

MAVIC PRO

User Manual V1.2

2016.12



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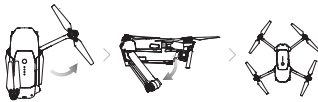
Product Profile

This section introduces the Mavic Pro and lists the components of the aircraft and remote controller.



Unfold the Arms

1. Unfold the front arms, followed by the rear arms of the aircraft as shown.
2. Unfold all propeller blades.



Product Profile

- ⚠ • Unfold the front arms and the propellers before the rear ones. All arms and propellers must be unfolded before powering on the aircraft, or it may affect Self Diagnostic Testing.

Preparing the Remote Controller

1. Unfold the mobile device clamps and the antennas.
2. Choose an appropriate RC cable based on the type of mobile device used. An RC cable with a Lightning Connector has been connected and the Standard Micro USB connector cable and the USB Type-C connector cable are included. An optional Reverse Micro USB connector cable is available. Insert the mobile device and secure it.



Refer to the figure below for how to replace the RC cable.



The RC cable slider must be replaced if using an USB Type-C RC cable.

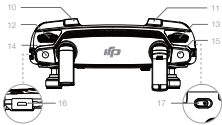
- ⚠ • Ensure the Control Mode Switch is toggled to "RC" when using the Remote Controller to control the aircraft.
- You can also connect your mobile device to the remote controller using a USB cable. Plug one end of the cable into your mobile device and the other end into the USB port on the bottom of the remote controller. Ensure to disconnect the RC cable from the Micro USB port on the remote controller when using a USB cable.

5. **LCD Screen**
Displays the aircraft and Remote Controller's system status.
6. **Flight Pause Button**
Press once for emergency braking.
7. **5D Button**
The default configuration is listed below. Set these values based on your preference in the DJI GO 4 app.
Left: Zoom In
Right: Zoom Out
Up: Gimbal Forward
Down: Gimbal Downward
Press down: Bring up DJI GO 4 Intelligent Flight menu.

8. **Mobile Device Clamp**
Securely mounts your mobile device onto the remote controller.
9. **USB Port**
Connection to mobile device for DJI GO 4 app.

Product Profile

10. **C1 Button**
The default configuration is listed below. Set these values based on your preference in the DJI GO 4 app.
Press once to focus on the center or add a waypoint when using Waypoints.
11. **C2 Button**
The default configuration is listed below. Set these values based on your preference in the DJI GO 4 app.
Press once to playback or delete a waypoint when using Waypoints.
12. **Gimbal Dial**
Control the camera's tilt.
13. **Camera Settings Dial**
Turn the dial to adjust camera settings.
(Only functions when the remote controller is connected to a mobile device running the DJI GO 4 app)
14. **Record Button**
Press to start recording video. Press again to stop recording.



15. **Shutter Button**
Press to take a photo. If burst mode is selected, a pre-set number of photos will be taken.
16. **Power Port**
Connect to the Charger to charge the remote controller battery. Connect this port to your mobile device using the RC cable.
17. **Flight Mode Switch**
Switch between P-mode and S-mode.

Aircraft

Aircraft Profile

The Mavic Pro aircraft comprises of a flight controller, video downlink, propulsion system and an Intelligent Flight Battery. This section introduces the features of the flight controller, video downlink and other aircraft components.

Flight Mode

The following flight modes are available for Mavic Pro:

P-mode (Positioning): P-mode works best when the GPS signal is strong. The aircraft utilizes the GPS and Forward and Downward Vision Systems to locate itself, automatically stabilize, and navigate between obstacles. Advanced features such as TapFly and ActiveTrack are enabled in this mode.

When the Forward Vision System is enabled and lighting conditions are sufficient, the maximum flight attitude angle is 16° with a maximum flight speed of 22 mph (36 kph). When forward obstacle sensing are disabled, the maximum flight attitude angle is 25° and the maximum flight speed is 36 mph (58 kph).

When the GPS signal is weak and lighting conditions are too dark for the Forward and Downward Vision Systems, the aircraft will only use its barometer for positioning to control altitude.

Note: P-mode requires larger stick movements to achieve high speeds.

S-mode (Sport): The aircraft is using GPS for positioning. As Forward and Downward Vision Systems are disabled, the aircraft will not be able to sense and avoid obstacles when in Sport Mode. Ground Station and the Intelligent Flight functions are also not available in Sport Mode.

Note: Aircraft responses are optimized for agility and speed making it more responsive to stick movements.

Aircraft

- 
 - **The Forward Vision System is disabled in S-mode (Sport), which means the aircraft will not be able to automatically avoid obstacles on its route.**
 - The aircraft's maximum speed and braking distance are significantly increased in S-mode (Sport). A minimum braking distance of 30 meters is required in windless conditions.
 - Descending speed is significantly increased in S-mode (Sport).
 - The aircraft's responsiveness is significantly increased in S-mode (Sport), which means a small stick movement on the remote controller will translate into a large travel distance of the aircraft. Be vigilant and maintain adequate maneuvering space during flight.
- 
 - Use the Flight Mode switch to change the flight mode of the aircraft.

