# AiPi-CAM-D200 Firmware User Guide

#### 1. Firmware burning

#### (1) Serial port wiring

TTL Tool	AiPi-CAM-D200
3.3V	VCC
TXD	RX
RXD	ТХ
GND	GND

#### (2)AiPi-Cam-Floor installation diagram



After the installation is complete, burning and debugging only requires a Type-C to connect to the USB.

## (3)Burning

Tool for burning : <u>click to download the tool for burning</u>

Firmware address: Click to download the firmware

After the burning tool starts burning, first press and hold the "download button (S1)" and then press and release the "reset button (S2)" to enter the burning mode. The operation steps of the burning tool are as follows:

T Bouffalo Jab Dev Oube 183 - Bi616/618				-	пх	
Eile View Help						
/ IOT / MCU / MFG						
Firmware Options			Basic Options			
partition table		Browse	Interface U	Jart	•	
aes-encrypt key (16 bytes)	iv (16 bytes)		Port/SN	COM35	*	
ecc-signature public key	Browse private key	Browse	Uart Rate 2	000000		
Single Download Options			JLink Rate	000		
✓ Enable 0x0	U	Browse				
	2 选择(OM 口					
choose COM port			ear			
	t + Haldr			Log		
1. 点击刷新			Open Uart			
	click to reflash					
		3. 点击烧录				
	0% click to burn					

### 2. Usage steps

## (1) Connect with DVP Camera



## Specific steps

- (1) Use AT commands to connect to WiFi and obtain IP address
  - ① Serial port connection (the baseboard user can directly connect to Type-C)

TTL tool	AiPi-CAM-D200
3.3V	VCC
TXD	RX
RXD	тх
GND	GND

② Select the corresponding port, baud rate 2000000

- ③ Enter AT+WJAP=SSID,PASSWORD, connect to the router, and wait for the IP to be obtained.
- ④ ou can manually enter AT+WJAP? to view the IP address.

start dhoping wpa_supplicant_otrl_iface_msg_ob: cm. GROUP_HANDSHAKE -> COMPLETED	l send succeded, txt is State###
[18:11:08.294]收← ◆ IP:192.168.0.10 MASK: 255.255.255.0 Gateway: 192.168.0.1	
[18:11:08.959]收★ ◆{FVIF-0} ip=I4 gv [0] wl1: MAC=b4:c2:e0:41:9a:d5 ip=192	v=I4bl618_wifi_got_ip_process 2.168.0.101/24_UP,CONNECTED
[18:11:11.271]收←◆accept start	
[18:11:14.840]发- ◆AT+WJAP? □ [18:11:15.062]收+ ◆192.168.0.101 0K	
<b>清除窗口</b> 打开文件	发送文件 停止 清
端口号 COM14 USB-SERIAL CH340 💌	□□ HEX显示 保存数据 □ 接收数据到文件 □ HEX
● 关闭串口 ♂ 更多串口设置	✓ 加时间戳和分包显示, 超时时间: 20 ms 第1 号
□ RTS I DTR 波特率: 2000000 -	AT +WJAP?

- (2) View Camera Data
  - ① Open the browser and enter the IP address you obtained earlier.
  - ② Click Start Stream to see if there is a camera image, as shown below:



#### (3)Flash and photo function

When the module is inserted into the SD card, it supports the photo taking function. Press the S2 button to store the taken pictures in the SD card. The pictures are named with numbers and counted from 0.

[10:13:06.606]收←◆Write Succeed! photo cnt:0 Write data size:97096 Byte, written size:4936 B [10:13:11.567]收←◆Write Succeed! photo cnt:1 Write data size:143032 Byte, written size:9912 B [10:13:12.992]收←◆Write Succeed! photo cnt:2 Write data size:138961 Byte, written size:5841 B [10:13:14.593]收←◆Write Succeed! photo cnt:3 Write data size:101357 Byte, written size:9197 B [10:13:15.443]收←◆Write Succeed! photo cnt:4 Write data size:126688 Byte, written size:3808 B

Remove the SD card from the module and use a card reader to read the contents of the SD card. You can see that the images have been stored in the SD card.



The effect pictures taken:



② Press and hold the S2 button for 2 seconds or input AT+LED=1 to enable the flash function. Press and hold the S2 button for 2 seconds again or input AT+LED=0 to disable the flash function.



