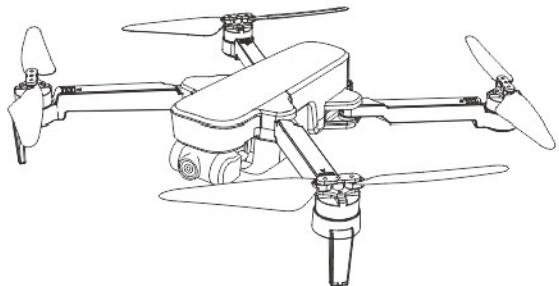


AGE 14+

CHUBORY X11 Pro Drone

USER MANUAL



WARNING:

- When taking off ,make sure that the operator is 3 meters away from the drone, and keep far away from any crowds and property.
- The players must operate the drone as required by the instructions. Pay attention to the flight safety and understand the accident liability caused by your own negligence!

Please read this manual carefully before operation and keep it properly for future reference.

Thank you for purchasing our drone. Please read all instructions and warnings carefully before operating. Please also keep this instruction manual for future reference and maintenance.

IMPORTANT

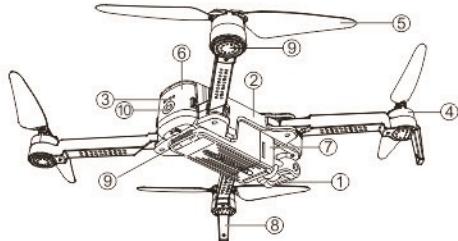
1. This product is not a toy. It is a precision device; integrating machinery and electronics with air mechanics and high frequency transmission. It requires correct assembly and debugging to avoid any accident. The user should operate and control this product in a safe manner. In case of incorrect operation, it may cause serious injury or damage property. It can also be lost due to incorrect operation.
2. This product is suitable for who is experiencing in operating drone and age no less than 14 years.
3. In the event of a problem during using, operating, or maintenance, please contact the local sales agent or retailer or keep in touch with the responsible staff of our company.
4. Small parts are included with this product. Please place it beyond the reach of the children to avoid a CHOKING HAZARD or parts being mistakenly swallowed.

INTRODUCTION SAFETY PRECAUTIONS

This R/C flying model can be dangerous when in use, please make sure you keep it far away from any persons or spectators when flying. In-correct installation, poor conditions, or users not familiar with operation may cause damage to the drone or injure people or may cause an unexpected accident. Please pay close attention to flying safety and learn to recognize more dangerous conditions which may cause an accident due to your own negligence.

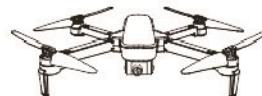
- **Keep it far away from any structures or crowds**
This R/C drone may vary slightly in speed or sensitivity while flying and can cause potential danger. Therefore, please keep it far away from crowds, buildings, trees, structures, high voltage wire, etc. Please also avoid flying in adverse weather conditions such as rain, electrical storms, and high winds to ensure safety of the user, any spectators, and surrounding property.
- **Keep it away from any moist environment**
The inside of the drone is composed of many precision electronic and mechanical parts. Therefore, please try to avoid any moisture or water content from entering the main body of the drone as it may cause a breakdown of the mechanical and electronic parts and thus cause an accident.
- **Only operate with included parts for intended use**
Please use the original parts for any re-equipping or maintenance to ensure flying safety. Please operate and use only under the scope of the product function permitted. Using unapproved parts will void warranty. Do not use for any illegal purpose or use beyond the scope of which your local laws and regulations have stipulated.
- **Avoid controlling it independently**
New users may have certain difficulties during the early stages of learning to operate this drone. Please try to avoid operating the drone alone. When available, always operate this drone under the guidance of a more experienced user.
- **Do not operate under the influence of drugs or alcohol**
Please operate this R/C drone according to your own state and flying skill. Any fatigue, bad mental state, or incorrect operation may increase the probability of accidental risk.
- **Please keep a safe distance from drone when using top speed**
When the drone is flying, please keep the drone far from the operator and any surrounding persons or objects so as not to cause danger or damage.
- **Store it in a cool, dry place**
The R/C drone is composed of material such as metal, fiber, plastic, electronics, etc. Therefore, please keep it away from any heat source and avoid prolonged exposure to direct sunlight. Excessive heat exposure can cause distortion and damage.

