



FLYWOO Hexplorer LR4 Analog Drone Instruction Manual

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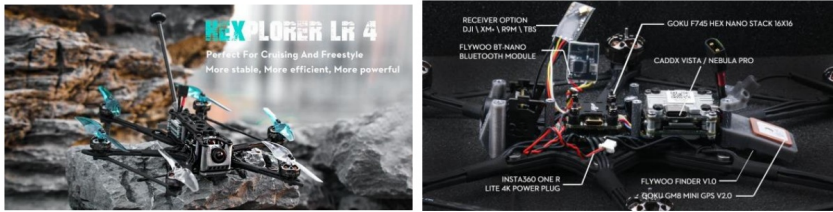


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Drone introduction

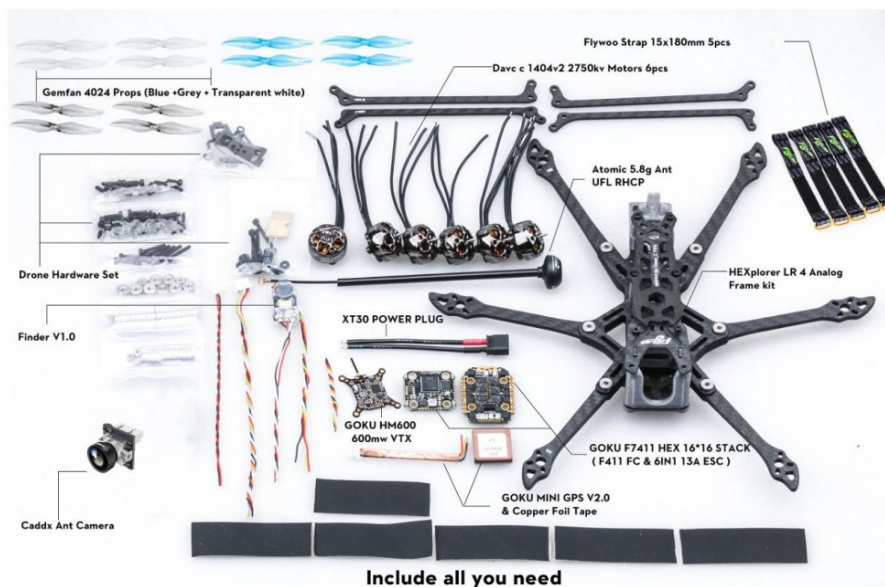
As we said before, we will explore more fun with Dave_C in the new field of #micro long range. We did it! After the success of Explorer LR 4, everyone has many new needs. For example: I hope it can carry a full-size gopro! I hope it is perfect for freestyle and cruising! I hope it has Bluetooth function! We are proud to announce that Hexplorer Hexa-copter is finally here. Continue to develop new products to meet the needs of more users.



The Flywoo Explorer made a new class of quads mainstream: Micro Long Range! These quads are a compact, sub 250g 4" platform that will still allow you an impressive range and flight times of over 30 minutes on Lithium-Ion packs. Next to these 4" platforms we do see more and more light 5" quads geared towards long flight times. They are usually over 250g but overall faster and capable of carrying heavy loads like full GoPros – Something I wouldn't recommend on 4" where a naked GoPro is a much better choice. Instead of moving up to a bigger prop size for these increased payloads, Flywoo applied some really cool out of the box thinking and created the HEXplorer! Six 4" props have indeed almost the exact same disc area a 5" quad has. Disc load and therefore the overall noise level gets reduced a lot compared to the Explorer when you carry a heavy 4S Li-Ion and a GoPro, while power and freestyle capabilities are increased on lighter packs.

So to summarize things: If you want super long flight times and range while staying sub 250g – Get the Explorer! If you want the smallest and quietest platform to be able to carry a full GoPro while still having good flight times and performance – Get the Hex! “ —Dave_

Configuration and wiring diagram description



HEXplorer LR 4 Vista / Nebula pro BNF Specification :

- Goku F411 hex nano stack 16×16
- Dave_C & Nin 1404 V2 2750kv motors
- Goku M8N mini gps v2.0
- Flywoo Finder v1.0
- Flywoo Bt-nano Bluetooth module
- Gemfan 4024 props

