U.S. Department
of Transportation
**Federal Aviation
Administration**

800 Independence Ave., S.W.
Washington, D.C. 20591

May 12, 2015

Exemption No. 11565
Regulatory Docket No. FAA–2015–0411

Mr. Gregory Dirk Sichel
3900 County Line Road
Suite 4A
Tequesta, FL 33469

Dear Mr. Sichel:

This letter is to inform you that we have granted your request for exemption. It transmits our decision, explains its basis, and gives you the conditions and limitations of the exemption, including the date it ends.

By letter dated February 12, 2015, you petitioned the Federal Aviation Administration (FAA) for an exemption. The exemption would allow the petitioner to operate an unmanned aircraft system (UAS) to conduct aerial photography for the education of real estate professionals and real estate marketing purposes.

See Appendix A for the petition submitted to the FAA describing the proposed operations and the regulations that the petitioner seeks an exemption.

The FAA has determined that good cause exists for not publishing a summary of the petition in the Federal Register because the requested exemption would not set a precedent, and any delay in acting on this petition would be detrimental to the petitioner.

Airworthiness Certification

The UAS proposed by the petitioner is a DJI Inspire 1.

The petitioner requested relief from 14 CFR part 21, *Certification procedures for products and parts, Subpart H—Airworthiness Certificates*. In accordance with the statutory criteria provided in Section 333 of Public Law 112−95 in reference to 49 U.S.C. § 44704, and in consideration of the size, weight, speed, and limited operating area associated with the

aircraft and its operation, the Secretary of Transportation has determined that this aircraft meets the conditions of Section 333. Therefore, the FAA finds that the requested relief from 14 CFR part 21, *Certification procedures for products and parts, Subpart H—Airworthiness Certificates,* and any associated noise certification and testing requirements of part 36, is not necessary.

The Basis for Our Decision

You have requested to use a UAS for aerial data collection. The FAA has issued grants of exemption in circumstances similar in all material respects to those presented in your petition. In Grants of Exemption Nos. 11062 to Astraeus Aerial (*see* Docket No. FAA−2014−0352), 11109 to Clayco, Inc. (*see* Docket No. FAA−2014−0507), 11112 to VDOS Global, LLC (*see* Docket No. FAA−2014−0382), and 11213 to Aeryon Labs, Inc. (*see* Docket No. FAA−2014−0642), the FAA found that the enhanced safety achieved using an unmanned aircraft (UA) with the specifications described by the petitioner and carrying no passengers or crew, rather than a manned aircraft of significantly greater proportions, carrying crew in addition to flammable fuel, gives the FAA good cause to find that the UAS operation enabled by this exemption is in the public interest.

Having reviewed your reasons for requesting an exemption, I find that—

- They are similar in all material respects to relief previously requested in Grant of Exemption Nos. 11062, 11109, 11112, and 11213;
- The reasons stated by the FAA for granting Exemption Nos. 11062, 11109, 11112, and 11213 also apply to the situation you present; and
- A grant of exemption is in the public interest.

Our Decision

In consideration of the foregoing, I find that a grant of exemption is in the public interest. Therefore, pursuant to the authority contained in 49 U.S.C. 106(f), 40113, and 44701, delegated to me by the Administrator, Mr. Gregory Dirk Sichel is granted an exemption from 14 CFR §§ 61.23(a) and (c), 61.101(e)(4) and (5), 61.113(a), 61.315(a), 91.7(a), 91.119(c), 91.121, 91.151(a)(1), 91.405(a), 91.407(a)(1), 91.409(a)(1) and (2), and 91.417(a) and (b), to the extent necessary to allow the petitioner to operate a UAS to perform aerial data collection. This exemption is subject to the conditions and limitations listed below.

Conditions and Limitations

In this grant of exemption, Mr. Gregory Dirk Sichel is hereafter referred to as the operator.

Failure to comply with any of the conditions and limitations of this grant of exemption will be grounds for the immediate suspension or rescission of this exemption.

1. Operations authorized by this grant of exemption are limited to the DJI Inspire 1 when weighing less than 55 pounds including payload. Proposed operations of any other aircraft will require a new petition or a petition to amend this exemption.

2. Operations for the purpose of closed-set motion picture and television filming are not permitted.

3. The UA may not be operated at a speed exceeding 87 knots (100 miles per hour). The exemption holder may use either groundspeed or calibrated airspeed to determine compliance with the 87 knot speed restriction. In no case will the UA be operated at airspeeds greater than the maximum UA operating airspeed recommended by the aircraft manufacturer.

4. The UA must be operated at an altitude of no more than 400 feet above ground level (AGL). Altitude must be reported in feet AGL.

5. The UA must be operated within visual line of sight (VLOS) of the PIC at all times. This requires the PIC to be able to use human vision unaided by any device other than corrective lenses, as specified on the PIC's FAA-issued airman medical certificate or U.S. driver's license.

6. All operations must utilize a visual observer (VO). The UA must be operated within the visual line of sight (VLOS) of the PIC and VO at all times. The VO may be used to satisfy the VLOS requirement as long as the PIC always maintains VLOS capability. The VO and PIC must be able to communicate verbally at all times; electronic messaging or texting is not permitted during flight operations. The PIC must be designated before the flight and cannot transfer his or her designation for the duration of the flight. The PIC must ensure that the VO can perform the duties required of the VO.

7. This exemption and all documents needed to operate the UAS and conduct its operations in accordance with the conditions and limitations stated in this grant of exemption, are hereinafter referred to as the operating documents. The operating documents must be accessible during UAS operations and made available to the Administrator upon request. If a discrepancy exists between the conditions and limitations in this exemption and the procedures outlined in the operating documents, the conditions and limitations herein take precedence and must be followed. Otherwise, the operator must follow the procedures as outlined in its operating documents. The operator may update or revise its operating documents. It is the operator's responsibility to track such revisions and present updated and revised documents to the Administrator or any law enforcement official upon request. The operator must also present updated and revised documents if it petitions for extension or amendment to this grant of exemption. If the operator determines that any update or revision would affect the basis upon which the FAA granted this exemption, then

the operator must petition for an amendment to its grant of exemption. The FAA's UAS Integration Office (AFS−80) may be contacted if questions arise regarding updates or revisions to the operating documents.

8. Any UAS that has undergone maintenance or alterations that affect the UAS operation or flight characteristics, e.g., replacement of a flight critical component, must undergo a functional test flight prior to conducting further operations under this exemption. Functional test flights may only be conducted by a PIC with a VO and must remain at least 500 feet from other people. The functional test flight must be conducted in such a manner so as to not pose an undue hazard to persons and property.

9. The operator is responsible for maintaining and inspecting the UAS to ensure that it is in a condition for safe operation.

10. Prior to each flight, the PIC must conduct a pre-flight inspection and determine the UAS is in a condition for safe flight. The pre-flight inspection must account for all potential discrepancies, e.g., inoperable components, items, or equipment. If the inspection reveals a condition that affects the safe operation of the UAS, the aircraft is prohibited from operating until the necessary maintenance has been performed and the UAS is found to be in a condition for safe flight.

11. The operator must follow the UAS manufacturer's maintenance, overhaul, replacement, inspection, and life limit requirements for the aircraft and aircraft components.

12. Each UAS operated under this exemption must comply with all manufacturer safety bulletins.

13. Under this grant of exemption, a PIC must hold either an airline transport, commercial, private, recreational, or sport pilot certificate. The PIC must also hold a current FAA airman medical certificate or a valid U.S. driver's license issued by a state, the District of Columbia, Puerto Rico, a territory, a possession, or the Federal government. The PIC must also meet the flight review requirements specified in 14 CFR § 61.56 in an aircraft in which the PIC is rated on his or her pilot certificate.

14. The operator may not permit any PIC to operate unless the PIC demonstrates the ability to safely operate the UAS in a manner consistent with how the UAS will be operated under this exemption, including evasive and emergency maneuvers and maintaining appropriate distances from persons, vessels, vehicles and structures. PIC qualification flight hours and currency must be logged in a manner consistent with 14 CFR § 61.51(b). Flights for the purposes of training the operator's PICs and VOs (training, proficiency, and experience-building) and determining the PIC's ability to safely operate the UAS in a manner consistent with how the UAS will be operated under this exemption are permitted under the terms of this exemption. However,

training operations may only be conducted during dedicated training sessions. During training, proficiency, and experience-building flights, all persons not essential for flight operations are considered nonparticipants, and the PIC must operate the UA with appropriate distance from nonparticipants in accordance with 14 CFR § 91.119.

15. UAS operations may not be conducted during night, as defined in 14 CFR § 1.1. All operations must be conducted under visual meteorological conditions (VMC). Flights under special visual flight rules (SVFR) are not authorized.

16. The UA may not operate within 5 nautical miles of an airport reference point (ARP) as denoted in the current FAA Airport/Facility Directory (AFD) or for airports not denoted with an ARP, the center of the airport symbol as denoted on the current FAA-published aeronautical chart, unless a letter of agreement with that airport's management is obtained or otherwise permitted by a COA issued to the exemption holder. The letter of agreement with the airport management must be made available to the Administrator or any law enforcement official upon request.

17. The UA may not be operated less than 500 feet below or less than 2,000 feet horizontally from a cloud or when visibility is less than 3 statute miles from the PIC.

18. If the UAS loses communications or loses its GPS signal, the UA must return to a pre-determined location within the private or controlled-access property.

19. The PIC must abort the flight in the event of unpredicted obstacles or emergencies.

20. The PIC is prohibited from beginning a flight unless (considering wind and forecast weather conditions) there is enough available power for the UA to conduct the intended operation and to operate after that for at least five minutes or with the reserve power recommended by the manufacturer if greater.

21. Air Traffic Organization (ATO) Certificate of Waiver or Authorization (COA). All operations shall be conducted in accordance with an ATO-issued COA. The exemption holder may apply for a new or amended COA if it intends to conduct operations that cannot be conducted under the terms of the attached COA.

22. All aircraft operated in accordance with this exemption must be identified by serial number, registered in accordance with 14 CFR part 47, and have identification (N−Number) markings in accordance with 14 CFR part 45, Subpart C. Markings must be as large as practicable.

23. Documents used by the operator to ensure the safe operation and flight of the UAS and any documents required under 14 CFR §§ 91.9 and 91.203 must be available to the PIC at the Ground Control Station of the UAS any time the aircraft is operating.

These documents must be made available to the Administrator or any law enforcement official upon request.

24. The UA must remain clear and give way to all manned aviation operations and activities at all times.

25. The UAS may not be operated by the PIC from any moving device or vehicle.

26. All Flight operations must be conducted at least 500 feet from all nonparticipating persons, vessels, vehicles, and structures unless:
    a. Barriers or structures are present that sufficiently protect nonparticipating persons from the UA and/or debris in the event of an accident. The operator must ensure that nonparticipating persons remain under such protection. If a situation arises where nonparticipating persons leave such protection and are within 500 feet of the UA, flight operations must cease immediately in a manner ensuring the safety of nonparticipating persons; and
    b. The owner/controller of any vessels, vehicles or structures has granted permission for operating closer to those objects and the PIC has made a safety assessment of the risk of operating closer to those objects and determined that it does not present an undue hazard.

    The PIC, VO, operator trainees or essential persons are not considered nonparticipating persons under this exemption.

27. All operations shall be conducted over private or controlled-access property with permission from the property owner/controller or authorized representative. Permission from property owner/controller or authorized representative will be obtained for each flight to be conducted.

28. Any incident, accident, or flight operation that transgresses the lateral or vertical boundaries of the operational area as defined by the applicable COA must be reported to the FAA's UAS Integration Office (AFS−80) within 24 hours. Accidents must be reported to the National Transportation Safety Board (NTSB) per instructions contained on the NTSB Web site: www.ntsb.gov.

If this exemption permits operations for the purpose of closed-set motion picture and television filming and production, the following additional conditions and limitations apply.

29. The operator must have a motion picture and television operations manual (MPTOM) as documented in this grant of exemption.

30. At least 3 days before aerial filming, the operator of the UAS affected by this exemption must submit a written Plan of Activities to the local Flight Standards District Office (FSDO) with jurisdiction over the area of proposed filming. The 3-day

notification may be waived with the concurrence of the FSDO. The plan of activities must include at least the following:

a. Dates and times for all flights;
b. Name and phone number of the operator for the UAS aerial filming conducted under this grant of exemption;
c. Name and phone number of the person responsible for the on-scene operation of the UAS;
d. Make, model, and serial or N−Number of UAS to be used;
e. Name and certificate number of UAS PICs involved in the aerial filming;
f. A statement that the operator has obtained permission from property owners and/or local officials to conduct the filming production event; the list of those who gave permission must be made available to the inspector upon request;
g. Signature of exemption holder or representative; and
h. A description of the flight activity, including maps or diagrams of any area, city, town, county, and/or state over which filming will be conducted and the altitudes essential to accomplish the operation.

31. Flight operations may be conducted closer than 500 feet from participating persons consenting to be involved and necessary for the filming production, as specified in the exemption holder's MPTOM.

Unless otherwise specified in this grant of exemption, the UAS, the UAS PIC, and the UAS operations must comply with all applicable parts of 14 CFR including, but not limited to, parts 45, 47, 61, and 91.

This exemption terminates on May 31, 2017, unless sooner superseded or rescinded.

Sincerely,

/s/
John S. Duncan
Director, Flight Standards Service

Enclosures

FAA Exemption Rulemaking Section 333

Of The FAA Reform Act and Part 11

Prepared by

Gregory Dirk Sichel Private Pilot

February 12, 2015

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Tequesta, Florida 33469

512-430-2227/ dirksichel@gmail.com

Attention: United States Secretary of Transportation Mr. Anthony R. Foxx□1200 New Jersey Ave., SE□Washington, DC 20590

Re: Exemption Request Section 333 of the FAA Reform Act and Part 11 of the Federal Aviation Regulations from 14 CFR 45.23(b); 14 CFR Part 21; 14 CFR 61.113 (a) & (b); 91.7 (a); 91.9 (b) (2); 91.103 (b); 91.109; 91.119; 91.121; 91.151 (a); 91.203 (a) & (b); 91.409 (a) (2); 91.417 (a) & (b)

Attachments:
1) Inspire 1 User manual V1.0 2014.12
2) Inspire 1 (Quick Start Guide) V1.0
3) Inspire 1 Safety Guidelines V1.0 2014.12

References:
1) FAA Exemption No. 11138, Regulatory Docket No. FAA20140481
In the matter of the petition of DOUGLAS TRUDEAU

Dear Mr. Secretary,

Pursuant to Section 333 of the FAA Modernization and Reform Act of 2012 (the Reform Act) and 14 CFR Part 11, Gregory Dirk Sichel, private pilot, and operator of Small Unmanned Aircraft Systems ("sUASs") equipped to conduct aerial photography for the education of real estate professionals and real estate marketing purposes, hereby applies for an exemption from the listed Federal Aviation Regulations ("FARs") to allow commercial operation of its sUASs, so long as such operations are conducted within and under the conditions outlined herein or as may be established by the FAA as required by Section 333.

As described more fully below, the requested exemption would permit the operation of small, unmanned and relatively inexpensive sUAS under controlled conditions in airspace that is 1) limited 2) predetermined and 3) controlled as to access. Approval of this exemption would thereby fulfill the Secretary of Transportation's (the responsibilities to "...establish requirements for the safe operation of such aircraft systems in the national airspace system." Section 333 (c) of the Reform Act.

Sincerely;

Gregory Dirk Sichel
3900 County Line Road, Suite 4A
Tequesta, Florida 33469

The name and address of the applicant is:

Gregory Dirk Sichel
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Tequesta, Florida 33469

Private Pilot FAA 3575382
512-430-2227

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Regulations from which the exemption is requested:

14 CFR Part 21
14 CFR 45.23 (b)
14 CFR 61.113 (a) & (b)
14 CFR 91.7 (a)
14 CFR 91.9 (b) (2)
14 CFR 91.103
14 CFR 91.109
14 CFR 91.119
14 CFR 91.121
14 CFR 91.151 (a)
14 CFR 91.203 (a) & (b)
14 CFR 91.405 (a)
14 CFR 407 (a) (1)
14 CFR 409 (a) (2)
14 CFR 417 (a) & (b)

This exemption application is expressly submitted to fulfill Congress' goal in passing Section 333 (a) through (c) of the Reform Act. This directs the Secretary of Transportation to consider whether certain unmanned aircraft systems may operate safely in the national airspace system (NAS) before completion of the rulemaking required under Section 332 of the Reform Act. In making this determination, the Secretary is required to determine which types of UASs do not create a hazard to users of the NAS or the public or pose a threat to national security in light of the following:

- The UAS's size, weight, speed, and operational capability:

- Operation of the UAS in close proximity to airports and populated areas; and

- Operation of the UAS within Visual Line of Sight (VLOS) of the Pilot and Observers. Reform Act §333 (a). Lastly, if the Secretary determines that such vehicles "may operate safely in the national airspace system, the Secretary shall establish requirements for the safe operation of such aircraft in the national airspace system." Id. §333 (c) (emphasis added). The Federal Aviation Act expressly grants the FAA the authority to issue

exemptions. This statutory authority by its terms includes exempting civil aircraft, as the term is defined under §40101 of the Act; that includes sUASs, from the requirement that all civil aircraft must have a current airworthiness certificate. The Administrator may grant an exemption from a requirement of a regulation prescribed under subsection (a) or (b) of this section or any sections 44702-44716 of this title if the Administrator finds the exemption in the public interest. 49 U.S.C. §44704; 14 CFR §91.203 (a) (1).

Gregory Dirk Sichel's UAS(s) are small rotorcraft aircraft, the DJI Inspire 1, weighing less than10 lbs. including sensor payload. They operate their rotorcraft, under normal conditions at a speed of no more than 20 knots, usually 3-5 knots, and have the capability to hover, and move in the vertical and horizontal plane simultaneously. They will manually operate only in Visual Line of Sight and will operate only within the operating parameters as described in the Operating Manual attached as Attachment1.

Adherence to the Operating Manual will insure that the sUAS will "not create a hazard to the national airspace system or the public."

Given the small size and weight of the sUAS involved and the restricted sterile environment within which they will operate, the applicant falls squarely within that zone of safety (an equivalent level of safety) in which Congress envisioned that the FAA must, by exemption, allow commercial operations of UASs to commence immediately. Also due to the size of the UASs and the areas in which the relevant sUAS will operate, approval of the application presents no national security issue. Given the clear direction in Section 333 of the Reform Act, the authority contained in the Federal Aviation Act, as amended; the strong equivalent level of safety, surrounding the proposed operations, and significant public benefit, including enhanced safety, reduction in environmental impact, including reduced emissions associated with allowing UASs for educational and marketing operations, (as opposed to full scale aircraft), the granting of the requested exemptions is in the public interest. Accordingly, the applicant respectfully requests that the FAA grant the requested exemption without delay.

AIRCRAFT AND EQUIVALENT LEVEL OF SAFETY

The applicant proposes that the exemption requested herein apply to civil aircraft that have the characteristics and that operate with the limitations listed herein. These limitations provide for at least an equivalent or possibly higher level of safety to operations under the current regulator structure because the proposed operations represent a safety enhancement to the already safe filming operations conducted with conventional aircraft. These limitations and condition to which Gregory Dirk Sichel agrees to be bound when conducting commercial operations under an FAA issued exemption include:

1. The sUAS will weigh less than 10 lbs.

2. Flights will be operated manually within visual line of sight (VLOS) of the Pilot and aircrew (Spotter / Observer).

3. Maximum total flight time for each operational flight will be 20 minutes. Flights will be terminated at 25% battery power reserve should that occur prior to the 20 minute limit.

4. Flights will be operated at an altitude of no more than 400 feet AGL, though most operations will be conducted within 50 feet of the ground

5. Minimum two (2) man crew for each sUAS operation will consist of the Pilot and Spotter / Observer. In most cases the third aircrew member will serve as the Safety Officer.

6. The sUAS Pilot will be an FAA licensed airman with at least a private pilot's certificate and third class medical and valid driver's license.

7. The sUAS Pilot will serve as Pilot in Command (PIC). If a pilot certificate holder, other than the sUAS Pilot, possesses the necessary PIC qualifications and is also present, that person can also be designated as PIC.

8. The sUAS will only operate within an area of Palm Beach, Broward, Martin and Vero Counties, Florida.

9. Additionally, the sUAS will only operate under 400ft AGL, and outside a 5 statute mile radius of any airport. The sUAS will never enter any MOA or Restricted Airspace, nor shall it violate any TFR as outlined by the FAA.

9. A pre-flight briefing will be conducted in regard to the planned sUAS operation prior to each day's flying / recording activities. It will be mandatory that all personnel who will be performing duties as "flight crew" be present for this briefing.

10. The Operator will obtain the consent of all persons involved in the filming and ensure that only consenting persons will be allowed within 100 feet of the flight operation, and this radius may be reduced to 30 feet based upon an equivalent level of safety determination.

11. Pilot and Spotter (Observer) will have been trained in operation of sUAS generally and received up-to-date information on the particular sUAS to be operated as required.

12. Spotter (Observer) and Pilot will at all times be able to communicate by voice or radio.

13. Written and/or oral permission from the relevant property holders will be obtained.

14. If the sUAS loses communications or loses its GPS signal, the UAS will have capability to return to a pre-determined location and land.

15. The sUAS will have the capability to abort a flight in case of unpredicted obstacles or emergencies.

A. The sUAS Pilot in Command (PIC) shall possess at a minimum, a private pilot certificate and current third-class medical certificate.

i. The PIC shall also meet the flight review requirements specified in 14 CFR §61.56 in an aircraft in which the PIC is rated on their pilot certificate.

ii. The PIC shall be trained in the operation of the specific make and model of the sUAS being piloted and successfully completed all training required.

iii. The PIC shall have accumulated and logged, in a manner consistent with 14 CFR §61.51 (b), a minimum of 200 flight cycles and 25 hours of total time as a sUAS rotorcraft pilot and at least five hours logged as a sUAS pilot with a similar sUAS type (multirotor or helicopter). Prior documented flight experience that was obtained in compliance with applicable regulations may satisfy this requirement.

iv. The PIC shall have accumulated and logged, in a manner consistent with 14 CFR §61.51 (b), a minimum of five hours as sUAS pilot operating the make and model of sUAS to be utilized for operations under the exemption and three take-offs and three landings in the preceding 90 days.

v. Training, proficiency, and experience-building flights can also be conducted under this grant of exemption to accomplish the required flight cycles and flight time.

1. During training, proficiency, and experience-building flights, all persons not essential for flight operations are considered non-participants, and the PIC must operate the sUAS with appropriate distance from non-participants in accordance with 14 CFR §91.119.

B. The sUAS Safety Observer (SO) shall meet all training requirements and be responsible for all of his/her duties as set forth by GCUAS sUAS Operating Manual.

C. The PIC and SO will be designated before each flight

i. Minimum crew for each flight operation will consist of the sUAS PIC and SO.

D. The PIC and SO shall always be within visual line of sight (VLOS) of each other and in direct verbal communication at all times.

E. Safety Briefings shall be conducted before each day's activities to include, but not limited to:

i. Designated roles of PIC and SO

ii. Risk Management and Mitigation

F. Liability Insurance

General Liability Insurance shall be maintained in the amount of 500,000/100,000.

DJI Inspire

Model	T600		
Weight (Battery Included)	2935 g	103.5 Ounces	6.5 lbs.
Hovering Accuracy (Vertical)	0.5m	1.6 feet	
(Horizontal)	2.5m	8.2 feet	
Max Angular Velocity (Yaw)	150°/s		
Max Tilt Angle	35°		
Max Ascent Speed	5 m/s	16.4 feet/s	
Max Decent Speed	4 m/s	13.1 feet	
Max Speed	22m/s	72.2 feet/s	
Max Flight Time	18 minutes		
Operating Temperature Range	-10° to 40° C		
Dimensions	438x451x301 mm	18x18x12 inches	

14 CFR Part 21, Subpart H: Airworthiness Certificates 14 CFR §91.203 (a) (1)

Subpart H, entitled Airworthiness Certificates, establishes the procedural requirements for the issuance of airworthiness certificates as required by FAR §91.203 (a) (1). Given the size and limited operating area associated with the aircraft to be utilized by the Applicant, an exemption from Part 21 Subpart H meets the requirements of an equivalent level of safety under Part 11 and Section 333 of the Reform Act. The Federal Aviation Act (49 U.S.C. §44701 (f)) and Section 333 of the Reform Act both authorize the FAA to exempt aircraft from the requirement capability, and proximity to airports and populated areas of the particular UAS. In all cases, an analysis of these criteria demonstrates that the UAS operated without an airworthiness certificate, in the restricted environment and under the conditions proposed will be at least as safe, or safer, than a conventional aircraft (fixed-wing or rotorcraft) operating with an airworthiness certificate without the restrictions and conditions proposed.

The sUAS to be operated hereunder is less than 10 lbs. fully loaded, carries neither a pilot nor passenger, carries no explosive materials nor flammable liquid fuels, and operates exclusively within a limited radius area as set out in the pre flight briefing / VLOS operations. Unlike other civil aircraft, operations under this exemption will be tightly controlled and monitored by both the Operator, pursuant to safety requirements, and under the requirements and in compliance with local public safety requirements, to provide security for the area of operation as is now

done with conventional aircraft. These safety enhancements, which already apply to civil aircraft operated in connection with video production, provide a greater degree of safety to the public and property owners than conventional operations conducted with airworthiness certificates issued under 14 C.F.R. Part 21, Subpart H. Lastly, application of these same criteria demonstrates that there is no credible threat to national security posed by the UAS, due to its size, speed of operation, location of operation, lack of explosive materials or flammable liquid fuels, and inability to carry a substantial external load.

14 CFR §45.23 (B): Marking of the Aircraft
The regulation requires:

When marks include only the Roman capital letter "N" and the registration number is displayed on limited, restricted or light-sport category aircraft or experimental or provisionally certificated aircraft, the operator must also display on that aircraft near each entrance to the cabin, cockpit, or pilot station, in letters not less than 2 inches nor more than 6 inches high, the words "limited," "restricted", "light-sport," "experimental," or "provisional," as applicable.