KNOW YOUR X-PRO



1. HD camera and Gimbal
 2. Drone top cover
 3. Battery power lights
 4. Motor
 5. Propeller
 6. Lithium battery
 7. Drone bottom cover
 8. Legs
 9. LED lights (Front: white and red/Back: blue and red/Bottom: white)
 10. Switch (Depress 4 seconds take on/off)

ACCESSORIES



8811 Drone x1
 (battery included)



Remote Control x1
 (battery not included)



User Manual x1



WIFI Instruction x1



Screw Driver x1



USB Charging line x1

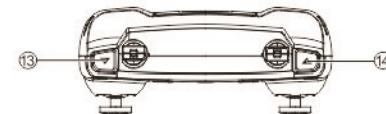
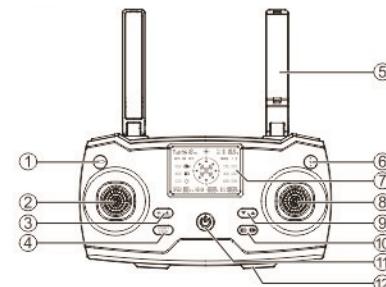


Extra propellers x4
 2 each of L, R

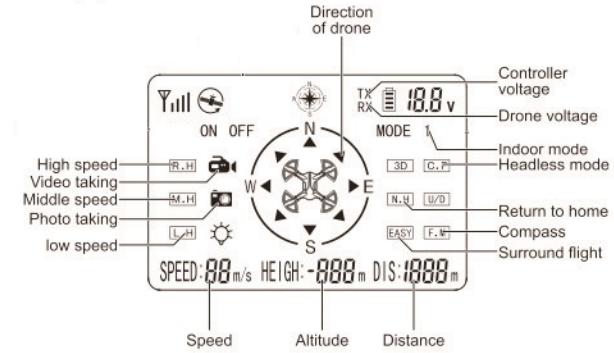
⚠ Note: Please check the number of accessories carefully (as shown above). Please provide proof of purchase and contact the store for replacement if any missing parts.

KNOW YOUR REMOTE CONTROL

Structures of remote control



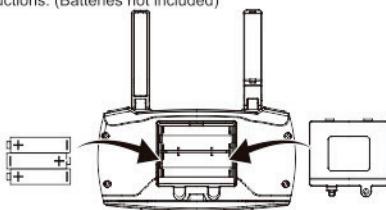
LCD Display



LITHIUM BATTERY INSTRUCTION

Remote control battery installation

Open the battery cover and insert the 3 AA batteries correctly according to the electrode instructions. (Batteries not included)



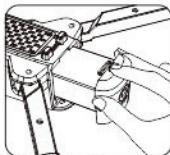
⚠ Note1:

When the remote control is in low power, there is DIDIDI sound. You need to change the battery.
Meanwhile, the LCD screen TX indicates the voltage is less than 3.5V.
(Depending on the environment, the value will be vary)

Note2:

1. Make sure the battery are loaded correctly according to the polarity indications on the battery compartment.
2. Please do not mix old and new batteries together.
3. Please do not mix different types of batteries together.

Battery charging for drone



1. Depress the clip at the bottom of the battery box.
2. Take out battery.
3. Connect lithium battery and USB charging interface by USB charger.

⚠ Note:

1. When the drone is in low power, there is long DIDIDI sound, and the LCD screen RX indicates the voltage is less than 11V. (Depending on the environment, the value will be vary).
2. When charging, the battery lights flash in turn, four lights all on indicate that the battery is full. After charging, please remove the battery from the USB. Charging time is about 5h.
3. Please take out battery after flying.