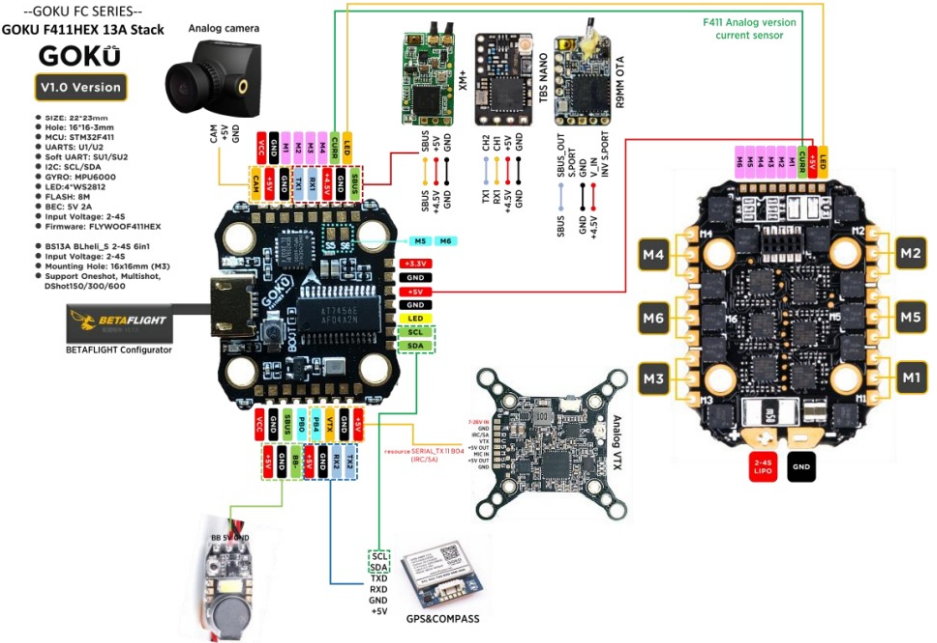
- Atomic 5.8 G antenna RHCP
- Camera: CADDX ANT
- VTX: FLYWOO HM600

Recommend Battery:

Naked Gopro & SMO 4K & Insta360 go —Explorer 18650 Gopro 5/6/7/8 & Insta360 One R — Tattu 1050 4s mah or 850 4s mah

Highlights & Specification

Equipped with GOKU HEX F411 16X16 NANO STACK, and NIN 1404 v2 2750kv, support 4s battery. Use powerful STM32F411 chip,5V/2A BEC, black box, WS2812LED support 2 complete hardware, 1 serial ports, I2C and other functions are all open ! Enough to meet all FPV needs.

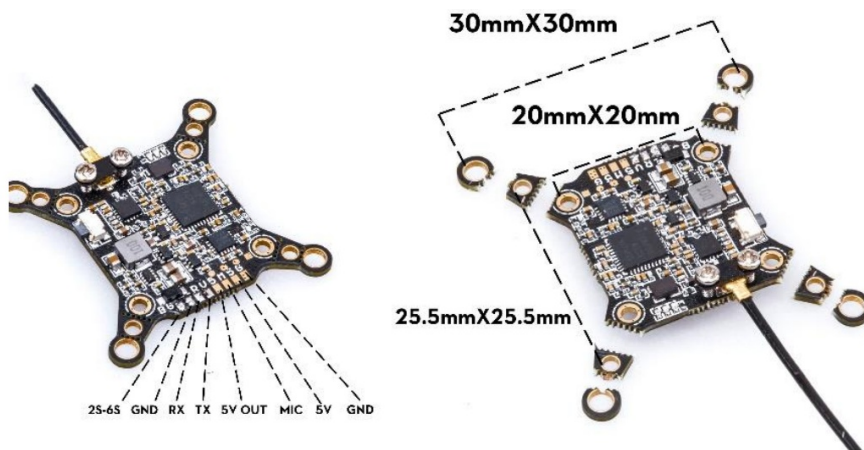


Identifier	Configuration/MSP	Serial Rx	Telemetry Output		Sensor Input		Peripherals	
USB VCP	<input checked="" type="checkbox"/> 115200	<input type="checkbox"/>	Disabled	AUTO	Disabled	AUTO	Disabled	AUTO
UART1	<input type="checkbox"/> 115200	<input checked="" type="checkbox"/>	Disabled	AUTO	Disabled	AUTO	Disabled	AUTO
UART2	<input type="checkbox"/> 115200	<input type="checkbox"/>	Disabled	AUTO	GPS	9600	Disabled	AUTO
SOFTSERIAL1	<input type="checkbox"/> 115200	<input type="checkbox"/>	Disabled	AUTO	Disabled	AUTO	VTX (IRC Tran	AUTO

