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DJI MAVIC 3M

See More, Work Smarter

Effective aerial surveying needs to see the invisible. That's why Mavic 3 Multispectral has two forms of sight. It combines an RGB camera with a multispectral camera to scan and analyze crop growth with total clarity. Agricultural production management requires precision and data, and Mavic 3M delivers both.

Compact and Portable

Foldable for easy storage Highly integrated imaging system

Precise Positioning

Centimeter-level RTK positioning Synchronization at microsecond level

Multispectral Camera

4 × 5 MP G/R/RE/NIR

Lightweight and Portable, Highly Integrated

- Small and foldable for easy storage
- Integrates RGB and multispectral cameras

Extra-long Battery Life, Highly Efficient Aerial Surveying

- 43-minute flight time [4]
- Aerial surveying of up to 200 hectares per flight [3]
- 100W Battery Charging Hub, 88W fast charging



RGB Camera

- 4/3 CMOS, 20 MP
- 1/2000-second mechanical shutter in order with no rolling shutter
- 0.7-second high-speed-burst shooting when shooting with RGB camera only

Stable Image Transmission, Omnidirectional Obstacle Sensing

- 15km image transmission, stable signal ^[2]
- Omnidirectional obstacle sensing, ^[1] terrain-follow aerial surveying ^[5]

Multispectral Camera

- Four 5MP multispectral cameras
- Green (G) 560 nm ± 16 nm
- Red (R) 650 nm ± 16 nm
- Red edge (RE) 730 nm ± 16 nm
- Near-infrared (NIR) 860 nm ± 26 nm
- Light sensor, NDVI is more accurate

Extensive Applications

- Aerial surveying of farmland, mountains, and orchards
- Multispectral aerial surveying to guide variable operations
- Smart field patrols to monitor crop status
- Environmental monitoring and natural resource surveying

Safe and Stable

Omnidirectional obstacle avoidance ^[1] 15 km transmission distance ^[2]

RGB Camera

20 MP 4/3 CMOS, mechanical shutter

Efficient Aerial Surveying

Up to 200 hectares per flight [3]

Accurate Images that Capture Every Pixel

- RTK centimeter-level positioning
- Microsecond-level time
- synchronization
- Phase-less aerial surveying

Open Ecosystem

- Cloud API, access to third-party platforms
- MSDK, an exclusive app

- 1. DO NOT fly in severe weather conditions, such as in strong winds (wind speeds of 12 m/s or more), snow, rain, or lightning. DO NOT fly in areas that are 6,000 meters or higher above sea level. DO NOT fly the aircraft in environments where the temperature is below -10° C (14° F) or above 40° C (104° F). DO NOT take off from moving objects, such as cars and ships. DO NOT fly close to reflective surfaces, such as water or snow. Otherwise, the vision positioning system may not work properly. When the GNSS signal is weak, fly the aircraft in environments with good lighting and visibility. The vision system may not work properly in poor light conditions. Be aware of flight Safety when flying near sources of electromagnetic interference. Common sources of electromagnetic interference include high-voltage power lines, high-voltage transmission stations, radar stations, cell phone base stations, broadcast towers, Wi-Fi hotspots, routers, and Bluetooth devices.
- 2. The 15km transmission distance can only be achieved under the FCC standard when measured in an outdot revenue without interference. The SRRC standard is adopted in mainland China, and the furthest transmission distance is 8 km. The above data are the furthest communication distances for one-way, non-return flights under each standard. Please pay attention to return prompts in the DJI Pilot 2 app during flight.
- 3. Specific test conditions: In a sunny environment without wind, the orthographic flight aerial photography is obtained with a flight speed of 15 m/s, a flight altitude of 217 m, a ground sampling distance (GSD) of 5.73 cm for visible and 10 cm for multispectral, a fore-and-aft overlap rate of 70%, and a side overlap rate of 60%. 4. Data was measured using a DJI Mavic 3M flying at a constant speed of 36 kph at sea level in a windless environment until 0% power remained. It is for reference only. Please pay attention to
- 4. Data was measured using a DJI Mavic 3M flying at a constant speed of 36 kph at sea level in a windless environment until 0% power remained. It is for reference only. Please pay attention to Return to Home prompts on the DJI Pilot 2 app during flight.
- 5. Terrain-Follow Aerial Surveying supports aerial surveying 80-200 meters from the ground. Low-light, water, electrical towers, glass structures, buildings with large, repeated patterns, and other areas with dynamic obstacles may present risks. Please use caution.