Return-to-Home (RTH)

Return-to-Home (RTH) function brings the aircraft back to the last recorded Home Point. There are three types of RTH: Smart RTH, Low Battery RTH, and Failsafe RTH. This section describes these three scenarios in detail.

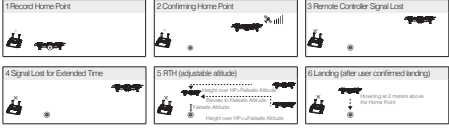
RTH	GPS	Description
Home Point		If a strong GPS signal was acquired before takeoff, the Home Point is the location from which the aircraft launched. The GPS signal strength is indicated by the GPS icon (). The aircraft status indicator will blink rapidly when the home point is recorded.

-
- Aircraft can sense and avoid obstacles when Forward Vision System is enabled and the lighting conditions are sufficient. The aircraft will automatically climb to avoid an obstacle and fly to the Home Point at the new altitude. To ensure the aircraft returns home forwards, it cannot rotate or fly left and right during RTH while the Forward Vision System is enabled.
 - Forward Vision System can be enabled during flight or RTH only.

Aircraft

Failsafe RTH

If the Home Point was successfully recorded and the compass is functioning normally, Failsafe RTH will be automatically activated if the remote controller signal is lost for a specified amount of time (3 seconds when using the remote controller and 20 seconds when using Wi-Fi). Return-to-Home can be cancelled by the pilot, allowing them to regain control when the remote controller signal connection is re-established.



-
- Aircraft cannot return to the Home Point when the GPS signal is weak or unavailable.
 - The aircraft cannot avoid obstruction during Failsafe RTH if Forward Vision System is disabled. It is important to set a suitable Failsafe altitude before each flight. Launch the DJI GO 4 app, enter "Camera" and tap to set the Failsafe Altitude.
 - User cannot control the aircraft while it is ascending to its failsafe altitude. However, user can press RTH button to exit the ascent and regain control.

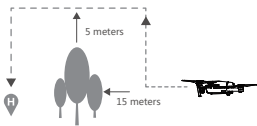
Battery Level Warning	Remark	Aircraft Status Indicator	DJI GO 4 App	Flight Instructions
Low battery level warning	Battery power is low. Land the aircraft.	Aircraft status indicator blinks RED slowly.	Tap "Go-home" to have the aircraft return to the Home point automatically, or "Cancel" to resume normal flight. If no action is taken, the aircraft will automatically go home after 10 seconds. Remote controller will sound an alarm.	Fly the aircraft back and land it as soon as possible, then stop the motors and replace the battery.
Critical Low battery level warning	The aircraft must land immediately.	Aircraft status indicator blinks RED quickly.	The DJI GO 4 app display will flash red and the aircraft will start to descend. The remote controller will sound an alarm.	Allow the aircraft to descend and land automatically.
Estimated remaining flight time	Estimated remaining flight based on current battery level.	N/A	N/A	N/A

- 
- When the Critical low battery level warning is triggered and the aircraft begins to land automatically, push the left stick upward to make the aircraft hover at its current altitude, giving you an opportunity to navigate to a more appropriate landing location.
 - The colored zones and markers on the battery level indicator bar reflect the estimated remaining flight time. They are automatically adjusted according to the aircraft's current location and status.

Precision Landing

The Mavic Pro automatically scans and attempts to match the terrain features underneath during Return to Home. When current terrain matches home point terrain, the Mavic will start landing immediately to achieve precision landing. The DJI GO 4 app will show a terrain feature mismatch prompt if matching fails.

- 
- Precision Landing performance is subject to the following conditions:
 - a. Home point is recorded upon take off, and cannot not be refreshed during flight.
 - b. Aircraft must take off vertically. Take off altitude must be greater than 10 meters.
 - c. Home point terrain features remain largely unchanged.
 - d. Home point terrain with no distinctive features will affect the performance.
 - e. Lighting conditions cannot be too light nor too dark.
 - The following actions are available during landing:
 - a. Pull throttle down to accelerate landing.
 - b. Moving the control sticks in any other direction will stop Precision Landing. The Mavic Pro will descend vertically and Landing Protection will remain active.



- To ensure the aircraft returns home forwards, it cannot rotate during RTH while the Forward Vision System is enabled.
- The aircraft cannot avoid obstacles above, beside, or behind the aircraft.

Aircraft

Intelligent Flight Mode

TapFly

Introduction

With the TapFly feature, users can now tap on the mobile device screen to fly in the designated direction without using the remote controller. The aircraft will automatically avoid obstacles it sees or brake and hover provided that the lighting is appropriate (< 300 lux) nor too bright (> 10,000 lux).

Using TapFly

Ensure the battery level is more than 50% for the Intelligent Flight Battery, and the aircraft is in P-mode.

Then follow the steps below to use TapFly:

1. Take off and ensure the aircraft is flying at least 6ft (2m) above the ground.



2. Launch the DJI GO 4 app and tap , then tap , read and understand the prompts.



Exit TapFly

Use the following methods to exit TapFly:

- 1. Press the Flight Pause button on the remote controller.
- 2. Pull back the pitch stick on the remote controller.
- 3. Tap "STOP" button on the screen.



