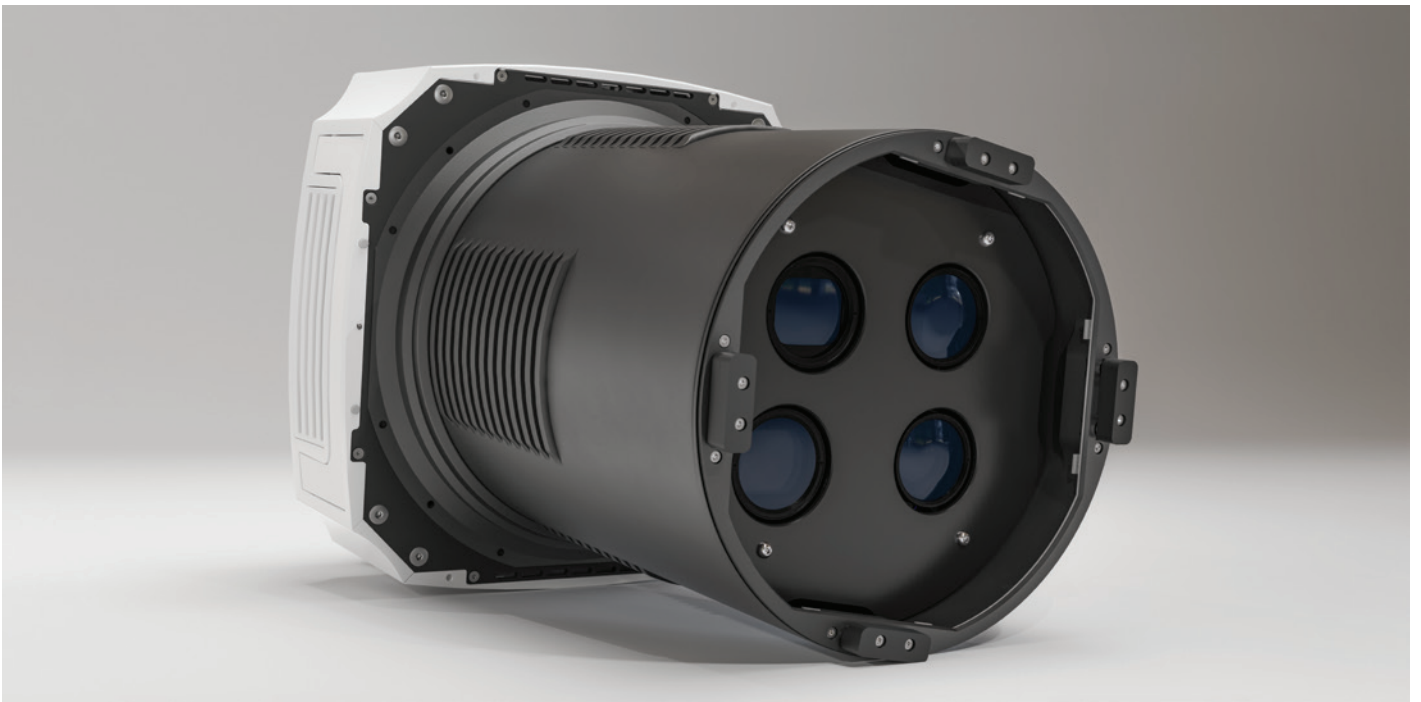


VEXCEL
IMAGING

ULTRACAM MERLIN 4.1 **3020**

수익성과 사업 성장을 위한 솔루션



The UltraCam Merlin 4.1 3020 은 대규모 프로젝트를 최소한의 비용으로 효율적으로 수행하도록 설계되었습니다. 높은 다이내믹 레인지, 빠른 촬영 속도(0.7초당 1 프레임)와 비행중 영상 품질관리를 통하여 동급 최고 품질의 영상을 얻어내며, 최고의

기하정확도를 자랑합니다. Merlin 3020 은 동급의 카메라의 기대치를 뛰어 넘었고, 투자 대비 수익성이 매우 높고, 향후 프리미엄 카메라로 업그레이드 옵션을 제공합니다.



SPECIFICATIONS & DETAILS

ULTRACAM MERLIN 4.1

3020

True nadir RGB sensor, portrait oriented
3 x 150 megapixels

True nadir NIR sensor, landscape oriented
2 x 150 megapixels

SENSOR SYSTEM

Imaging sensor physical pixel size	CMOS 3.76 µm
Shutter (longlife central leaf)	Prontor magnetic-0 HS2; field exchangeable
Color capability (multi-spectral)	4 channels – RGB Bayer pattern & NIR
Color (RGB Bayer pattern) image size	31,300 x 14,016 pixels
Color (NIR) image size	20,867 x 9,344 pixels
Ratio RGB to NIR	1 : 1.5
Spectral bands (FWHM ¹)	R (580–690 nm) G (480–600 nm) B (420–510 nm) NIR (690–880 nm)

1 frame per 0.7 seconds

Adaptive Motion Compensation

>83 dB at base ISO

14 bits at 4 bands

True Pixel Processing

CAMERA SPECIFICATIONS

Height: 76 cm

Cylinder diameter: 32.5 cm

Power consumption: 230 W (average), 250 W (peak)

Width: 42 cm

Weight: 46 kg

Operator display: Vexcel IPT – Interface Panel Touch (2 kg)

LENS SYSTEM

Color (RGB Bayer pattern) lens system focal length	120 mm
Color (RGB Bayer pattern) lens aperture	f=1/5.6
Color (NIR) lens system focal length	80 mm
Color (NIR) lens aperture	f=1/4.3
Total field of view, across track along track	52.2° 24.8°
Footprint for lean restriction of 1 m lean @ 5 m height (across x along)	12,765 x 12,765 pixels

Sample flying heights:
3,192 m @ 10 cm GSD
1,596 m @ 5 cm GSD

DATA STORAGE

Type	NVMe solid state disk pack (SSD)	Features	In-flight exchangeable Optional redundancy
Storage capacity	16 TB (4x 4 TB) 32 TB (4x 8 TB)	Number of raw images ² (without optional redundancy)	16 TB: up to 8,130 (11,380) 32 TB: up to 16,960 (23,730)
Size of one raw image (without optional redundancy)	1,798 MB (1,284 MB)	Weight of data unit	1 kg

OPERATIONAL SPECIFICATIONS

FLIGHT ALTITUDE
≤7,000 m
above sea level

HUMIDITY
5% to 95%
non-condensing

TEMPERATURE
0 °C to 45 °C
-20 °C to +45 °C³ (operation)
-20 °C to +65 °C (storage)

MOUNTING
UltraMount and most current third party mounts⁴

GNSS/INS/FMS
UltraNav and most current third party systems⁴

INSTALLATION
(Camera, UltraNav & UltraMount)
<89 kg
480 W (average)
560 W (peak)

DATA PROCESSING
UltraMap processing suite including data export in standard formats



¹ Full Width at Half Maximum.

² Due to configuration and change in SSD technology, usable storage size may vary and can not be guaranteed.

³ Camera cylinder exposed to outside airflow only.

⁴ Please contact our sales team for detailed information.

Technical changes, printing errors and amendments reserved.