RX IN (SBUS/CRSF)
GPS Serial Port
VTX IRC/SA

SOFTSERIAL1 TX is mapped to PIN B04
CLI: RESOURCE SERIAL_TX 11 B04

UART1: TBS/R9M/XM+/DSMX/SBUS receiver
UART2: GPS module, the default baud rate is 9600
SOFTSERIAL1: VTX IRC/SA Control

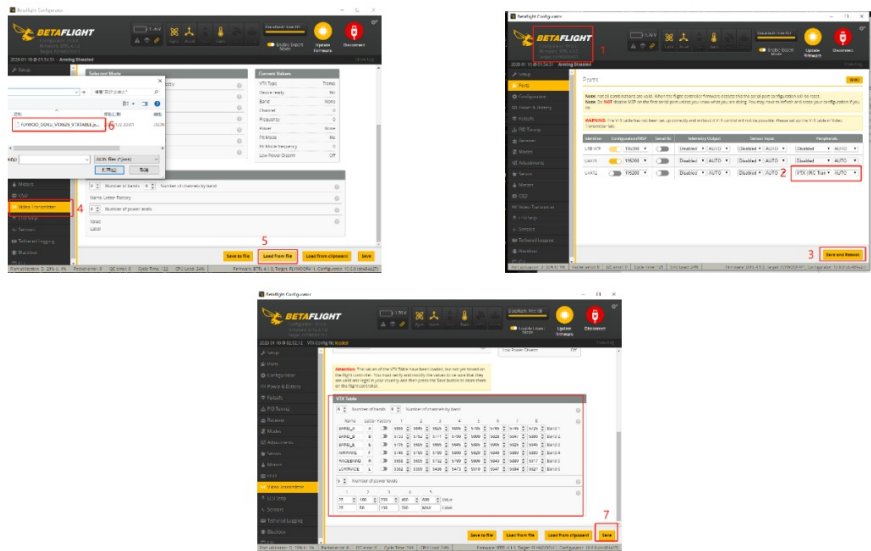


FR/CH	CH1	CH2	CH3	CH4	CH5	CH6	CH7	CH8
A	5865	5845	5825	5805	5785	5765	5745	5725
b	5733	5752	5771	5790	5809	5828	5847	5866
E	5705	5685	5665	5645	5885	5905	5925	5945
F	5740	5760	5780	5800	5820	5840	5860	5880
r	5658	5695	5732	5769	5806	5843	5880	5917

The selections in XXXX requires HAM license to operate .legally. Selections are only available on special request.

- Button function
- FR (blue light), short press the button, the blue light flashing times represent CH1-CH8
- CH (yellow light), long press the button 2S until the yellow light flashes, and then press the button shortly, the number of flashes of the yellow light represents A-r
- PW (power), long press the button 6S until the red light flashes, and then press the button shortly, the number of flashes of the red light represents 5 levels of power
- **Betaflight osd IRC function FLYWOOGOKU_HM600_VTXTABLE.json**

<https://flywoo.net/pages/manual>



Receiver binding

TBS NANO 915:

When the USB is connected, the green light of the receiver flashes, and then bind according to the picture

operation.

https://www.youtube.com/watch?v=iNkVcOLITM&ab_channel=Danimal3D



R9MM FCC ACCESS OTA:

Make sure your remote control supports ACCESS protocol, then follow the link to register and bind

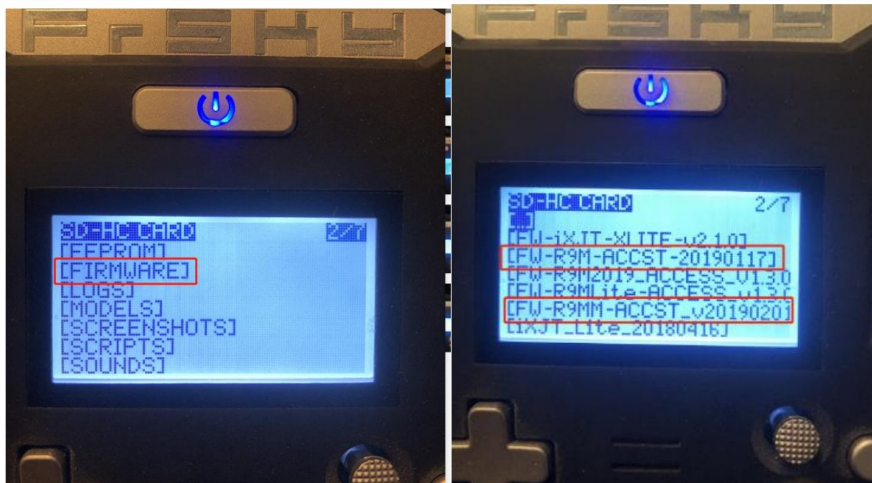
https://www.youtube.com/watch?v=az5hDdNBcjg&t=9s&ab_channel=FrSkyRC

