Data Sheet

SkyNode

The compact system that gives you the ability to directly task and downlink imagery and video from the Skybox Imaging constellation.

Overview

A SkyNode is a compact system comprised of a 2.4 meter communications antenna and two racks of supporting equipment that gives you direct access to the Skybox Imaging constellation for your mission-critical needs.

From scheduling, tasking, imaging, and downlink, to imagery and video processing, a SkyNode includes a complete suite of easy-to-use applications that help you and your organization capture the right image at the right time.

Features and Benefits

Fastest Access to the Skybox Constellation
A SkyNode is your fastest point of access to the Skybox constellation. Our premier suite of platform applications allows you to create orders, schedule collects, monitor the satellites, and produce and archive imagery.

Quick Delivery When You Need It
You can depend on the SkyNode to rapidly deliver imagery for time-critical situations. Plan your access up to 10 minutes before the satellite flies over, and download imagery on demand in as little as 20 minutes of collection.

Flexible Access Plans
Whether you need minutes per month or complete satellite capacity, we will work with you to find the Access Plan that meets your mission needs.

Built to Scale
You'll appreciate seeing the capabilities of your SkyNode increase over time - including gaining access to the complete Skybox constellation as it is launched and enjoying the unprecedented timeliness it will bring.

Uninterrupted Access
We think it is important you have reliable, dependable access when you need it. With the SkyNode, you reserve the passes on a first-come, first-served basis. Even better, once you reserve a pass, it is yours. No exceptions.

Figure 1: SkyNode antenna and two equipment racks

![Skybox Imaging logo]

SkyNode Equipment

The SkyNode ships with a standard antenna, two equipment racks, and two operator workstations.

Antenna

The specifications below describe the standard 2.4 m antenna. An optional radome is available.

Figure 2: SkyNode antenna

Weight	595 kg
Height	3.2 m
Wind Resistance	Up to 88 km/hour, operational (without a radome)
Operational Temperature	-40C to +55C
Power	5A typical at 240 Volts
Downlink Feed	X-band, 8025-8400 MHz
Uplink Feed	S-band, 2025-2110 MHz

Equipment Racks

The SkyNode includes two equipment racks: one rack manages radio communication with the satellite and the second rack manages the order entry, planning, processing, and delivery of images. Additional production racks may be added as needed.

Dimensions of each rack	Height: 1.47 m Weight: 0.66 m Depth: 1.14 m Weight: ~500 kg
Data Storage	25 TB
Total Power	12,350 W
Voltage	200-240 Volt AC
Heat Generation	31,920 BTU/HR
UPS	Included in each rack

Operator Workstations

Figure 3: Two iMac workstations with complete suite of software applications

Two dedicated iMac desktop computers enable you to interact with SkyNode to schedule satellite tasking, monitor the transmission of data, and produce imagery.

SkyNode Software

All SkyNode software operates locally on the SkyNode hardware and may be accessed by the browser-based interface.

SkyNode Products

The SkyNode system captures and produces imagery and videos of any location accessible to an orbiting SkySat satellite.

Imagery

The SkyNode can collect and deliver better than one meter resolution imagery.

Panchromatic GSD	90 cm at nadir
Multispectral GSD	2 m at nadir
Swath Width	8 km at nadir
File Format	16-bit GeoTIFF

Video

The SkyNode also has the capability to collect up to 90 seconds of full motion high-definition video enabling you to enhance change detection capabilities and situational awareness.

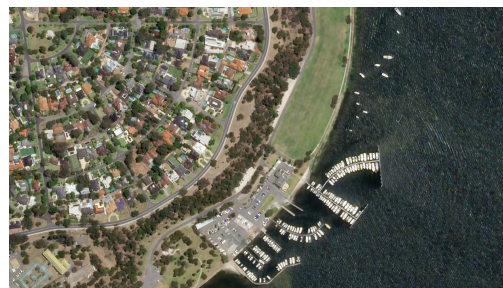|	
Color	Panchromatic
Duration	Up to 90 seconds
Frame Rate	30 frames per second
GSD	1.1 m at nadir
FOV	2 km by 1.1 km
File Format	MPEG-4 (H.264 encoding)

Figure 4: SkySat-1 Imagery collected over Perth, Australia