BATTERY INSTRUCTIONS

- There is a certain risk when using lithium battery. It may cause fire, body injury or property loss. Users must be aware of the risks and take full responsibility of using battery improperly.
- If battery leakage occurs, please avoid contacting your eyes and skin with electrolyte. Once it happens, please wash your eyes with clean water and seek medical care immediately.
- Please remove the plug immediately if you sense any peculiar smell, noise or smog.

Battery charging

- Please use the charger from original factory to ensure your safe usage.
- Do not charge dilatant or outworn battery.
- Do not over charge battery. Please unplug the charger once fully charged.
- Do not charge the battery next to in flammables, such as carpet, timber floor or wood furniture or on the surface of electro-conductive objects.
- Please always keep an eye on the battery when charging.
- Do not charge battery which not cool down yet.
- The charging temperature should be between 0°C to 40°C.
- Rechargeable batteries are to be removed from the product before being charged.
- Exhausted batteries are to be removed from the product.
- Supply terminals are not to be short-circuited.
- The battery chargers used with the toy are to be regularly examined for damage to the cord, plug, enclosure and other parts, and in the event of such damage they must not be used until the damage has been repaired.
- Non-rechargeable batteries for remote control are not to be recharged.

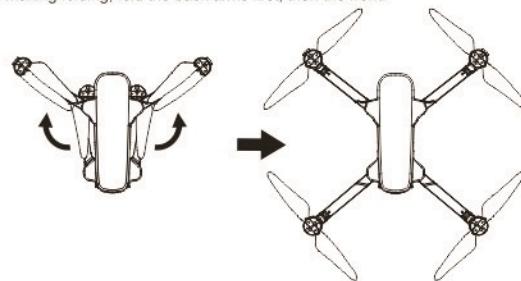
Battery recycling

Do not dispose the battery as daily rubbish. Please familiarize yourself with the local garbage disposal method and dispose it according to the special requirement.

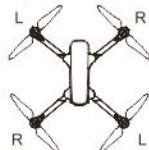
PRE-FLIGHT PREPARATION

1. Unfold the drone

First unfold the front two arms (Near the camera), then extend the back two arms. When making folding, fold the back arms first, then the front.



2. Propellers installation



R corresponds to R
L corresponds to L

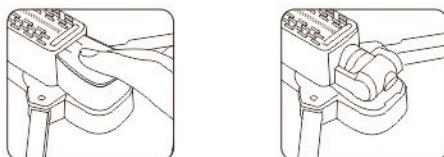


Press down the propeller with the crankshaft and screw it.

⚠ Note: When installing or dismantling the propeller, please do not exert force on the propeller to avoid distortion.

3. Open the cover of gimbal

Press the clip of the gimbal cover and remove it.



4. The method to assemble clip on phone



Pull out the holder for phone
at the bottom of controller.



Clip the phone.

5. Install APP software and APP operation refer to WIFI INSTRUCTION

6. Pairing controller and drone

- Place the drone on a level surface, depress the switch 4 seconds and switch on it, the red LED lights flash.
- Then switch on the controller, the red lights on the drone go out, the white and blue lights start to flash, the pairing between controller and drone is successful automatically.



⚠ Note: 1. After switch the drone, if no operation for 5 minutes, the drone will lies dormant and need to restart;
2. If no operation for 10 minutes, the motors will alarm and prompt the operator to shut down.

7. Gyro calibration

Gyro calibration could be applied to ensure drone fly vertically. Push the two joysticks to the right corner in the same time. When there are sounds of DI on controller and the white and blue lights on the drone are quickly flash, then gyro calibration was successful. Drone must be placed on a level surface and remain stationary while calibrating.