Even though the UAS will have no airworthiness certificate, an exemption may be needed as the UAS will have no entrance to the cabin, cockpit or pilot station on which the word "Experimental" can be placed. Given the size of the sUAV, two-inch lettering will be impossible. The word "Experimental" will be placed on the fuselage in compliance with §45.29 (f).

The equivalent level of safety will be provided by having the sUAV marked on its fuselage as required by §45.29 (f) where the Pilot, Spotter (Observer) and others working with the sUAV will see the identification of the UAS as "Experimental." The FAA has issued the following exemptions to this regulation to Exemptions Nos. 10700, 8738, 10167 and 10167A.

14 CFR §61.113 (a) & (b): Private Pilot Privileges and Limitations - Pilot in Command (PIC)

Sections 61.113 (a) & (b) limit private pilots to non-commercial operations. Because the UAS will not carry a pilot or passengers, the proposed operations can achieve the equivalent level of safety of current operations by requiring the PIC operating the aircraft to have a private pilot's license rather than a commercial pilot's license to operate this small UAS. Unlike a conventional aircraft that carries the pilot and passengers, the sUAS is remotely controlled with no living thing on board. The area of operation is controlled and restricted, and all flights are planned and coordinated in advance as set forth in the Operating Manual. The level of safety provided by the requirements included in the Operating Manual meets that provided by single individual holding a commercial pilot's certificate operating a conventional aircraft. The risks associated with commercial operations contemplated by Part 61 when drafted,

that allowing operations of the sUAS as requested with a private pilot as the PIC exceeds the present level of safety achieved by 14 CFR §61.113 (a) & (b).

14 CFR §91.7 (a): Civil Aircraft Airworthiness

The regulation requires that no person may operate a civil aircraft unless it is in airworthy condition. As there will be no airworthiness certificate issued for the aircraft, should this exemption be granted, no FAA regulatory standard will exist for determining airworthiness. Given the size of the aircraft and the requirements contained in the Operating Manual for maintenance and use of safety checks prior to each flight, as set forth in the Operating Manual, an equivalent level of safety will be provided.

14 CFR §91.9 (b) (2): Civil Aircraft Flight Manual in the Aircraft

Section 91.9 (b) (2) provides: No person may operate a U.S.-registered civil aircraft ...

(2) For which an Airplane or Rotorcraft Flight Manual is not required by §21.5 of this chapter, unless there is available in the aircraft a current approved Airplane or Rotorcraft Flight Manual, approved manual material, markings, and placards, or any combination thereof.

The sUAS, given its size and configuration has no ability or place to carry such a flight manual on the aircraft, not only because there is no pilot on board, but because there is no room or capacity to carry such an item on the aircraft.

The equivalent level of safety will be maintained by keeping the Operating Manual at the ground control point where the pilot flying the sUAS will have immediate access to it. The FAA has issued the following exemptions to this regulation: Exemption Nos. 8607, 8737, 8738, 9299, 9299A, 9565, 9565B, 10167, 10167A 10602, 32827, and 10700

14 CFR §91.103: Preflight Action

This regulation requires each pilot in command to take certain actions before flight to insure the safety of flight. As FAA approved rotorcraft flight manuals will not be provided for the aircraft an exemption will be needed. An equivalent level of safety will be provided as set forth in the Operating Manual. The PIC will take all actions including reviewing weather, flight battery requirements, landing and takeoff distances and aircraft performance data before initiation of flight.

14 CFR §91.109: Flight Instruction

Section 91.103 provides that no person may operate a civil aircraft (except a manned free balloon) that is being used for flight instruction unless that aircraft has fully functioning dual controls. SUASs and remotely piloted aircraft, by their design do not have fully functional dual controls. Flight control is accomplished

through the use of a control box that communicates with the aircraft via radio communications. The FAA has approved exemptions for flight training without fully functional dual controls for a number of aircraft and for flight instruction in experimental aircraft. See Exemptions Nos. 5778K & 9862A. The equivalent level of safety provided by the fact that aircraft will be piloted by a certified private pilot who has previously trained in remote flight areas before attempting flight within filming distance of structures.

14 CFR §91.119: Minimum Safe Altitudes

Section 91.119 establishes safe altitudes for operation of civil aircraft. Section 91.119 (d) allows helicopters to be operated at less than the minimums prescribed, provided the person operating the helicopter complies with any route or altitudes prescribed for helicopters by the FAA. As this exemption is for a sUAS, Gregory Dirk Sichel requests authority to operate at altitudes up to 400 ft. AGL; an exemption may be needed to allow such operations. As set forth herein, the UAS will never operate at higher than 400 ft. AGL. It will however be operated in a controlled area where buildings and people will not be exposed to operations without their pre-obtained consent.

The equivalent level of safety will be achieved given the size, weight, speed of the UAS as well as location where it is operated. No flight will be taken without the permission of the property owner. Because of the advance notice to the property owner and participants in the photographic activity, all affected individuals will be aware of the planned flight operations as set forth in the Operating Manual. Compared to flight operations with aircraft or rotorcraft weighing far more than the maximum 10 lbs. proposed herein and the lack of flammable fuel, any risk associated with these operations is far less than those presently presented with conventional aircraft operating at or below 500 ft. AGL. In addition, the low-altitude operations of the sUAS will ensure separation between these small UAS operations and the operations of conventional aircraft that must comply with Section 91.119.

14 CFR §91.121: Altimeter Settings

This regulation requires each person operating an aircraft to maintain cruising altitude by reference to an altimeter that is set "...to the elevation of the departure airport or an appropriate altimeter setting available before departure." As the sUAS will not have a barometric altimeter, but instead a GPS altitude read out, an exemption may be needed. An equivalent level of safety will be achieved by the operator, pursuant to the Operating Manual and Safety Check list, confirming the altitude of the launch site shown on the GPS altitude indicator before flight.

14 CFR §91.151 (a): Fuel Requirements for Flight in VFR Conditions

Section 91.151 (a) prohibits an individual from beginning "a flight in an airplane under VFR conditions unless (considering wind and forecast weather conditions)

there is enough fuel to fly to the first point of intended landing, and, assuming normal cruising speed – (1) During the day, to fly after that for at least 30 minutes; or (2) At night, to fly after that for at least 45 minutes."

The battery powering the sUAS provides approximately 20 minutes of powered flight. To meet the 30 minute reserve requirement in 14 CFR §91.151, sUAS flights would be impossible. Given the limitations on the UAS's proposed flight area and the location of its proposed operations within a predetermined area, a longer time frame for flight in daylight or night VFR conditions is reasonable.

Applicant believes that an exemption from 14 CFR §91.151 (a) falls within the scope of prior exemptions. See Exemption 10673 (allowing Lockheed Martin Corporation to operate without compliance with FAR 91.151 (a)). Operating the small UAS, in a tightly controlled area where only people and property owners or official representatives who have signed waivers will be allowed, with less than 30 minutes of reserved fuel, does not engender the type of risks that Section 91.151 (a) was intended to alleviate given the size and speed of the small UAS. Additionally, limiting sUAS flights would greatly reduce the utility for which the exemption will be granted.

Applicant believes that an equivalent level of safety can be achieved by limiting flights to 20 minutes or 25% of battery power whichever happens first. This restriction would be more than adequate return the sUAS to its planned landing zone from anywhere in its limited operating area.

Similar exemptions have been granted to other operations, including Exemptions 2689F, 5745, 10673, and 10808.

14 CFR §91.203 (a) and (b): Carrying Civil Aircraft Certification and Registration

The regulation provides in pertinent part:

(a) Except as provided in §91.715, no person may operate a civil aircraft unless it has within it the following:

(1) An appropriate and current airworthiness certificate...

(b) No person may operate a civil aircraft unless the airworthiness certificate required by paragraph (b) of this section or a special flight authorization issued under §91.715 is displayed at the cabin or cockpit entrance so that it is legible to passengers or crew.

The UAS fully loaded weighs no more than 10 lbs. and is operated without an onboard Pilot. As such, there is no ability or place to carry certification and registration documents or to display them on the sUAS.

An equivalent level of safety will be achieved by keeping these documents at the ground control point where the Pilot flying the sUAS will have immediate access

to them, to the extent they are applicable to the sUAS, and should they be issued. The FAA has issued numerous exemptions to this regulation. A representative sample of other exceptions includes Exemption Nos. 9565, 9665, 9789, 9789A, 9797, 9797A, 9816A, and 10700.

14 CFR §91.405 (a); 407 (a) (2); 417 (a) & (b): Maintenance Inspections

These regulations require that an aircraft operator or owner "shall have that aircraft inspected as prescribed in subpart E of this part and shall between required inspections, except as provided in paragraph C of this section, have discrepancies repaired as prescribed in Part 43 of this chapter...," and others shall inspect or maintain the aircraft in compliance with Part 43.

Given that these section and Part 43 apply only to aircraft with an airworthiness certificate, these sections will not apply to the applicant. Maintenance will be accomplished by the operator; pursuant to the Operating manual. An equivalent level of safety will be achieved because these small UASs are very limited in size and will carry a small payload and operate only in restricted areas for limited periods of time. If mechanical issues arise the UAS can land immediately and will be operating from no higher than 400 ft. AGL. As provided in the Operating Manual, the PIC (operator) will ensure that the UAS is in working order prior to initiating flight, and perform required maintenance. Moreover, the operator is the person most familiar with the aircraft and best suited to maintain the aircraft in an airworthy condition to provide the equivalent level of safety.

*********□Pursuant to 14 CFR Part 11, the following summary is provided for publication in the Federal Register, should it be determined that publication is needed:

Applicant seeks an exemption from the following rules:□14 CFR § 21, subpart H; 14 CFR § 45.23 (b); 14 CFR § 61.113 (a) & (b); 91.7 (a); 91.9 (b) (2); 91.103 (b); 91.109; 91.119; 91.121; 91.151 (a); 91.203 (a) & (b); 91.405 (a); 91.407 (a) (1); 91.409 (a) (2) and 91.417 (a) & (b) to operate commercially a small unmanned vehicle (5lbs or less) in Educational and Marketing operations.

Privacy

All flights will occur over private or controlled access property with the property owner's prior consent and knowledge, or over remote public land. Image capture of people will rarely take place, but in the event they are, they will have consented prior to being filmed or otherwise have agreed to be in the area where data collection will take place.

Airborne Image Capture

With regard to airborne filming, Gregory Dirk Sichel adheres to all FAA regulations. Further Gregory Dirk Sichel airborne teams operate under the principals of: Safety First, Quality Assurance, Accountability, Reporting, and Training. When approved by the FAA it is Gregory Dirk Sichel's mandate to treat all sUAS operations the exact same level of professionalism and seriousness as that of conventional aircraft.

Approval of exemptions allowing commercial operations of sUASs in the real estate industry will enhance safety by reducing risk. Conventional filming operations, using turbine or piston powered aircraft present the risks associated with vehicles that weigh in the neighborhood of 2,000lbs.+, carrying large amounts of Jet A or 100LL (90 gallons for the aircraft primarily used by Gregory Dirk Sichel). Such aircraft must fly to and from photographing location. In contrast, a sUAS weighing fewer than 10lbs and powered by batteries eliminates virtually all of the risk given the substantial reduced mass and lack of combustible fuel carried on board. The sUAS is typically transported to the location via auto or cargo van in a medium sized case and is never flown to set. The sUAS will carry no passengers or crew and, therefore, will not expose them to the risks associated with manned aircraft

The operation of small UASs, weighting less than 10lbs., conducted in the strict conditions outlined above, will provide an equivalent level of safety supporting the grant of the exemptions requested herein, including exempting the applicant from the requirements of Part 21 and allowing commercial operations. These lightweight aircraft operate at slow speeds, close to the ground, and in a sterile environment and, as a result, are far safer than ground than conventional operations conducted with piston helicopters or fixed wing aircraft operating in

relatively close proximity to the ground and people.

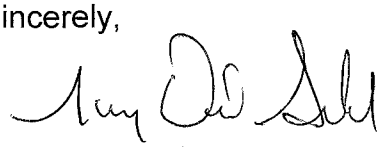
The primary market of interest for Gregory Dirk Sichel utilizing sUASs is the marketing of real property, and the second is the education of real estate professionals.

It is anticipated that the airborne image capture process will be accomplished exclusively in day time VFR environments. To capture the highest quality of resolution the majority of airborne data collections will take place during the 07:00am – 07:00pm (19:00) window.

Summary

Satisfaction of the criteria provided in Section 333 of the Reform Act of 2012 – size, weight, speed, operating capabilities, proximity to airports and populated areas and operation within visual line of sight and national security – provide more than adequate justification for the grant of the requested exemptions allowing commercial operation of applicant's sUAS in the real estate industry pursuant to the Operating Manual appended hereto. Gregory Dirk Sichel is eagerly standing by to support the FAA and sUAS community in its quest to establish proper regulations and protocols for the safe introduction of unmanned aircraft into the national airspace.

Sincerely,



Gregory Dirk Sichel
3900 County Line Road
Suite 4A
Tequesta, Florida 33469
512-430-2227

Exhibit 1

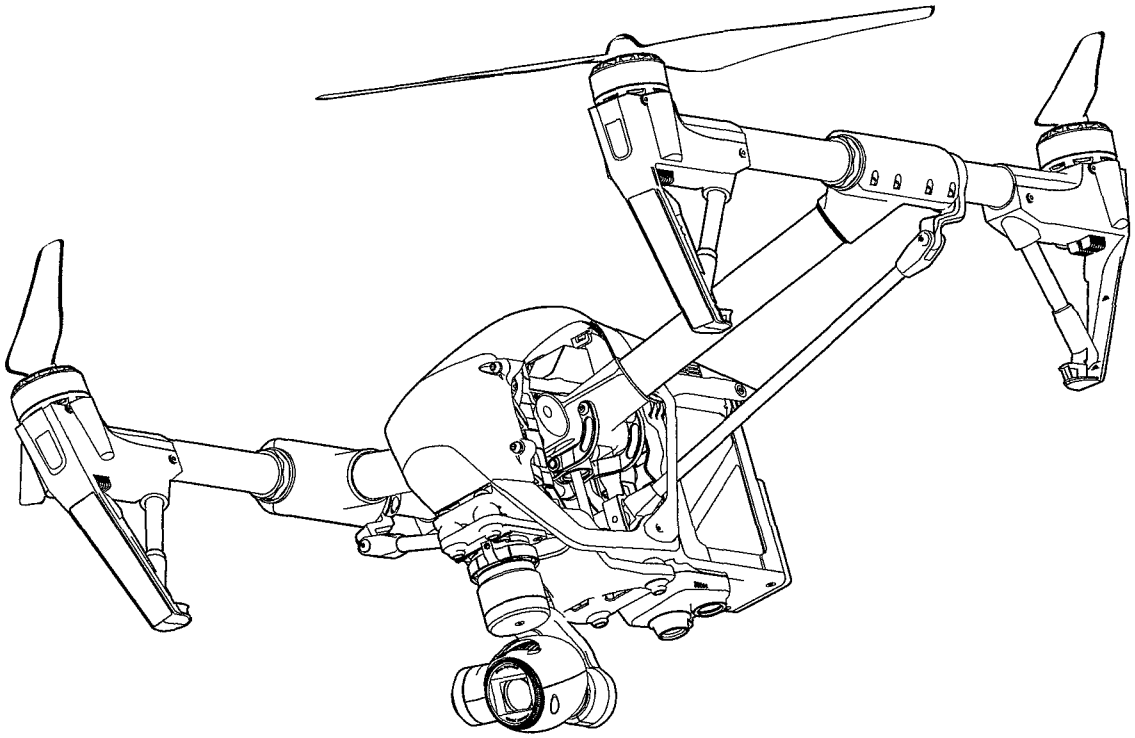
DJI Inspire 1

User Manual

INSPIRE 1

User Manual V1.0

2014.12



Using this manual

Legends

⊘ Warning ⚠ Important Hints and Tips Reference

Before Flight

The following tutorials and manuals have been produced to ensure you to make full use of your Inspire 1.

1.Disclaimer
2.In the Box
3.Inspire 1 Quick Start Guide
4.Safety Guidelines
5.Inspire 1 User Manual
6.Intelligent Flight Battery Safety Guidelines

Watching all the tutorial videos and reading the Disclaimer before flight is recommended. Afterwards, prepare for your first flight by using the Inspire 1 Quick Start Guide. Refer to this manual for more comprehensive information.

Watch the video tutorials

Please watch the tutorial video below to learn how to use Inspire 1 correctly and safely:

www.dji.com/product/inspire-1/video

Download the DJI Pilot app

Download and install the DJI Pilot app before use. Scan the QR code or visit "http://m.dji.net/djipilot" to download the app.

For the best experience, use mobile device with Andriod V 4.1.2 or above, iOS version is coming soon.

Contents

Product Profile

This chapter describes the features of Inspire 1, instructs you to assemble the aircraft and explains the components on the aircraft and remote controllers.

Product Profile

Introduction

The Inspire 1 is brand new quadcopter capable of capturing 4K video and transmitting an HD video signal (up to 2km) to multiple devices straight out of the box. Equipped with retractable landing gear, it can capture an unobstructed 360 degree view from its camera. The built-in camera has an integrated gimbal to maximize stability and weight efficiency while minimizing space. When no GPS signal is available, Vision Positioning technology provides hovering precision.

Feature Highlights

Camera and Gimbal: Up to 4K video recording and 12 megapixel photo capture. Reserved mounting space for ND filters for better exposure control. New quick-release mount allows you to remove the camera with ease.

HD Video Downlink: Low latency, HD downlink powered by an enhanced version of the DJI Lightbridge system. It also provides dual controllers mode.

Landing gear: Retractable landing gear that enables an unobstructed panoramic view from the camera.
DJI Intelligent Flight Battery: 4500 mAh DJI Intelligent Flight Battery employs new battery cells and a battery management system.

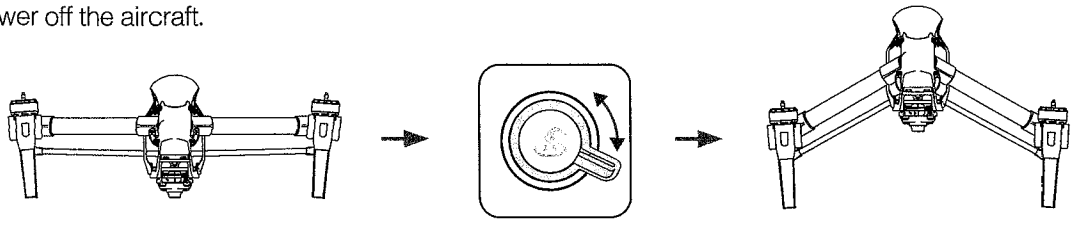
Flight Controller: The next generation flight controller system provides a more reliable flight experience. A new flight recorder stores the flight data from each flight, and Vision Positioning enhances hovering precision when no GPS is available.

Assemble the Aircraft

Unlocking Travel Mode

The aircraft is in Travel Mode during delivery. Follow these steps to change it to Landing Mode before your first flight:

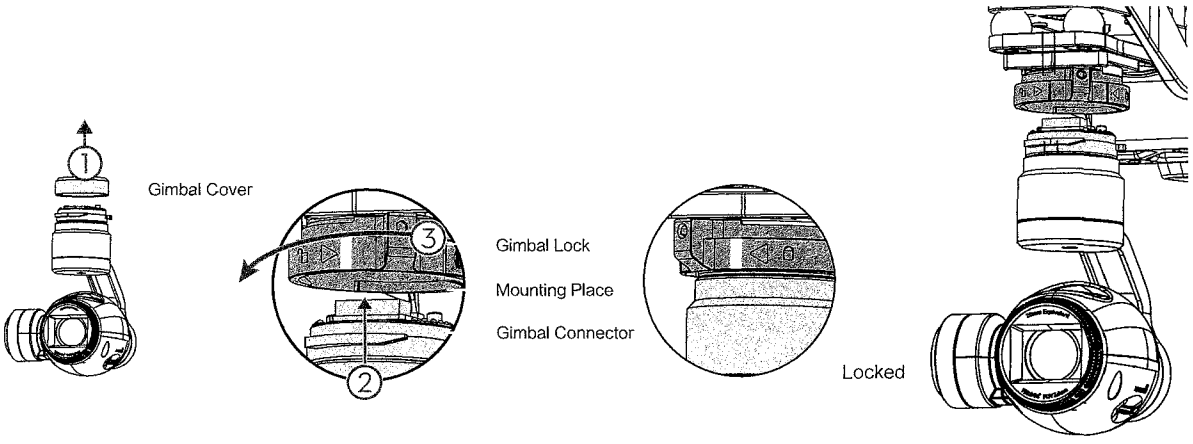
1. Insert the Intelligent Flight Battery into the battery compartment.
2. Power on the Remote Controller and the Intelligent Flight Battery.
3. Toggle the Transformation Switch up and down at least four times.
4. Power off the aircraft.



⚠
- Battery must be fully charged before using it for the first time. Refer to "Charging the Intelligent Flight Battery" (P21) for more information .
- If you have purchased the dual remote controller version, you must use the Master remote controller to deactivate Travel Mode. Refer to "Setting Up Dual Remote Controllers Mode" (P30) section for more infromation about Master remote controller.
- Be sure to remove the gimbal from the aircraft before switch from Landing Mode to Travel Mode.
- Place the aircraft on the smooth and reflective surface (e.g. table or tile) before switching between the travel modes to the landing mode. Do not place the aircraft on the rough and sound-absorbing surface (e.g. carpet) before switching between the travel modes and landing mode.

Installing Gimbal and Camera

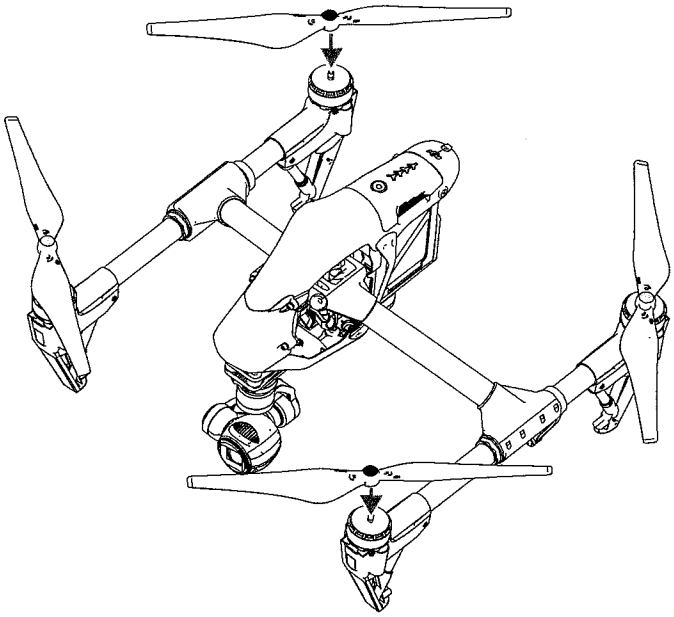
1. Remove Gimbal Cover.
2. Rotate the Gimbal Lock to the unlocked position (to the right when facing the nose of the aircraft).
3. Insert the gimbal by aligning the white mark on the Gimbal.
4. Rotate the Gimbal Lock back into the locked position.



⚠ Ensure the Micro-SD card is correctly inserted into the camera.

Attaching Propellers

Attach propellers with the black nut onto motors with the black dot and spin counter-clockwise to secure. Attach propellers with gray nut onto motors without a black dot and spin clockwise to secure.

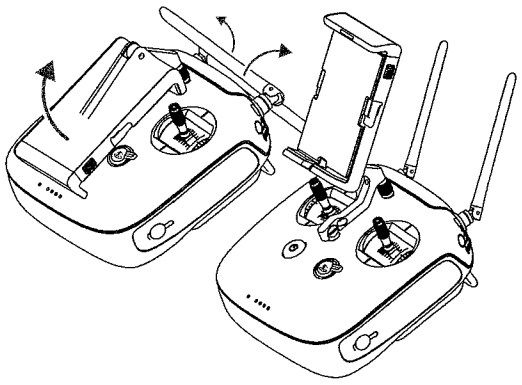


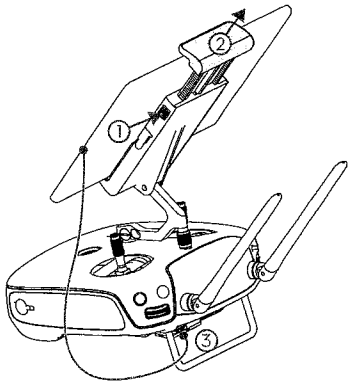
⚠ Place all propellers onto the correct motor and tighten by hand to ensure security before flight.

Preparing Remote Controller

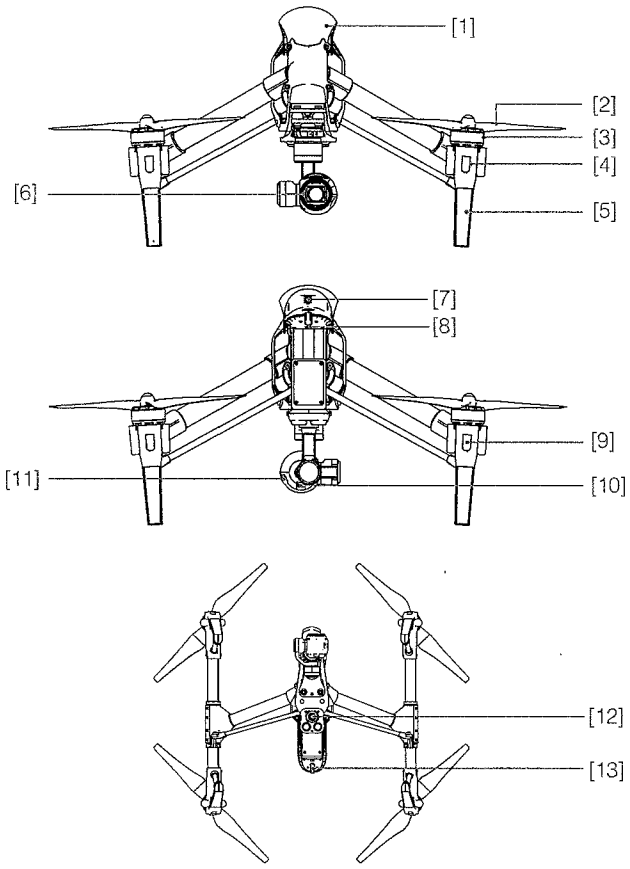
Tilt the Mobile Device Holder to the desired position then adjust the antenna as shown.

