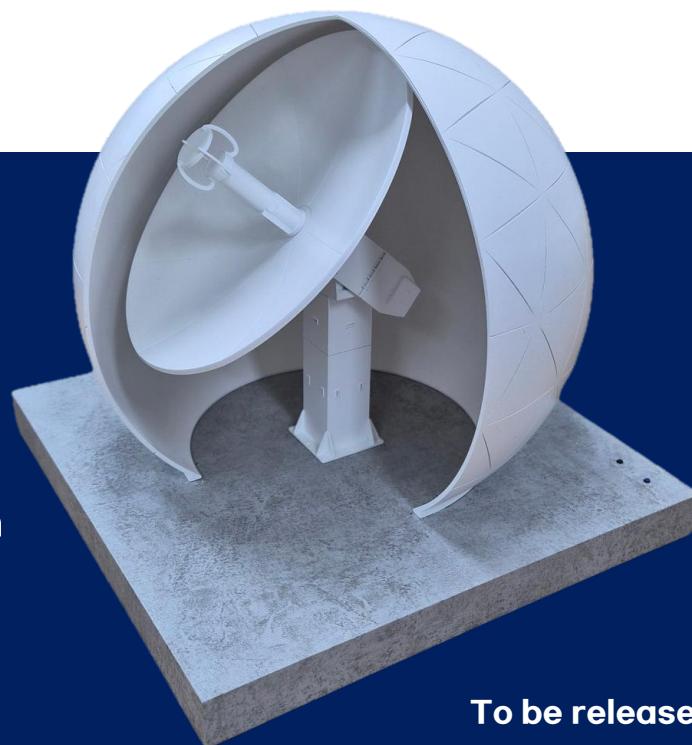


R-CUBE-400

**Radome-protected
4m Gateway and TT&C Antenna System
(S/X dual-band)**



To be released in Nov. 2025

R-CUBE-400 is a robust 4-meter antenna system designed to support multi-orbit satellite missions, including LEO, MEO, and GEO satellites. It features a protective radome enclosure that shields the system from harsh environmental conditions and external factors such as rain, hail, snow, debris, and bird impact.

The system's lightweight pedestal makes it ideal for deployment in antenna farms, where space efficiency and ease of installation are critical. Equipped with a TLE-based auto-tracking system and advanced satellite tracking algorithms, the R-CUBE excels at following LEO satellites travelling at speeds up to 7.5km/s. It is engineered to withstand survival winds of up to 67m/s, equivalent to a Category-4 hurricane, providing exceptional durability in extreme weather.

Our pedestal's Az, El, and tilt axes are constructed as detachable modular structures, facilitating easy maintenance, upgrades, and repairs. A single RF feed supports both S- and X-band frequencies, enabling versatile operation across multiple spectrum ranges without the need for additional hardware.

Operators benefit from a user-friendly web-based GUI, which allows remote control and monitoring of the antenna system from the ground station. As an optional feature, our patented AI-based anomaly detection system provides real-time monitoring of the antenna system.

**Shields the system
from harsh environmental
conditions**

**Lightweight pedestal
reduces CAPEX and OPEX**

**Custom
structure and function**

**3-axis pedestal
with modular design
(No key hole)**

**100% in-house technology
and 4-month lead time**

**Connecting
Ground
And
Space**

Specification

Item	Description
Frequency(GHz)	S-band Rx : 2.2 ~ 2.3, Tx : 2.025 ~ 2.120 X-band Rx : 7.9 ~ 8.5
G/T @ 10° EL	S-band : 14dB/K X-band : 27dB/K
RX Polarization	LHCP and RHCP (Simultaneous)
TX Polarization	LHCP and RHCP (Selectable)
Axial Ratio	≤ 2dB
Reflector diameter	4.3m
Antenna Type	Cassegrain
Travel Range	Azimuth ±270°
	Tilt ±270°
	Elevation 0~180°
Velocity	Azimuth 15°/s
	Tilt 5°/s
	Elevation 10°/s
Acceleration	Azimuth 5°/s ²
	Tilt 5°/s ²
	Elevation 5°/s ²
Pointing Accuracy	0.06° rms
Operating	25m/s
Survival Wind	67m/s(With radome)