Aircraft will stop and hover after exiting from TapFly. Tap a new target direction to continue flying or begin manual flight.

ActiveTrack

ActiveTrack allows you to mark and track a moving object on your mobile device screen. The aircraft will automatically avoid obstacles in its flight path. No external tracking device is required.
The Mavic Pro can automatically identify and trace bikes and other vehicles, people and animals, and use different tracking strategies for each.

Using ActiveTrack

- Ensure the Intelligent Flight Battery has more than 50% power and the aircraft is in P-mode. Then follow the steps below to use ActiveTrack:
- 1. Take off and hover at least 6ft (2m) above the ground.



- 2. In the DJI GO 4 app, tap  and tap  to bring up the flight modes and then select ActiveTrack.



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- You must follow local privacy laws and regulations when using ActiveTrack.
 - Aircraft will not be able to avoid obstacles while in Profile or Spotlight Mode. Use these modes in open areas.
- 

- The aircraft will sense and avoid obstacles on its flight path.
 - If the aircraft loses track of the subject, because it is moving too fast or obscured, re-select the subject to resume tracking.

Exiting ActiveTrack

Use the following methods to exit ActiveTrack:

1. Press the Flight Pause button on the remote controller.
2. Tap the "STOP" button on the screen.



OR



Aircraft

After exiting ActiveTrack, the aircraft will hover in place, at which point you may choose to fly manually, track another subject, or return to home.

Gesture Mode

In Gesture Mode, the Mavic's Vision System recognizes gestures, allowing it to follow and capture selfies without a phone or a controller. Follow the steps below to use Gesture Mode:

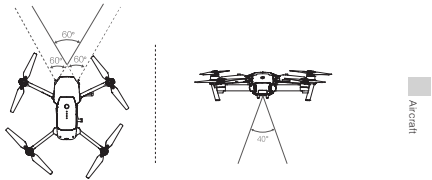
Modes	Prompts	Front LEDs	Remarks
1. Confirm the subject		 Slow Red Flashing	Ensure the forward vision system is active and there is enough light. Tap the icon and move in front of the camera for the Mavic to recognize you.
2. Confirm the distance		 x2 Red Flashes Twice	Raise your arms and wave to the Mavic, the Front LED will blink red twice once it confirms the shooting distance.
3. Selfie Count Down		 Fast Red Flashing	Put your fingers in front on your face as shown.

- 

- Gesture Mode can only be used in Photo Mode.
 - Fly the aircraft 2 meters or higher above the ground then move in front of the camera to be recognized. Front LED Indicators will blink red rapidly if the Mavic Pro fails to recognize a subject.
 - Enabling GPS on your phone will allow the Mavic to follow with more accuracy while flying in Gesture Mode.

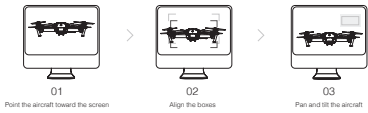
Detection Range

The detection range of the Forward and Downward Vision System is depicted as follow. Note that the aircraft cannot sense or avoid the obstacles that are not within the detection range.



Calibrating Sensors

Forward and Downward Vision Systems cameras installed on the aircraft are calibrated on delivery. However these cameras are vulnerable to excessive impact and will require occasional calibration via DJI Assistant 2 or the DJI GO 4 app. Follow the steps below to calibrate the camera.



Repeat the steps above to calibrate the Downward Vision System cameras.

Quick Calibration

Use quick calibration when the DJI GO 4 app notify that vision sensor calibration is required. Tap through "Aircraft Status" -> "Vision Sensors" to start quick calibration.

- ⚠ Quick calibration is quick fix to vision sensor issues. Connecting the aircraft to a computer to carry out a full calibration using DJI Assistant 2 is recommended when possible. Only calibrate when lighting conditions are adequate and on textured surfaces i.e. grass.
- Do not calibrate the aircraft on highly reflective surfaces such as Marble or ceramics.

- ⚠

The performance of the Forward and Downward Vision Systems are affected by the surface being flown over. Ultrasonic sensors may not be able to accurately measure distances when operating above sound-absorbing materials and the camera may not function correctly in suboptimal environments. The aircraft will switch from P-mode to Atti mode automatically if neither GPS nor Forward and Downward Vision Systems are available. Operate the aircraft with great caution in the following situations:

 - Flying over monochrome surfaces (e.g. pure black, pure white, pure red, pure green).
 - Flying over a highly reflective surfaces.
 - Flying at high speeds of over 22mph (36kph) at 2 meters or over 11mph (18kph) 1 meter.
 - Flying over water or transparent surfaces.
 - Flying over moving surfaces or objects.
 - Flying in an area where the lighting changes frequently or drastically.
 - Flying over extremely dark (lux < 10) or bright (lux > 100,000) surfaces.
 - Flying over surfaces that can absorb sound waves (e.g. thick carpet).
 - Flying over surfaces without clear patterns or texture.
 - Flying over surfaces with identical repeating patterns or textures (e.g. tiling).
 - Flying over inclined surfaces that will deflect sound waves away from the aircraft.

