

## LaQuinta

Professional Crop Sensor for Everyone

LaQuinta is the first of its kind: a single sensor, single optical path, high resolution 4 narrow-band multispectral UAV and ground vehicle camera for Precision Agriculture, packed with functionality like no other device in the global market; all without the multiple-camera-in-a-box misalignment issues or timeshift sensitive filter-wheel drawbacks.

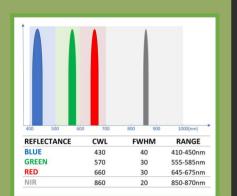
LaQuinta is designed to feature all popular requirements, nice-to-haves and more into one user-friendly device at an unprecedented price tag.

Supported through value-added partnerships, DB2 Vision is able to deliver the full value chain by offering a complete solution to the enduser.

LaQuinta aids in solving a worldwide growing problem:

- By monitoring plant health
- Determining exactly where fertilizer is needed (and where not)
- Determining if and where pesticides are needed and..
- Control water usage by pinpointing exact areas of interest

Less use = Less cost + Less waste + Less pollution



1 Optical Path / 4 Narrow Bands in RGB-NIR / 4.1 Megapixel

RAW multispectral image acquisition @1.5 FPS (max.)

IMU, GPS + Geotagging + Compass + Altimeter for exact GPS location of the target, rather than the UAV

Full image calibration through the DB2 Adapt-2-Light® R-G-B-NIR irradiance sensor

Android, iOS App and touchscreen controlled

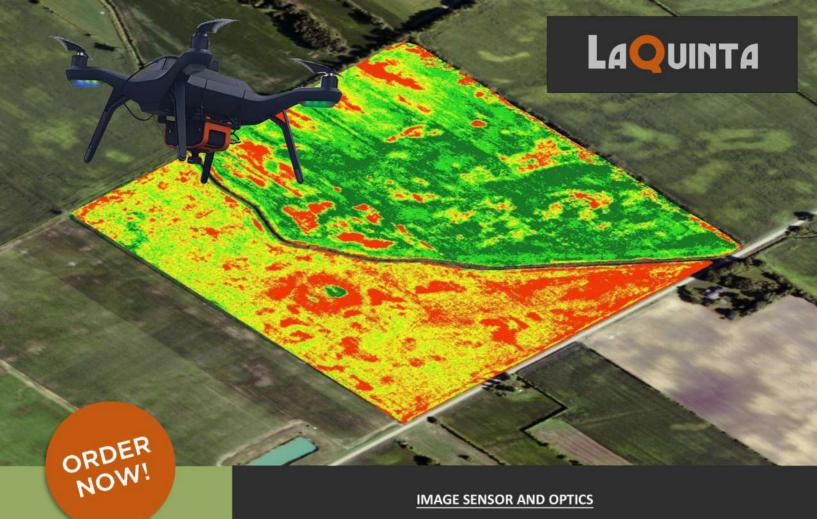












- 1 single revolutionary 4.1 Megapixel combined RGB + NEAR-INFRARED sensor
- 1 OPTICAL PATH WITH 4 NARROW BANDS! (as opposed to the "multiple cameras in a box" method causing mechanical misalignent due to different FOVs)
- Multispectral AG Bands CWL/FWHM: Blue 430/40 Green 570/30 Red 660/30 NIR 860/20 for crop-health analysis through multiple indices such as NDVI, EVI, OSAVI and more
- No damaging rolling shutter effects
- Up to 1.5 FPS in Full Resolution RAW Auto or User selectable (frequency or x% of image overlap)
- Exchangeable lenses ( Achromatic M12 mount; Standard 8mm, other focal lenghths optional )

## IMAGE CAPTURE AND POST-PROCESSING

- Fully Compatible with 3rd party Image Stitching & AG Analysis Software (AgiSoft Metashape/Pix4D)
- RAW Multispectral image acquisition with all hybrid sensor information included in Metadata
- User selectable Image capture in 2 formats (Stacked Multilayer TIF and Single-Layer R-G-B-NIR TIF)

M12 Version

(with UAV mount)

All sensors inside, so operates fully system/ UAV independent

Fully Compatible with all common **Analysis Software packages** 

Camera mounts to most commonly used UAVs available + custom design possible on demand!



## HYBRID SENSOR FEATURES AND FUNCTIONALITY

- Setup and Configuration over Android, iOS & Windows (Bluetooth) and/or camera touchscreen
- IMU/ GPS/ Geo-tagging/ Compass/ Altimeter for exact GPS location of the target, rather than UAV
- 64GB uSD card
- Internal Rechargeable Battery for 1hr + µUSB connector to charger/ external battery
- PAL video-out for realtime downlink
- Trigger in- and output
- Multiple unit connectivity for simultaneous capture (f.i. tractor boom usage)
- Dual Full Image Calibration through the DB2 Adapt-2-Light® / RGB + NIR and Pixel-level irradiance sensor
- Custom UAV mount for easy attachment to your specific aircraft!
- Size & Weight: 78 x 58 x 56mm/ 146g 3.07 x 2.28 x 2.20" / 5.15oz (incl 8mm M12 lens)

