

## 45 Item Pre-Flight Checklist for sUAS

### PRE-PLANNING

- A Check AirMap App for Airspace Restrictions/Limitations
- B Notify MVY Airport 1 or 2 days in advance if flying within 5 miles of airport
- C Obtain FAA Waiver if flying within Controlled Airspace
- D Obtain FAA Waiver if necessary for other Part 107 exemptions
- E Check for NOTAMS <https://pilotweb.nas.faa.gov/PilotWeb/notamRetrievalByICAOAction.do?method=displayByICAOs&reportType=RAW&formatType=DOMESTIC&retrieveLocId=KMOVY&actionType=notamRetrievalByICAOs>
- F Determine Maximum Flight Height
- G Determine Maximum Flight Distance
- H Charge & Check all charged batteries by placing into aircraft & power up when connected to Wi-Fi
- I Check that aircraft & remote controller firmware is current (connect to Wi-Fi)
- J Post public notice 48 hours ahead at minimum
- K Notify local Police Department of flight time & location
- L Check SD Card Storage – should be empty
- M Cache Maps on Remote Controller

### PRE-FLIGHT

#### WEATHER & SITE SAFETY CHECK

- 1 Chance of precipitation less than 10%
- 2 Wind speed under 15 knots (less than 17 mph)
- 3 Cloud base > 500 feet
- 4 Visibility at least 3 statute miles (SM)
- 5 If flying at dawn / dusk, double-check civil twilight hours
- 6 Establish take-off, landing, and emergency hover zones
- 7 Potential for electromagnetic interference?
- 8 Look for towers, wires, buildings, trees, or other obstructions
- 9 Look for pedestrians and/or animals and set up safety perimeter if needed
- 10 Discuss flight mission with other crew members if present

[https://aviationweather.gov/adds/metars/index?submit=1&station\\_ids=KMOVY&chk\\_metars=on&hoursStr=2&std\\_trans=translated&chk\\_tafs=on](https://aviationweather.gov/adds/metars/index?submit=1&station_ids=KMOVY&chk_metars=on&hoursStr=2&std_trans=translated&chk_tafs=on)

UAS must remain 500ft below cloud base

#### VISUAL AIRCRAFT / SYSTEM INSPECTION

- 1 Registration number is displayed properly and is legible
- 2 Look for abnormalities—aircraft frame, propellers, motors, undercarriage
- 3 Look for abnormalities—gimbal, camera, transmitter, payloads, etc.
- 4 Gimbal clamp and lens caps are removed
- 5 Clean lens with microfiber cloth
- 6 Attach propellers, battery/fuel source, and insert SD card / lens filters

#### POWERING UP

- 1 Turn on transmitter / remote control and open up DJI Go 4 app
- 2 Turn on aircraft
- 3 Verify established connection between transmitter and aircraft
- 4 Position antennas on transmitter toward the sky
- 5 Verify display panel / FPV screen is functioning properly
- 6 Calibrate Inertial Measurement Unit (IMU) as needed
- 7 Calibrate compass before every flight
- 8 Verify battery / fuel levels on both transmitter and aircraft
- 9 Verify that the UAS has acquired GPS location from at least six satellites

#### TAKING OFF

- 1 Take-off to eye-level altitude for about 10-15 seconds
- 2 Look for any imbalances or irregularities
- 3 Listen for abnormal sounds
- 4 Pitch, roll, and yaw to test control response and sensitivity
- 5 Check for electromagnetic interference or other software warnings
- 6 Do one final check to secure safety of flight operations area
- 7 Proceed with flight mission