🌀

- Keep sensors clean at all times. Dirt or other debris may adversely affect their effectiveness.
 - The Downward Vision System is only effective when the aircraft is at altitudes of 0.3 to 13 meters.
 - Forward and Downward Vision Systems may not function properly when the aircraft is flying over water.
 - The Forward and Downward Vision System may not be able to recognize patterns on the ground in low light (less than 100lux).
 - Do not use other ultrasonic devices with a frequency of 40KHz when Forward and Downward Vision Systems are in operation.

🔊

- Keep animals away from the aircraft when the Downward Vision System is activated. The sonar sensor emits high frequency sounds that are audible to some animals.

Aircraft

Flight Recorder

Flight data is automatically recorded to the internal storage of the aircraft. This includes flight telemetry, aircraft status information, and other parameters. To access this data, connect the aircraft to the PC through the Micro USB port.

Attaching and Detaching the Propellers

Use only DJI approved propellers with your Mavic Pro. White ring and unmarked propellers indicate where they should be attached and in which direction they should spin.

Propellers	White Ring	Unmarked
Figure		
Attach On	Motors with white marks	Motors without white marks
Legends	 Lock : Turn the propellers in the indicated direction to mount and tighten.  Unlock : Turn the propellers in the indicated direction to loosen and remove.	

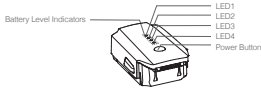
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DJI Intelligent Flight Battery Functions

1. Battery Level Display: The LED indicators display the current battery level.
2. Auto-Discharging Function: To prevent swelling, the battery automatically discharges to below 65% of total power when it is idle for more than ten days. It takes around two days to discharge the battery to 65%. It is normal to feel moderate heat being emitted from the battery during the discharge process. Discharge thresholds can be set in the DJI GO 4 app.
3. Balanced Charging: Automatically balances the voltage of each battery cell when charging.
4. Overcharge Protection: Charging automatically stops when the battery is fully charged.
5. Temperature Detection: The battery will only charge when the temperature is between 5°C (41°F) and 40°C (104°F).
6. Over Current Protection: The battery stops charging when a high amperage (more than 8.5A) is detected.
7. Over Discharge Protection: To prevent over-discharge damage, discharging automatically stops.
8. Short Circuit Protection: Automatically cuts the power supply when a short circuit is detected.
9. Battery Cell Damage Protection: The DJI GO 4 app displays a warning message when a damaged battery cell is detected.
10. Sleep Mode: To save power, the battery will cut off power supply and enter sleep mode after 20 minutes of inactivity.
11. Communication: Information pertaining to the battery's voltage, capacity, current, etc. is transmitted to the aircraft's main controller.

⚠ Refer to *Mavic Pro Intelligent Flight Battery Safety Guidelines* before use. Users take full responsibility for all operations and usage.

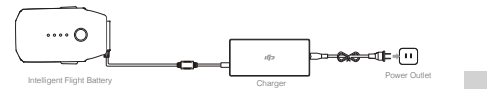
Using the Battery



Turning ON/OFF

- Turning On:** Press the Power Button once, then press again and hold for 2 seconds to turn on. The remote controller system status screen will display the current battery level.
- Turning Off:** Press the Power Button once, then press again and hold for 2 seconds to turn off.

⚠ Always turn off the battery before inserting it or removing it from the Mavic Pro. Never insert or remove a battery when it is turned on.



Battery Level Indicators While Charging					
LED1	LED2	LED3	LED4		Battery Level
☹	○	○	○		0%~25%
☹	☹	○	○		25%~50%
☹	☹	☹	○		50%~75%
☹	☹	☹	☹		75%~100%
○	○	○	○		Fully Charged

Battery Protection LED Display

The table below shows battery protection mechanisms and corresponding LED patterns.

Battery Level Indicators while Charging					
LED1	LED2	LED3	LED4	Blinking Pattern	Battery Protection Item
○	☹	○	○	LED2 blinks twice per second	Over current detected
○	☹	○	○	LED2 blinks three times per second	Short circuit detected
○	○	☹	○	LED3 blinks twice per second	Over charge detected
○	○	☹	○	LED3 blinks three times per second	Over-voltage charger detected
○	○	○	☹	LED4 blinks twice per second	Charging temperature is too low
○	○	○	☹	LED4 blinks three times per second	Charging temperature is too high

After these issues are resolved, press the Power Button to turn off the Battery Level Indicator. Unplug the Intelligent Flight Battery from the charger and plug it back in to resume charging. You do not need to unplug and plug in the charger in the event of a room temperature error; the charger will resume charging when the temperature is within the allowable range.

⚠ DJI does not take any responsibility for damage caused by third-party chargers.

🔋 How to discharge the Intelligent Flight Battery before transport the batteries for long trip:
Fly the Mavic Pro outdoors until there is less than 20% of power left, or until the battery can no longer be turned on.

Remote Controller

Remote Controller Profile

The Mavic Pro remote controller is a multi-function wireless communication device that integrates the video downlink system and aircraft remote control system. The video downlink and aircraft remote control system operate at 2.4 GHz. The remote controller features a number of camera control functions, such as taking and previewing photos and videos, as well as controlling gimbal motion. The battery level is displayed via the LCD Screen of the remote controller.