1. Press the button on the side of the Mobile Device Holder to release the clamp, adjust it to fit then attach your mobile device.
2. Connect your mobile device to the remote controller with a USB cable.
3. Plug one end of the cable into your mobile device, and the other end into the USB port on the back of the remote controller.





Aircraft Diagram



[1] GPS

[2] Propeller (P17)

[3] Motor

[4] Front LED (P12)

[5] Landing gear

[6] Gimbal and Camera (P37)

[7] Intelligent Flight Battery (P18)

[8] Aircraft Micro-USB Port

[9] Rear LED (P12)

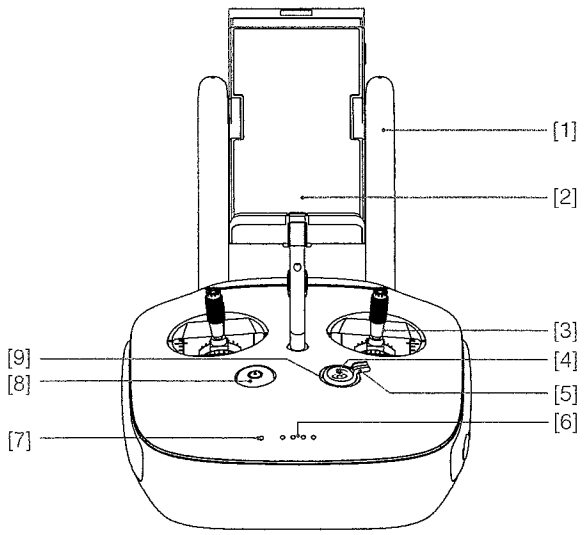
[10] Camera Micro-USB Port

[11] Camera Micro-SD Card Slot (P35)

[12] Vision Positioning Sensors (P16)

[13] Aircraft Status Indicator (P13)

Remote Controller Diagram



[1] Antennas (P29)

Relays aircraft control and video signal.

[2] Mobile Device Holder

Mounting place for your mobile device.

[3] Control Stick

Controls aircraft orientation.

[4] Return Home (RTH) Button (P13)

Press and hold the button to initiate Return to Home (RTH).

[5] Transformation Switch (P27)

Toggle the switch up or down to raise or lower the landing gear.

[6] Battery Level LEDs

Displays the current battery level.

[7] Status LED

Displays the power status.

[8] Power Button

Used to power on or power off the remote controller.

[9] RTH LED

Circular LED around the RTH button displays RTH status.

[10] 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 Pilot app.

[11] Playback Button

Playback the captured images or videos.

[12] Shutter Button

Press to take a photo. If in burst mode, the set number of photos will be taken with one press.

[13] Flight Mode Switch

Used to switch between P, A and F mode.

[14] Video Recording Button

Press to start recording video. Press again to stop recording.

[15] Gimbal Dial

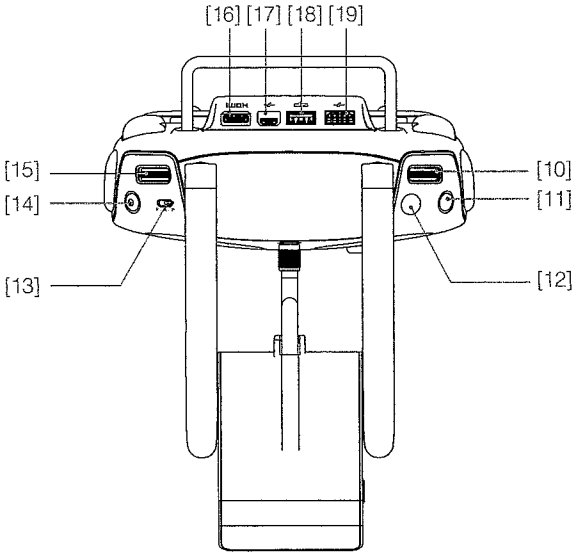
Use this dial to control the tilt of the gimbal.

[16] Micro-USB Port

For connecting the remote controller to your computer.

[17] Mini-HDMI Port

Connect an HD compatible monitor to this port to get a live HD video preview of what the camera sees.

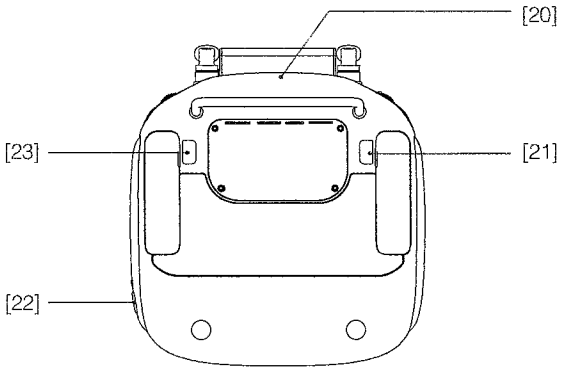


[18] CAN Bus Port

Reserved for future use.

[19] USB Port

Connect to mobile device to access all of the DJI Pilot app controls and features.



[20] GPS Module

Used to pinpoint the location of the remote controller.

[21] Back Left Button

Customizable button in DJI Pilot app.

[22] Power Port

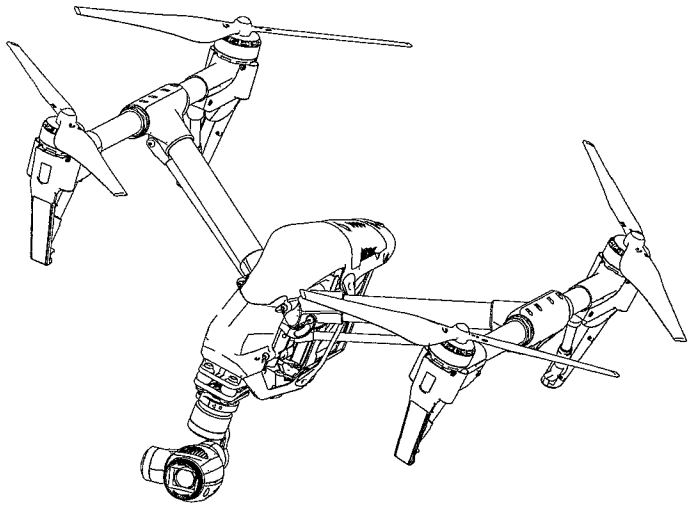
Connect to a power source to charge the remote controller's internal battery.

[23] Back Right Button

Customizable button in DJI Pilot app.

Aircraft

This chapter describes the features of the Flight Controller, Vision Positioning System and the Intelligent Flight Battery.



Aircraft

Flight Controller

The Inspire 1's flight controller is based on DJI flight controller with several enhancements such as new flight mode and new safe mode. Three safe modes are available: Failsafe, Return Home and Dynamic Home Point. These features ensure the safe return of your aircraft if the control signal is lost. A flight recorder stores crucial flight data for each flight.

Flight Mode

Three flight modes are available. The details of each flight mode are found in the section below:

P mode (Positioning) : P mode works best when GPS signal is strong. There are three different states of P mode, which will be automatically selected by the Inspire 1 depending on GPS signal strength and Vision Positioning sensors:

P-GPS: GPS and Vision Positioning both are available, and the aircraft is using GPS for positioning.

P-OPTI: Vision Positioning is available but the GPS signal is not. Aircraft is using only Vision Positioning for hovering

P-ATTI: Neither GPS or Vision Positioning available, aircraft is using only its barometer for positioning, so only altitude is controlled.

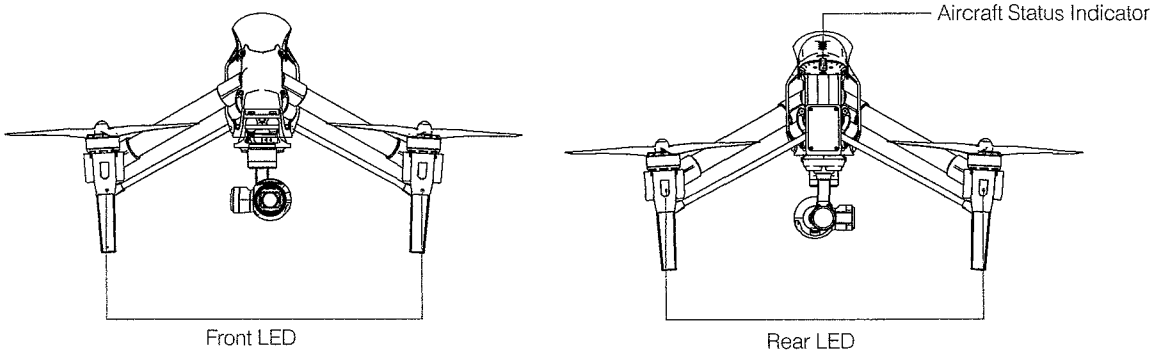
A mode (Attitude): The GPS and Vision Positioning System is not used for holding position. The aircraft only uses its barometer to maintain altitude. If it is still receiving a GPS signal, the aircraft can automatically return home if the Remote Controller signal is lost and if the Home Point has been recorded successfully.

F mode (Function): Intelligent Orientation Control (IOC) is activated in this mode. For more information about IOC, refer to the IOC in Appendix.

Use the Flight Controller mode switch to change the flight mode of the aircraft, refer to the "Flight Mode Switch" on P27 for more information.

Flight Status Indicator

The INSPIRE 1 comes with the Front LED, Rear LED and Aircraft Status Indicator. The positions of these LEDs are shown in the figure below:



The Front and Rear LED show the orientation of the aircraft. The Front LED displays solid red and the Rear LED displays solid green.

Aircraft Status Indicator shows the system status of the flight controller. Refer to the table below for more information about the Aircraft Status Indicator:

Aircraft Status Indicator Description

Normal	
Ⓡ Ⓖ Ⓨ ····· Red, Green and Yellow Flash Alternatively	Power on and self-check
Ⓖ Ⓨ ····· Green and Yellow Flash Alternatively	Aircraft warming up
Ⓖ ····· Green Flashes Slowly	Safe to Fly (P mode with GPS and Vision Positioning)
ⒼX2 ····· Green Flashes Twice	Safe to Fly (P mode with Vision Positioning but without GPS)
Ⓨ ····· Yellow Flashes Slowly	Safe to Fly (A mode but No GPS and Vision Positioning)
Warning	
Ⓨ ····· Fast Yellow Flashing	Remote Controller Signal Lost
Ⓡ ····· Slow Red Flashing	Low Battery Warning
Ⓡ ····· Fast Red Flashing	Critical Low Battery Warning
Ⓡ ····· Red Flashing Alternatively	IMU Error
Ⓡ —— Solid Red	Critical Error
Ⓡ Ⓨ ····· Red and Yellow Flash Alternatively	Compass Calibration Required

Return to Home (RTH)

The Return to Home (RTH) brings the aircraft back to the last recorded Home Point. There are three cases that will trigger RTH procedure; they are Smart RTH, Low Battery RTH and Failsafe RTH.

	GPS	Description
Home Point		The Home Point is the location at which your aircraft takes off when the GPS signal is strong. You can view the GPS signal strength through the GPS icon ( ). If you are using the Dynamic Home Point setting, the Home Point will be updated to your current position as you move around and when the Aircraft Status Indicator blinks green.

Smart RTH

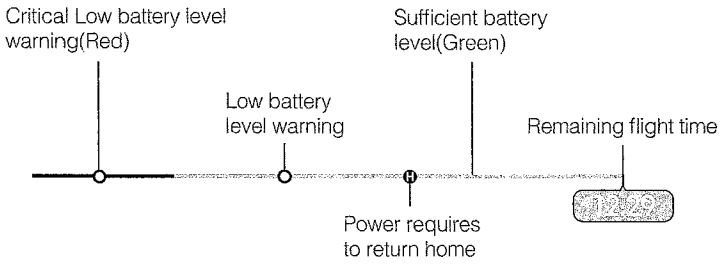
Using the RTH button on the remote controller (refer to "RTH button" on P28 for more information) or the RTH button in the DJI Pilot app when GPS is available to enables smart RTH. The aircraft return to the latest recorded Home Point, you may control the aircraft's orientation to avoid collision during the Smart RTH. Press the Smart RTH button once to start the process, press the Smart RTH button again to exit Smart RTH and regain the control.

Low Battery RTH

The low battery level failsafe is triggered when the DJI Intelligent Flight Battery is depleted to a point that may affect the safe return of the aircraft. Users are advised to return home or land the aircraft immediately when these warnings are shown. DJI Pilot app will advise user to return the aircraft to the Home Point when low battery warning is triggered. Aircraft will automatically return to the Home Point if no action is taken after 10 seconds countdown. User can cancel the RTH by pressing once on the RTH button. The thresholds for these warnings are automatically determined based on the current aircraft altitude and its distance from the Home Point.

Aircraft will land automatically if the current battery level can only support the aircraft to land to the ground from the current altitude. User can use the remote controller to control the aircraft's orientation during the landing process.

The Battery Level Indicator is displayed in the DJI Pilot app, and is described below



Battery level indicator

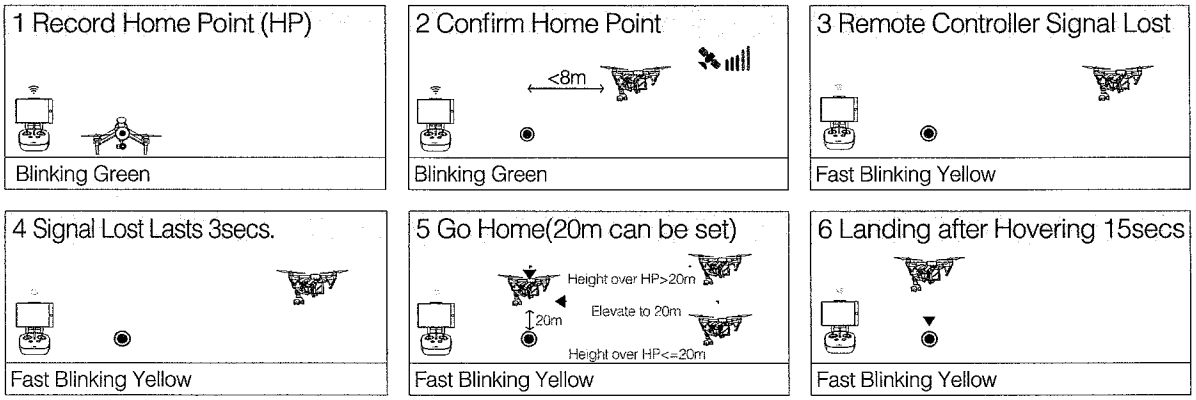
Battery Level Warning	Remark	Aircraft Status Indicator	DJI Pilot app	Flight Instructions
Low battery level warning	The battery power is low. Please land the aircraft.	Aircraft status indicator blinks RED slowly.	Tap "Go-home" to have the aircraft return to the Home point and land automatically, or "Cancel" to resume normal flight. If no action is taken, the aircraft will automatically go home and land 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 Pilot app screen will flash red and aircraft starts to descend. Remote controller will sound an alarm.	The aircraft will begin 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 battery level warning activates and the aircraft is descending to land automatically, you may push the throttle upward to hover the aircraft and navigate it to a more appropriate location for landing.
- Color zones and markers on the battery level indicator reflect estimated remaining flight time and are adjusted automatically, according to the aircraft's current status.

Failsafe RTH

Failsafe RTH is activated automatically if remote controller signal (including video relay signal) is lost for more than 3 seconds provided that Home Point has been successfully recorded and compass is working normally. Return home process may be interrupted and the operator can regain control over the aircraft if a remote controller signal is resumed.

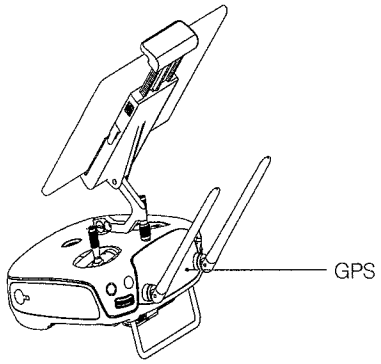
Failsafe Illustration



- Aircraft cannot avoid obstruction during the Failsafe RTH, therefore it is important to set an reasonable Failsafe altitude before each flight. Launch the DJI Pilot app and enter "Camera" view and select "MODE" to set the Failsafe altitude.
- Aircraft will stop ascending and immediately return to the Home Point if you move the throttle stick during the Failsafe.

Dynamic Home Point

Dynamic home point is useful in situations when you are in motion and require a Home Point that is different from the takeoff point. GPS module is located at the position shown in the figure below:



Ensure the space above the GPS module is not obstructed when using Dynamic Home Point.

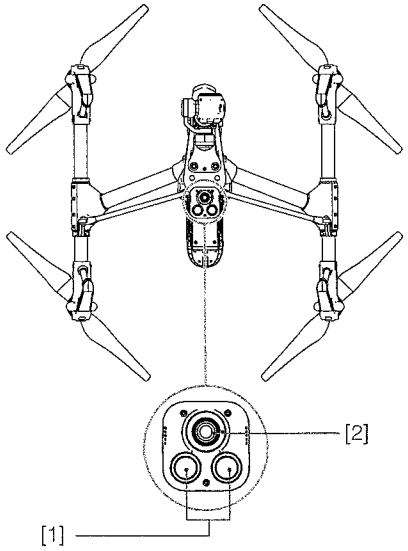
There are two options for Dynamic Home Point.
1. Set the aircraft current coordinate as the new Home Point.
2. Set the remote controller's coordinate as the new Home Point.

Setting Up Dynamic Home Point

Follow the steps below to setup Dynamic Home Point:
1. Connect to the mobile device and launch the DJI Pilot app and go to the "Camera" page.
2. Tap"📍"and select"🎮", to reset the remote controller's coordinates as the new Home Point.
3. Tap"📍"and select"✈", to reset the aircraft's coordinates as the new Home Point.
4. The aircraft status indicator blinks green to show Home Point is set succesfully.

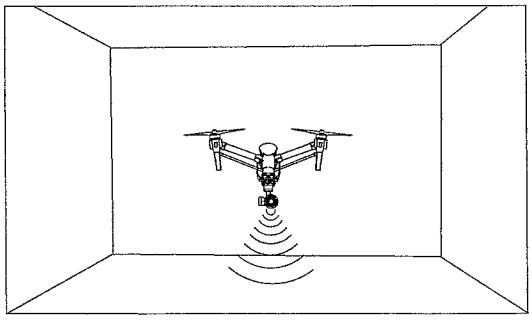
Vision Positioning System

DJI Vision Positioning is a positioning system that uses ultrasonic and image data to help the aircraft identify its current position. With the help of Vision Positioning, your Inspire 1 can hover in place more precisely and fly indoors or in other environments where there is no GPS signal available. The main components of DJI Vision Positioning are located on the bottom of your Inspire 1, including [1]two sonar sensors and[2]one monocular camera.



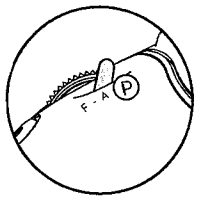
Using Vision Positioning

Vision Positioning is activated automatically when the Inspire 1 is powered on. No manual action is required. Vision Positioning is typically used in the indoor environment where no GPS is available. By using the sensors on the Vision Positioning system, Inspire 1 can perform precision hovering even when no GPS is available.



Follow the steps below to use Vision Positioning:

1. Toggle the switch to "P" as shown the figure to the right:
2. Place the Inspire 1 on a flat surface. Notice that the Vision Positioning system cannot work properly on surfaces without pattern variations.
3. Power on the Inspire 1. The aircraft status indicator will flash twice in green light, which indicates the Vision Positioning system is ready. Gently push the throttle up to lift off, and the Inspire 1 will hover in place.



⚠ The performance of your Inspire 1's Vision Positioning System is subject to the surface you are flying over. The ultrasonic waves may not be able to accurately measure the distance over sound absorbing materials, and the camera may not function correctly in suboptimal environments. The aircraft will switch from "P" mode to "A" mode automatically if both GPS and Vision Positioning System are not available. So operate the aircraft cautiously when in any of 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(over 8m/s at 2 meters or over 4m/s at 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 > 10,000) 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. tiles with same design).
- Flying over inclined surfaces that will deflect sound waves away from the aircraft.
- In the event of loss of remote controller's signal, the aircraft will hover for 8 seconds and then auto-land if it is in "P" mode.

- Keep the sensors clean at all times. Dirt or other debris may adversely affect the effectiveness of the sensors.
- The effective hovering altitudes of the aircraft is from 0 to 2.5 meters.
- Vision Positioning system may not function properly when the aircraft is flying over water.
- Vision Positioning system may not be able to recognize pattern on the ground in low light conditions (less than 100lux).
- Do not use other ultrasonic devices with frequency of 40 KHz when Vision Positioning system is in operation.
- Vision Positioning system may not be able to stabilize the aircraft when flying close to the ground (below 0.5 meters) in fast speed.

⊘ Keep the animals away from the aircraft when Vision Positioning system is activated. The sonar sensor emits high frequency sound that is only audible to some animals.

Flight Recorder

Flight data is automatically recorded to the SD card. This includes flight duration, orientation, distance, aircraft status information, speed, and other parameters.

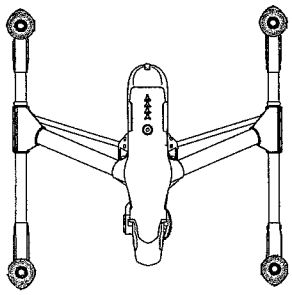
Attaching and Detaching the Propellers

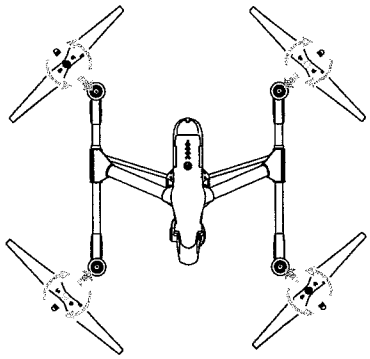
Use only DJI approved propellers with your Inspire 1. The grey or black nut on the propeller indicates the rotation direction of the propeller and where it should be attached. To attach the propellers properly, match the nut with the dots on the motors of your Inspire 1:

Propellers	Grey cap(1345)	Black cap(1345R)
Figure		
Attach On	Motors without a black dot	Motors with a black dot
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	

Attaching the Propellers

1. Attach the propellers with a grey nut onto a motor without a black dot and spin the propellers clockwise to secure them in place. Attach the propellers with a black nut onto a motor with a black dot and spin the propellers counter clockwise to secure its position. Be sure to completely tighten each propeller by hand before flight.





⚠
- Ensure propellers are attached to its corresponding motors, otherwise the aircraft cannot take off.
- Handling the propellers with care.
- Manually tightent each of the propellers on the corresponding motors to ensure it is attached firmly.

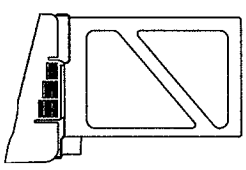
Detaching the Propellers

Hold the motor still. Then spin the propeller in the unlock direction indicated on the propeller itself.

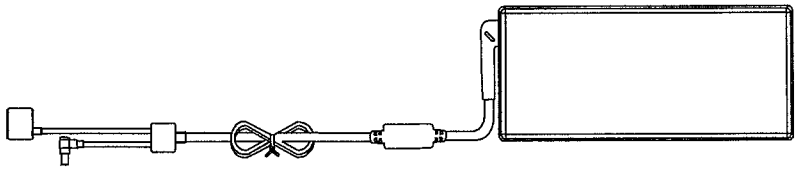
⚠
- Check that the propellers and motors are installed correctly and firmly before every flight.
- Ensure that all propellers are in good condition before each flight. DO NOT use old, chipped, or broken propellers.
- To avoid injury, STAND CLEAR of and DO NOT touch propellers or motors when they are spinning.
- ONLY use original DJI propellers for a better and safer flight experience.

DJI Intelligent Flight Battery

The DJI Intelligent Flight Battery has a capacity of 4500mAh, voltage of 22.2V, and smart charge-discharge functionality. It can only be charged with an appropriate DJI approved charger.



Intelligent Flight Battery



Charger

Battery life

The battery life indicates how many more times the battery can be discharged and recharged before it must be replaced. When the battery is powered off, press and hold the Power Button for 5 seconds to check the battery life. The Battery Level Indicators will light up and/or blink as described below for 2 seconds:

Battery Life				
LED1	LED2	LED3	LED4	Battery Life
☆	☆	☆	☆	90%~100%
☆	☆	☆	✳	80%~90%
☆	☆	☆	☆	70%~80%
☆	☆	✳	☆	60%~70%
☆	☆	☆	☆	50%~60%
☆	✳	☆	☆	40%~50%
☆	☆	☆	☆	30%~40%
✳	☆	☆	☆	20%~30%
☆	☆	☆	☆	below 20%

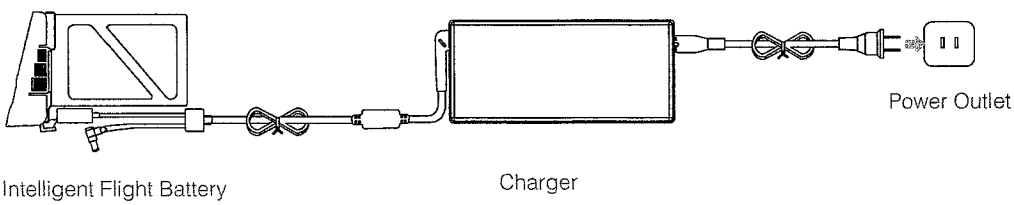
⚠ When battery life reaches 0%, it can no longer be used.

For more information about the battery, launch DJI Pilot app and check the information under the battery tab.

Charging the Intelligent Flight Battery

1. Connect Battery Charger to a power source (100-240V 50/60Hz).
2. Open the Protection Cap and connect the Intelligent Flight Battery to the Battery Charger. If the battery level is above 95%, turn on the battery before charging.
3. The Battery Level Indicator will display the current battery level during charging.
4. The Intelligent Flight Battery is fully charged when Battery Level Indicators are all off.
5. Air cool the Intelligent Flight Battery after each flight. Allow its temperature to drop to room temperature before storing it for an extended period.

