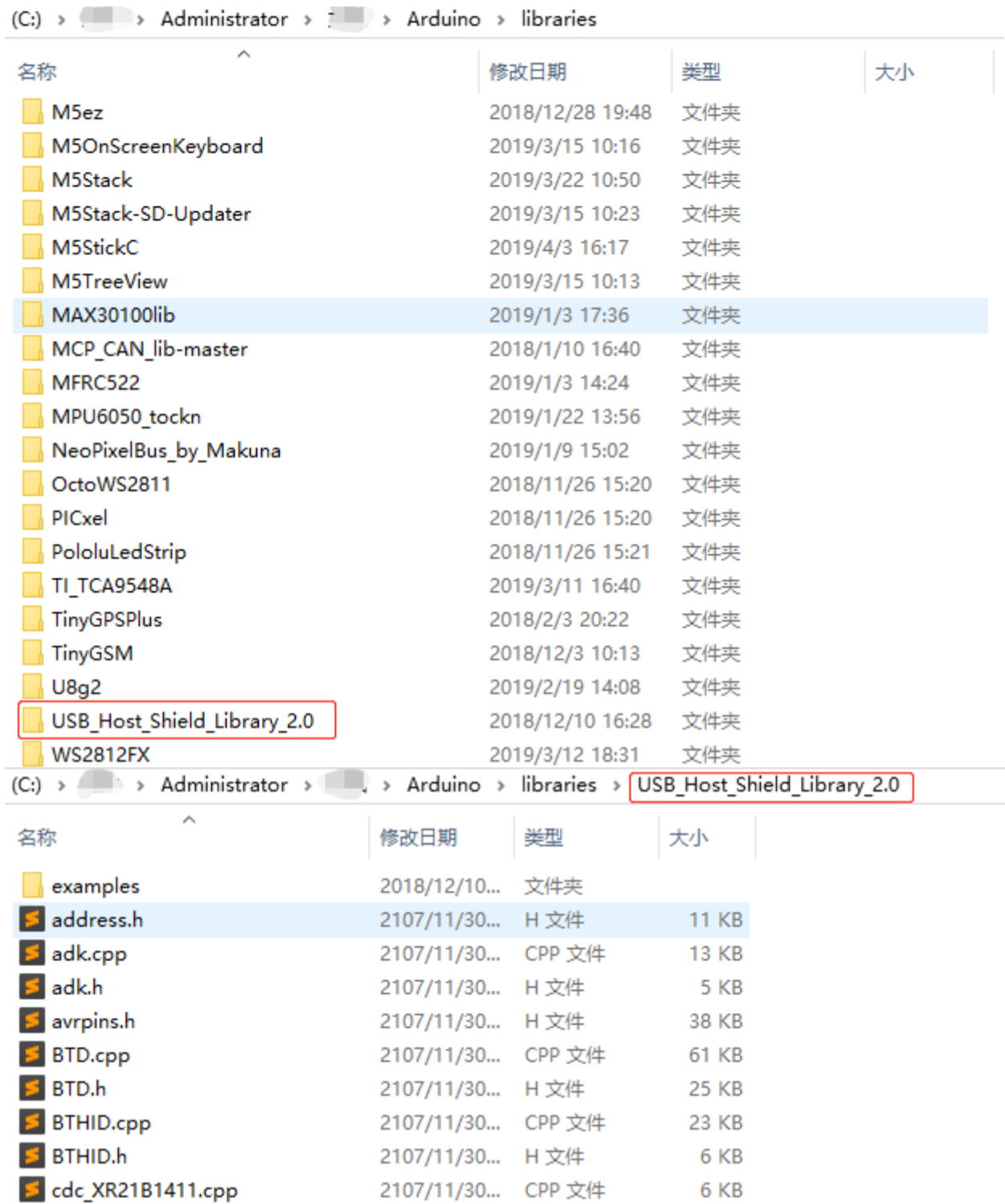
2. After downloading the software, double-click to run the application, connect the M5 device to the computer via the data cable, select the port parameters, and click "**Burn**" to start burning.

3. The CP210X (USB driver) needs to be installed before the EasyLoader is burned.

Example

NOTE:

Before compile this example code, you need to download the corresponding USB library from [here](#). Unzip and copy this library folder to Arduino library path. (This is my path C:\Users\\Documents\Arduino\libraries)



Download the example `usb_mouse.ino`

Plug the USB mouse into USB A port.

- Hold down the left button to draw white lines.
- Hold down the right button to draw green line.
- Press the middle wheel button to clear the screen.

```

#include <M5Stack.h>
#include <SPI.h>
#include <Usb.h>
#include <hiduniversal.h>
#include <hidboot.h>
#include <usbhub.h>
#include "M5Mouse.h"

// new objects
USB Usb;
USBHub Hub(&Usb);
HIDBoot<USB_HID_PROTOCOL_MOUSE> HidMouse(&Usb);
MouseRptParser Prs;

// initialization
M5.begin();
Usb.Init();
HidMouse.SetReportParser(0, (HIDReportParser*)&Prs);

// handle event coming from usb device
Usb.Task();
if(Usb.getUsbTaskState() == USB_STATE_RUNNING)
{
    Mouse_Pointer(mou_px, mou_py);
    mou_px = 0;
    mou_py = 0;
    /* left button pressed: draw white point */
    if (mou_button == 1)
        M5.Lcd.drawCircle(StaPotX, StaPotY, 1, WHITE);
    /* right button pressed: draw green point */
    if (mou_button == 2)
        M5.Lcd.drawCircle(StaPotX, StaPotY, 1, GREEN);
    /* middle button pressed: clear screen */
    if (mou_button == 4)
        M5.Lcd.fillScreen(BLACK);
}

```



Schematic