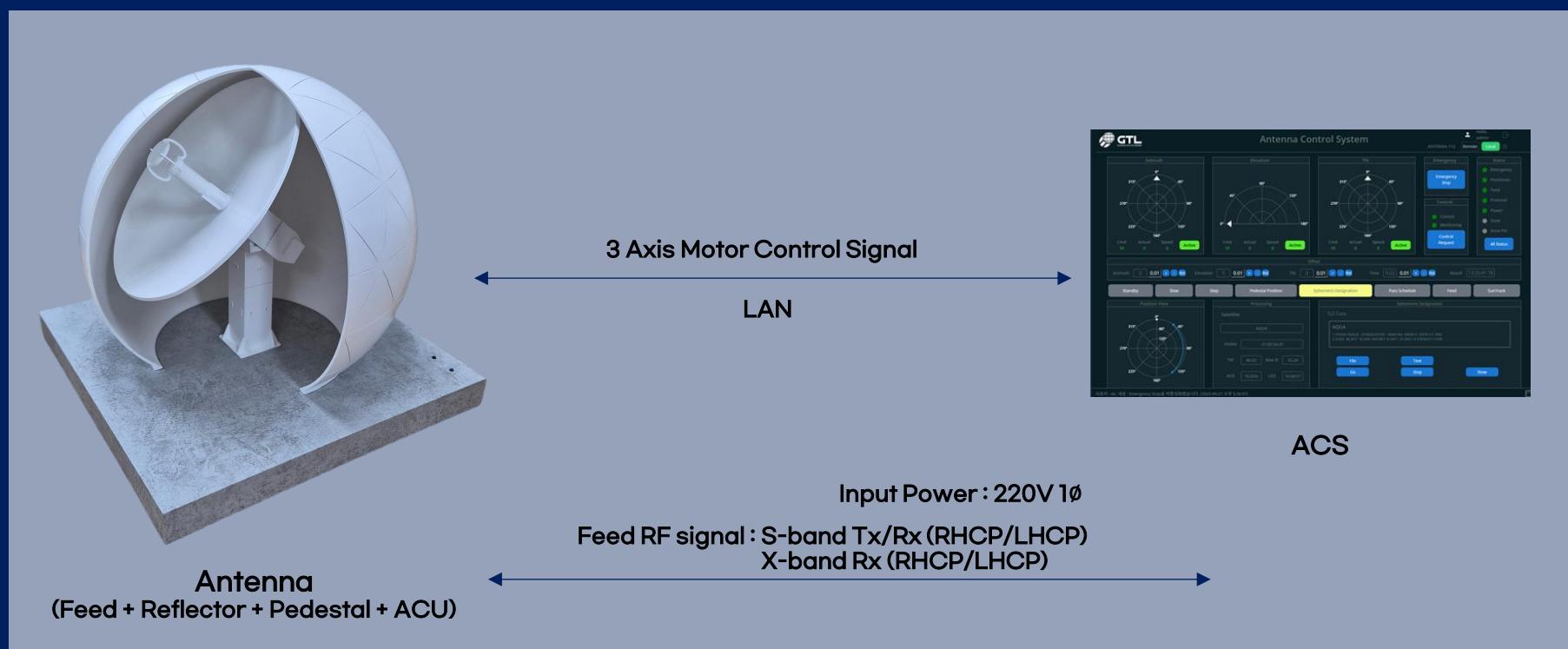
3-Axis Precision Pedestal

- 3 Axis Az/EI + Tilt
- ≤0.060° rms pointing accuracy
- **No keyhole**

Available Options

- AI-based anomaly detection
- Real-time antenna components monitoring and failure
- Loop-Back Tests
- SSPA
- Up/Down Converter

Product Package



Global sales

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