If the remote control is ACCST protocol, please bind as follows:

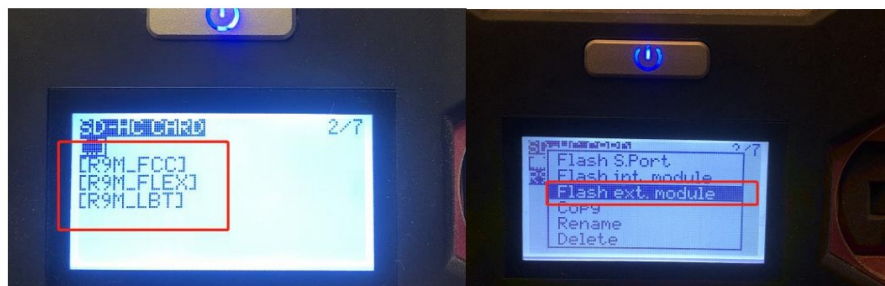
1. Put these two files into the firmware directory of the SD card of the remote control.

R9MM firmware: FW-R9MM-ACCST_v20190201

R9M TX module: FW-R9M-ACCST-20190117



2. Insert the R9M TX module and write the firmware you need

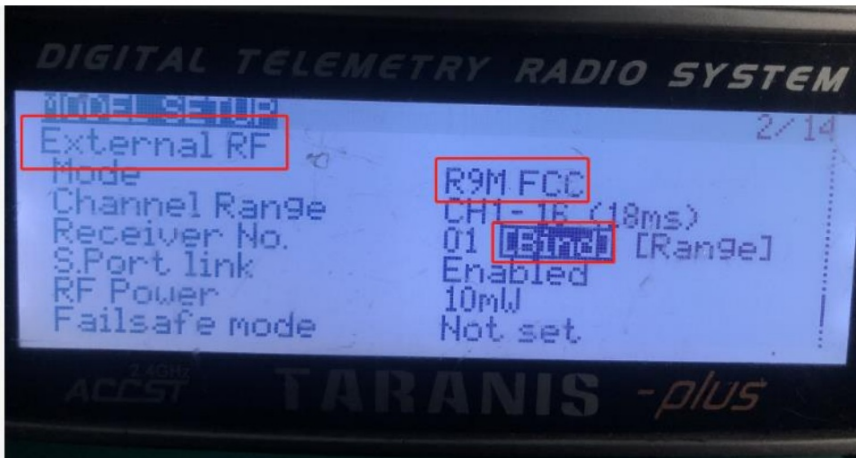


3. To write the firmware of the R9MM receiver, you need to remove the R9MM receiver, and then write the firmware by connecting to the S.PORT port.



4. After both R9M TX and R9MM RX are written into the ACCST firmware.

1. Press and hold the button of RX, power on, the red and green lights are always on.
2. Then after R9MM selects binding, RX red light flashes, and then exit
3. RX is powered on again, and only a green light is displayed, indicating that the binding is successful.

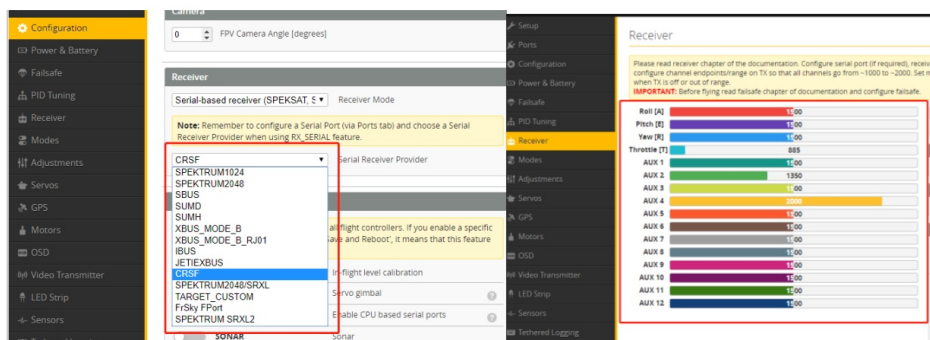


XM+ receiver:

1. Press the XM+ receiver button, USB power supply, the red and green lights are always on
2. The remote control turns on the binding mode, the green light flashes to indicate successful binding, turn off and restart

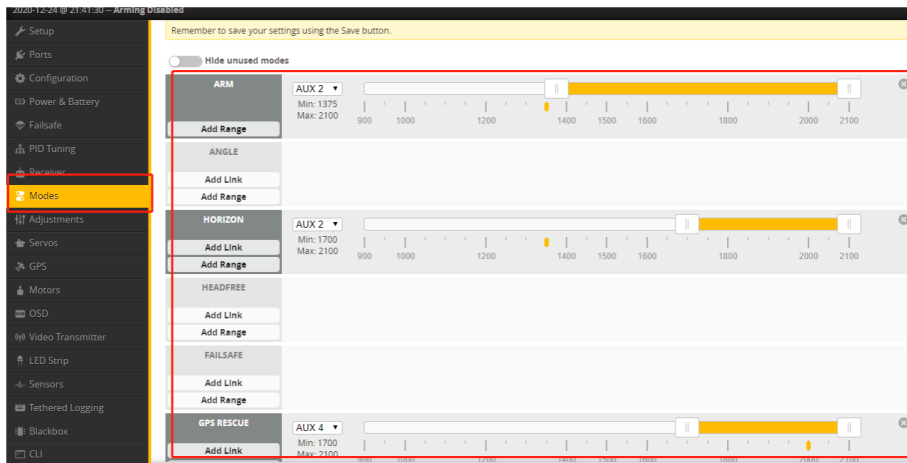


3. Then set the corresponding serial port and receiver protocol to ensure the normal output of each channel of the receiver.



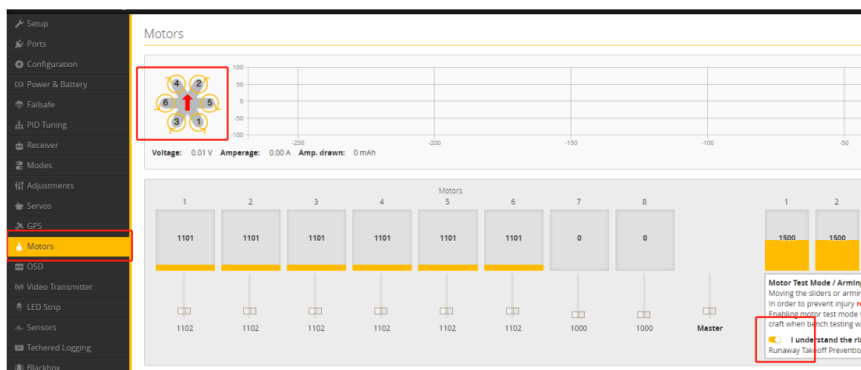
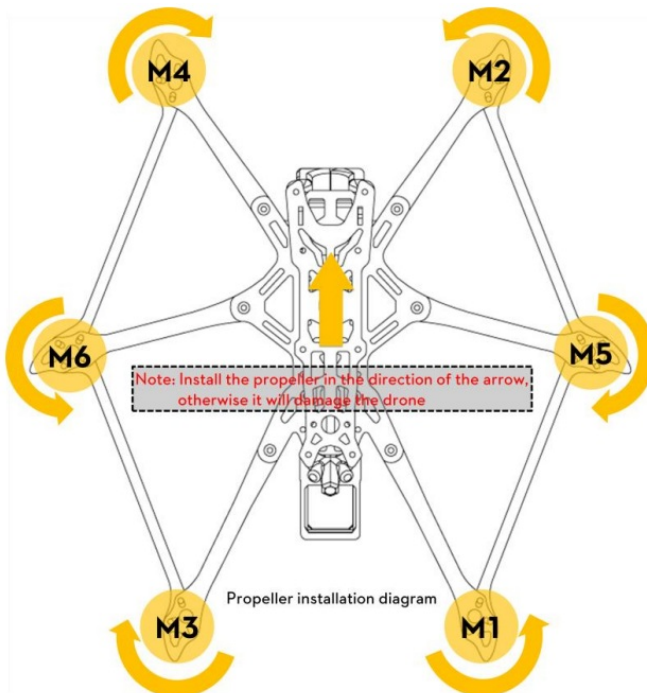
Mode setting

Set the ARM switch and flight mode switch, AUX* corresponds to the remote control switch, and the yellow area mark is turned on.