- **Compliance Version:** The remote controller is compliant with local compliance and regulations.
- **Operating Mode:** Control can be set to Mode 1 or Mode 2, or to a custom mode.
- **Mode 1:** The right stick serves as the throttle.
- **Mode 2:** The left stick serves as the throttle.

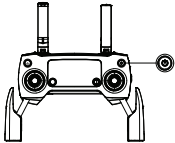
⚠ To prevent transmission interference, do not operate more than three aircraft in the same area.

Using the Remote Controller

Turning the Remote Controller On and Off

The Mavic Pro remote controller is powered by a 2S rechargeable battery that has a capacity of 2970 mAh. Follow the steps below to turn on your remote controller:

1. When the remote controller is turned off, press the Power Button once. The LCD Screen will display the current battery level.
2. Press once, then again and hold the Power Button to turn on the remote controller.
3. The remote controller will beep when it is turned on.
4. Repeat Step 2 to turn off the remote controller.



Charging the Remote Controller

Charge the remote controller using the included charger. Refer to the figure below for more details.

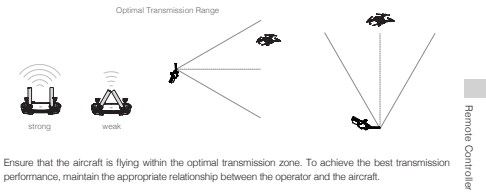
Remote Controller (Mode 2)	Aircraft (◀▶ Indicates Nose Direction)	Remarks
		Moving the left stick up and down changes the aircraft's elevation. Push the stick up to ascend and down to descend. When both sticks are centered, the Mavic Pro will hover in place. The more the stick is pushed away from the center position, the faster the Mavic Pro will change elevation. Always push the stick gently to prevent sudden and unexpected elevation changes.
		Moving the left stick to the left or right controls the rudder and rotation of the aircraft. Push the stick left to rotate the aircraft counter-clockwise, push the stick right to rotate the aircraft clockwise. If the stick is centered, the Mavic Pro will maintain its current orientation. The more the stick is pushed away from the center position, the faster the Mavic Pro will rotate.
		Moving the right stick up and down changes the aircraft's forward and backward pitch. Push the stick up to fly forward and down to fly backward. Mavic Pro will hover in place if the stick is centered. Push the stick further away from the center position for a larger pitch angle (maximum 30°) and faster flight.
		Moving the right stick control left and right changes the aircraft's left and right pitch. Push left to fly left and right to fly right. The Mavic Pro will hover in place if the stick is centered.
		Press the Flight Pause button once to exit from the ActiveTrack, TapFly and Intelligent Navigation flight mode. The aircraft will hover at the current position.

Remote Controller

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- Keep the remote controller away from magnetic materials to avoid it being affected by magnetic interference.
 - Ensure the control sticks are in the center position and not being squeezed by external force during transportation or storage.

Optimal Transmission Range

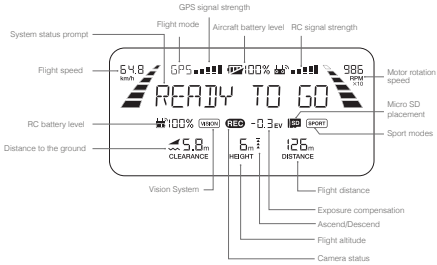
The transmission signal between the aircraft and the remote controller is most reliable within the area that depicted below:



Ensure that the aircraft is flying within the optimal transmission zone. To achieve the best transmission performance, maintain the appropriate relationship between the operator and the aircraft.

LCD Screen

The LCD Screen displays various system statuses including flight telemetry and battery level in real time. Refer to the figure below for the meaning of each icon on the LCD Screen.



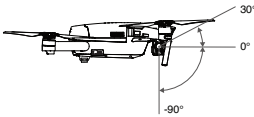
Camera and Gimbal

This section provides the technical specifications of the camera and explains the gimbal's operation modes.

Gimbal

Gimbal Profile

The 3-axis gimbal provides a steady platform for the attached camera, allowing you to capture clear, stable images and video. The gimbal can tilt the camera within a 120° range.



Gimbal Camera

Use the gimbal dial on the remote controller to control camera tilt, or go to Camera View in the DJI GO 4 app, tap and hold on the screen until a blue circle appears, then drag the circle to control the camera's tilt.

The controllable range of the gimbal roll axis is 0° to 90°, enabling you to shoot in Landscape Mode and Portrait Mode. The roll axis will rotate 90° when Portrait Mode is enabled.

⚠️ It is recommended to use the Portrait Mode for taking photos instead of recording video. When the aircraft is flown in ways that taxes the system, for example emergency braking or flying in Sport Mode, the gimbal roll axis will reach its endpoint and cause the gimbal to vibrate.

