

Support up to 8 motor outputs to easily build X8 drones.

Integrated 5V/10V dual BEC ensures stable operation

Four LED status indicators display the working status under different states.

Although the flight control is small, it has all five internal components. The F722

main control chip, onboard OSD chip, barometer, and onboard black box chip.

The use of large pads ensures that the pads are kept away from components to ensure perfect soldering for beginners.

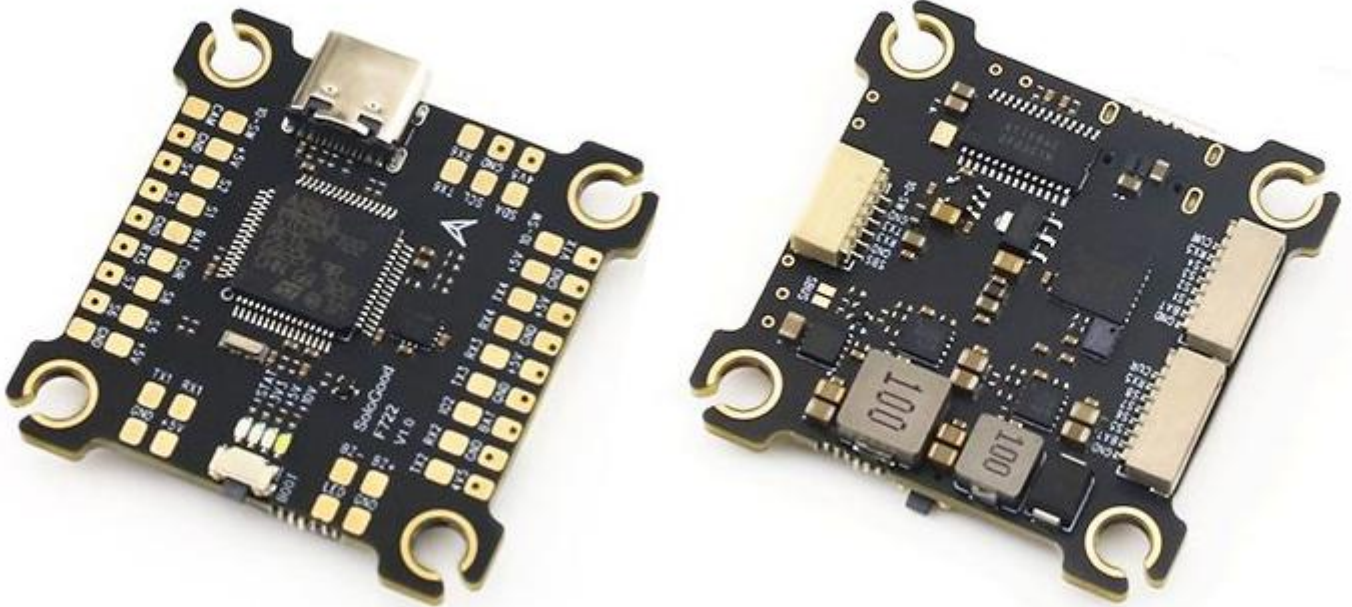
SoloGood

F722 V1.0 FC

High end configuration

Better in flying

FC Description

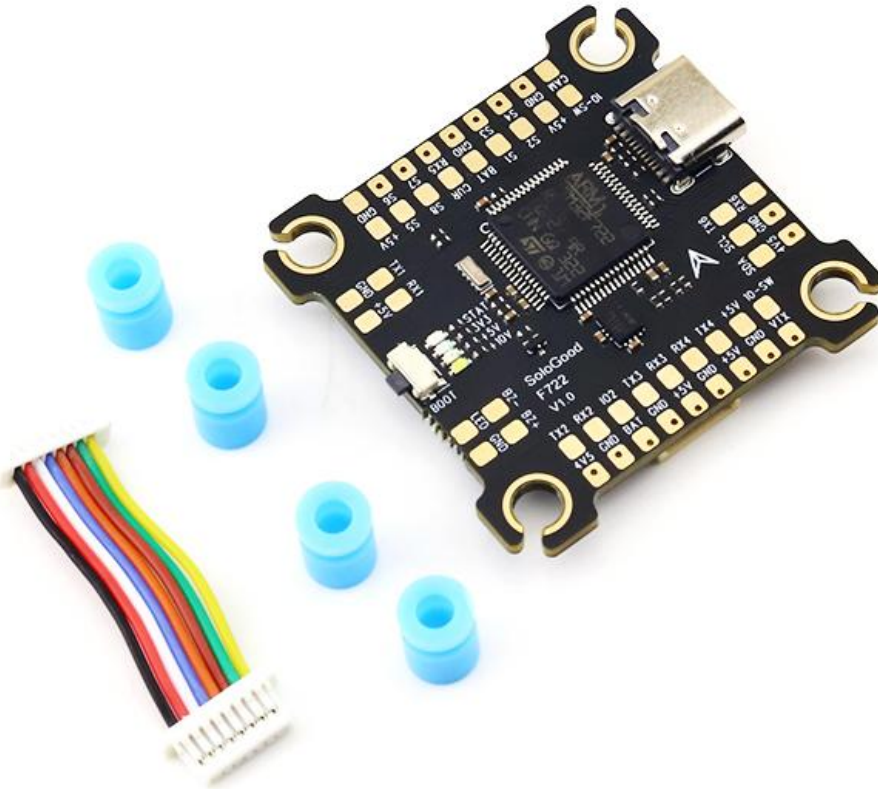


- SoloGood high-performance flight control supports up to 8 motor outputs, making it easy to build X8 drones.
- Integrating 5V/10V dual BEC, 10VBEC can provide independent power to the VTX through the USER1 control switch to ensure stable operation. When debugging the aircraft, the 10V power of the VTX can be remotely turned off without the need for a fan to desuperheat the VTX.
- The flight control has four LED status indicators, which display the working status under different states.
- F722 main control chip, onboard OSD chip, barometer, and onboard black box chip are also available.
- Using large solder pads, the pads are kept away from the components to ensure perfect soldering for beginners.
- The electric tuning adopts imported Toshiba MOS transistors, high-performance processors, and onboard TVS protection tubes to ensure maximum performance even in complex flight environments, and has undergone multiple layers of testing!
- Support Bluejay firmware, bidirectional DSHOT, and enable RPM filtering