Motor test

Unload the propeller, test the rotation direction of the motor, turn on the safety switch, and test the rotation of the motors one by one.

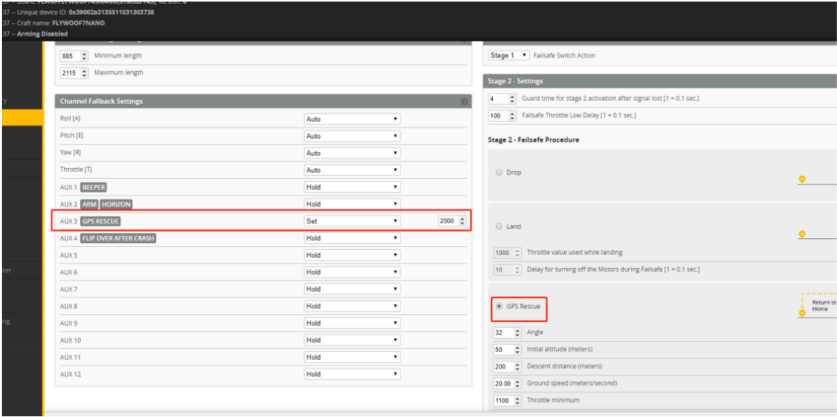


GPS rescue mode

1. When GPS finds 5 satellites and locks, it will display latitude /longitude /altitude /distance information.
2. GPS rescue can only be turned on when the flight distance data exceeds 100 meters, otherwise it will fall

directly.

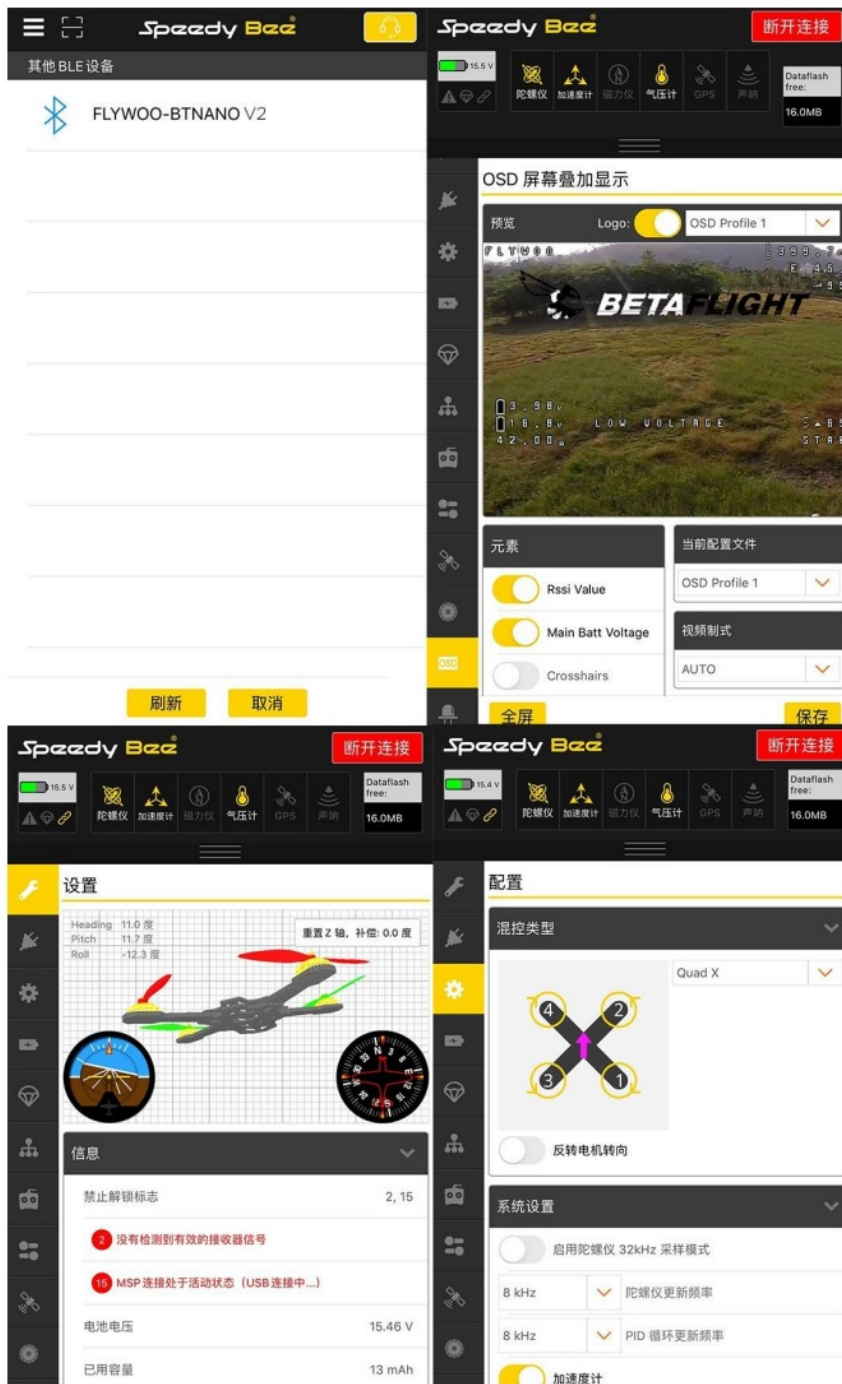
3. After the GPS rescue is turned on, DRONE will turn around and rise gradually and return to the home location.
4. DRONE will not automatically land. When the control is restored, you need to control DRONE to land.



