

# 6X Series Sensor Comparison



Feature / Specification**	6X Multispectral	6X Thermal	6X Thermal Pro
<b>Resolution</b>	2048px x 1536px (Multispectral) 5184px x 3888px (RGB)	2048px x 1536px (Multispectral) 5184px x 3888px (RGB) 320px x 256px (Thermal)	2048px x 1536px (Multispectral) 5184px x 3888px (RGB) 640px x 512px (Thermal)
<b>Thermal Imager</b>	N/A	FLIR Radiometric Boson 320	FLIR Radiometric Boson 640
<b>Capture Rate</b>	5 FPS (0.2s interval)	5 FPS (0.2s interval)	5 FPS (0.2s interval)
<b>GSD @ 200ft (60m)</b>	1.0in / 2.6cm (Multispectral) 0.4in / 1.0cm (RGB)	1.0in / 2.6cm (Multispectral) 0.4in / 1.0cm (RGB) 6.9in / 17.5cm (Thermal)	1.0in / 2.6cm (Multispectral) 0.4in / 1.0cm (RGB) 3.4in / 8.75cm (Thermal)
<b>Field of View (HFOV)</b>	47° (Multispectral & RGB)	47° (Multispectral & RGB) 50° (Thermal)	47° (Multispectral & RGB) 50° (Thermal)
<b>Storage</b>	512 GB Internal SSD	512 GB Internal SSD	512 GB Internal SSD
<b>Weight (Sensor only)</b>	280g	280g	290g
<b>Weight (With Gimbal)</b>	Skyport: 495g Smart Dovetail: 515g	Skyport: 495g Smart Dovetail: 515g	Skyport: 505g Smart Dovetail: 525g
<b>Thermal Range</b>	N/A	8µm - 14µm (Thermal Infrared)	8µm - 14µm (Thermal Infrared)
<b>Power Consumption</b>	15W Typical, 18W Max	15W Typical, 18W Max	15W Typical, 18W Max
<b>Compatible Platforms</b>	DJI M350, M300, M210, & M200 Inspired Flight IF800 & IF1200 Freefly Astro	Same as 6X Multispectral	Same as 6X Multispectral

## Key Features

- **6X Multispectral:** Offers high-resolution multispectral and RGB imagery with advanced radiometric accuracy, ideal for vegetation analysis and RGB mapping applications.
- **6X Thermal:** Combines high-resolution multispectral, RGB, and FLIR Radiometric Boson 320 thermal imaging for more comprehensive data collection, ideal for thermal mapping and water stress detection.
- **6X Thermal Pro:** Features the FLIR Radiometric Boson 640 thermal imager (delivering 4x the thermal resolution of the standard 6X Thermal) combined with high-resolution multispectral and RGB imagery, providing higher precision for advanced thermal analytics and environmental monitoring.

Suggested Use Cases	6X Multispectral	6X Thermal	6X Thermal Pro
Vegetation Health Monitoring	√	√	√
Water Stress Prediction		√	√
Thermal Mapping & Soil Moisture Analysis		√	√
Forest Fire and Active Flame Detection		√	√
Evaporation Analysis			√
Forest Health & Vegetation Moisture Levels		√	√
Crop Growth Stages & Yield Estimation	√		
Stand Count & Plant Vigor Monitoring	√	√	√
Infrastructure Thermal Inspections (e.g., Solar Panels, Roofs)		√	√

\*\*Specifications are subject to change without notice

\*\*With appropriate post-processing