FC Spec

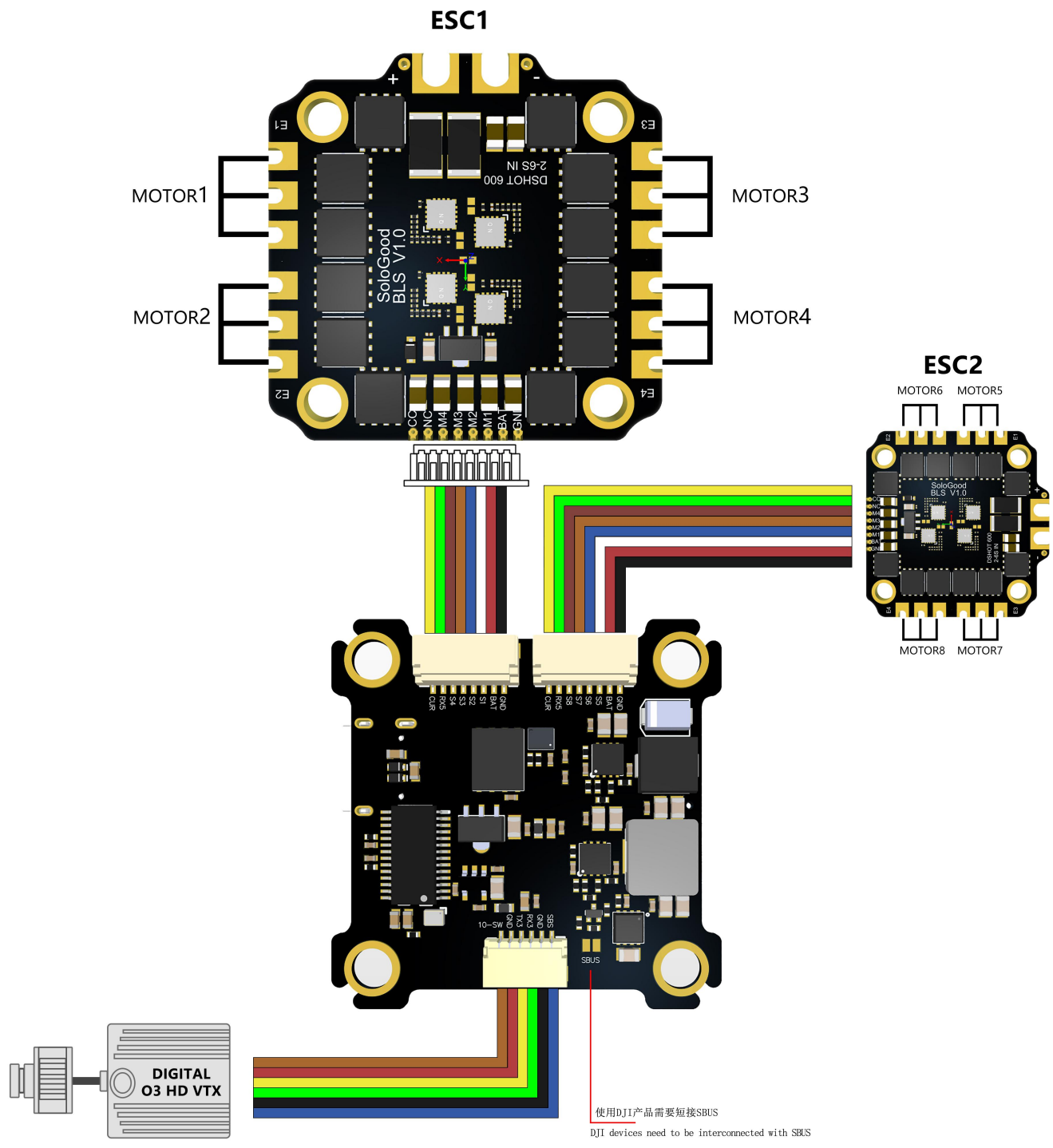
- Main control: STM32F722RET6
- Gyroscope: ICM42688P
- Barometer: Support (DPS310)
- OSD: Support (AT7456E)
- BEC: 10V/2A, 5V/2A
- UART port: 6
- Black box: onboard (16M flash memory)
- Number of supported motors: M1-M8
- Firmware name: BETAFLIGHT: SOLOGOODF722
- Input voltage: 3-6S lithium battery (11-30V MAX)
- Output voltage: VBAT
- Installation hole: 30.5x30.5mm (4mm aperture)
- Flight control size: 38.5x38.5mm
- Weight: 8.1 grams
- LED status: blue: gyroscope status, green: 3V3 indication, red: 5Vbec indication, white: 10Vbec indication
- DJI/Vista: Support/6pin
- Electric regulation
- TVS protective diode: Yes
- External capacitor: 1000uF high-frequency low resistance capacitor (included in the packaging)
- ESC/Motor Protocol: DSHOT300/600
- Continuous current: 60A
- Maximum current : 65A
- Installation hole: 30.5x30.5mm (4mm aperture)