Bluetooth function

Betaflight App





Finder BUZZER function



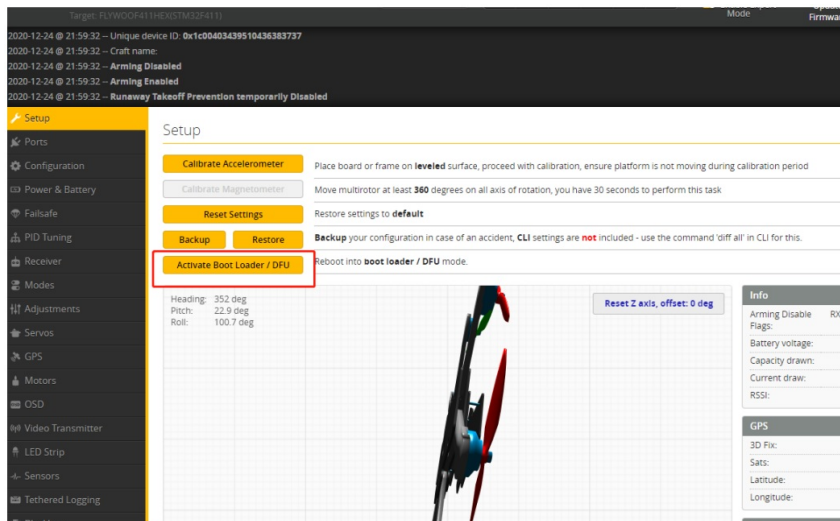
The buzzer has two modes of operation:

1. It is compatible with the functions of the traditional active buzzer and synchronized with the flight control.
2. When the flight control is normally connected, if the main battery in the flight is powered off, it can still automatically emit 100 dB of drip sound after 30 seconds of power failure, and the LED will emit white light.

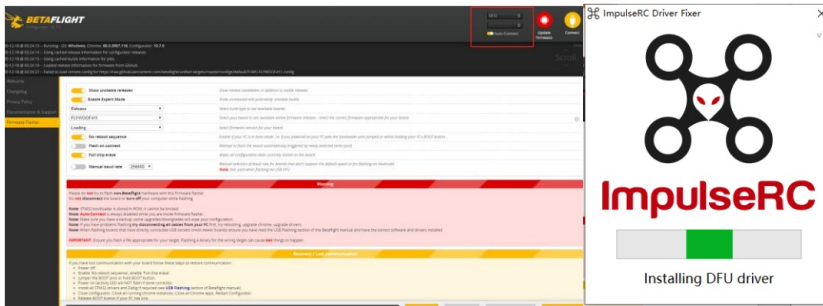
To turn off the buzzer: Press and hold the release button for more than 2 seconds, the Finder V1.0 turns off the sound.