Gimbal Operation Modes

Two gimbal operation modes are available. Switch between the different operation modes on the camera settings page of the DJI GO 4 app. Note that your mobile device must be connected to the remote controller for changes to take effect. Refer to the table below for details:

⚙️	Follow Mode	The angle between the gimbal's orientation and aircraft's nose remains constant at all times.
	FPV Mode	The gimbal will synchronize with the movement of the aircraft to provide a first-person perspective flying experience.
⚠️	- Remove the Gimbal Clamp before powering on the aircraft. - A gimbal motor error may occur in these situations: (1) The aircraft is placed on uneven ground or the gimbal's motion is obstructed. (2) The gimbal has been subjected to excessive external force, such as a collision. Take off from flat, open ground and protect the gimbal at all times. - Flying in heavy fog or clouds may make the gimbal wet, leading to temporary failure. The gimbal will recover full functionality after it dries. - It is normal for the gimbal to beep upon initialization.	

DJI GO 4 App

The DJI GO 4 app is a mobile application designed specifically for DJI equipment. Use this app to control the gimbal, camera, and other aircraft functions. The app features Equipment, Editor, SkyPixel and Me sections, which are used for configuring your aircraft, editing and sharing your photos and videos with others.

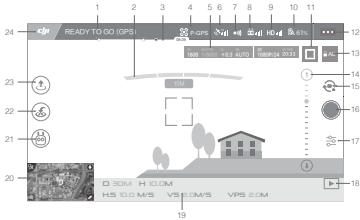


DJI GO 4 App

Equipment

Enter Camera View by tapping Camera on the DJI GO 4 welcome screen.

Camera View



13. Auto Exposure Lock

■ AE : Tap to lock the exposure value.
14. Gimbal Slider

⦿ ⦿ : Displays the pitch of the gimbal.
15. Photo/Video Button

📷 : Tap to switch between photo and video recording modes.
16. Shoot / Record Button

⬢ / ⬢ : Tap to start shooting photos or recording video.
17. Camera Settings

⚙️ : Tap to set ISO, shutter and auto exposure values of the camera.
18. Playback

▶️ : Tap to enter the playback page and preview photos and videos as soon as they are captured.
19. Flight Telemetry

📏 30M : Distance between the aircraft and the Home Point.
H 10.0M : Height from the ground.
HS 10.0M/S : Aircraft horizontal speed.
VS 2.0M/S : Aircraft vertical speed.
20. Map



Tap to view map.
21. Intelligent Flight Mode

🚁 : Tap to select Intelligent Flight Mode.
22. Smart RTH

🏠 : Initiate RTH home procedure. Tap to have the aircraft return to the last recorded home point.
23. Auto Takeoff/Landing

🚀 / 🛬 : Tap to initiate auto takeoff or landing.
24. Back

🏠 : Tap this icon to return to the main menu.

DJI GO 4 App

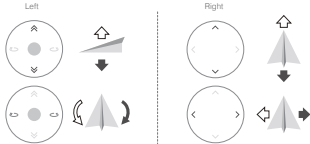
- 
- Launch the DJI GO 4 app and tap the icon on the top right of your screen, then scan the Wi-Fi QR Code on the front arm to start connection. Note that this feature is available on Android devices.
 - When using Wi-Fi in a wide open area with no Electromagnetic Interference, transmission distance is approximately 262ft (80m) at an altitude of 164ft (50m). The maximum flight speed is 9mph (14kph), maximum ascent speed is 2m/s and maximum descent speed is 1m/s.
 - The Wi-Fi frequency of your mobile device can be set to 2.4GHz (default) or 5GHz. On supported devices, set Wi-Fi to 5GHz for less interference.
 - Press and hold the linking button for 5 seconds or more to set Wi-Fi password and SSID. Press and release to reset the transmission frequency to 2.4 GHz.
 - Using Wi-Fi mode in a wide open area with less Electromagnetic Interference. If the Wi-Fi is severely affected by the Electromagnetic Interference, use the remote controller to fly your aircraft instead.

Using Virtual Joysticks

Ensure the mobile device has been connected to the aircraft before using the Virtual Joysticks. The illustrations below are based on Mode 2 (left stick as throttle).



Virtual Joysticks GUI



Move the aircraft upwards, downwards or rotate to the left or right by pressing on the left half of the screen. Move the aircraft forwards, backwards or rotate to the left or right by pressing on the right half of the screen.
Tap on the "Virtual Joysticks" button to enable or disable Virtual Joysticks.

 The area beyond the white cycle is also responsive to control commands.

DJI GO 4 App

Flight

This section describes safe flight practices and flight restrictions.

GPS Signal Strong Blinking Green			
	Flight Limits	DJI GO 4 App	Aircraft Status Indicator
Maximum Flight Altitude	Aircraft's altitude cannot exceed the specified value.	Warning: Height limit reached.	None.
Max Radius	Flight distance must be within the max radius.	Warning: Distance limit reached.	Rapid red flashing  when close to the max radius limit.

GPS Signal Weak Blinking Yellow			
	Flight Limits	DJI GO 4 App	Aircraft Status Indicator
Maximum Flight Altitude	Height is restricted to 16 feet (5 meters) when the GPS signal is weak and Downward Vision System is activated. Height is restricted to 98 feet (30 meters) when the GPS signal is weak and Downward Vision System is inactivated.	Warning: Height limit reached.	None.
Max Radius	No limits		

- 
- If the aircraft flies out of the limit, you can still control the aircraft, but you cannot fly it any farther.
 - If the aircraft flies out of the max radius, it will fly back within range automatically when GPS signal is strong.
 - For safety reasons, please do not fly close to airports, highways, railway stations, railway lines, city centers, or other sensitive areas. Fly the aircraft only within your line of sight.