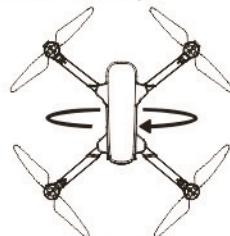
7. Compass (magnetometer) calibration

After Gyro calibration, you need to do compass calibration by two steps, press the compass key, the drone red/white/blue lights begin to flash quickly.

- Keep the drone level and pick up it about 1M height, then rotate 3 circles, there is a DI sound and front red and white lights on drone will turn to solid, the back lights keep flashing quickly.



- From the bottom, hold the drone face-up about 1M height and rotate it 3 circles, there is a DI sound and front white lights and back blue light start flashing(all the red lights turn off), compass calibration is okay.



If the GPS calibration is successful before the compass calibration, after the compass calibration, the white and blue lights of the drone will stay on.



Note:

- To fly at GPS mode, make sure the GPS signal number is more than 10N/S.
- After succeeding GPS calibration, wait for 2 minutes to take off, the return to home will be more accurate.

FLY SAFE



Fly in open areas

Maintain line of sight



Fly below 150M



Avoid flying over or near obstacles, crowds, high over voltage power lines, trees, airport or bodies of water. Do not fly near strong electromagnetic sources, such as power lines and base stations, as it may affect the onboard compass.



Do not use the drone in adverse weather conditions, such as rain, snow, fog and wind speeds exceeding 10 m/s or 22 mph.



No fly zone

Stay away from the rotating propellers and motors.

START YOUR FLIGHT



- 1. Only can choose remote controller or mobile phone APP to operate the drone!
- 2. The drone is not equipped with obstacle-avoidance, please choose a open and wide space for the flight!

1. Take off and landing

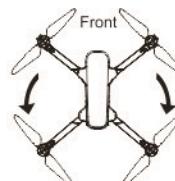
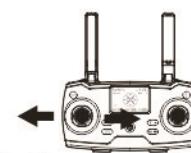
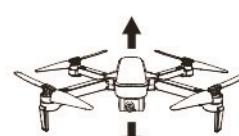
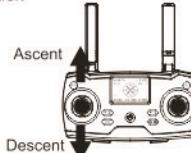
Take off: After compass calibration , press the key "START" to unlock the drone and push forward the left joystick to realize drone take-off, or just press one key ascend to fly.
Landing: Pull down left joystick to realize drone descending or depress 3 seconds one key descend to land the drone.



2. Basic flight

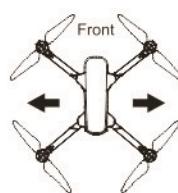
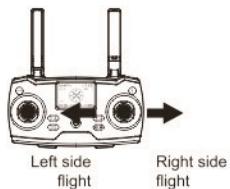
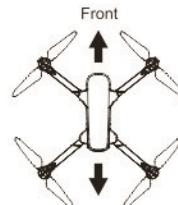
The left joystick controls the flying altitude and direction change and the right joystick is to control the directions flight.

Left joystick



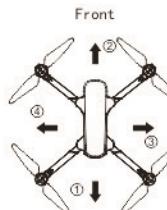
Turn left Turn right

Right joystick



3. Fine-tuning function

- When deviating from course, press down "Fine-tuning" key (Right joystick) for calibration until the drone is back to normal.
- Press down Fine tuning key (Right rocker) then move the right joystick to front, back, left or right to fine tuning the fly direction of the drone.



1. Fine tune front if drone drifting back
2. Fine tune back if drone drifting front
3. Fine tune left if drone drifting right
4. Fine tune right if drone drifting left



- After pressing the Fine-tuning key (Right rocker), if there is no operation within 3 seconds, will cancel the fine-tuning mode automatically.

4. Set 3 speeds mode

Press down 3 speeds mode button (Left joystick), you can hear corresponding sounds, the drone is set 3 speeds mode.