⚠
- Do not charge the Intelligent Flight Battery and remote controller with standard charger (model: A14-100P1A) at the same time, otherwise the charger may overheat.
- Always turn off the battery before inserting it or removing it from the Inspire 1. Never insert or remove a battery when it is powered on.



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

Charging 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 (<0°C)
				LED4 blinks three times per second	Charging temperature is too high (>40°C)

After any of the above mentioned protection issues are resolved, press the button to turn off the Battery Level Indicator. Unplug the Intelligent Flight Battery from the charger and plug it back in to resume charging. Note that you do not need to unplug and plug the charger in the event of a room temperature error, the charger will resume charging when the temperature falls within the normal range.

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

How to discharge your Intelligent Flight Battery:

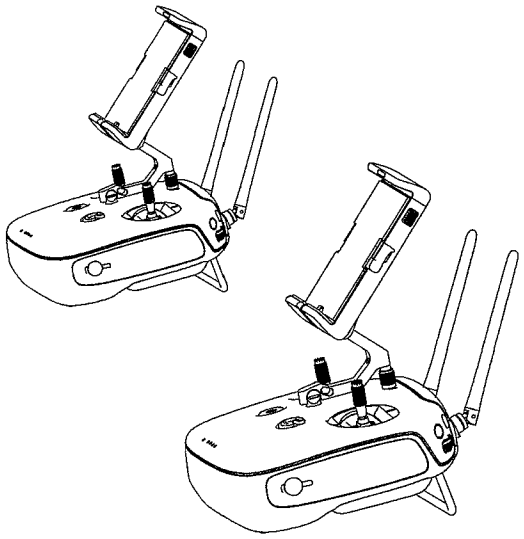
To effectively calibrate the battery capacity, it is recommended to charge and discharge the battery thoroughly for every 10 charge-and-discharge cycle. User should install the battery onto the aircraft and then power on the aircraft to initiate the discharge process, discharge the battery until the aircraft is powered off automatically. User should then fully charge the battery to ensure the battery is working at its optimal.

Slow: Place the Intelligent Flight Battery into the Inspire 1's Battery Compartment and power it on. Leave it on until there is less than 5% of power left, or until the battery can no longer be turned on. Launch the DJI Pilot app to check battery level.

Rapid: Fly the Inspire 1 outdoors until there is less than 5% of power left, or until the battery can no longer be turned on.

Remote Controllers

This chapter describes the features of the remote controller that includes aircraft and remote controller operations and dual remote controller mode.



Remote Controller

Remote Controller Profile

The Inspire 1 Remote Controller is a multi-function wireless communication device that integrates the video downlink ground system and aircraft Remote Controller system. The video downlink and aircraft Remote Controller system operate at 2.4 GHz with maximum transmission distance of 2km. The remote controller features a number of camera functions, such as taking and previewing photos and video, and controlling gimbal motions. The remote controller is powered by a 2S rechargeable battery. The current battery level is displayed by LEDs on the front panel of the remote control.

- **Compliance Version:** The Remote Controller is compliant with both CE and FCC regulations.
- **Operating Mode:** Control can be set to Mode 1 , Mode 2.
- **Mode 1**: The right stick serves as the throttle.
- **Mode 2:** The left stick serves as the throttle.

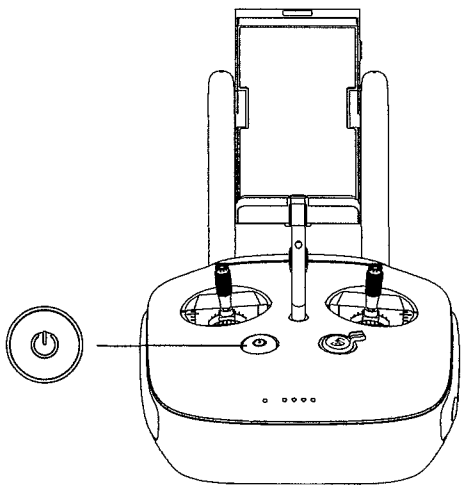
⚠ Do not operate more than 3 aircrafts within in the same area (size equivalent to a soccer field) to prevent transmission interference.

Remote Controller Operations

Powering On And Off The Remote Controller

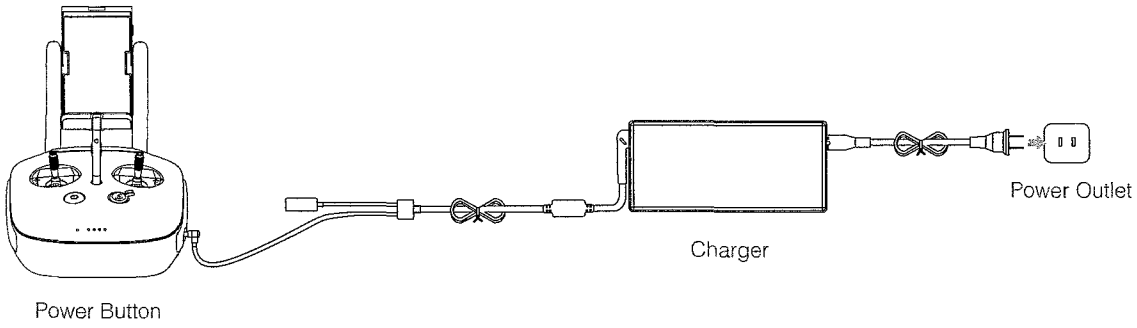
The Inspire 1 remote controller is powered by a 2S rechargeable battery with a capacity of 6000mAh. The battery level is indicated by the Battery Level LEDs on the front panel. Follow the steps below to power on your remote controller:

1. When powered off, press the Power Button once and the Battery Level LEDs will display the current battery level.
2. Then, press and hold the Power Button to power on the remote controller.
3. The Remote Controller will beep when it powers on. The Status LED will blink green (slave remote controller blinks solid purple) rapidly, indicating that the remote controller is linking to the aircraft. The Status LED will show a solid green light when linking is completed.
4. Repeat step 2 to power off the remote controller after finish using it.



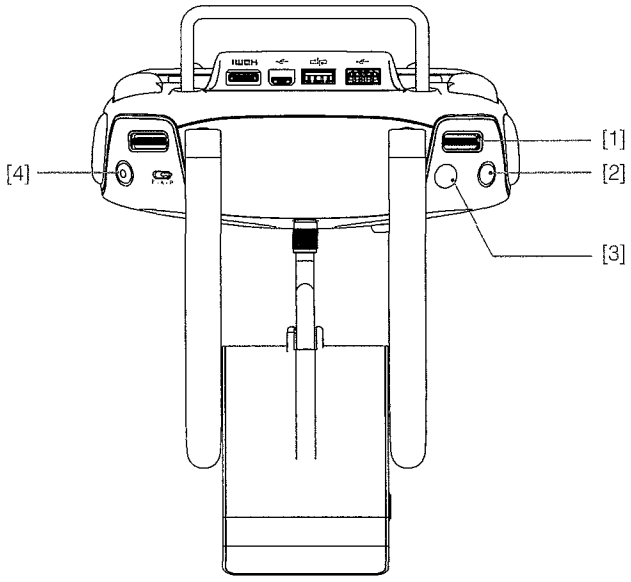
Charging Remote Controller

Charge the remote controller via supplied charger.



Controlling Camera

Shoot videos or images and adjust camera settings via the Shutter Button, Camera Settings Dial, Playback Button and Video Recording Button on the remote control.



[1] Camera Settings Dial

Turn the dial to quickly adjust camera settings such as ISO and shutter speed without letting go of the remote controller. Move the dial button to left or right to view the pictures or videos in playback mode.

[2] Playback Button

Press to view images or videos that have already been captured.

[3] Shutter Button

Press to take a photo. If burst mode is activated, multiple photos will be taken with a single press.

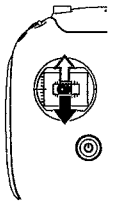
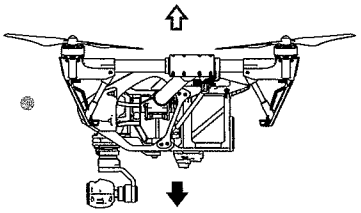
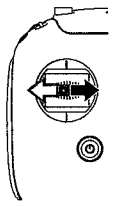
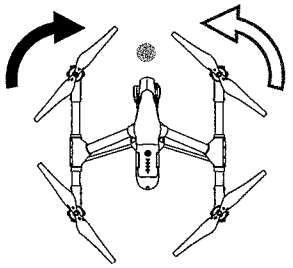
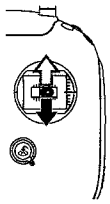
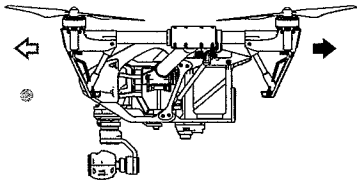
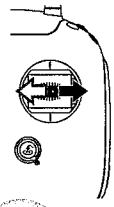
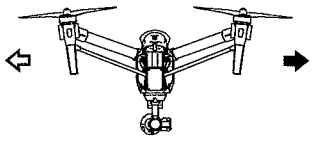
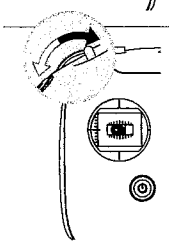
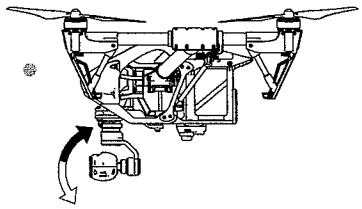
[4] Recoding Button

Press once to start recording video, then press again to stop recording.

Controlling Aircraft

This section explains how to use the various features of the remote controller. The Remote Controller is set to Mode 2 by default.

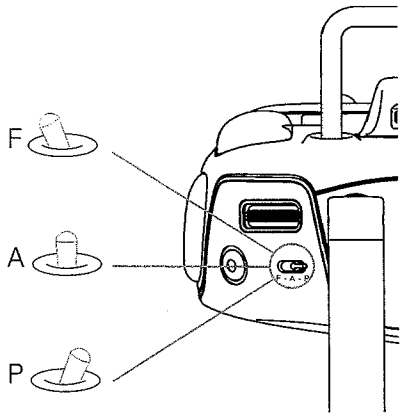
Stick Neutral/ mid point: Control sticks of the Remote Controller are placed at the central position.
Move the Stick: The control stick is pushed away from the central position.

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. Push the throttle stick up to takeoff. When both sticks are centered, the Inspire 1 will hover in place. The more the stick is pushed away from the center position, the faster the Inspire 1 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 sick left to rotate the aircraft counter clock-wise, and push the stick right to rotate the aircraft clockwise. If the stick is centered, the Inspire 1 will stay facing its current direction. The more the stick is pushed away from the center position, the faster the Inspire 1 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. The Inspire 1 will hover in place if the stick is centered. Push the stick further away from the center position for a larger pitch angle (maximum 35°) 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 Inspire 1 will hover in place if the stick is centered. Push the stick further away from the center position for a larger pitch angle (maximum 35°) and faster flight.
		Gimbal Dial: Turn the dial to the right, and the camera will shift to point upwards. Turn the dial to the left, and the camera will shift to point downwards. The camera will remain in its current position when dial is static.

Flight Mode Switch

Toggle the switch to select the desired flight mode. You may choose between; P mode, F mode and A mode.

Figure	Flight Mode
F	F mode
A	A mode
P	P mode



P mode (Positioning) : P mode works best when GPS signal is strong. There are three different states of P mode, which will be automatically selected by the Inspire 1 depending on GPS signal strength and Vision Positioning sensors:

P-GPS: GPS and Vision Positioning both are available, and the aircraft is using GPS for positioning.

P-OPTI: Vision Positioning is available but the GPS signal is not. Aircraft is using only Vision Positioning for hovering

P-ATTI: Neither GPS or Vision Positioning available, aircraft is using only its barometer for positioning, so only altitude is controlled.

A mode (Attitude): The GPS and Vision Positioning System is not used for holding position. The aircraft only uses its barometer to maintain altitude. If it is still receiving a GPS signal, the aircraft can automatically return home if the Remote Controller signal is lost and if the Home Point has been recorded successfully.

F mode (Function): Intelligent Orientation Control (IOC) is activated in this mode. For more information about IOC, refer to the IOC in Appendix.

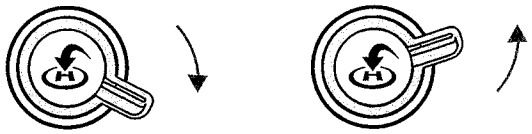
The Flight Mode Switch is locked in P mode by default. To unlock the switch, launch the DJI Pilot app, enter the "Camera" page, tap "MODE", and then activate "Multiple Flight Mode" .

Transformation Switch / RTH Button

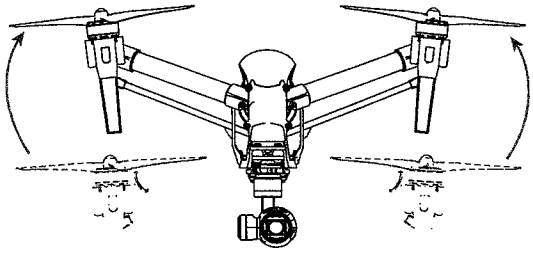
The Transformation Switch / RTH Button combination serves two functions. Toggle the switch up or down to raise or lower the landing gear. Or, press the button to activate the Return to Home (RTH) procedure.

Transformation Switch

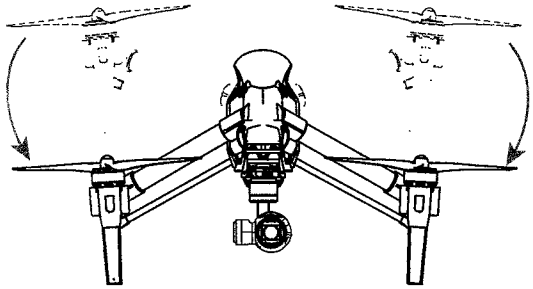
This switch has two positions. The effect of toggling the switch to any of these positions is defined below:



1. **Raise:** Raise the landing gear to its upper most position.



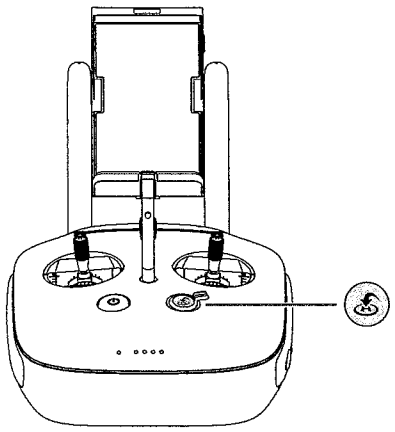
2. **Lower:** The landing gear will lower to its lowest position for landing.



⚠ Do not raise the landing gear when the aircraft is on the ground. Ensure the landing gear is lowered before landing.

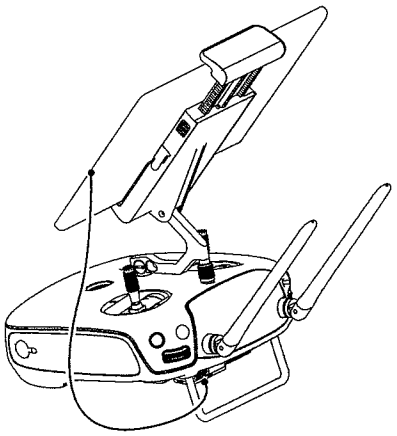
RTH button

Press and hold this button to start the Return to Home (RTH) procedure. The LED around the RTH Button will blink white to indicate the aircraft is entering RTH mode. The aircraft will then return to the last recorded Home Point. Press this button again to cancel the RTH procedure and regain the control of the aircraft.



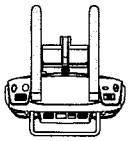
Connecting Mobile Device

Tilt the Mobile Device Holder to the desired position. Press the button on the side of the Mobile Device Holder to release the clamp, and then place your mobile device into the clamp. Adjust the clamp to secure your mobile device. Then connect your mobile device to the remote controller with a USB cable. Plug one end of the cable into your mobile device, and the other end into the USB port on the back of the remote controller.

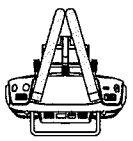


Optimal Transmission Range

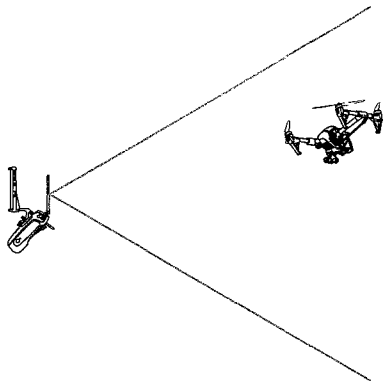
The signal transmission between aircraft and remote controller perform best within the range that displayed in the picture shown below:



Strong



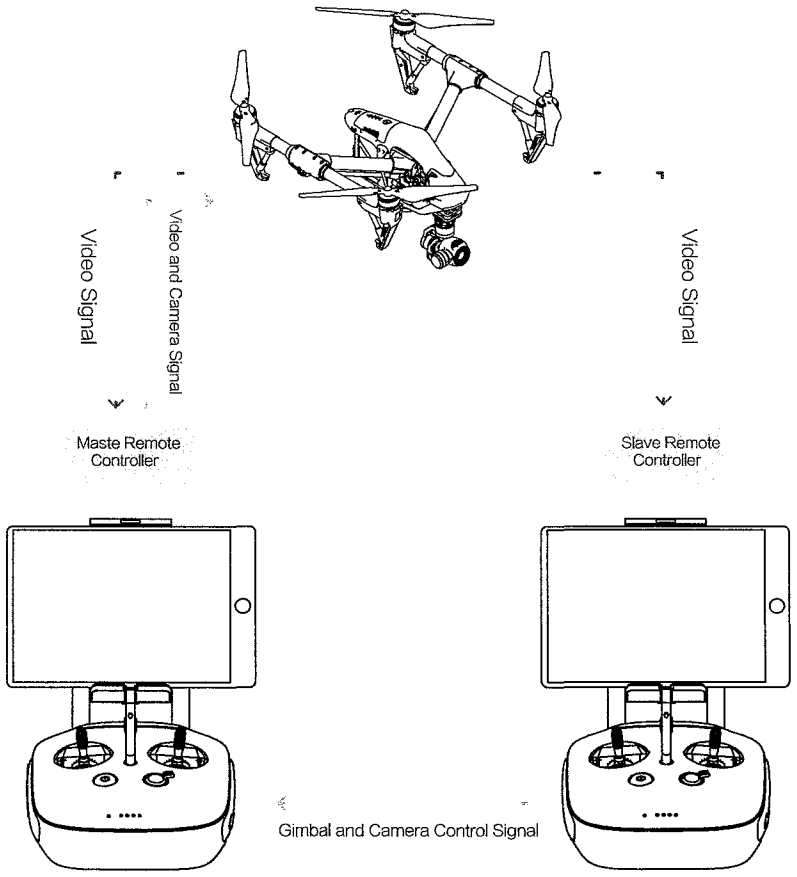
Weak



Ensure the aircraft is flying within the optimal transmission range. Adjust the distance and position between the operator and the aircraft to achieve optimal transmission performance.

Dual Remote Controllers Mode

More than one remote controller can connect to the same aircraft in Dual Remote Controller mode. In Dual Controllers mode, the "Master" remote controller operator controls the orientation of the aircraft, while the "Slave" remote controller controls the movement of the gimbal and camera operation. When multiple "slave" remote controllers (max of 6) are connect to the aircraft, only the first connected "slave" remote controller is able to control the gimbal, the remaining "slave" remote controller can view the live feed video from the aircraft and set the camera parameters, but they cannot control the gimbal.



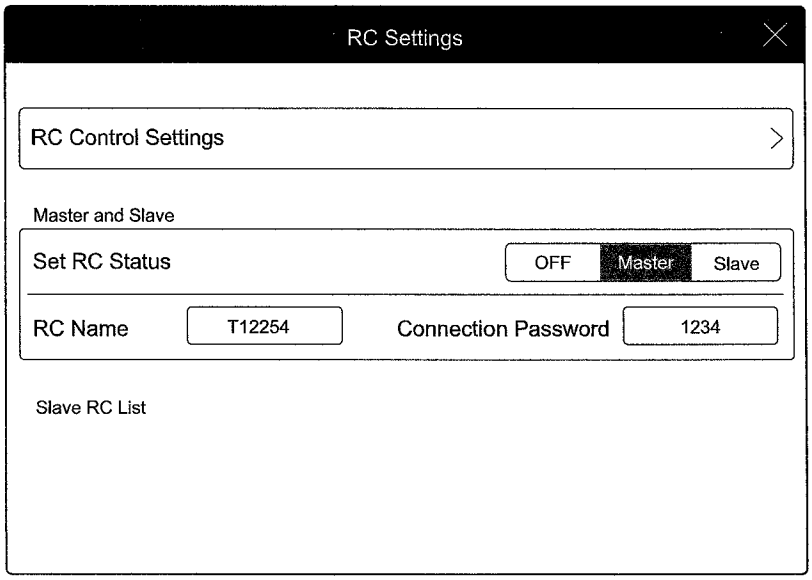
⚠ Use the gimbal dial on the remote controller to control the pitch movement of the camera in the single remote controller mode, however, you cannot control the pan movement of the camera.

Setting Up Dual Remote Controllers Mode

Dual Remote Controllers mode is disabled by default. Users must enable this feature on the "Master" remote controller by through the DJI Pilot app. Follow the steps below for setup:

"Master" Remote Controller:

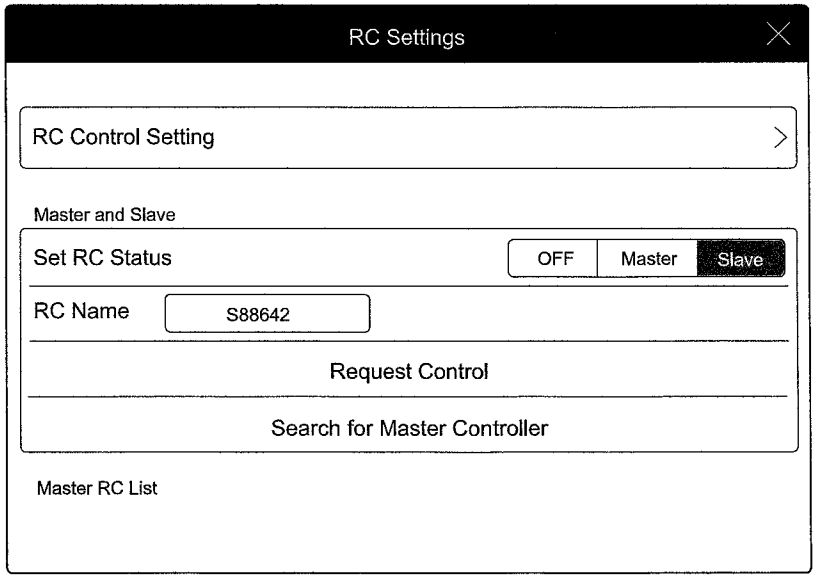
1. Connect the remote controller to your mobile device and launch the DJI Pilot app.
2. Go to the Camera page, and tap to enter the remote controller settings window.
3. Tap "Set RC Status" to enable Master-and-Slave mode.
4. Select "Master" in the "Set RC Status" section to set the remote controller as "Master" remote controller.



5. Enter the connection password for the "Slave" remote controller.

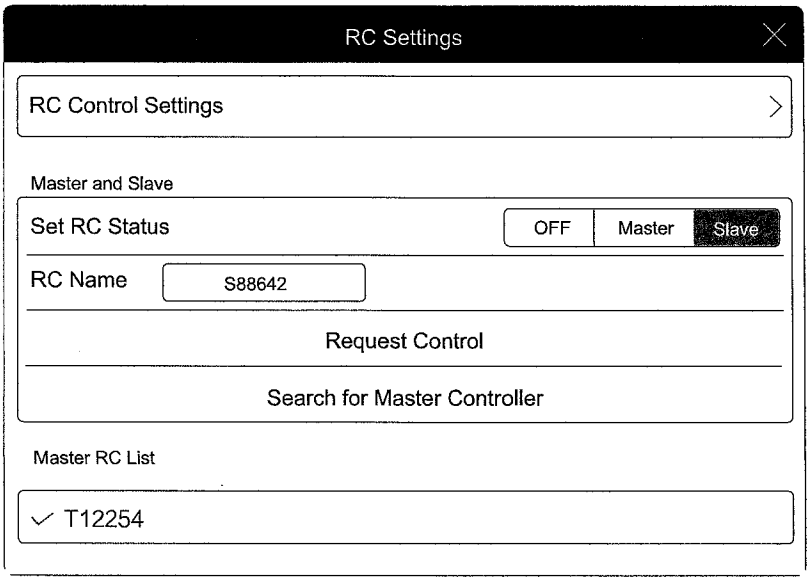
"Slave" Remote Controller:

1. Tap "Search for Master Controller" to search the "Master" remote controller.

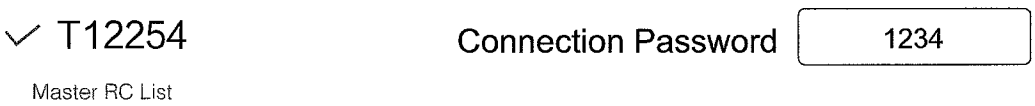


⚠ Remote controller cannot link to the aircraft if the remote controller is set as "Slave". Meanwhile, the "Slave"remote controller cannot control the orientation of the aircraft. Reset the remote controller to "Master" in DJI Pilot app if you wish to link the remote controller to the aircraft.

2. Search the "Master" remote controller in the surrounding area in the "Request Control" section.

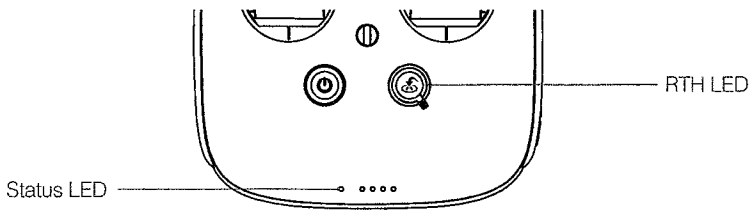


3. Select the "Master" remote controller from the "Master RC List" and input the connection password to connect to the desired "Master" remote controller.