No-Fly Zones

All No-Fly Zones are listed on the DJI official website at <http://www.dji.com/flysafe/no-fly>. No-Fly Zones are divided into Airports and Restricted Areas. Airports include major airports and flying fields where manned aircraft operate at low altitudes. Restricted Areas include border lines between countries or sensitive institute.

Pretflight Checklist

1. Remote controller, Intelligent Flight Battery, and mobile device are fully charged.
2. Propellers are mounted correctly and firmly.
3. Micro SD card has been inserted, if necessary.
4. Gimbal is functioning normally.
5. Motors can start and are functioning normally.
6. The DJI GO 4 app is successfully connected to the aircraft.
7. Ensure that the sensors for the Forward and Downward Vision System are clean.

4. Re-calibrate the aircraft if the aircraft status indicators blink red.

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- If the Aircraft Status Indicator blinks red and yellow after the calibration procedure, move your aircraft to a different location and try again.
- 🧭

- DO NOT calibrate the compass near metal objects such as a metal bridge, cars, scaffolding.
 - If the aircraft status indicator is blinking red and yellow alternately after placing the aircraft on the ground, the compass has detected magnetic interference. Change your location.

Auto Takeoff and Auto Landing

Auto Takeoff

Use auto takeoff only if the Aircraft Status Indicators are blinking green. Follow the steps below to use the auto takeoff feature:

1. Launch the DJI GO 4 app, and enter "Camera" page.

2. Complete all steps on the pre-flight checklist.

3. Tap , and confirm that conditions are safe for flight. Slide the icon to confirm and takeoff.

4. Aircraft takes off and hovers at 1.2 meters above ground.

⚠

Aircraft Status Indicator blinks rapidly when it is using the Downward Vision System for stabilization. The aircraft will automatically hover below 13 meters. It is recommended to wait until there is sufficient GPS before using the Auto Take-off feature.

Auto-Landing

Use auto-landing only if the Aircraft Status Indicator is blinking green. Follow the steps below to use the auto-landing feature:

1. Tap on , to ensure the landing condition is ideal. Slide to confirm.

2. Abort landing process immediately by using the  button on the screen.

3. a. When Landing Protection determines that the ground is suitable for landing, the Mavic Pro will land gently.

b. If Landing Protection determines that the ground is not suitable for landing, the Mavic Pro will hover and wait for pilot confirmation.

c. If Landing Protection is not operational, the DJI GO 4 app will display a landing prompt when the Mavic Pro descends below 0.5 meters. Pull down on the throttle or use the auto landing slider to land.

4. Aircraft will land and turn off automatically.

Flight

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- When the Aircraft Status Indicator blinks yellow rapidly during flight, the aircraft has entered Fallsafe mode.
 - A low battery level warning is indicated by the Aircraft Status Indicators blinking red slowly or rapidly during flight.
 - Watch our video tutorials for more flight information.

Video Suggestions and Tips

1. Go through the full pre-flight checklist before each flight.
2. Select the desired gimbal operation mode in the DJI GO 4 app.
3. Only shoot video when flying in P-mode.
4. Always fly in good weather and avoid flying in rain or heavy wind.
5. Choose the camera settings that suit your needs. Settings include photo format and exposure compensation.
6. Perform flight tests to establish flight routes and preview scenes.
7. Push the control sticks gently to keep the aircraft's movement smooth and stable.

Flight

Specifications	
Aircraft	
Weight	1.62 lbs (734 g)
Weight (including gimbal cover)	1.64 lbs (743 g)
Dimensions	83 x 83 x 198 mm (folded)
Diagonal Length (propellers excluded)	335 mm
Max Ascent Speed	16.4 ft/s (5 m/s) in Sport Mode
Max Descent Speed	9.8 ft/s (3 m/s)
Max Speed	40.4 mph (65 kph) in Sport Mode without wind
Max Service Ceiling Above Sea Level	16404 feet (5000 m)
Max Flight Time	27 minutes (0 wind at a consistent 15.5 mph (25 kph))
Max Hovering Time	24 minutes (0 wind)
Avg. Flight Time	21 minutes (general flight, 15% battery left)
Max Flight Distance	8 mi (13 km, 0 wind)
Operating Temperature	32° to 104° F (0° to 40° C)
Satellite Positioning Systems	GPS/GLONASS
Gimbal	
Controllable Range	Pitch: -90° to +30°, Roll: 0°or 90° (Horizontally and vertically)
Forward Vision System	
Sensing Range	Precision measurement range: 2 ft (0.7 m) to 49 ft (15 m) Detectable range: 49 ft (15 m) to 98 ft (30 m)
Operating Environment	Surfaces with clear patterns and adequate lighting (lux > 15)
Downward Vision System	
Velocity Range	≤ 22.4 mph (36 kph) at 6.6 ft (2 m) above ground
Altitude Range	1 - 43 feet (0.3 - 13 m)
Operating Range	1 - 43 feet (0.3 - 13 m)
Operating Environment	Surfaces with a clear patterns and adequate lighting (lux > 15)
Camera	
Sensor	1/2.3" CMOS Effective pixels:12.35 Megapixels (Total pixels: 12.71 M)
Lens	78.8° FOV, 28 mm (35 mm format equivalent) f2.2 Distortion <1.5% Focus from 0.5 m to ∞
ISO Range	100 - 3200 (video), 100 - 1600 (photo)
Electronic Shutter Speed	8 s to 1/8000 s
Max Image Size	4000x3000
Still Photography Modes	Single shot
	Burst shooting: 3/5/7 frames
	Auto Exposure Bracketing (AEB):
	3/5 bracketed frames at 0.7EV Bias
	Interval HDR