5. Headless mode

Depress 3 seconds the "Headless mode" key, the controller make sounds DIDI and blue lights (back) on drone start to flash, drone is now in headless mode, this will lock the drone flying direction, that means no matter which direction the drone will fly, it always remembers the first set direction. Pressing "Headless mode" 3 seconds again, exit this mode.



6. Return to home (RTH)

The return to home (RTH) function brings the drone back to the last recorded home point. There are 3 types of RTH : Smart RTH / Low-battery RTH / Failsafe RTH

Smart RTH

Press the key return to home, there is DI sounds on the controller and the white and blue lights on the drone start to flash, the drone will return to the take off point. Press this key again, exit this mode.



Low-battery RTH

•Low-battery RTH is triggered when the drone battery level is low. The drone will fly back to where away from you about 20 m. You can still control your drone. Pull the joystick down to land the drone in a safe area.

•When the drone is under low voltage, the controller will make long "DIDI" sound, and all the Indicator lights (red, white and blue) on the drone will flash. LCD screen RX indicates the voltage is less than 11V. (Depending on the environment, the value will be vary)

Failsafe RTH

Drone will enter failsafe RTH mode if the signal of the controller is lost, drone fly back to the record point. Rebind the controller to the drone if drone flies into your view. Pull the joystick down to land the drone in a safe area.

7. surround flight

•At flight mode press surround flight key (pic.1), the drone looks for its direction automatically.

•Push the right joystick left front, the drone fly surround counterclockwise. (pic.2)

•Push the right joystick right front, the drone fly surround clockwise. (pic.3)



Pic.1



Pic.2



Pic.3

8. Follow me

Follow me function refer to WIFI INSTRUCTION.

9. Way point flight

Way point flight function refer to WIFI INSTRUCTION.

10. Photo/video taking

•Press "Photo" key on controller to take photo.

•Depress 3 seconds "Video" key on controller to start video taking and depress again to finish.

•Players can view photos and videos in APP or save them on the SD card and read them with a card reader. SD card and card reader need to be purchased separately.



WIFI SOFTWARE INSTRUCTION (FOR X-PRO)

- 17 Software Installation Instructions
- 18 Warm Precautions
- 18 Control Interface-Home
- 19 Control interface-control page
- 20 Control interface-function description (I)
- 21 Control interface-function description (I)
- 22 Expansion description
- 22 Control interface-function description (I)
- 23 Multi-lens function description
- 24 Joystick and PTZ
- 24 Gesture Recognition
- 25 MV interface
- 25 Choose music

Software installation instructions

1. Install the APP

Please scan the qr code below and download the mobile App on the corresponding website.



iOS



Android(Google)

2. Connect Aircraft WiFi

- (1) Turn on the aircraft power;
- (2) Looking for aircraft hot spots " aircraft " in mobile phone "setting-wireless LAN";
- (3) Click the network (no password), and the phone will be connected automatically.

3. The recommended model configuration

(1) iOS

Configuration	Recommended	Optimal (Support 2K)
Product model	iPhone 6 and above	iPhone 7 and above
System version	iOS 9.0 and above	iOS 9.0 and above

(2) Android

Configuration	Recommended	Optimal (Support 2K)
The CPU model	Snapdragon 630 and above Samsung Exynos 7420 and above Hair division Helio X25 and above Kirin 950 and above	Snapdragon 835 and above Samsung Exynos 8895 and above Hair division Helio X30 and above Kirin 970 and above
System version	Android 5.0 and above	Android 8.0 and above
Memory size	3G and above	6G and above
CPU usage	Occupancy rate of 25% and below	Occupancy rate of 10% and below

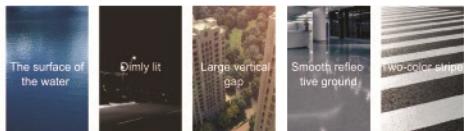
Clean up the background program, which can effectively reduce the CPU usage.

Tips: Your mobile Wi-Fi needs to support IEEE 802.11 b/g/n band WLAN.