Packing

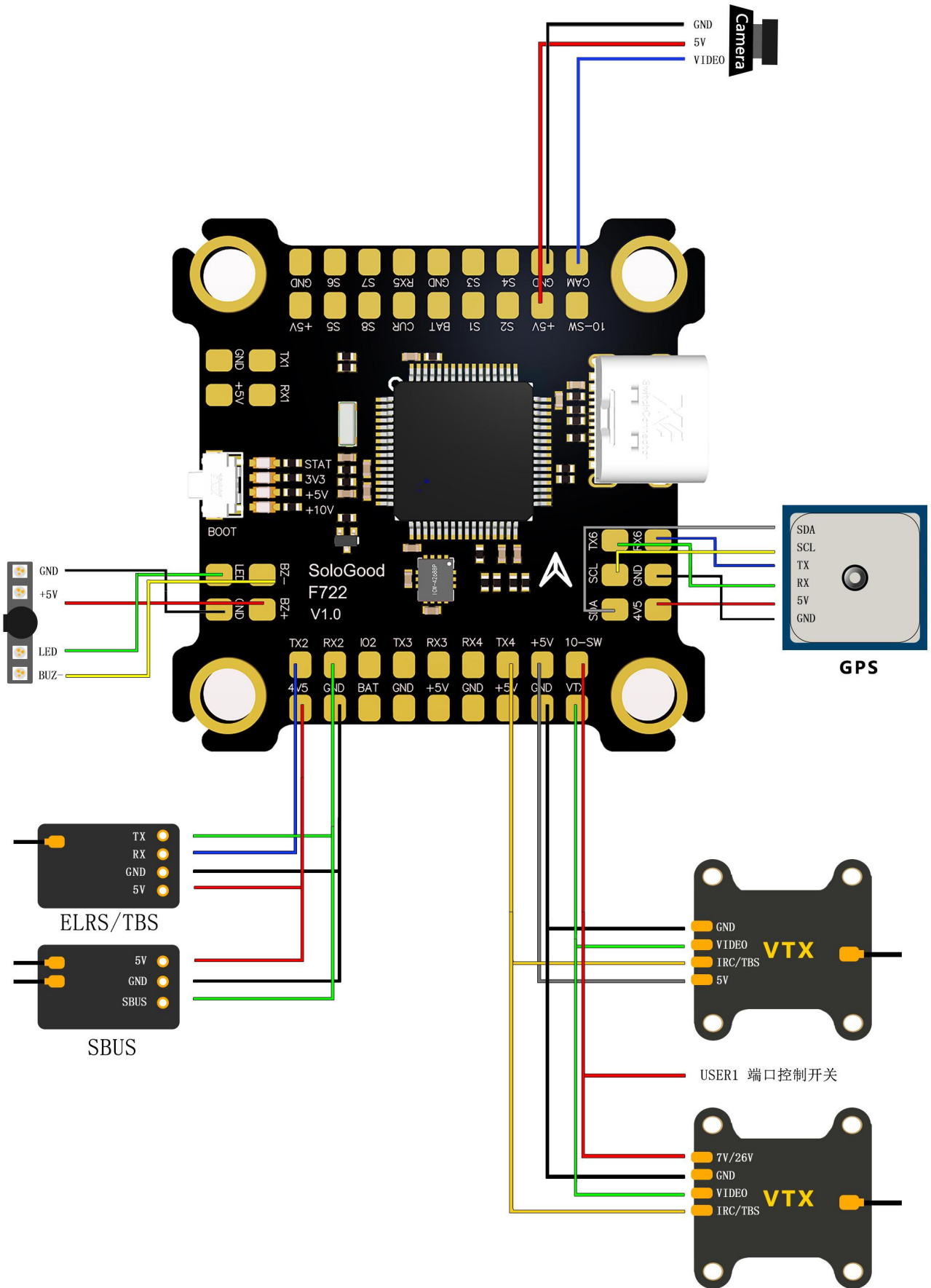


SoloGood F722 V1.0 Flight Control x 1
4SH 1.0mm 15mm long 8-pin cable (for FC-ESC connection) x 1
5M 3 * 8mm silicone eyelet (for FC) x 4

FC&ESC Wiring Diagram



FC peripheral equipment



How to set Betaflight

2023-11-08 @14:36:49 - Device - Ready

0.03V (USB) | Gyro | Accel | Mag | Baro | GPS | Samba | Dataflash: free 16.0MB | Enable Expert Mode | Update Firmware | Disconnect | Show Log

Ports

Note: not all combinations are valid. When the flight controller firmware detects this the serial port configuration will be reset.
Note: Do **NOT** disable MSP on the first serial port unless you know what you are doing. You may have to refresh and erase your configuration if you do.