Flight firmware upgrade and write default CLI

1. Activate DFU mode



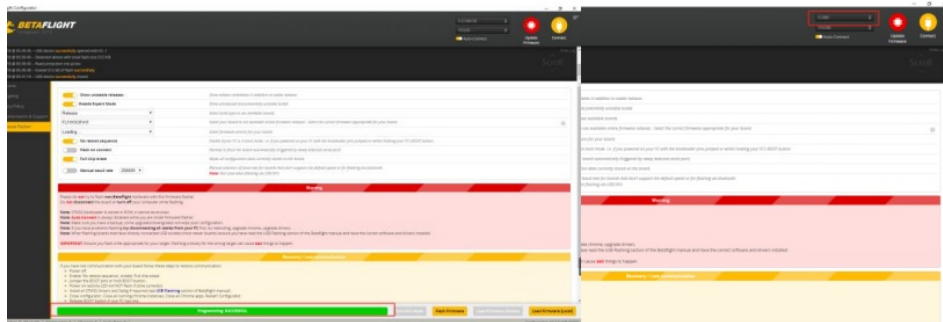
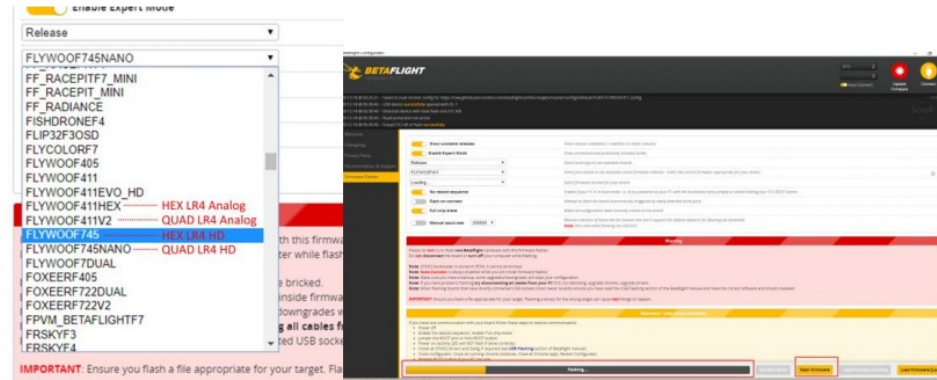
2. BF Configurator will display to enter DFU mode. If it does not enter DFU mode, it may be that the driver is not installed. The driver can be installed using IMPULSE RC software



Driver software:

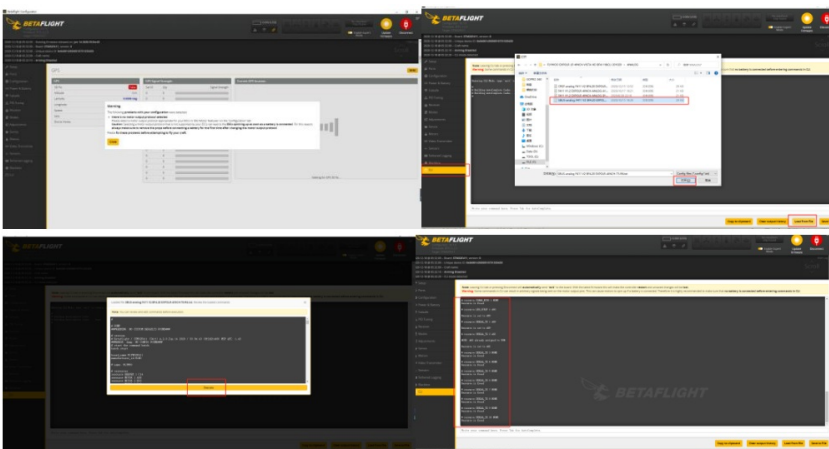
https://impulserc.blob.core.windows.net/utilities/ImpulseRC_Driver_Fixer.exe

- Then load the local HEX firmware and wait for the flashing to complete. A green progress bar is displayed to indicate completion, and DFU will become a COM port



- After the connection is entered, it is a blank interface, you need to write CLI commands, Factory CLI LINK:

<https://flywoo.net/pages/manual>



- If the command is not restarted after writing the command, please write SAVE and press Enter to save, and the FC will restart