Warm Precautions

When the aircraft is in the following environment, the fixed-point hovering effect is not good.

Note: When the aircraft is in the following environment, the optical flow of the lower lens is not good enough to hover, which will make it difficult for the aircraft to fly smoothly, and the body will be shaken.



Control interface-control page



Control Interface-Home



Control interface-function description (I)

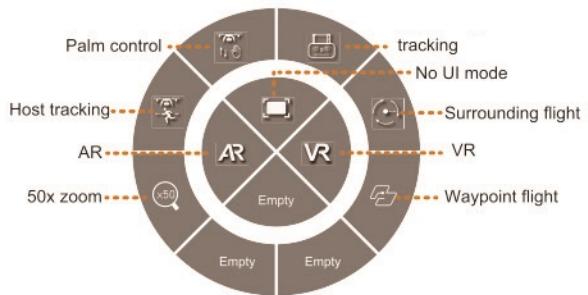
WiFi : Display chart signal strength;

Satellite signals : Represents current flight mode and number of satellites; Scintillation means that the current mode is the optical flow point, without the function of returning, following, circling and pointing.

Battery : The battery status of the aircraft.

- (1) 2-4 grid indicates the normal power, which can operate the returning, following, circling and pointing flight functions normally in the mode.
- (2) 1 grid (flicker state) represents the current low power state, and the aircraft will perform the automatic course reversal function. There is no following circling and pointing flight function in low power state.

Control interface-function description (I)



Palm control : Click [Palm Control] in optical flow mode, and the aircraft will follow the palm of your hand to fly up and down. ([See the extension description for details](#))

Host tracking : Click the button in the optical flow mode, the aircraft will follow the target person flight. ([See the extension description for details](#))

AR : Embed AR 3D model in real-time video stream;

50x zoom : After opening, adjust the zoom multiples of the lens view by adjusting the right slide bar. After the view is enlarged, the finger slides the visual range of the movable view on the screen.

tracking : In S mode, click this button and the aircraft will follow the phone.

No UI mode : Hide non-essential UI controls;

Surrounding flight : the aircraft nose will fly around clockwise or counterclockwise with the current position of the aircraft as the center. During the surround process, you can control the rise, fall, forward, and reverse to adjust.

VR : Click into VR mode.

Waypoint flight : the aircraft will fly according to the location selected on the map.

Holder : Turn on the front camera pan/tilt controller.

*Expansion description

Human Tracking

(1) Blue candidate boxes for the target person appears on the screen.

(2) On the screen, tap your finger to select the target character.

(3) After the target person is locked, the blue box will turn red. Make sure the red box target character is in the middle of the screen.

(4) The tracking flight starts when the aircraft is about 2m away from the target figure. If the target character is lost, you need to click the target character again.

When the red frame is more than 80% of the human area, the best effect can be achieved.

Palm Control

(1) Click the [Palm Control] button in the optical flow mode;

(2) Facing the camera lens, raise one hand horizontally;

(3) When the palm is in the red frame on the App, move the palm gently;

(4) At this time, the aircraft will follow the palm of the hand to fly up and down;

When the distance between the palm and the camera is about 1m, the control effect is best.

*Multi-lens function description

Switch lens

Camera switching and multi-lens window : **(Some models support)**

In the expanded button, you can freely switch the drone's top and bottom camera, picture-in-picture. **(4K lens Wi-Fi aircraft does not support);**
And combined with the mobile phone camera to realize the free combination of multiple windows.



Control interface-function description (I)



One-click return: In S mode, click to return home with one key.



MV: Click the button to open the MV interface.



Switch lens: The front lens and the lower lens can be switched.



Photo/video: Click the button to take a photo according to the current lens (front lens or bottom lens); long press the button to switch to camera.