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 type="checkbox"/>	Disabled AUTO	Disabled AUTO	Disabled AUTO
UART2	<input type="checkbox"/> 115200	<input checked="" type="checkbox"/>	Disabled AUTO	Disabled AUTO	Disabled AUTO
UART3	<input type="checkbox"/> 115200	<input type="checkbox"/>	Disabled AUTO	Disabled AUTO	Disabled AUTO
UART4	<input type="checkbox"/> 115200	<input type="checkbox"/>	Disabled AUTO	Disabled AUTO	Disabled AUTO
UART5	<input type="checkbox"/> 115200	<input type="checkbox"/>	Disabled AUTO	Disabled AUTO	Disabled AUTO
UART6	<input type="checkbox"/> 115200	<input type="checkbox"/>	Disabled AUTO	Disabled AUTO	Disabled AUTO

BETAFLIGHT default firmware is version 4.3.2

2023-11-08 @14:36:49 - Device - Ready

0.03V (USB) | Gyro | Accel | Mag | Baro | GPS | Samba | Dataflash: free 16.0MB | Enable Expert Mode | Update Firmware | Disconnect | Show Log

Power & Battery

Battery

Onboard ADC | Voltage Meter Source

Onboard ADC | Current Meter Source

3.3 | Minimum Cell Voltage

4.2 | Maximum Cell Voltage

3.5 | Warning Cell Voltage

0 | Capacity (mAh)

Voltage Meter

Warning: Values limited to 25.5V

Battery: 0 V

110 | Scale

10 | Divider Value

1 | Multiplier Value

Amperage Meter

Warning: Values limited to 63.5A

Battery: 0.00 A

80 | Scale [1/10th mV/A]

-1120 | Offset [mA]

Power State

Connected	No
Voltage	0.03 V
mAh used	0 mAh
Amperage	0 A

After flashing Bluejay firmware, bidirectional DSHOT can be enabled, and then RPM filtering can be enabled

The default BLHeli_ S firmware

FC knowledge

1. What is flight control?

Flight control is the full name of the flight controller, to put it bluntly, it is like the human brain, control the human body to complete various actions. Flight control is to control the airplane.

2. How to choose the right flight control?

Even though F7 is the newest one, F4 is still the most popular one in the market nowadays, no matter from the adaptability of flight control or cost-effective, F4 still has the advantage. No matter from the adaptability of the flight control or the cost performance, F4 still has the advantage. If you are a novice, it is better to buy F4 directly.

When choosing a flight control, you should pay attention to whether the mounting holes of the rack and the flight control are matched, and also pay attention to whether the mounting holes of the rack and the flight control are matched.

In addition, if you choose the ESC as a whole, you should pay attention to the ESC or fly tower (tower-shaped multi-layer fly control with ESC on the 2nd tower, 3 layers of tower with ESC and

(Figure transmission) should pay attention to the current size of the traversing motor motor, to choose to match the motor current of the ESC. Avoid ESC current is too small to burn the ESC. At present, the technology of flying K control is very mature, just take out a flight control in the default parameters of the number of almost all can be very smooth flight, so novice beginners] do not need to be too expensive and high-end flying K control, we We only need to choose a cost-effective flight control.

3. How many channels does the flight control have?

The output channel of the flight control is the channel that the flight control connects to the ESC or servo. The input channel is not divided into several channels.

The input channel is not divided into several channels, -- generally is the flight control mode type distinction, the remote control has enough switches to switch these modes.

The remote control has enough switches to switch between these modes. If the remote control does not have enough channels, it is possible to set the modes to a combination of switches or to discard some less frequently used modes.

If the remote control does not have enough channels, it is possible to combine the modes in one switch or to discard some less frequently used modes.

4. What kind of flight controllers can automatically level the rocker when it returns to the center?

All flight controls with self-stabilizing function can do it, simple ones are Lodi Byme-a-d, df flight control. Advanced ones Pix, Sinan, arkbird.

5. What are the flight controls for fixed-wing aircraft that can fly long distances?

As long as with gps can automatically return, can support the fixed-wing flight control can be used, Ledi pix and mini pix and arkbird, sparrow, Sinan, DF-F1, DF-H1 are available. For the distance requirements are mainly remote control, digital radio and map transmission of these three devices.