Remote Controller Status LED

The Status LED reflects connection status between Remote Controller and aircraft. The RTH LED shows the Return to Home status of the aircraft. The table below contains details on these indicators.



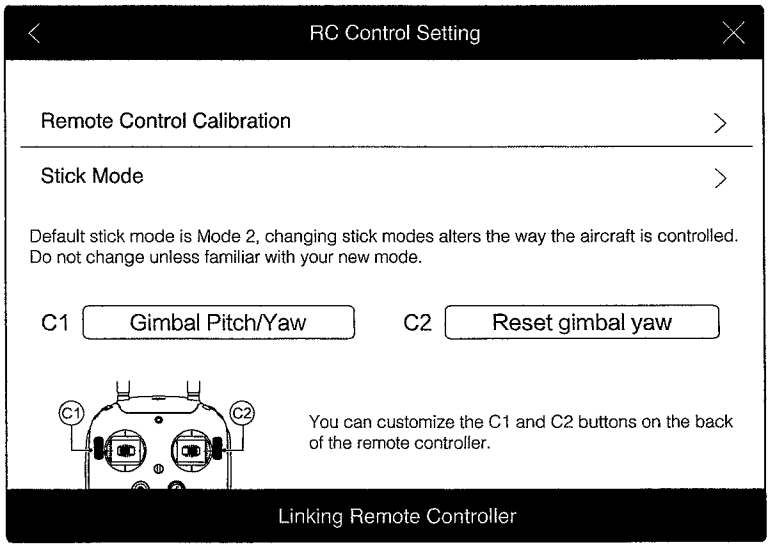
Status LED	Alarm	Remote Controller Status
R —— Solid Red	♪ chime	The remote controller set as "Master" but it is not connected with the aircraft.
G —— Solid Green	♪ chime	The remote controller set as "Master" and it is connected with the aircraft.
P —— Solid Purple	D-D-	The remote controller set as "Slave" but it is not connected with the aircraft.
B —— Solid Blue	D-D- ♪ chime	The remote controller set as "Slave" and it is connected with the aircraft.
R ····· Slow Blinking Red	D-D-D·····	Remote controller error.
R G/R Y ····· Red and Green/ Red and Yellow Alternate Blinks	None	HD Downlink is disrupted.
RTH LED	**Sound**	**Remote Controller Status.**
W —— Solid White	♪ chime	Aircraft is returning home.
W ····· Blinking White	D · · ·	Sending Return to Home command to the aircraft.
W ····· Blinking White	DD ·· ·· ··	Aircraft Return to Home in progress.

⚠ The Remote Status Indicator will blink red, sound an alert, when the battery level is critically low.

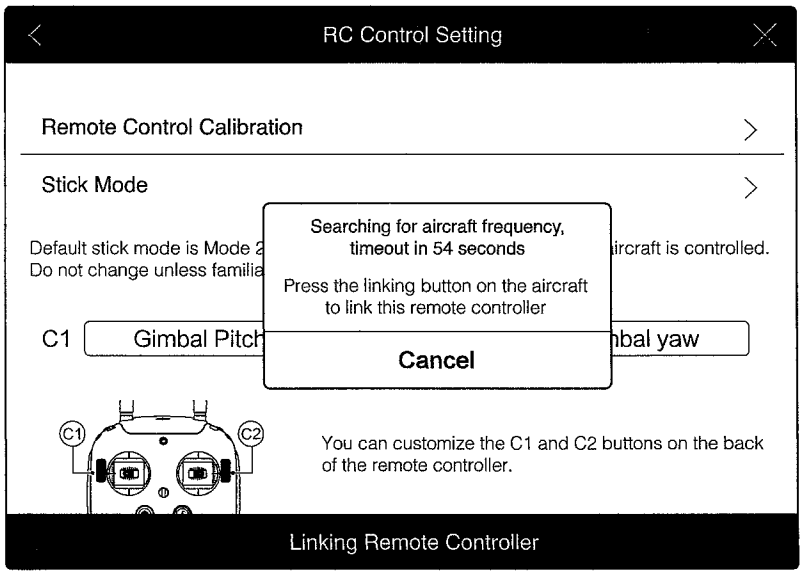
Linking the Remote Controller

The remote controller is linked to your aircraft before delivery. Linking is only required when using a new remote controller for the first time. Follow these steps to link a new remote controller:

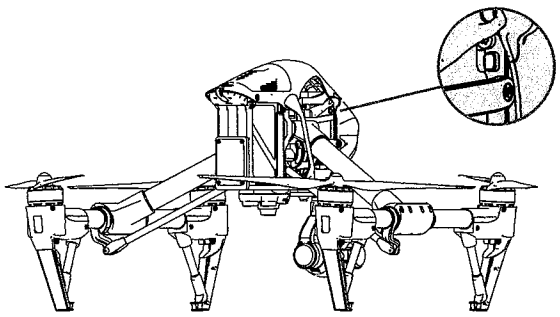
1. Power on the remote controller and connect to the mobile device. Launch DJI Pilot app.
2. Power on the Intelligent Flight Battery.
3. Enter "Camera" view and tap on and then tap "Linking Remote Controller" button as shown below.



4. The remote controller is ready to link. The Remote Controller Status Indicator blinks blue and "beep" sound is emitted.



5. Locate the Linking button on the front of the aircraft, as shown in the figure shown below. Press the Linking button to start linking. The Remote Controller Status Indicator will display solid green if Link is succeed.



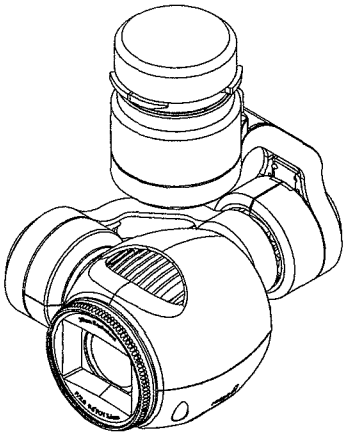
⚠
- Remote controller cannot link to the aircraft if the remote controller is set as "Slave". Meanwhile, the "Slave"remote controller cannot control the orientation of the aircraft. Reset the remote controller to "Master" in DJI Pilot app if you wish to link the remote controller to the aircraft.
- Remote controller will disconnect from the linked aircraft if a new remote controller is linked to the same aircraft.

Remote Controller Compliance Version

The remote controller is compliant with both CE and FCC requirements.

Gimbal and Camera

This chapter provides the technical specifications of the camera and explains the working mode of the gimbal.



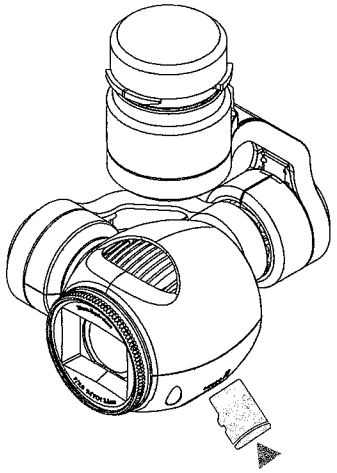
Camera and Gimbal

Camera Profile

The on-board camera supports 4K video capture up to 4096x2160p24 and 12M pixel photos capture by using the 1/2.3 inch CMOS sensor. You may export the video in either MOV or MP4 format for editing. Available picture shooting modes include burst, continuous, and timer mode. A live preview of what the camera is seeing before you shoot videos and pictures is supported through the DJI Pilot App.

Camera Micro-SD Card Slot

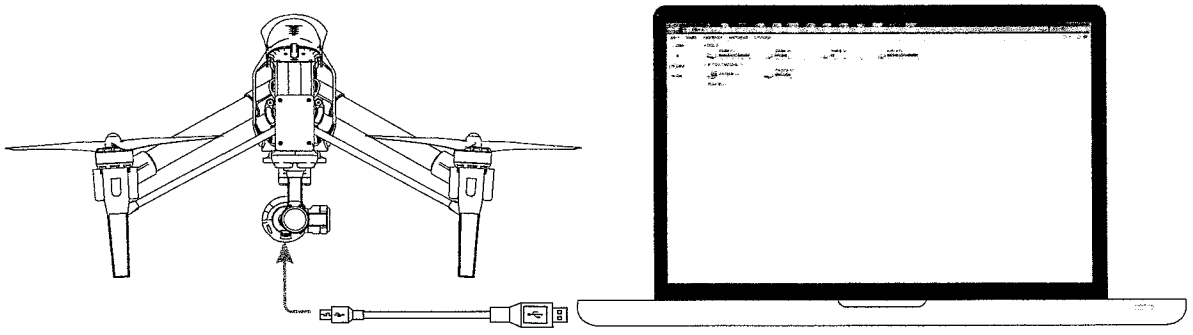
To store your photos and videos, plug in the micro-SD card into the slot shown below before powering on the Inspire 1. The Inspire 1 comes with a 16GB micro-SD card and supports up to a 64GB micro-SD card. A UHS-1 type micro-SD card is recommended, because the fast read and write capability of these cards enables you to store high-resolution video data.



⊘ Do not remove micro-SD card from the Inspire 1 when it is powered on.

Camera Data Port

Power on the Inspire 1 and then connect a USB cable to the Camera Data Port to download photos or videos from the camera to your computer.



⚠ Power on the aircraft before attempting to download the files.

Camera Operation

Use the Shutter and Record button on the remote controller to shoot the images or the videos through the DJI Pilot app. For more information about how to use these buttons, refer to "Controlling Camera" P25.

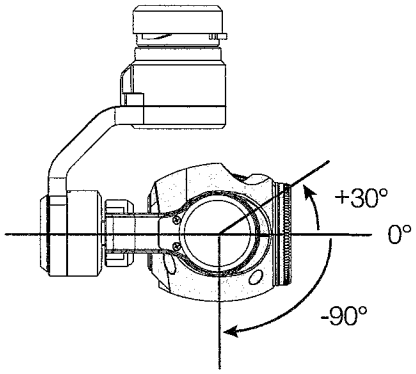
ND Filter

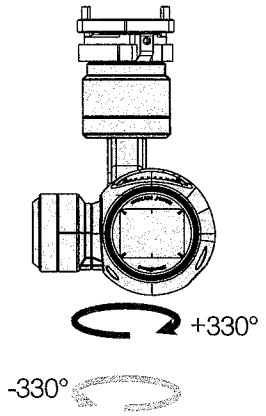
Attach an ND filter to the front of the camera to reduce over-exposure and "jello" effect.

Gimbal

Gimbal Profile

The 3-axis Gimbal provides a steady platform for the attached camera, allowing you to capture stabilized images and video. The Gimbal can tilt the camera up to 120 degrees and rotate 360 degrees.





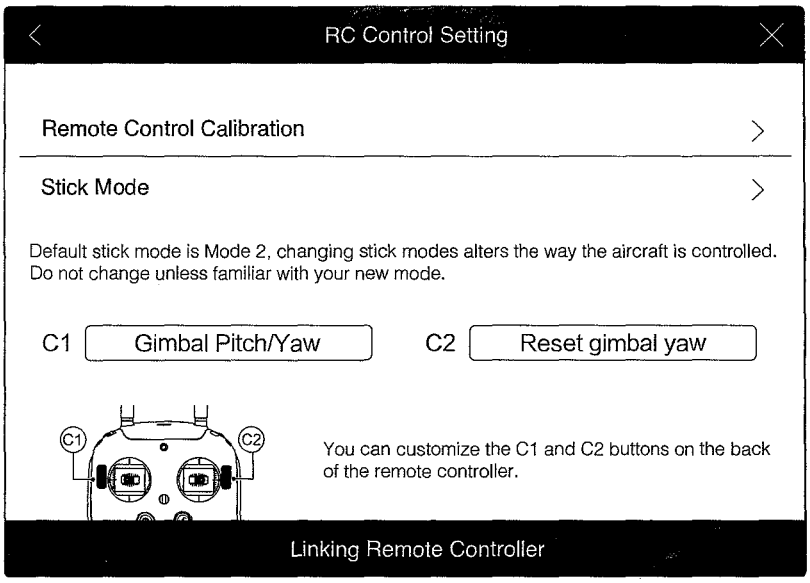
Use the gimbal dial on the remote controller to control pitch movement of the camera by default. Note that you cannot control the pan motion of the camera by default. Enable the "Master-and-Slave"mode and set the remote controller to "Slave" state if you wish to control both the pan and pitch movement of the camera.

⚠ Use the gimbal dial on the remote controller to control the pitch movement of the camera in the single remote controller mode, however, you cannot control the pan movement of the camera.

Pan Control

Follow the instructions below to use the gimbal dial to control the pan movement of the gimbal:

1. Power on the aircraft and remote control, launch DJI Pilot app and enter "Camera" page.
2. Tap "RC Control Settings" icon and select either C1 or C2 customizable button as the gimbal pitch/yaw switching button.
3. Select "Gimbal Pitch/Yaw" from the dropdown list.

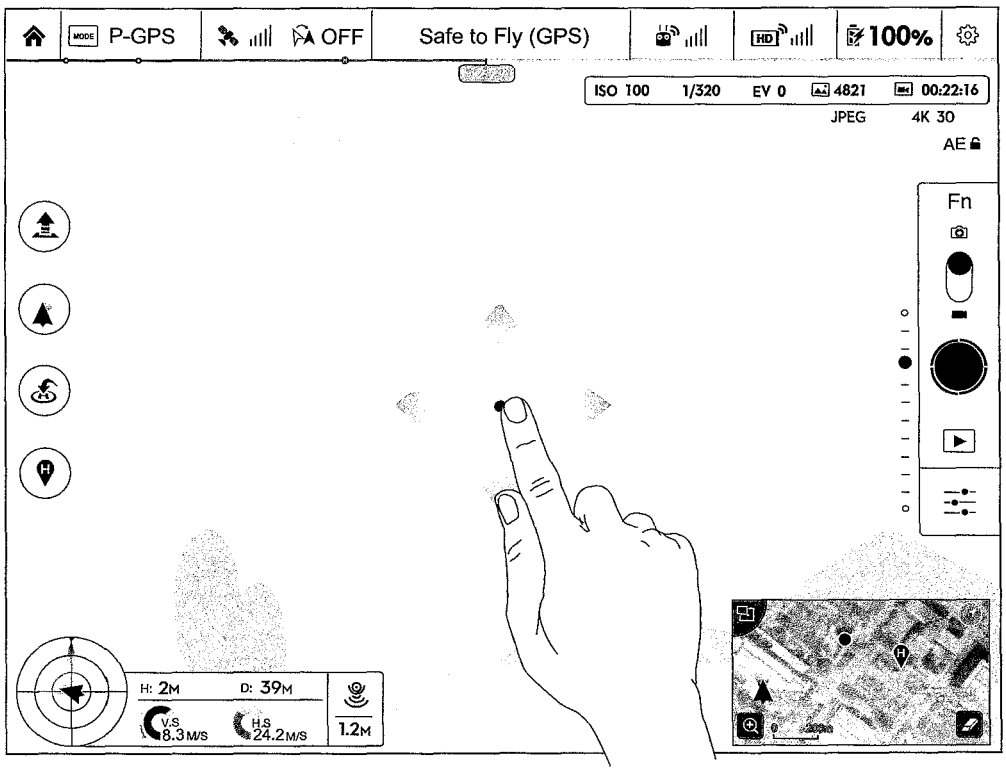


Press C1 or C2 button to switch from pitch mode to yaw mode. You may use the gimbal dial to pan the gimbal under yaw mode. Press C1 or C2 again to exit yaw mode.

Using DJI Pilot App to Control Gimbal

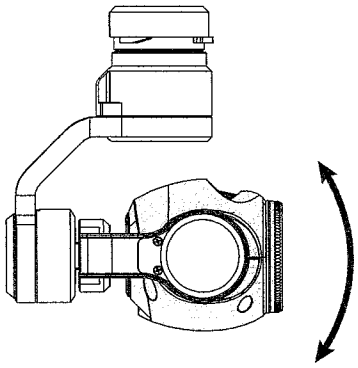
Follow the steps below to use DJI Pilot app to control the gimbal orientation:

1. Launch DJI Pilot app, enter "Camera" page.
2. Tap and press on the screen until a blue circle is shown.
3. Slide to control the gimbal orientation within the "Camera" page as shown below.

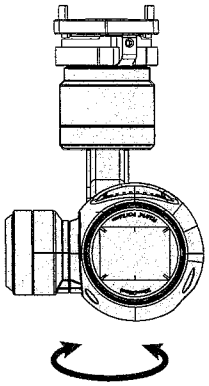


Gimbal Operation Modes

Three Gimbal operation modes are available. Switch between the different operation modes on the Camera page of the DJI Pilot 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:



Pitch



Pan

		Follow Mode	The angle between Gimbal's orientation and aircraft's nose remains constant at all times. One user alone can control the pitch motion of the Gimbal, but a second user is required to control the pan motion using a second remote controller.
		FPV Mode	The Gimbal will lock to the movements of the aircraft to provide a First-Person-View flying experience.
		Free Mode	The Gimbal's motion is independent of the aircraft's orientation. One user alone can control the pitch motion of the Gimbal, but a second user is required to control the pan motion using a second remote controller.
		Re-alignment	Tap to force the Gimbal orientation to re-align with aircraft's orientation by panning from gimbal's current orientation. Pitch angle will remain unchanged during the re-alignment.

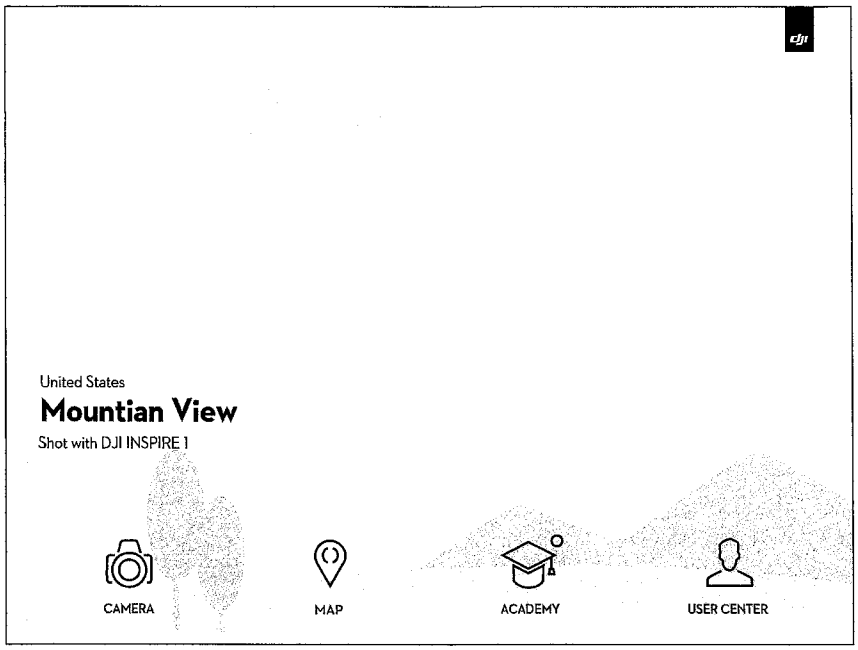
- Gimbal motor error may occur in these situations: (1) Gimbal is placed on uneven ground. (2) Gimbal has received an excessive external force, e.g. a collision. Please take off from flat, open ground and protect the gimbal after powering up.
- Flying in heavy fog or cloud may make the gimbal wet, leading to a temporary failure. The gimbal will recover when it dries out.

DJI Pilot App

This chapter describes the four main GUI of the DJI Pilot app.

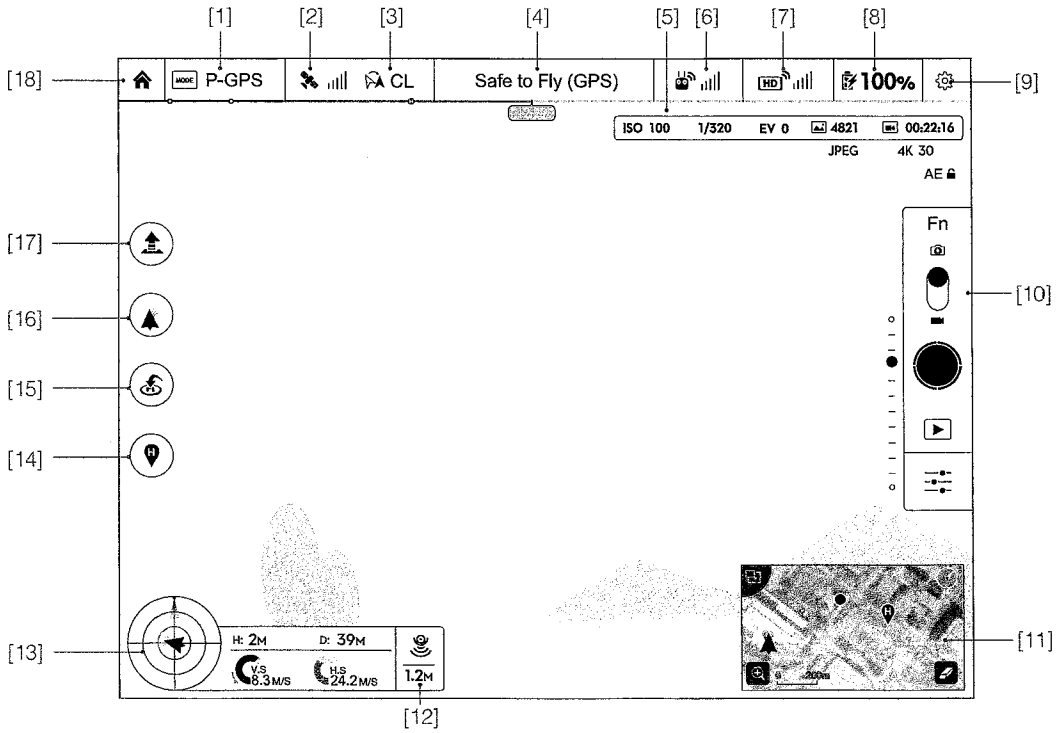
DJI Pilot App

The DJI Pilot app is a new mobile app designed specifically for the Inspire 1. Use this app to control the gimbal, camera and other features of your flight system. The app also comes with Map, Store a User Center, for configuring your aircraft and sharing your content with friends. It is recommended that you use a tablet for the best experience.



Camera

The Camera page contains a live HD video feed from the Inspire 1's camera. You can also configure various camera parameters from the Camera page.



[1] Flight Mode

MODE: The text next to this icon indicates the current flight mode.

Tap to enter MC (Main Controller) settings. Modify flight limits, perform compass calibration, and set the gain values on this screen.

[2] GPS Signal Strength

: This icon shows the current strength of GPS signals. Green bars indicates adequate GPS strength.

[3] IOC Settings

CL : This icon shows which IOC setting that the aircraft has entered when in F Mode.

Tap to enter IOC setting menu and select Course Lock, Home Lock or Point of Interest Lock.

[4] System Status

Safe to Fly (GPS) : This icon shows current aircraft system status, such as GPS signal health.

[5] Battery Level Indicator

: The battery level indicator dynamically displays the battery level. The color zones on the battery level indicator represent different battery levels.

[6] Remote Controller Signal

: This icon shows the strength of remote controller signal.

[7] HD Video Link Signal Strength

HD : This icon shows the HD video downlink signal strength between the aircraft and the remote controller.

[8] Battery Level

100%: This icon shows the current Intelligent Flight Battery level.

Tap to enter battery information menu, set the various battery warning thresholds and view the battery warning history in this page.

[9] General Settings

: Tap this icon to enter General Settings page. Select parameter units, reset the camera, enable the quick view feature, adjust the gimbal roll value and toggle flight route display on this page.

[10] Camera Operation Bar

Exposure Lock

AE : Tap to enable or disable the camera exposure lock.

Function

Fn : Tap to adjust camera settings, such as video format and digtial filters.

Shutter

: Tap this button to take a single photo.

Record

: Tap once to start recording video, then tap again to stop recording. You can also press the Video Recording Button on the remote controller, which has the same function.

Playback

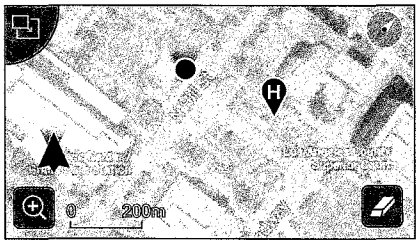
[▶] : Tap to enter playback page. You can preview photos and videos as soon as they are captured.

Camera Settings and Shooting Mode

: Tap to enter the Camera Settings page and switch from camera shooting mode from manual to auto.

[11] Map

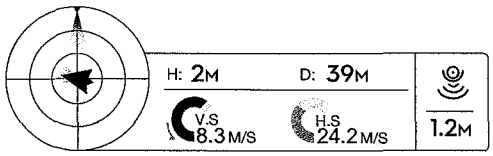
Display the flight path of the current mission. Tap to switch from the Camera GUI to the Map GUI.



[12] Vision Positioning

: This icon shows the distance between the surface and the Vision Positioning System's sensors.

[13] Flight Telemetry



Vision Positioning Status

Icon is highlighted when Vision Positioning is in operation.

Flight attitude is indicated by the flight attitude icon.

(1) The red arrow shows which direction the aircraft is facing.

(2) Light blue and dark blue areas indicate pitch.

(3) Pitching of the boundary between light blue and dark blue area shows roll angle.

[14] Home Point Settings

: Tap this button to reset the current home point. You may choose to set the aircraft take-off location, the remote controller's current position, or the aircraft's current position as the Home Point.

[15] Return to Home (RTH)

: Initiate RTH home procedure. Tap to have the aircraft return to the latest home point.

[16] Gimbal Operation Mode

Refer to "Gimbal Operation Mode" P38 for more information.

[17] Auto Takeoff/Landing

: Tap to initiate auto takeoff or landing.

[18] Back

: Tap to return to the main GUI.

Map

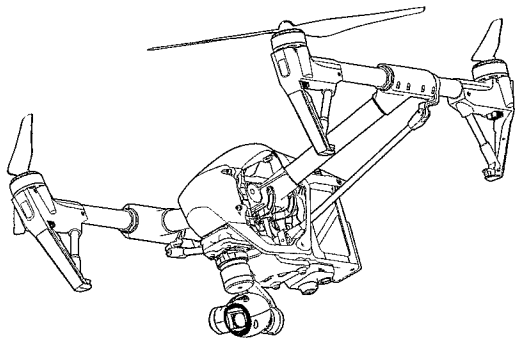
User can view the current flight route in a larger map view in this page. You can also perform Auto take-off and Landing in the page. Ensure your mobile device has access to the Internet. Due to the map data required, Wi-Fi connection is recommended. Internet access is required to cache the map, if Wi-Fi is unavailable, mobile data service is required.