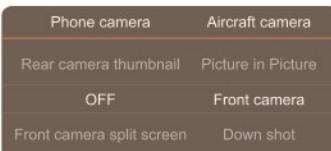
Album: Can view photos and videos.

Switch lens

Click the "switch lens" button to switch the following 3 functional states successively:

- (1) ordinary front lens;
- (2) shooting;
- (3) painting within painting;

If the button "switch lens" is not clicked, the default function is normal front-lens function.



*PIP (Picture in picture)

In the picture in the picture, you can view the video reality of the camera under the aircraft in real time;

On the control page, click to open the "draw in picture" switch, the lower lens of the aircraft and the video screen captured by the front lens will be displayed together. **(The 4K lens Wi-Fi aircraft is not supported.)**

FCC warning:

1. This device should be installed and operated with minimum distance 20cm between the radiator&your body.
2. This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions:
 - (1) This device may not cause harmful interference, and
 - (2) This device must accept any interference received, including interference that may cause undesired operation.
3. Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.
4. This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:
 - Reorient or relocate the receiving antenna.
 - Increase the separation between the equipment and receiver.
 - Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
 - Consult the dealer or an experienced radio/TV technician for help.

*Joystick and PTZ



Holder

After the aircraft takes off, the holder will be displayed on the left side of the screen. At this time, if you move the slider upward, the front lens of the aircraft will move upward by a certain angle; if you move the slider down, the front lens of the aircraft will move downward by a certain angle.



Rocker

The left rocker can control the upward, downward movement, left and right turn of the aircraft, and the right rocker can control the forward, backward movement of the aircraft, and it can also move the aircraft towards the left and right.

Share

After clicking in the upper right corner of the screen on the control page, enter the album interface. When you click to view a photo or video, users can share photos or videos to major social platforms through in the top right corner.

*Gesture Recognition

Facing the front lens of the camera, the following gestures can be triggered to trigger the automatic camera or camera function of the aircraft:



Take Photos by Yeah Gestures About 2m in front of the camera of the aircraft, hold the Yeah gesture with one hand flat. After the aircraft successfully recognized the gesture, the countdown of 3 seconds began to take photos;



Shoot Videos by Palm Gestures About 2 meters in front of the aircraft lens, with five fingers and one hand flat; After the aircraft has successfully recognized the gesture, the video will start.

When the gesture is recognized again, end the recording (The time difference between two recognition should be more than 3 seconds);

* Special Instructions

To ensure that the lens gets a higher recognition rate:

1. Please aim the lens face to face;
2. Please fly in a good light environment;
3. Please conduct gesture recognition operation at a distance of about 2m from the lens.

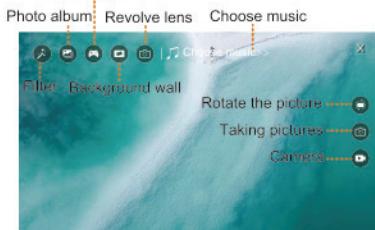
In the following cases, it will result in a low lens recognition rate:

1. Weak light or backlight;
2. The WiFi signal is weak or the signal is disturbed.

*MV interface

Click the button on the right side of the screen on the control page to enter the MV interface. In the MV interface, you can shoot music videos.

Operating lever

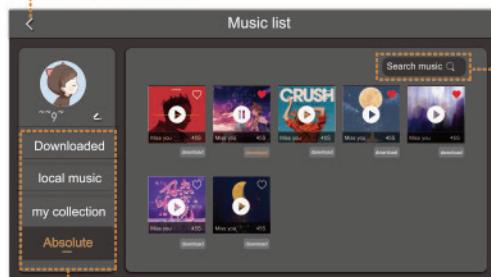


Rotating picture

Click this button to enable the Rotate Screen feature. At this point, the finger swipes on the screen to rotate the image; if the finger double-clicks anywhere on the screen, the image can be magnified in an instant (this feature also applies when recording video).

*Choose music

Return to the MV interface



Slide down to choose more types of music