Appendix

Using DJI Assistant 2

Use the DJI Assistant 2 to update the firmware for the remote controller and the aircraft simultaneously.
Follow the instructions below to update the firmware through DJI Assistant 2:

1. With the remote controller and the aircraft powered off, connect the remote controller to the computer through the charging port using a micro USB cable.
2. Power on the remote controller and aircraft.
3. Launch DJI Assistant 2 and login with your DJI account.
4. Select "Mavic Pro" and click on the "Firmware Updates" on the left panel.
5. Select the firmware version that you wish to update.
6. Wait for the firmware to be downloaded and firmware update will start automatically.
7. Reboot the aircraft and the remote controller after the firmware update is complete.

- • The remote controller and the aircraft can also be updated separately.
• If you connect the aircraft to the computer via the aircraft's micro USB port, you are only able to update the aircraft firmware.
- • The firmware update will take around 15 minutes. It is normal that the gimbal goes limp, aircraft status indicator blinks abnormally and the aircraft reboots. Please wait patiently until the update is complete.
• Ensure the computer has access to the Internet.
• Ensure the batteries have at least 50% power.
• Do not disconnect the aircraft from the computer during firmware update.

Appendix

Intelligent Flight Mode

Intelligent Flight mode includes Course Lock, Home Lock, Point of Interest (POI), Follow Me and Waypoints features to assist users to create professional shoots during the flight. Course Lock and Home Point lock helps to lock the orientation of aircraft so that the user can focus more on other operations. Point of Interest, Follow Me and Waypoints mode enable aircraft to fly automatically according to the pre-set flight maneuvers.

Course Lock	Lock the current nose direction as the aircraft's forward direction. The aircraft will move in the locked directions regardless of its orientation (yaw angle).
Home Lock	Pull the pitch stick backward to move the aircraft toward its recorded Home Point.
Point of Interest	The aircraft will orbit around the subject automatically to allow the operator can be more focus on framing their shoot on the subject in Point of Interest.
Follow Me	A virtual tether is created between the aircraft and the mobile device so that the aircraft can track your movement as you move. Note that Follow Me performance is subject to the GPS accuracy on the mobile device.
Waypoints	Record a flight path, then the aircraft will fly along the same path repeatedly while you control the camera and orientation. The flight path can be saved and re-apply in the future.

Enable Multiple Flight Mode by launching the DJI GO 4 app > Camera View >  > Multiple Flight Mode before using the Intelligent Flight Mode for the first time.

STICK ERR+RE-CTR STCK	Control stick is not centered. Re-center it.
WHEEL ERR+RE-CTR WHEL	Left Dial on the remote controller is not centered. Re-center it.
STICK ERR	Control stick error. Calibrate the control sticks in the DJI GO 4 app.
MECH ERR	Remote Controller Error. Calibrate the remote controller in the DJI GO 4 app. If this problem persists, contact DJI support.
STICK EM/3+AUTO RTH	Control Sticks are experiencing severe electromagnetic interference and cannot function. The aircraft will return to home and land immediately.
STICK EM/2+MANUAL RTH	Control Sticks are experiencing electromagnetic interference and may not function. Use Smart RTH and land the aircraft as soon as possible.
STICK EM/1	Control Sticks are experiencing slight electromagnetic interference. fly the aircraft to another location.
SD FULL SD	Micro SD Card is full.
NO PROP	No propellers attached.
BAT TEMP HI	Intelligent Flight Battery is too hot.
BATTERY ERR	Intelligent Flight Battery error.
BAT TEMP LO	Intelligent Flight Battery is too cold.
LOW BATTERY	Intelligent Flight Battery low battery.
RC LOW BAT	Remote Controller low battery.
NO RC SIGNAL	Remote Controller signal lost.
RC TEMP HI	Remote Controller too hot.
STICK EMI	Control stick is suffering electromagnetic interference.
STICK ERR	Control Stick Error.
NO RTH	Aircraft cannot Return to Home.

After-Sales Information

Visit the following pages to learn more about After-sales policy and warranty information:

1. After-sales Policy: <http://www.dji.com/service>
2. Refund Policy: <http://www.dji.com/service/refund-return>
3. Paid Repair Service: <http://www.dji.com/service/repair-service>
4. Warranty Service: <http://www.dji.com/service/warranty-service>