Academy

Download user manual, view online videos. Also you can use the flight simulator to practice your flight skills.

User Center

You can sync the picture and videos to the mobile device, view the flight records and check your DJI account status in the User Center. Use the DJI registered account to login to the User Center.



Flight

This chapter describes the flight safety and flight restrictions.

Flight

Once pre-flight preparation is complete, it is recommended to use the flight simulator to learn how to fly safely. Ensure that all flights are carried out in a suitable location.

Flight Environment Requirements

1. Do not use the aircraft in severe weather conditions. These include wind speed exceeding 10m/s , snow, rain and smog.
2. Only fly in open areas. Tall buildings and steel structures may affect the accuracy of the on-board compass and GPS signal.
3. Avoid from obstacles, crowds, high voltage power lines, trees or bodies of water.
4. Minimize electromagnetic interference by not flying in area with high levels of electromagnetism, including mobile phone base stations or radio transmission towers.
5. Aircraft and battery performance is subject to environment factor such as air density and temperature. Be very careful when flying 14700 feet (4500 meters) or more above sea level as battery and aircraft performance may be reduced.
6. The Inspire 1 cannot operate within the polar areas in "P" mode.

Flight Limits and Flight Restriction Area

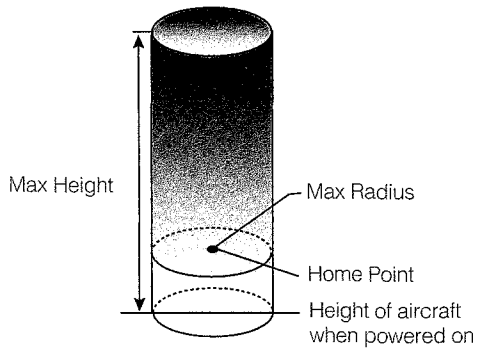
Flight limits on height and distance can be set. The details of these flight limits are described in the following section.

All unmanned aerial vehicle (UAV) operators should abide by all regulations from such organizations as the ICAO (International Civil Aviation Organization), FAA and their own national airspace regulations. For safety reasons, the flight limits function is enabled by default to help users use this product safely and legally. The flight limits function includes height limits, distance limits and No Fly Zones.

When operating in P Mode, height, distance limits and No Fly Zones work together to manage flight. In A mode only height limits work and flights cannot go higher than 120 meters.

Max Height & Radius Limits

Max Height & Radius limit flying height and distance, and the user may change these settings in the DJI Pilot App. Once complete, your Inspire 1 will fly in a restricted cylinder that is determined by these settings. The tables below show the details of these limits.



GPS Signal Strong (G) ····· Blinking Green

	Flight Limits	DJI Pilot App	Aircraft Status Indicator
Max Height	Flight altitude must be under the set height.	Warning: Height limit reached.	None.
Max Radius	Flight distance must be within the max radius.	Warning: Distance limit reached.	Rapid red flashing (R) ····· when close to the max radius limit.

GPS Signal Weak (Y) ····· Blinking Yellow

	Flight Limits	DJI Pilot App	Aircraft Status Indicator
Max Height	Flight height restricted to 120m and under.	Warning: Height limit reached.	None.
Max Radius	No limits		

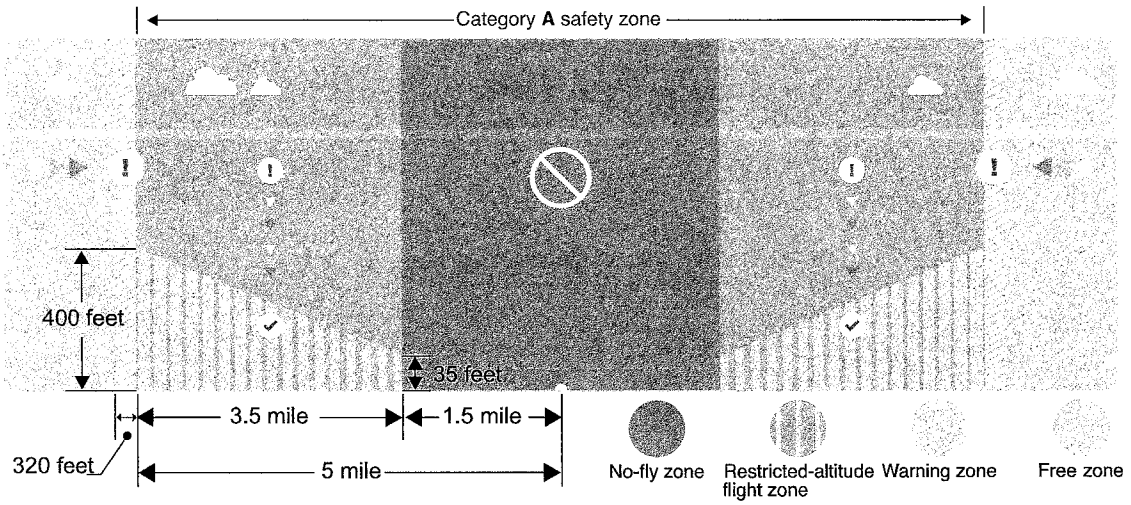
⚠ • If you fly out of the limit, you can still control the Inspire 1, but cannot fly it further.
• If the Inspire 1 flies out of the max radius in Ready to Fly (non-GPS) mode, it will fly back within range automatically.

Flight Restriction of Restricted Areas

Restricted areas include airports worldwide. All restricted areas are listed on the DJI official website at http://www.dji.com/fly-safe/category-mc. Restricted areas are divided into category A and category B. Category A areas cover major international airport such as LAX and Heathrow, while category B areas includes smaller airports.

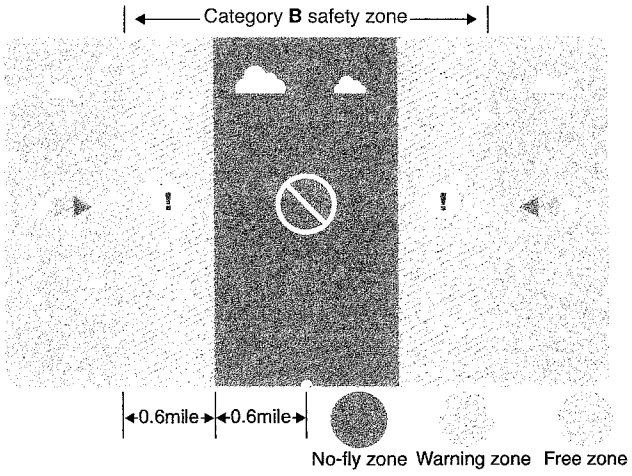
Category A Safety Zone

(1) The category A "safety zone" is comprised of a small "no-fly zone" and a range of "restricted-altitude zones". Flight is prevented in the "no-fly zone" but can continue with height restrictions in the restricted-altitude zone.
(2) 1.5 miles (2.4 km) around a designated safety zone is a no-fly zone, inside which takeoff is prevented.
(3) 1.5 miles (2.4 km) to 5 miles (8 km) around restricted areas are altitude restricted, with maximum altitude going from 35 feet (10.5 m) at 1.5 miles (2.4 km) to 400 feet (120 m) at 5 miles (8 km).
(4) A "warning zone" has been set around the safety zone. When you fly within 320 feet (100m) of the safety zone, a warning message will appear on the DJI Pilot App.



Category B Safety Zone

(1) Category B "safety zone" is comprised of a "no-fly zone" and a "warning zone".
(2) 0.6 miles (1 km) around the safety zone is a designated "no-fly zone".
(3) A "warning zone" has been set around the safety zone. When you fly within 0.6 miles (1Km) of this zone, a warning will appear on the DJI Pilot App.



GPS Signal Strong Ⓖ ····· Blinking Green			
Zone	Restriction	DJI Pilot App Prompt	Aircraft Status Indicator
No-fly Zone	Motors will not start.	Warning: You are in a No-fly zone. Take off prohibited.	Ⓡ ····· Red flashing
	If the aircraft enters the restricted area in A mode but P mode activates the aircraft will automatically descend to land then stop its motors after landing.	Warning: You are in a No-fly zone, automatic landing has begun. (If you are within 1.5 mile radius)	
Restricted-altitude flight zone	If the aircraft enters the restricted area in A mode but P mode activates, it will descend to a safe altitude and hover 15 feet below the safe altitude.	Warning: You are in a restricted zone. Descending to safe altitude. (If you are between the range of 1.5 mile and 5 mile radius) Warning: You are in a restricted zone. Max flight height restricted to between 10.5m and 120m. Fly Cautiously.	
Warning zone	No flight restriction applies, but there will be warning message.	Warning: You are approaching a restricted zone, Fly Cautiously.	
Free zone	No restrictions.	None.	None.

Semi-automatic descent: All stick commands are available except the throttle stick command during the descent and landing process. Motors will stop automatically after landing.

- When flying in the safety zone, aircraft status indicator will blink red quickly and continue for 3 seconds, then switch to indicate current flying status and continue for 5 seconds at which point it will switch back to red blinking.
- For safety reasons, please do not fly close to airports, highways, railway stations, railway lines, city centers and other special areas. Try to ensure the aircraft is visible.

Preflight Checklist

1. Remote controller, aircraft 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 as normal.
5. Motors can start and are functioning as normal.
6. DJI Pilot app connected to the aircraft.

Calibrating the Compass

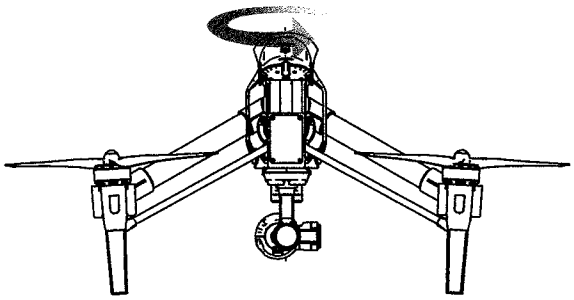
IMPORTANT: Make sure to calibrate the compass in every new flight location. The compass is very sensitive to electromagnetic interference, which can cause abnormal compass data leading to poor flight performance or even failure. Regular calibration is required for optimum performance.

- DO NOT calibrate your compass where there is a chance of strong magnetic interference, such as magnetite, parking structures, and steel reinforcements underground.
- DO NOT carry ferromagnetic materials with you during calibration such as keys or cellular phones.
- DO NOT calibrate beside massive metal objects.

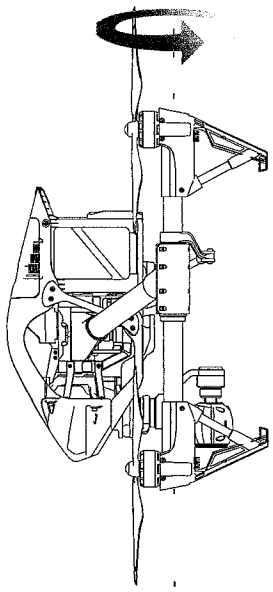
Calibration Procedures

Choose an open space to carry out the following procedures.

1. Ensure the compass is calibrated. If you did not calibrate the compass in the Checklist, or if you have changed your position since last calibrating it, tap "MODE" in the app and select "Compass Calibration" to calibrate the compass. Then follow the on-screen instructions.
2. Hold and rotate the aircraft horizontally 360 degrees, and the Aircraft Status Indicator will display a solid green light.



3. Hold the aircraft vertically with nose pointing downward, and rotate it 360 degrees around the center axis. Recalibrate the compass if the Aircraft Status Indicator show solid red.



⚠ If the Aircraft Status Indicator blinks red and yellow after the calibration, move your aircraft to a different location to carry out compass calibration.

Calibrate the compass before each flight. Launch DJI Pilot App, follow the on-screen instruction to calibrate the compass.

When to Recalibrate

1. When compass data is abnormal, and the Aircraft Status Indicator is blinking red and yellow.
2. When flying in a new location, or a location that is different from your last flight.
3. When the mechanical structure of the Inspire 1 has changed, i.e. changed mounting position of the compass.
4. When severe drifting occurs in flight, i.e. the Inspire 1 does not fly in straight lines.

Auto Take-off and Auto Landing

Auto Take-off

Use auto take-off to take off your aircraft automatically if the Aircraft Status Indicator displays blinking green. Follow the steps below to use auto take-off:

1. Launch DJI Pilot app, enter "Camera" page.
2. Ensure the aircraft is in "P" mode.
3. Go through the pre-flight checklist.
4. Tap"⏏", and confirm flight condition. Slide to confirm and take-off.
5. Aircraft takes off and hovers at 1.5 meters above ground.

Auto-Landing

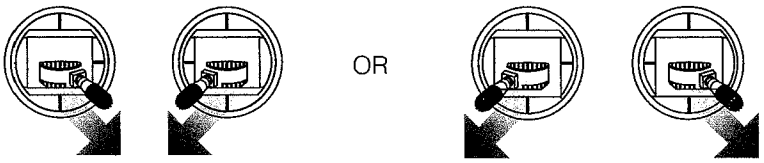
Use auto-landing to land your aircraft automatically if the Aircraft Status Indicator displays blinking green. Follow the steps below to use auto-landing:

1. Ensure the aircraft is in "P" mode.
2. Check the landing area condition before tapping "⏬", to perform landing.
3. Aircraft lowers the landing gear and proceed to land automatically.

Starting/Stopping the Motors

Starting Motors

The Combination Stick Command (CSC) listed below are used to start the motors instead of simply pushing the stick up. Ensure that you perform the CSC in one motion.

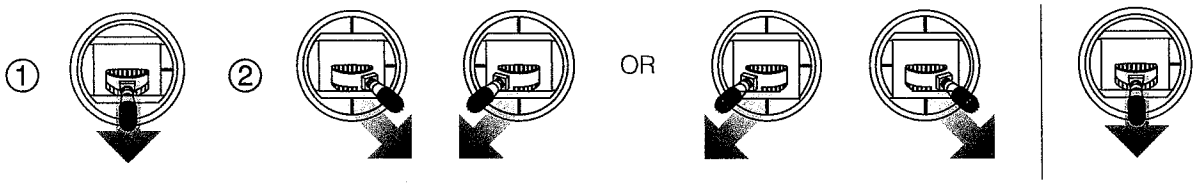


Stopping Motors

There are two methods to stop the motors.

Method 1: When the Inspire 1 has landed, push the throttle down ①, then conduct CSC ②. Motors will stop immediately. Release both sticks once motors stop.

Method 2: When the aircraft has landed, push the throttle down and hold. The motors will stop after 3 seconds.



⚠ Do not perform CSC when aircraft is in midair, otherwise the motors will be stopped.

Flight Test

Take off/Landing Procedures

1. Place the aircraft on open, flat ground with battery indicators facing towards you.
2. Power on the remote controller and your mobile device, then the Intelligent Flight Battery.
3. Launch the DJI Pilot App and enter the Camera page.
4. Wait until the Aircraft Indicator blinks green. This means the Home Point is recorded and it is safe to fly now. If it flashes yellow, it means Home Point is not recorded, and you should not take off.
5. Push the throttle up slowly to take off or using Auto Take-off to take off.
6. Shoot photos and videos using the DJI Pilot app.
7. To land, hover over a level surface and gently pull down on the throttle slowly to descend.
8. After landing, execute the CSC command or hold the throttle at its lowest position for 3 seconds or more until the motors stop.
9. Turn off the Intelligent Flight Battery first, followed by the Remote Controller.

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

Video Suggestions and Tips

1. Work through the checklist before each flight.
2. Select desired gimbal working mode in the DJI Pilot app.
3. Aim to shoot when flying in P mode only.
4. Always fly in good weather, such as sunny or windless days.
5. Change camera settings to suit you. These include photo format and exposure compensation.
6. Perform flight tests to establish flight routes and scenes.
7. Push the sticks gently to make aircraft movements stable and smooth.

FAQ

Troubleshooting (FAQ)

1. How can I put a GoPro camera on the Inspire 1?
   The Inspire 1 does not currently support GoPro attachments. The gimbal is designed to hold DJI cameras only.

2. When will ground station functionality be available?
   The Inspire 1 does not currently support ground station. Ground station will be available with future firmware updates.

3. Is the camera's exposure automatic?
   The exposure can be set to Auto, for automatic changes, or Manual, if you wish to use a specific setting.

4. Can I see the size of images through the app?
   Yes, you can preview image or video sizes through the DJI Pilot app.

5. How much weight can the Inspire 1 carry without its included camera?
   We do not recommend flying with any payload other than the included DJI gimbal and camera.

6. Do you have an LCD monitor available for the Inspire 1?
   No, DJI does not sell LCD or HD monitors for the Inspire 1. However, you can output the live streaming video to a compatible monitor or mobile device of your own.

7. How long does it take to charge the battery? Does it comes with a charger?
   Yes, all Inspire 1 units come with standard TB47 charger.
   With the standard TB47 100W charger, it takes 85min to fully charge a 4500mAh battery.

8. Are the two remote controllers the same? Should I setup the remote controllers in the app or somewhere else to control the camera and aircraft separately?
   The two remote controllers are physically identical. You can set the remote controllers to either "Master" or "Slave" through the DJI Pilot app if you wish to use dual controller mode.

9. Where can I find info on the simulation application that plugs into the trainer port? Can you suggest a simulation program?
   There is no trainer port on the remote controller for the Inspire 1.

10. Can the mobile device holder be used on the Phantom 2 series remote controller?
    No, it cannot. The mobile device holder can only be used with the Inspire 1 remote.

11. Does the Inspire 1 have a SD card included?
    The Inspire 1 comes with a 16GB micro-SD card. It supports SD cards up to 64GB.

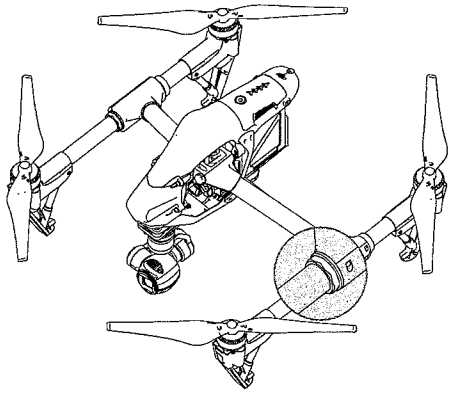
12. Can I upgrade and buy a second remote controller if I only buy a single remote controller now?
    Yes.

13. How big is the Inspire 1?
    Its length x height x width dimensions without the propellers attached are 44 x 30 x 45cm (17.3 x 11.8 x 17.7in).

14. What flight controller does the Inspire 1 use?
    The Inspire 1 uses its own new flight controller.

15. Which motors and propellers does the Inspire 1 come with?
    The Inspire 1 uses 3510 motors and 1345 propellers.

16. Aircraft frame arm joints appear loosen, is that normal?
    The space of the joins shown in the below figure is normal and it will not affect the performance of aircraft, do not adjust the position of the screws on your own.



17. Failed to complete self-check?
    Place the aircraft on the flat surface before powering on. Do not move the aircraft during the self-check.

Appendix

Appendix

Specifications

Aircraft	
Model	T600
Weight (Battery Included)	2935 g
Hovering Accuracy (P Mode)	Vertical: 0.5 m Horizontal: 2.5 m
Max Angular Velocity	Pitch: 300°/s Yaw: 150°/s
Max Tilt Angle	35°
Max Ascent Speed	5 m/s
Max Descent Speed	4 m/s
Max Speed	22 m/s (ATTI mode, no wind)
Max Flight Altitude	4500 m
Max Wind Speed Resistance	10 m/s
Max Flight Time	Approximately 18 minutes
Motor Model	DJI 3510
Propeller Model	DJI 1345
Indoor Hovering	Enabled by default
Operating Temperature Range	-10° to 40° C
Diagonal Distance	559 to 581 mm
Dimensions	438x451x301 mm
Gimbal	
Model	ZENMUSE X3
Output Power (With Camera)	Static: 9 W;In Motion: 11 W
Operating Current	Station: 750 mA;Motion: 900 mA
Angular Vibration Range	±0.03°
Mounting	Detachable
Controllable Range	Pitch: -90° to +30° Pan: ±320°
Mechanical Range	Pitch: -125° to +45° Pan: ±330°
Max Controllable Speed	Pitch: 120°/s Pan: 180°/s

Camera	
Name	X3
Model	FC350
Total Pixels	12.76M
Effective Pixels	12.4M
Image Max Size	4000x3000
ISO Range	100-3200 (video) 100-1600 (photo)
Electronic Shutter Speed	8 s to 1/8000 s
FOV (Field Of View)	94°
CMOS	Sony EXMOR 1/2.3"
Lens	20mm (35mm format equivalent) f/2.8 focus at ∞) 9 Elements in 9 groups Anti-distortion
Still Photography Modes	Single shoot Burst shooting: 3/5/7 frames Auto Exposure Bracketing (AEB): 3/5 bracketed frames at 0.7EV Bias Time-lapse
Video Recording Modes	UHD (4K): 4096x2160p24/25, 3840x2160p24/25/30 FHD: 1920x1080p24/25/30/48/50/60 HD: 1280x720p24/25/30/48/50/60
Max Bitrate Of Video Storage	60 Mbps
Supported File Formats	FAT32/exFAT Photo: JPEG, DNG Video: MP4/MOV (MPEG-4 AVC/H.264)
Supported SD Card Types	Micro SD Max capacity: 64 GB. Class 10 or UHS-1 rating required.
Operating Temperature Range	0° to 40° C
Remote Controller	
Name	C1
Operating Frequency	922.7MHz~927.7 MHz (Japan Only) 5.728~5.850 GHz;2.400~2.483 GHz
Transmitting Distance	2 km (Outdoor And Unobstructed)
EIRP	10dBm@900m, 13dBm@5.8G, 20dBm@2.4G
Video Output Port	USB, Mini-HDMI
Power Supply	Built-in battery
Charging	DJI charger
Dual User Capability	Host-and-Slave connection

Mobile Device Holder	Tablet or Smart Phone
Output Power	9 W
Operating Temperature Range	-10° to 40° C
Storage Temperature Range	Less than 3 months: -20° to 45° C More than 3 months: 22° to 28° C
Charging Temperature Range	0-40° C
Battery	6000 mAh LiPo 2S
Charger	
Model	A14-100P1A
Voltage	26.3 V
Rated Power	100 W
Battery (Standard)	
Name	Intelligent Flight Battery
Model	TB47
Capacity	4500 mAh
Voltage	22.2 V
Battery Type	LiPo 6S High voltage battery
Energy	99.9 Wh
Net Weight	570 g
Operating Temperature Range	-10° to 40° C
Storage Temperature Range	Less than 3 months: -20° to 45° C More than 3 months: 22° C to 28° C
Charging Temperature Range	0° to 40° C
Max Charging Power	180 W
Battery (Optional)	
Name	Intelligent Flight Battery
Model	TB48
Capacity	5700 mAh
Voltage	22.8 V
Battery Type	LiPo 6S
Energy	129.96 Wh
Net Weight	670 g
Operating Temperature Range	-10 to 40° C
Storage Temperature Range	Less than 3 months: -20 to 45° C More than 3 months: 22° to 28° C
Charging Temperature Range	0° to 40° C

Max Charging Power	180 W
Vision Positioning	
Velocity Range	Below 8 m/s (2 m above ground)
Altitude Range	5-500 cm
Operating Environment	Brightly lit (lux > 15) patterned surfaces
Operating Range	0-250 cm
DJI Pilot App	
Mobile Device System Requirements	iOS version 7.1 or later;Android version 4.1.2 or later
Supported Mobile Devices	* iPhone 6 Plus, iPhone 6, iPhone 5S, iPad Air 2, iPad Mini 3, iPad Air, iPad Mini 2, iPad 4;* Samsung Note 3, Samsung S5, Sony Z3 EXPERIA;* Note: It is recommended that you use a tablet for the best experience

Intelligent Orientation Control (IOC)

IOC allows users to lock the orientation of aircraft in different fashions. There are three working modes for IOC and you may select the desired IOC modes from the DJI Pilot app. IOC only works under F mode, and user must toggle the flight mode switch to "F" mode to activate IOC. Refer to the table below:

Course Lock (CL)	Its forward direction is pointing to the nose direction when recording, which is fixed until you re-record it or exit from CL.
Home Lock (HL)*	Record a Home Point (HP), and push Pitch stick to control the aircraft far from or near to the HP.
Point of Interest (POI)*	Point of Interest. Record a point of interest (POI), the aircraft can circle around the POI, and the nose always points to the POI.

*Home Lock and Point of Interest feature are coming soon.

Prerequisites of IOC

Use the IOC feature under the following condition:

Modes IOC	GPS enabled	GPS	Flight Distance Limits
Course Lock	No	None	None
Home Lock	Yes		Aircraft ≥10m Home Point
POI	Yes		Aircraft 5m~500m Point of Interest

Using IOC

Enable the IOC feature by tapping "Enable IOC" in the setting page of the DJI Pilot app. Toggle the Flight Mode Switch to "F" mode and follow the on-screen instruction to use IOC feature.

How to Update Firmware

Follow the steps below to upgrade your Inspire 1's firmware, including the firmware for the remote controller and battery.

Updating the Aircraft Firmware

Step 1- Check Battery and SD Card Capacity

Ensure the Intelligent Flight Battery and Remote Controller have at least 50% power and there is at least 100MB of free space on the SD card.

Step 2- Prepare the Firmware Update Package

1. Download the firmware update package from the official DJI website (http://www.dji.com/product/inspire-1).
2. Insert the SD into your PC. Extract the all downloaded files into the root directory of the SD card. Remove the SD card from your PC and insert it into the SD card slot on the Inspire 1 camera.

