

AXI-R100 IMU

Designed for what's next,
ready for now.

HRL's AXI-R100 inertial measurement unit (IMU) provides **class-leading capabilities** for the most demanding navigation missions.

AXI-R100 delivers **near navigation-grade results** in the palm of your hand.

- Exceeds state-of-the-art tactical-grade performance
- Silicon MEMS DRaGon™ gyro
- AutoCal™ for bias correction
- Robust to challenging vibration, shock and thermal conditions
- Pre-production units in 2026
- Production expected in 2027

Contact us

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Gyroscopes

Turn-On Bias Repeatability	0.1 deg / hr
Bias Instability	<0.05 deg / hr
Scale Factor	500 ppm
Angle Random Walk	0.01 deg / $\sqrt{\text{hr}}$
Vibe Rectification	0.06 deg / hr / G ²
Operating Range	400 deg / sec

Accelerometers

Grade	Low	High
Scale Factor	400 ppm	400 ppm
Bias Repeatability	0.24 mg	4 mg
Velocity Random Walk	7 $\mu\text{G}/\sqrt{\text{Hz}}$	100 $\mu\text{G}/\sqrt{\text{Hz}}$
Operating Range	2 G	30 G

Mechanical

Size	3" Wide x 3.5" Tall
Volume	25 in ³
Weight	900 g
Power	<8 W

**Pre-production specifications*