



Maptek™ UAS support the Architectural, Engineering, Construction, Survey, and Public Safety UAS industries with forward-looking, expandable technology.. Designed for environments requiring precision flight, confident data capture, automation, and on-board computer processing, the Aquila Series by Maptek™ are purpose-built aircraft.

Designed to capture critical precision, the dual RTK system provides self-heading, and captures data compatible with all post-flight analysis, pointcloud, and assembly software applications.

Four on-board expansion ports and power sources, multiple hardpoints on the aircraft and ground control system, OFDM transmission system, and many payloads, places this NATO-compliant aircraft in a new category of industrial and commercial unmanned systems.

Pilots will never be grounded by controlled airspace restrictions. Maptek™ supports professional pilots and flight in controlled airspace by not restricting flight, regardless of location. Pilots may define their own geofencing when/if required.

The Aviator Ground Controller interfaces with the on-board Pixhawk™ flight system, enabling pilots to access corridor, survey, waypoint, and facade scan operations through automated flight, enabling pilots to recall missions at any time. Missions may be off-loaded for archiving, and reloaded when a reflight or mission debrief is required.

Interchangeable payloads ranging from standard 22MP RGB to high-end, 42 MP full frame sensors, thermal camera, blended camera systems, stereo vision, and built-in SLAM technology round out this extremely versatile UAS multi-sensor platform.

AIRCRAFT

Dimensions
Diagonal Wheelbase
Weight

Max Payload
Operating Frequency
Hovering Accuracy

RTK Positioning Accuracy

Max Angular Velocity
Max Pitch Angle
Max Ascent Speed
Max Descent Speed (vertical)
Max Speed
Service Ceiling Above Sea Level
Max Wind Resistance
Max Flight Time
GNSS
Operating Temperature

GROUND CONTROL

Operating Frequency
Max Transmitting Distance
Dimensions
Weight
Operating system
Built-in battery
Battery Life
Touch screen
I/Os
Operating Environment

Flight Battery
Capacity
Voltage
Battery Type
Energy
Weight
Operating Environment

AQUILA

500*450*300mm
600mm
Approx. 1.3 kg (without batteries)
Approx. 2.5 kg (with one LPB610HV battery)
1.5kg
2.4000 - 2.4835 GHz; 5.725-5.850 GHz
Vertical
±0.5 m (GPS enabled)
±0.1 m (RTK enabled)
Horizontal
±0.5 m (GPS enabled)
±0.1 m (RTK enabled)
1cm + 1ppm Horizontal)
1.5cm + 1ppm (Vertical)
120°/s
30°
5m/s
4m/s
12m/s
5000m
15m/s
68min (no load) 33min (with 1500g load)
GPS+GLONASS+BeiDou+Galileo
-20°C to 50°C (-4°F to 122° F)

AVIATOR

2.4000 GHz; 5.725 GHz
10km
280x150x60mm
1100g
Android10
7.4V 10000mAh
4.5h
7 inch 1080P 1000nit
2*USB 1*HDMI 2*USB-C
-20°C to 50°C (-4°F to 122° F)

LPB610HV
10000mAh
26.1V
Lipo 6S
231wh
1.2kg
-20°C to 50°C (-4°F to 122° F)

AQUILA 3

600*600*300mm
735mm
Approx. 1.65 kg (without batteries)
Approx. 2.85kg (with one LPB610HV battery)
3kg
2.4000 - 2.4835 GHz; 5.725-5.850 GHz
Vertical
±0.5 m (GPS enabled)
±0.1 m (RTK enabled)
Horizontal
±0.5 m (GPS enabled)
±0.1 m (RTK enabled)
1cm + 1ppm (Horizontal)
1.5cm + 1ppm (Vertical)
120°/s
30°
5m/s
4m/s
12m/s
5000m
15m/s
80min (no load) 30min (with 3000g load)
GPS+GLONASS+BeiDou+Galileo
-20°C to 50°C (-4°F to 122° F)



Multiple power and data extension ports provide deep flexibility and system expandability to fit every mission or industry.

MORE INFO:
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