Step 3- Update the Aircraft

1. Connect your mobile device to the remote controller, power on the remote controller, and launch the DJI Pilot app to obtain information about firmware update progress. Confirm you wish to update within the app to continue. Note the upgrade will begin automatically after power cycling the aircraft if the DJI Pilot app is not launched.
2. It will take approximately 25 minutes to complete the firmware update. During the upgrade process, DJI Pilot app will display update progress and gimbal will sound a fast beeping sound(D-D-D-D). A message windows of "Upgrade Completed, Aircraft will restart in 5 seconds" will prompt in DJI Pilot app and gimbal will sound a slow beeping sound (D--DD) to indicate the update is complete, aircraft will then restart automally. Note that user will need to manually power cycle the aircraft if DJI Pilot app is not launched prior to the upgrade.
3. Try update again if gimbal sounds a long beeping sound.

Updating the Remote Controller Firmware

Step 1- Check Battery

The remote controller firmware is included in the aircraft firmware update package. Use the same update file that is downloaded from the official DJI website. Ensure the remote controller's remaining battery level is at least 50%.

Step 2- Prepare the Firmware Update Package

1. Extract all downloaded files into the root directory of an SD card or USB thumb drive.
2. With the remote controller powered off, insert the SD card into a SD card reader and plug the reader into the USB port on the remote. Or if using a USB thumb drive, plug it directly into the remote's USB port. If you do not have a SD card reader or USB thumb drive, you may insert the SD card into the gimbal and connect the gimbal to the remote controller with a USB cable.

Step 3- Update the Remote Controller

1. Power on the remote controller and wait 60 seconds until the upgrade begins. Do not power off the remote controller during the update.
2. It will take approximately 10 minutes to complete the firmware update. The Inspire 1's camera will emit a beeping sound and the Status LED on the remote controller will show a solid blue light to indicate

Exhibit 2

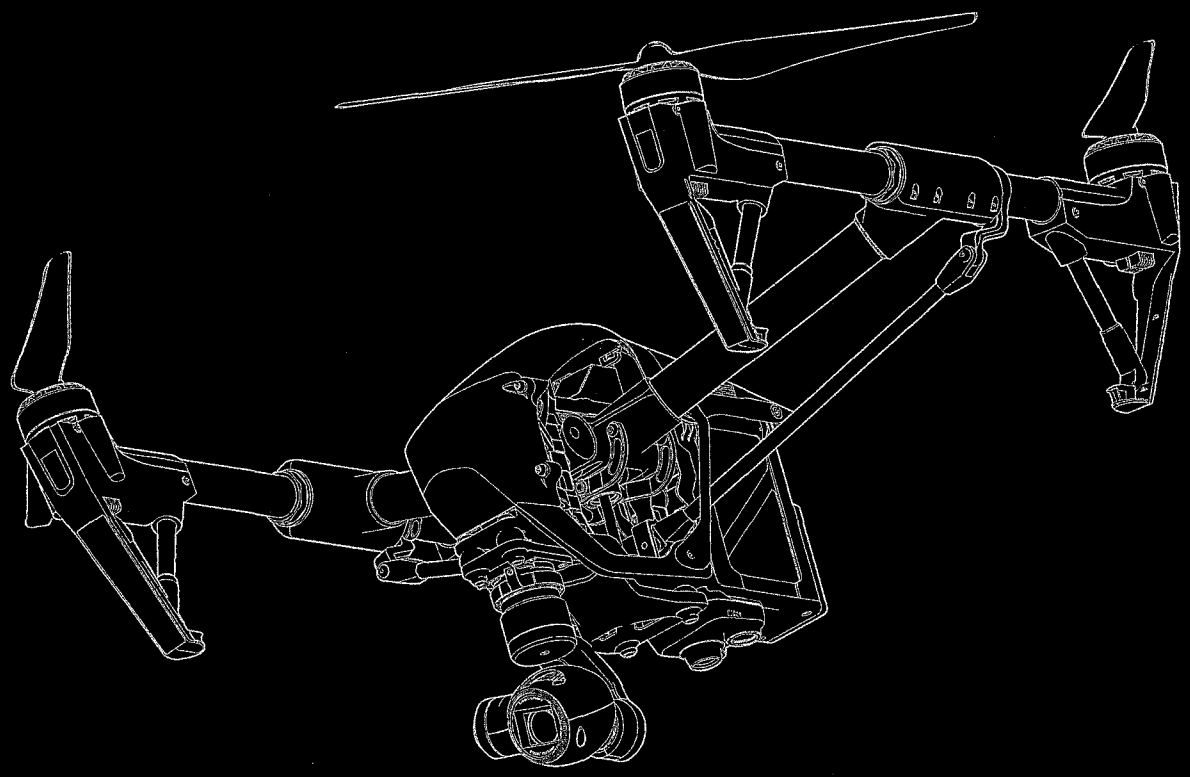
DJI Inspire

Quick Start Guide

INSPIRE 1

Quick Start Guide

V1.0

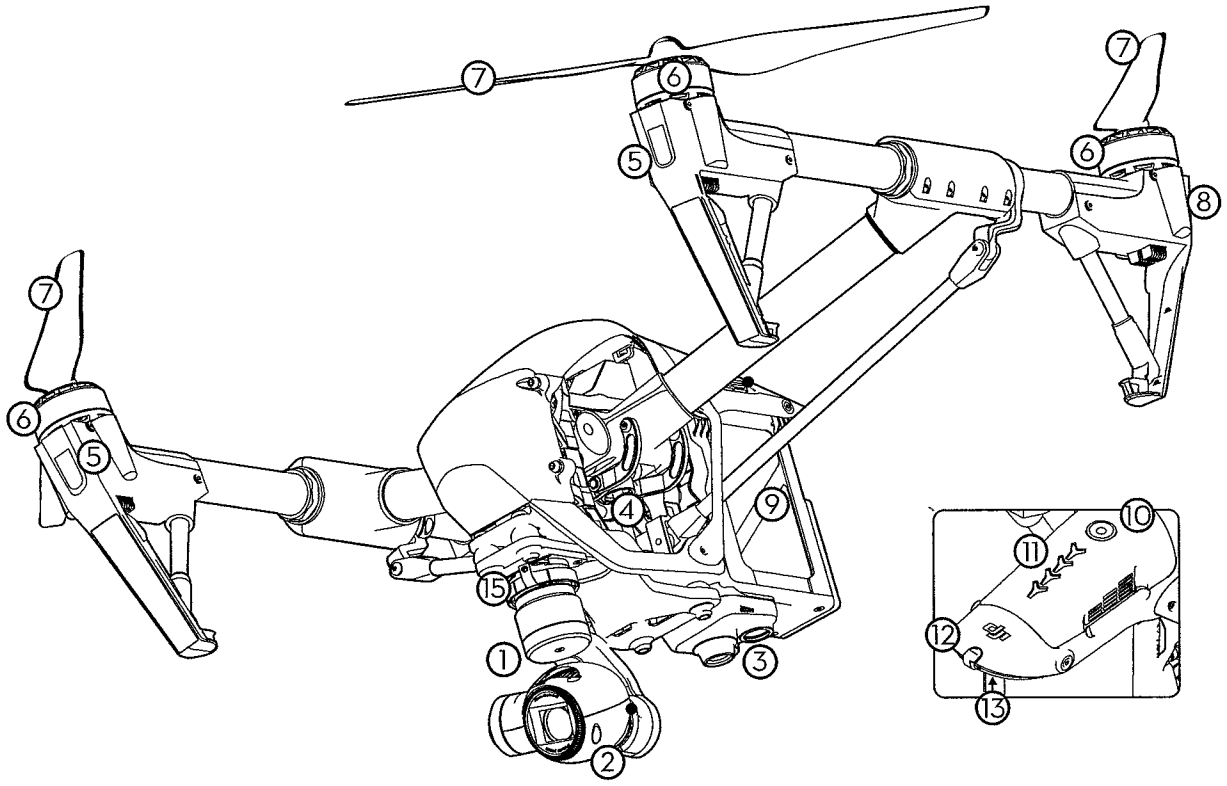


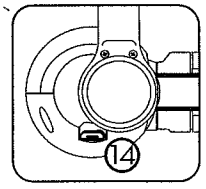
INSPIRE 1

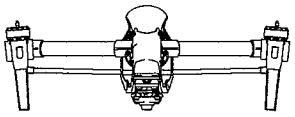
The Inspire 1 is a professional aerial filmmaking and photography platform that is ready to fly right out of the box. Featuring an onboard camera equipped with a 20mm lens and 3-axis stabilized gimbal, it shoots sharp 12mp stills and stable video at up to 4K. Its retractable landing gear pulls up out of view, giving the camera an unobstructed 360 degree view of the world below.

An advanced flight controller makes the Inspire 1 stable, safe and easy to fly indoors or out. The brand new Vision Positioning System gives it the power to hover in position at low altitudes even without GPS. Like all DJI flight controllers, it is also able to return home if remote controller signal is lost or if the low battery warning is triggered.

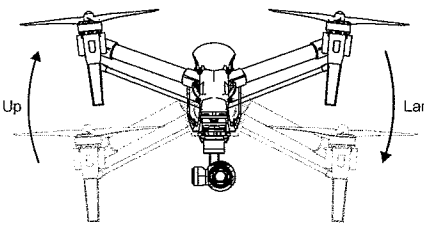
The Inspire 1 boasts a maximum flight speed 22m/s* and a maximum flight time of 18 minutes* using one fully charged 4500mAh Intelligent Flight Battery.







Travel Mode



Flight Mode

Landing Mode

1. Gimbal and Camera
2. Camera Micro-SD Card Slot
3. Vision Positioning System
4. Transformation Mechanism
5. Front LEDs
6. Motors
7. Propellers
8. Rear LEDs
9. Intelligent Flight Battery
10. Power Button
11. Battery Level Indicators
12. Aircraft Status Indicator
13. Aircraft Micro-USB Port
14. Camera Micro-USB Port
15. Gimbal Lock

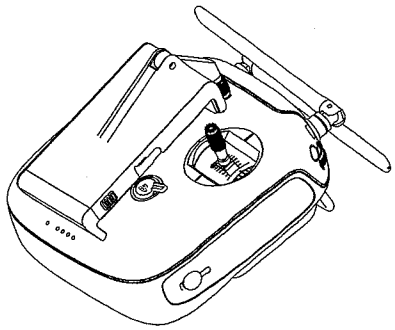
* Please note that maximum flight speed and maximum run time were tested in a lab environment. These statistics are for reference only, as conditions in your area may vary.

Remote Controller

The maximum transmission distance of the Inspire 1 remote controller is 2km*. The remote controller also allows you to control the landing gear or activate Return to Home with a tap. Other buttons allow instant photo capture, video recording, picture review and gimbal control.

A DJI Lightbridge-based HD video downlink is built-in, letting you see what your camera sees on your mobile device in real time HD. The app also allows you to change camera settings and activate Master/Slave mode so that one person can fly while other controls the gimbal independently. The master and slave controllers communicate using a 5.8Ghz wireless signal, and have a communication range with each other of up to 50 meters.The controller's LiPo battery has a maximum run time of approximately four hours and can be charged by plugging directly into the controller.

1. Power Button
2. Transformation Switch
3. Return to Home (RTH) Button
4. Control Sticks
5. Status LED
6. Battery Level LEDs
7. Power Port
8. Mobile Device Holder
9. Antennas
10. Handle Bar



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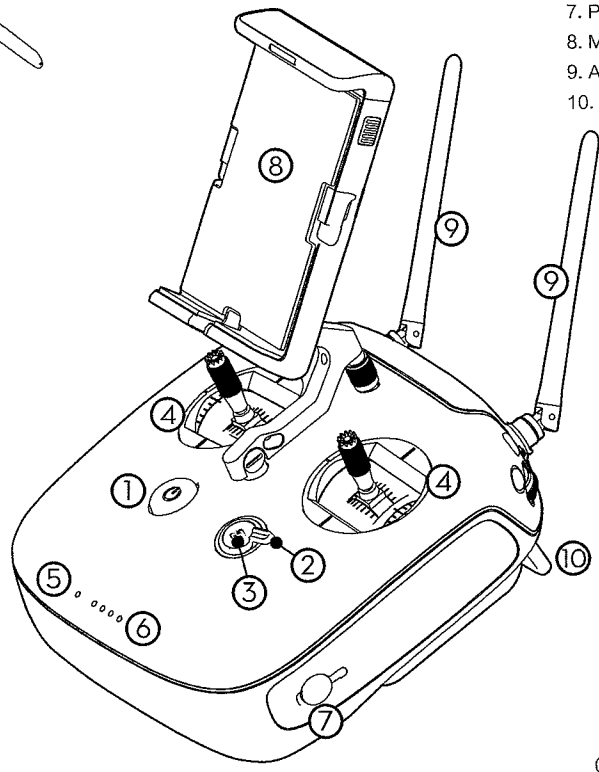
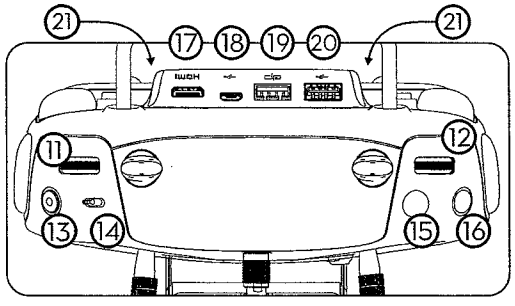
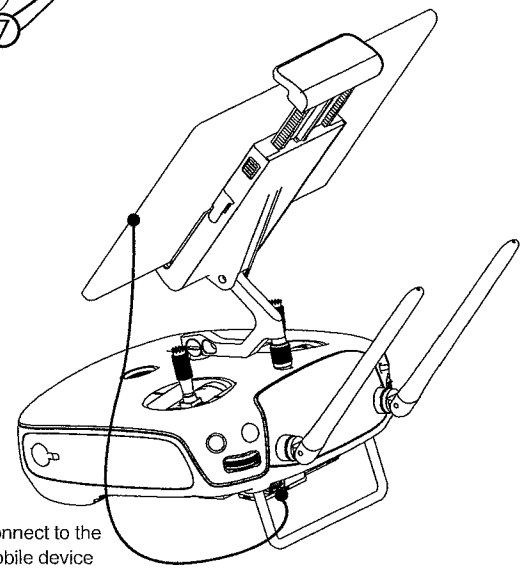


11. Gimbal Dial
12. Camera Settings Dial
13. Video Recording Button
14. Flight Mode Switch
15. Shutter Button
16. Playback Button
17. Mini-HDMI Port
18. Micro-USB Port
19. CAN-Bus Port
20. USB Port
21. Back Buttons (Reserved)





Connect to the mobile device

* Please note that the max transmission distance were tested in a lab environment. This statistic is for reference only, as conditions in your area may vary.

Fly Safe

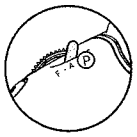
• Calibrating the Compass

Make sure to calibrate the compass in every new flight location. The compass is very sensitive to electromagnetic interference, which can cause abnormal compass data leading to poor flight performance or even failure. Regular calibration is required for optimum performance. Recalibrate the compass when: a) The Aircraft Status Indicator is blinking red and yellow. b) Flying in a new location.

- DO NOT calibrate your compass where there is a chance of strong magnetic interference, such as magnetite, parking structures, and steel reinforcements underground.
- DO NOT carry ferromagnetic materials with you during calibration such as keys or cellular phones.
- DO NOT calibrate beside massive metal objects.
- If the Flight Status LED is showing solid red, then try to calibrate again. If it is blinking red and yellow alternately after placing the aircraft on the ground, the compass has detected magnetic interference. Change your location.

• P Mode:

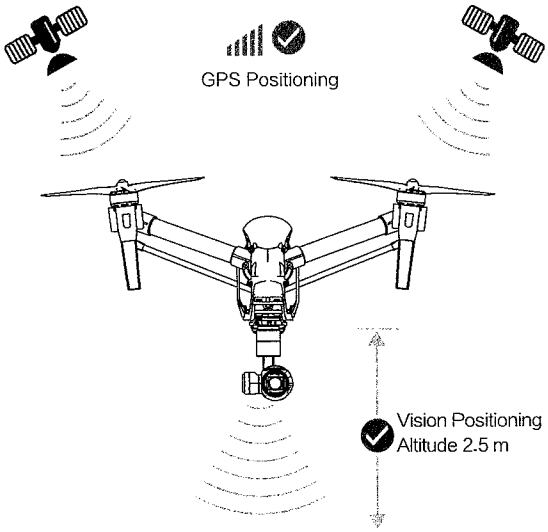
Safe to fly. In this mode, the Inspire 1 has a strong GPS signal and can use the Vision Positioning System allowing it to hover accurately in position indoors and out. If outdoors, this mode also means that a Home Point has been locked so that it can Return to Home if the control signal is lost.



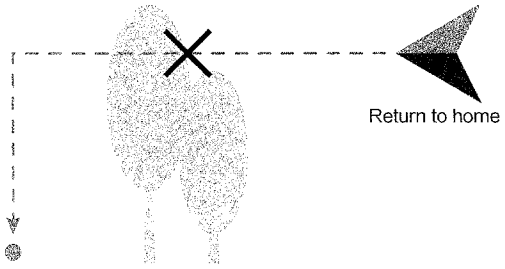
If you are not in this mode, toggle the Flight Mode Switch to P position to enable it.

The Flight Mode Switch is locked in P mode by default. Refer to the User Manual on how to unlock the switch.

There are three states in P mode.
P-GPS: GPS works best when outdoors in a wide open area, and your Inspire 1 uses GPS to hover in place when the GPS signal is strong. P-OPTI: If GPS is not available, the aircraft can use the Vision Positioning System to hover accurately. P-ATTI: Neither GPS or Vision Positioning System available, aircraft is using only its barometer for positioning, so only altitude is controlled.
Note that the Vision Positioning System may not work properly when the Inspire 1 is flying over water, over surfaces without a clear pattern, or in a low light environment.



• Return to Home:



When the GPS signal is strong, the aircraft will be able to record a Home Point and return to the Home Point when needed. The GPS location is recorded when the GPS signal icon in the DJI Pilot app is either yellow or green.
The aircraft will return to the Home Point automatically in the following cases (all require a strong GPS signal).
Smart RTH: When you press the RTH button on the remote controller or in the App. Low Battery RTH: The DJI Pilot app notifies users to take action when the battery level falls to a specified threshold.
Failsafe RTH: When the remote controller signal is lost.

• While returning home, its altitude can be adjusted by the user to avoid obstructions. Tall buildings may affect the remote controller signal. The Failsafe Return to Home procedure will be triggered if the signal is lost. Be sure fly higher than any nearby buildings to avoid crashing.

• Flight Limits:

The Inspire 1 is not permitted to fly within no-fly zones as specified by local laws and regulations. Please visit here:
http://www.dji.com/fly-safe for more information.

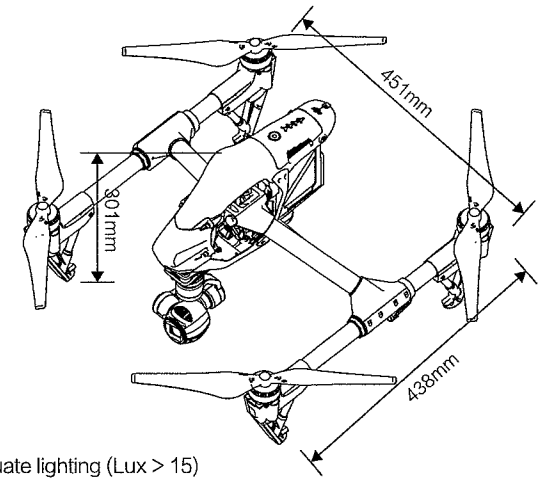
• Environmental Considerations:

1. Do not fly in severe weather conditions. This includes high wind, snow, rain and smog.
2. Only fly in open areas. Tall buildings and steel structures may affect the accuracy of the onboard compass and GPS signal.
3. Avoid from obstacles, crowds, high voltage power lines, trees or bodies of water.
4. Minimize electromagnetic interference by not flying in areas with high levels of electromagnetism, including mobile phone base stations or radio transmission towers.
5. Aircraft and battery performance is subject to environmental factors such as air density and temperature. Be very careful when flying 14700 feet (4500 meters) or more above sea level as battery and aircraft performance may be reduced.
6. The Inspire 1 cannot operate in P mode or use GPS at polar latitudes. It only can fly in ATTI mode and use the Vision Positioning System.

Appendix

- Aircraft (Model: T600)

Weight (Battery Included)	2935g
Maximum Weight of Payload	3400g
Max Tilt Angle	35°
Max Ascent Speed	5m/s
Max Descent Speed	4m/s
Max Speed	22m/s (ATTI mode, no wind)
Max Flight Altitude	4500m
Max Flight Time	Approximately 18 minutes
Operating Temperature Range	−10° C to 40° C



- Gimbal (Model: ZENMUSE X3)

Angular Vibration Range	±0.03°
Controllable Range	Pitch: −90° to +30° Pan: ±320°
Max Controllable Speed	Pitch: 120°/s Pan: 180°/s

- Vision Positioning

Velocity Range	<8m/s (Altitude 2m)
Altitude Range	5cm−500cm
Operating Environment	Surface with clear pattern and adequate lighting (Lux > 15)
Operating Range	0−250 cm

- Camera (Name/Model: X3/FC350)

Sensor	Sony EXMOR 1/2.3" Effective pixels:12.4M (total pixels: 12.76M)
Lens	FOV (Field Of View) 94° 20mm (35mm format equivalent) f/2.8 Focus at ∞
ISO Range	100−3200 (video) 100−1600 (photo)
Electronic Shutter Speed	8 s−1/8000 s
Image Max Size	4000x3000
Still Photography Modes	Single shoot; Burst shooting: 3/5/7 frames Auto Exposure Bracketing (AEB): 3/5 bracketed frames at 0.7EV Bias; Time−lapse
Video Recording Modes	UHD (4K): 4096x2160p24/25, 3840x2160p24/25/30 FHD: 1920x1080p24/25/30/48/50/60 HD: 1280x720p24/25/30/48/50/60
Max Bitrate Of Video Storage	60Mbps
Supported File Formats	FAT32/exFAT Photo: JPEG, DNG Video: MP4/MOV (MPEG−4 AVC/H.264)
Supported SD Card Types	Micro SD, Max capacity: 64GB. Class 10 or UHS−1 rating required
Operating Temperature Range	0° C to 40° C

- Remote Controller (Name: C1)

Operating Frequency	922.7MHz−927.7MHz (Japan only) 5.725GHz−5.825 GHz 2.400GHz−2.483GHz
Transmitting Distance	2km (outdoor and unobstructed)
Video Output Port	USB, Mini−HDMI
Operating Temperature Range	−10° C to 40° C
Battery	6000mAh LiPo 2S

- Charger (Model: A14−100P1A)

Voltage	26.3V
Rated Power	100W

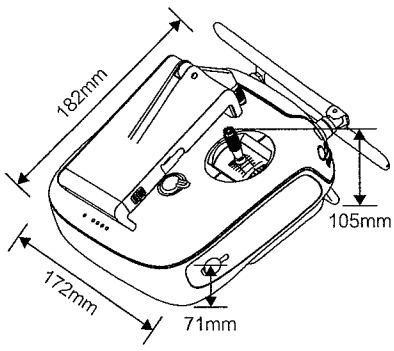
- Intelligent Flight Battery (Model: TB47, Standard)

Capacity	4500mAh
Voltage	22.2V
Battery Type	LiPo 6S High voltage battery
Energy	99.9Wh
Net Weight	570g
Operating Temge	−10° C to 40° C
Max Charging Power	180W

- Intelligent Flight Battery (Model: TB48, Optional)

Capacity	5700mAh
Voltage	22.8V
Battery Type	LiPo 6S High voltage battery
Energy	129.6Wh
Net Weight	670g
Operating Temge	−10° C to 40° C
Max Charging Power	180W

※ This Quick Start Guide is subject to change without prior notice.



CE 1313 RoHS

Using INSPIRE 1

Watch the video tutorials on the official DJI website and read the following documents before using your Inspire 1 for the first time:
Inspire 1 Quick Start Guide, Disclaimer, Intelligent Flight Battery Safety Guidelines, Inspire 1 Safety Guidelines, In the Box, Inspire 1 User Manual.

1. Download the **DJI Pilot** App

Visit http://m.dji.net/djipilot or scan this QR code to download the **DJI Pilot** app through your mobile device.

DJI Pilot app

2. Watch the Tutorial Videos

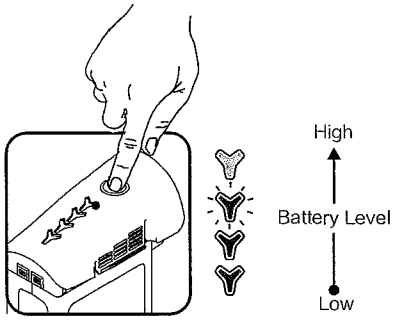
Watch the tutorial videos at www.dji.com or in the DJI Pilot app.

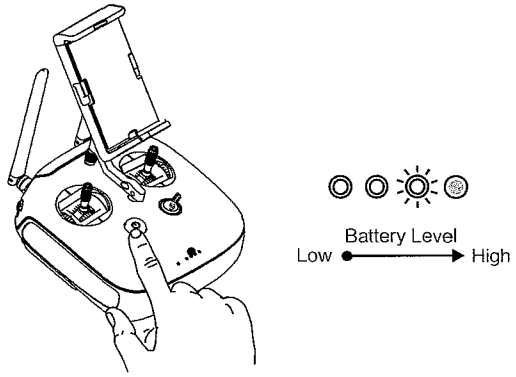
The tutorial videos

- For the best user experience, please use mobile devices with iOS 8.0 (or higher) and Android 4.1.2 (or higher).
- Read the Inspire 1 User Manual in the DJI Pilot app or official DJI website for more details.

3. Check Battery Levels

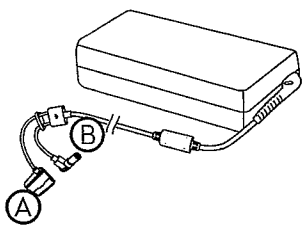
Press the Power Button once on both the Intelligent Flight Battery and remote controller to check battery levels. The Intelligent Flight Battery must be fully charged before using it for the first time. Make sure both batteries are adequately charged before each flight.
Press the power button once then press again and hold for 2 seconds to power on the remote controller. Repeat to power off.
Press the power button once, then press again and hold for 2 seconds to power on the Intelligent Flight Battery. Repeat to power off.

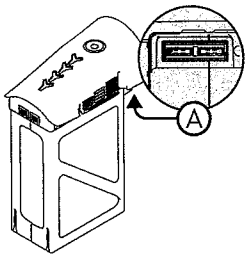


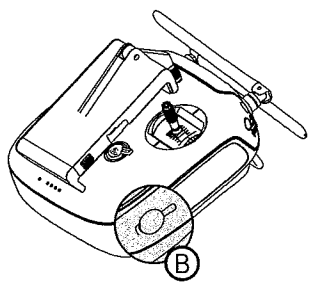


4. Charging

- Only use the official DJI Inspire 1 charger for your Intelligent Flight Battery and remote controller.
- To charge the Inspire 1 Intelligent Flight Battery or the remote controller, connect it to power through the port to a suitable power source (100-240V 50/60Hz).
- It is recommended to turn off the batteries before charging.
- Use the included charger to charge the Intelligent Flight Battery and the remote controller battery. When fully charged, the battery LEDs on the Intelligent Flight Battery and remote controller will turn off.

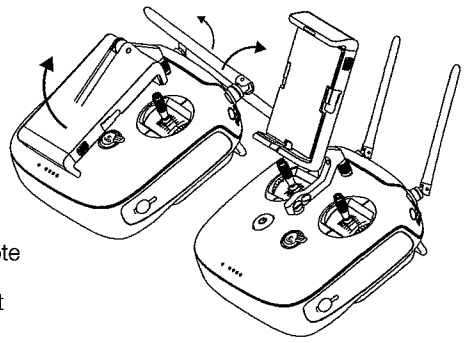




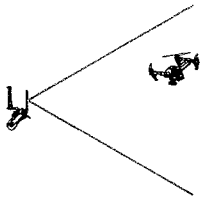


5. Preparing the Remote Controller

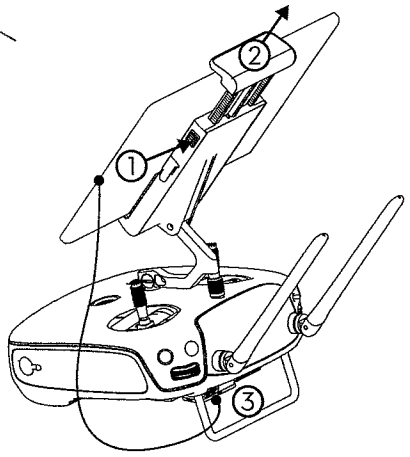
Tilt the Mobile Device Holder to the desired position then adjust the antennas as shown. The strength of the remote controller signal is different when the antenna position is different.



Strong  Weak 



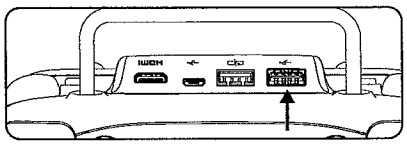
The transmission signal between the aircraft and remote controller will perform best when within the optimal transmission range. If the signal is weak, fly the aircraft closer to you to achieve optimal signal performance.



① Press the button on the side of the Mobile Device Holder to release the clamp.

② Place your device onto the clamp and adjust the clamp to hold it securely.

③ Connect your mobile device to the remote controller with a USB cable. Plug one end of the cable into your mobile device, and the other end into the USB port on the back of the remote controller.



If you have purchased an Inspire 1 with dual remote controllers, the Master remote controller will connect to the aircraft automatically when powered on. Master/Slave mode is disabled by default. Activate it and set it up through the DJI Pilot app. The Master remote controller's Status LED will show solid green when it connected to the aircraft. The Slave remote controller's Status LED will show solid blue when it is connected to the Master controller.

Connecting the Master remote controller to the Slave remote controller:
On the Master remote controller, launch the DJI Pilot app and go to the Camera page. Then tap on the top of your screen to enter the remote controller settings window. Tap "Activate Master/Slave Mode"and select "Master". Then enter your desired connection password for the "Slave" remote controller.
On the Slave remote controller, select "Slave " and tap "Search" to find the Master remote controller. Select the "Master" remote controller from the "Master RC List" and input the connection password.

• Do not use other 2.4GHz devices at the same time to avoid signal interference.

6. Preparing the Aircraft

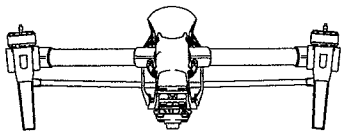
The aircraft is in Travel Mode during delivery. Follow these steps to change it to Landing Mode before your first flight:

① Insert the Intelligent Flight Battery into the battery compartment.

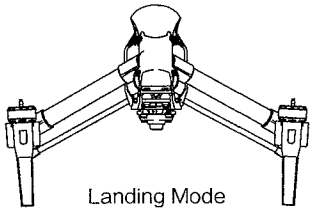
② Power on the remote controller and the Intelligent Flight Battery.

③ Toggle the Transformation Switch up and down at least four times. Repeat to change aircraft to Travel Mode.

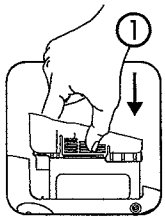
Power off the aircraft before mounting the gimbal and camera.

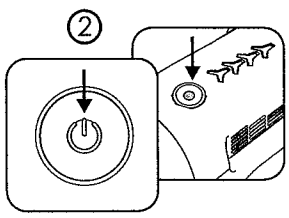


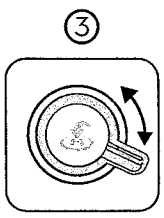
Travel Mode



Landing Mode



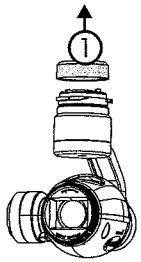




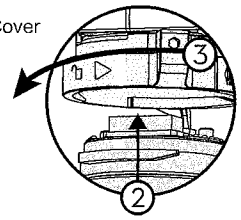
• If you have purchased the dual remote controller version, you must use the Master remote controller to deactivate Travel Mode.

7. Mounting the Gimbal and Camera

① Remove the Gimbal Cover.
② Rotate the Gimbal Lock to the unlocked position (to the right when facing the nose of the aircraft). Insert the gimbal by aligning the white mark on the gimbal with white mark on the Gimbal Lock.
③ Rotate the gimbal lock back into the locked position (to the left when facing the nose of the aircraft).



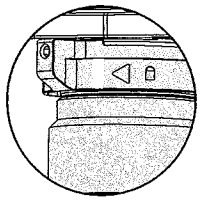
Gimbal Cover



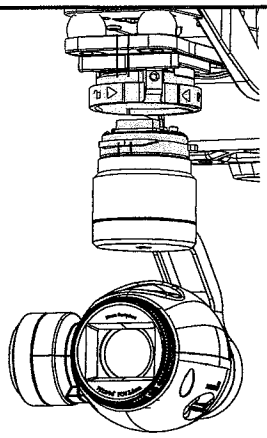
Gimbal Lock

Mounting Place

Gimbal Connector



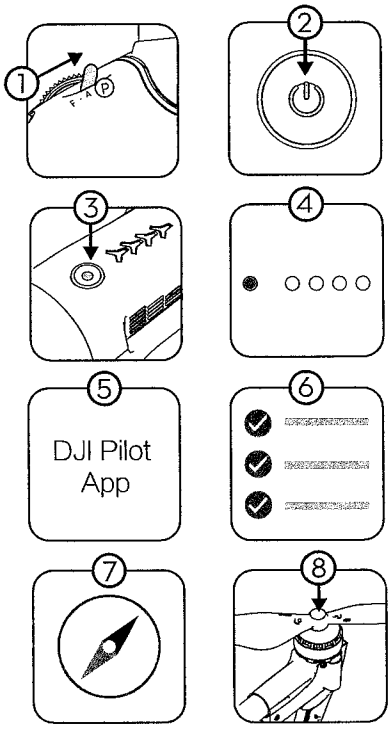
Locked



8. Preparing for Flight

Place the aircraft on a flat surface, in an open space, with the back facing you.

① Move the Flight Mode Switch to the right to select P mode. (P mode is Positioning mode, A mode is ATTI mode, and the F mode is Function mode.)
② Power on the remote controller.
③ Power on the aircraft and wait for the self-check to complete. Do not move the aircraft during the self-check.
④ Ensure the remote controller is linked to the aircraft before flight. Re-link the remote controller to the aircraft if it fails to connect. Refer to the *INSPIRE 1 User Manual* on how to link.
⑤ Ensure the remote controller and your mobile device are connected with a USB cable. Launch the DJI Pilot app when connecting to the aircraft for the first time, and follow the instructions within the app.
⑥ Launch the DJI Pilot app and tap "Camera". Ensure the aircraft is functioning normally by completing the Checklist.Beginner Mode is enabled by default when you launch the DJI Pilot app for the first time. The aircraft's altitude and flight distance is restricted when flying in Beginner Mode. We recommend you fly in Beginner Mode when using the aircraft for the first time. You may disable Beginner Mode in the settings page of the DJI Pilot app.
⑦ Calibrate Compass: tap"MODE"in the app and select "Compass Calibration" to calibrate the compass, then follow on-screen instructions.
⑧ Attach propellers with the black nut onto motors with the black dot and spin counter-clockwise to secure. Attach propellers with gray nut onto motors without a black dot and spin clockwise to secure. Place all propellers onto the correct motor and tighten by hand to ensure security before flight.

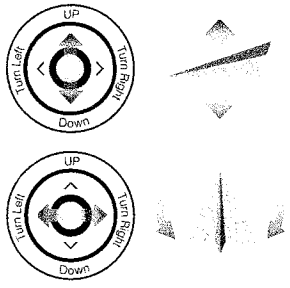


- When not in P mode, the Inspire 1 will only maintain altitude, not position, and will drift with wind or user inputs. Return to Home is not available in F mode.

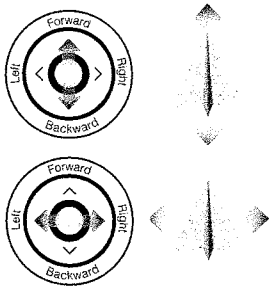
9. Remote Controller Operation

The remote controller is by default set to Mode 2 (throttle controlled by the left-hand stick). Adjust the tilt angle of camera by using the Gimbal Dial.

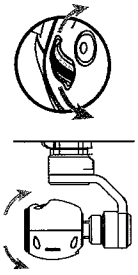
Left Stick



Right Stick



Gimbal Dial



- You can set the remote controller to different modes using the DJI Pilot app.

10. Flight

Safe to Fly (GPS)

Before taking off, make sure the aircraft status bar in the DJI Pilot app shows "Safe to Fly (GPS)". Otherwise, the aircraft cannot hover in place and record the Home Point.

● Auto Taking – Off & Landing:

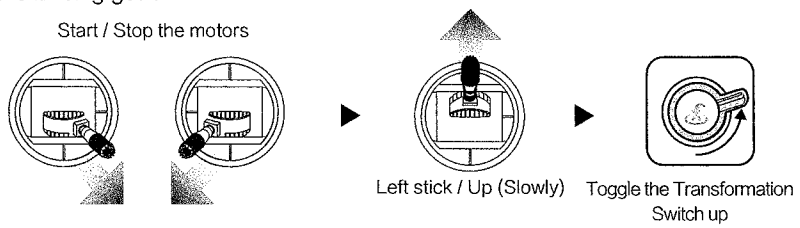
(In the Camera screen of the DJI Pilot app)

Tap and confirm your selection. The aircraft will automatically take off, retract its landing gear, and hover at 1.5 meters after you tap and confirm Auto Take-off.

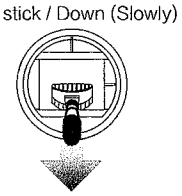
Tap and confirm your selection. The landing gear will lower and the aircraft will automatically land.

● Manual Take – off & Landing:

Start the motors by pulling both control sticks to the bottom inside corners. Release the sticks once the motors start. Slowly push the left (throttle) stick up to take off. Once in the air, toggle the Transformation Switch up to raise the landing gear.



Gently pull the left (throttle) stick down to lower the aircraft until it touches the ground. Pull both sticks to the bottom inside corners to stop the motors.
After flight, change the aircraft back into Travel Mode. Do not attempt this at the beach, over grass, or over monochromatic carpet. Then place the aircraft on a flat surface and remove the gimbal and camera for transport.



- It is highly recommended that you only take off when the Aircraft Status bar is green.
- The aircraft cannot take off if the Critical Low Battery Warning is active.
- The Intelligent Flight Battery must warm-up if the outside temperature is low. A warning will display in the DJI Pilot app.
- Rotating propellers can be dangerous. Do not start the motors when there are people nearby and always fly in a wide open area.
- Never stop the motors during flight. Power off the aircraft prior to switching off the remote controller after landing.

● Return to Home

1. Press and hold the return home button until the LED surrounding the button is blinking white, and the return home procedure is in process. Press once to stop the procedure.
2. The DJI Pilot app notifies users to take action when the battery level falls to a specified threshold. This warning threshold can be set within the DJI Pilot app. The aircraft will land immediately when it reaches Critical Low Battery Level Warning.
3. Failsafe: The Inspire 1 will enter RTH mode if remote controller signal is lost.

- While returning home, its altitude can be adjusted by the user to avoid obstructions.

Appendix

Aircraft Status Indicator Description

- Slowly: Safe to fly,GPS working
- x2 Double: Vision Positioning System working, no GPS
- Slowly: P-ATTI or ATTI
- Quickly: Not connected to remote controller
- Slowly: Low battery level warning
- Quickly: Critical low battery level warning
- Solid: Critical error
- / Blinking Alternately: Compass calibration required

Remote Controller Status LED

- Remote controller is functioning normally but is not connected to the aircraft.
- Remote controller is functioning normally and is connected to the aircraft.
- Remote controller is in Slave Mode and not connected to the aircraft.
- Remote controller is in Slave Mode and is connected to the aircraft.
- B-B-B... Aircraft low battery warning or remote controller error.
- B—B—... Remote controller has been idle for 5 minutes.

Learn more information from:

www.dji.com/product/inspire-1

Using the Camera

- Adjust the camera parameters using the Camera Settings Dial on the remote controller or through the DJI Pilot app. Press the Shutter Button/Video Record Button to capture photos or record videos.
- Adjust the tilt of the gimbal using the Gimbal Dial.
- Download photos and video from the SD card to your mobile device through the DJI Pilot app. You may also use a SD card reader to export files to your PC.

Exhibit 3

DJI Inspire

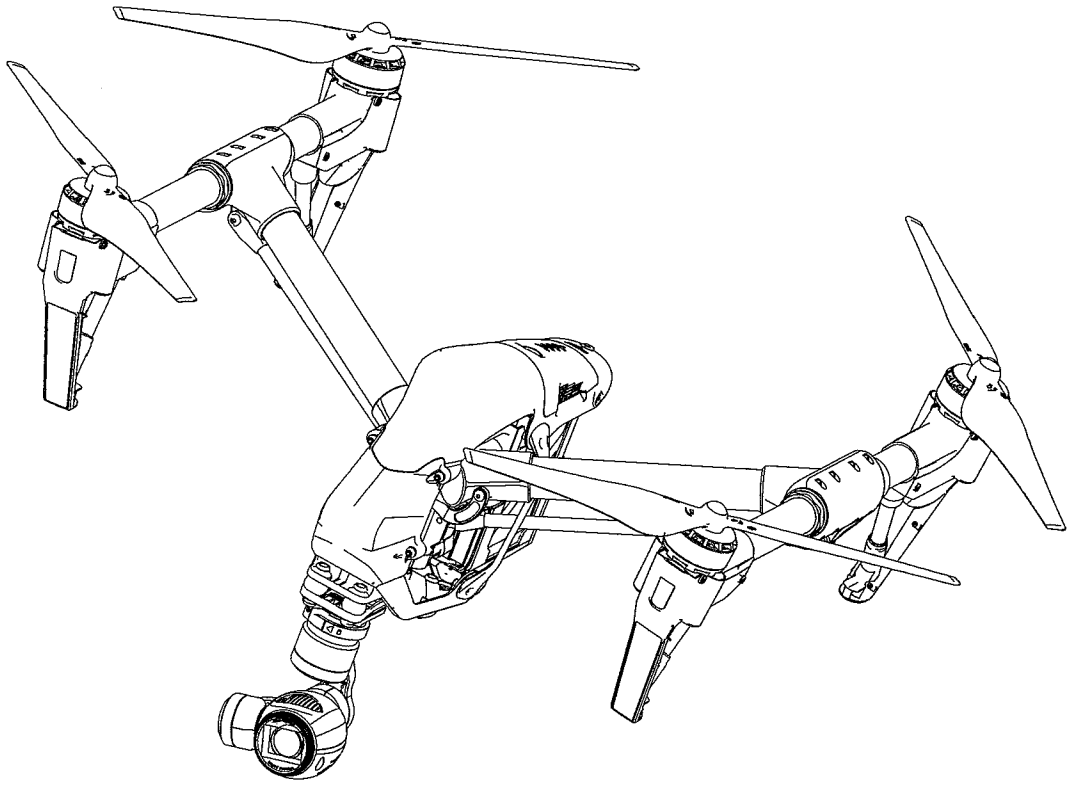
Safety Guide

INSPIRE 1

Safety Guidelines

安全使用指南

V1.0 2014.12



Reading Inspire 1 Manuals

The following tutorials and manuals have been produced to help you make full use of your DJI Inspire 1:

1. In The Box
2. Disclaimer and Warning
3. Intelligent Flight Battery Safety Guidelines
4. INSPIRE 1 Safety Guidelines
5. INSPIRE 1 Quick Start Guide
6. INSPIRE 1 User Manual

Check all of the included parts listed in the In The Box document. Read the Disclaimer and Warning, Intelligent Flight Battery Safety Guidelines, and INSPIRE 1 Safety Guidelines before flight. Then prepare for your first flight by using the INSPIRE 1 Quick Start Guide and watching all of the tutorial videos. If you have questions, refer to the INSPIRE 1 User Manual for more comprehensive information. Experienced users, particularly those who have previously used DJI products, may choose to skip to the Inspire 1 Quick Start Guide to begin preparing for flight.

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Individual Parts

Remote Controller

1. Linking is required if you wish to replace your remote controller or receiver, or add a new remote controller. Refer to the user manual for more information about how to link the aircraft.
2. If the remote controller is powered on and has not been used for 5 minutes, it will sound an alert. After 10 minutes it will automatically power off. Move the sticks or perform some other action to cancel the alert.
3. A Slave remote controller cannot be linked with the aircraft and cannot control the aircraft's flight. You may change it to a Master remote controller via the DJI Pilot app, and then link it to the aircraft to control flight.
4. Ensure the Mobile Device Holder is firmly in place and does not slip.
5. For the GPS in the remote controller to function properly, and the Dynamic Home Point to be accurate, ensure the DJI logo is facing the sky and keep the remote controller away from any metal objects.
6. Repair or replace the remote controller if damaged. A damaged remote controller antenna will greatly decrease performance.
7. When on the go, you may charge the remote controller from the aircraft's Intelligent Flight Battery.

Camera

1. Photos or videos cannot be transmitted or copied from the camera if the Intelligent Flight Battery is powered off.
2. Be sure to power off the Intelligent Flight Battery correctly, otherwise your camera parameters will not be saved and any recorded videos may be damaged.
3. Test the camera by shooting a few test images to check that it is operating correctly before shooting important pictures.
4. Respect the privacy of others when using the camera. Make sure you comply with local privacy laws, regulations and moral standards.
5. Check camera settings before use to make sure you can adjust them to fit your needs.

Gimbal

1. The gimbal and gimbal connector are very delicate. Handle with care and do not touch the gimbal connector, as any damage will cause it to function abnormally.
2. A gimbal motor error may occur if: (1) The aircraft is placed on uneven ground or other objects obstruct the gimbal's full range of motion, or (2) The gimbal has undergone an excessive impact, e.g. a collision. Please only takeoff from flat, open areas and protect the gimbal after powering up.
3. Hold the gimbal firmly when detaching or reattaching it, so it does not drop.
4. Do not add any payloads to the gimbal, as this may cause the gimbal to function abnormally, or even

lead to motor damage.

5. Precision elements in the gimbal may be damaged by a collision or impact, which will cause the gimbal to function abnormally.

Compass

1. Ensure the compass is calibrated before every flight. Failure to calibrate may lead to a poor flight performance or even failure.
2. DO NOT calibrate your compass where there is a chance of strong magnetic interference. This includes areas where there are massive metal objects, parking structures, steel reinforcements underground, or under bridges.
3. DO NOT carry ferromagnetic materials with you during calibration, such as keys or mobile phones.
4. The compass should always be recalibrated when moving from indoor spaces to outdoor spaces.
5. If the rear LED shows a solid red light, compass calibration has failed. Please recalibrate.
6. After successful calibration, the compass may become abnormal when you put the aircraft on the ground. This is because of magnetic interference that may be underground. Move the aircraft to another location and try again.

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Parameter Settings

The Inspire 1 features a built-in flight control system to make operation as safe as possible. However, it is good practice to remove all propellers before switching it on for calibration or changing other parameter settings.

Battery

Refer to the Intelligent Flight Battery Safety Guidelines and battery sticker for usage and maintenance information.

Storage and Transportation

1. Store the Intelligent Flight Battery and remote controller in a cool, dry place away from direct sunlight, to ensure the built-in LiPo battery does not overheat. Recommended storage temperature: between 22°C and 28°C for storage periods of more than three months. Never store in environments outside the temperature range of -20°C to 45°C.
2. Do not allow the camera to come into contact with, or become immersed in, water or other liquids. If it gets wet, wipe dry with a soft, absorbent cloth. Turning on an aircraft that has fallen into water may cause permanent component damage. Do not use substance containing alcohol, benzene, thinners or other flammable substances to clean or maintain the camera. Do not store the camera in humid or dusty areas.
3. Always keep all parts out of the reach of children, as the cables, straps or small parts may be dangerous if swallowed. If swallowed, go to the hospital immediately.
4. Detach the gimbal from the Inspire 1 when storing for a long period of time or transporting over long distances. Also replace the Gimbal Cover when storing.

Maintenance and Upkeep

1. Check every part of the aircraft if it is violently impacted. If you have any problems or questions, please contact a DJI authorized dealer.
2. Old, chipped, or broken propellers or motors should never be used.
3. Regularly check the Battery Level Indicators to see the current battery level and overall battery life. When the battery life reaches 0%, it can no longer be used.
4. After every 50 hours of flight time, DJI recommends you perform a thorough inspection of your Inspire 1 and all of its parts and components to ensure the safe operation of your aircraft.

Flight Environment Requirements

1. Do not use the aircraft in severe weather conditions. These include wind speed exceeding 10m/s, snow, rain, smog, heavy wind, hail, lightning, tornado or hurricane.
2. Do not use the aircraft in dust or sandstorms.
3. Fly in open areas, as tall buildings or steel structures may affect the accuracy of the onboard compass and block the GPS signal.
4. Keep the aircraft away from obstacles, people, animals, high voltage power lines, trees, and bodies of water when in flight.
5. Avoid interference between the remote controller and other wireless equipment. Make sure to turn off the Wi-Fi on your mobile device.
6. Do not fly near areas with magnetic or radio interference. These include but are not limited to: high voltage lines, large scale power transmission stations, mobile base stations and broadcasting towers. Failing to do so may compromise the transmission quality of this product, cause remote controller and video transmission errors may affect flight orientation and location accuracy. The aircraft may behave abnormally or fall out of control in areas with too much interference.
7. P mode is unavailable in polar zones. Users can use ATTI mode instead.
8. Do not fly the aircraft within no-fly zones specified by local laws and regulations.

Flight Warnings

Failsafe and Return to Home

1. Return to Home will not work if the GPS signal is insufficient or GPS is not active.
2. Press the RTH Button on the remote controller to bring the aircraft back to the Home Point instead of turning off the remote controller.
3. Tall buildings may adversely affect the Failsafe function. Please adjust the aircraft location, altitude and speed while returning home to avoid obstacles.
4. Make sure to always fly the aircraft within the transmission range of the remote controller.
5. When updating the Home Point, do not block the GPS signal of the remote controller and ensure the new Home Point is correct on the live map.
6. Do not update the Home Point near tall buildings, as the GPS may be blocked and lead to an incorrect location being stored.
7. Only use the Failsafe and Return to Home functions in case of emergency, as they may be affected by the weather, the environment, or any nearby magnetic fields.

Low Battery

1. When the Critical Battery Level Warning activates and the aircraft is descending automatically, you may push the throttle upward to hover the aircraft and navigate it to a more appropriate location for landing.
2. When battery warnings are triggered, please bring the aircraft back to the Home Point or land to avoid losing power during flight.

Vision Positioning System

1. The Vision Positioning System cannot work properly over surfaces that do not have pattern variations. The effective altitude for Vision Positioning System to function correctly is less than 2.5 meters.
2. Vision Positioning System may not function properly when the aircraft is flying over water.
3. Vision Positioning System may not be able to recognize patterns on the ground in low light conditions (less than 100 lux).
4. Keep your pets away from the aircraft when Vision Positioning System is activated, as the sonar sensors emit high frequency sound that is only audible to some pets.
5. Note that Visual Positioning System may not function properly when the aircraft is flying too fast or too low.

Transformation Function

1. Ensure the landing gear is lowered before landing.
2. Stay away from the aircraft when it is transforming to prevent injury.
3. DO NOT attempt to catch the aircraft, as the landing gear will lower if the Visual Positioning system detects an object and may cause injury.
4. Keep the aircraft arms clean, otherwise transformation may be affected.
5. Never apply lubricants to aircraft arms.

Others

1. If you are using a phone as your mobile display device, be sure to continue flying safely if you receive an incoming call.
2. Land as soon as possible if there is an alert shown on the DJI Pilot app.
3. Upon landing, power off the aircraft first, then switch off the remote controller.

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Preflight Checklist

1. Check that all parts are in good condition. Do not fly with aging or damaged parts.
2. Remote controller, Intelligent Flight Battery and mobile device are all fully charged.
3. Propellers are mounted correctly and securely.
4. Lens is clear.
5. Micro-SD card has been inserted, if necessary.
6. Gimbal is functioning as normal.
7. Gimbal is correctly attached to the aircraft.
8. Motors can start and are functioning as normal.
9. The DJI Pilot app can connect to the camera and all firmware has been updated to the latest version.

