

K-PUS

Digital Magnetic Compass



K-PUS DMC Sensor

High performance Heading, Bank and Elevation

K-PUS is high accuracy and high performance Digital Magnetic Compass (DMC) sensor family. It measures Bank (Roll) angle, Elevation (Pitch) angle and Heading (Yaw) angle. Results are provided via a bi-directional electrical interface. It includes a 3D accelerometer, a 3D gyroscope and a 3D magnetometer as its primary sensors.

- Advanced sensor fusion algorithms for accurate calculation of the roll, pitch and yaw angles.
- State-of-the-art hard and soft iron calibration algorithms for maximum heading accuracy.
- Lightweight and reliable design, ready for use in civilian and military applications.
- Numerous modes, settings and options for utilization with great flexibility.
- Direct replacement for existing DMC products. (With same mechanical, electronic and software interface, same standard 12-point calibration and easy calibration modes)

MIL STD-810G
tested

No Export License

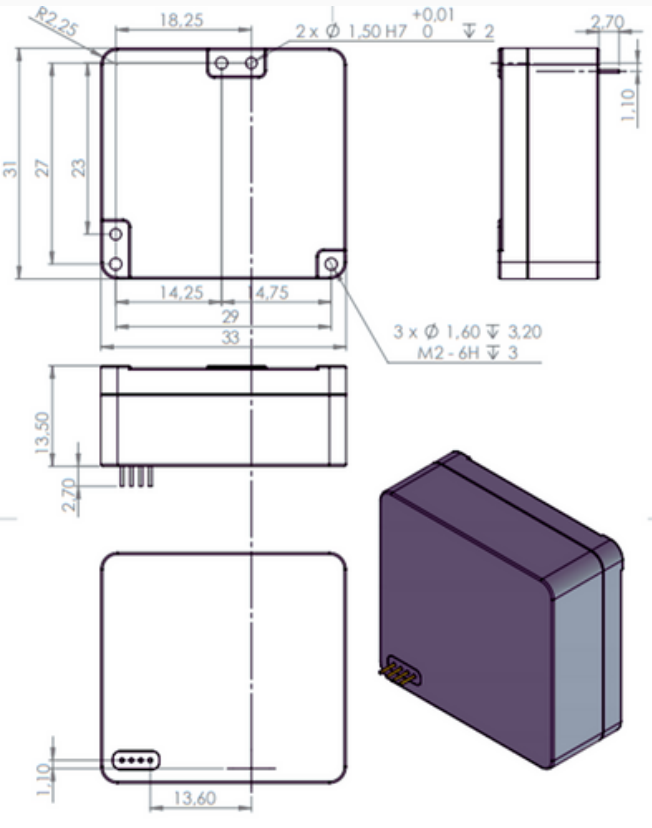
Roll/Pitch Accuracy	Heading Accuracy
0.1° RMS	0.25° RMS

K-PUS SPECIFICATONS

SYSTEM PERFORMANCE PARAMETERS		
	K-PUS-GY2	K-PUS-GY5
Roll/Pitch Accuracy	0.1° RMS	0.1° RMS
Heading Accuracy*	0.25° RMS	0.5° RMS
Pitch/Roll Operational Range	- 80° / + 80°	- 80° / + 80°
Sampling Rate	Up to 50 Hz	Up to 50 Hz

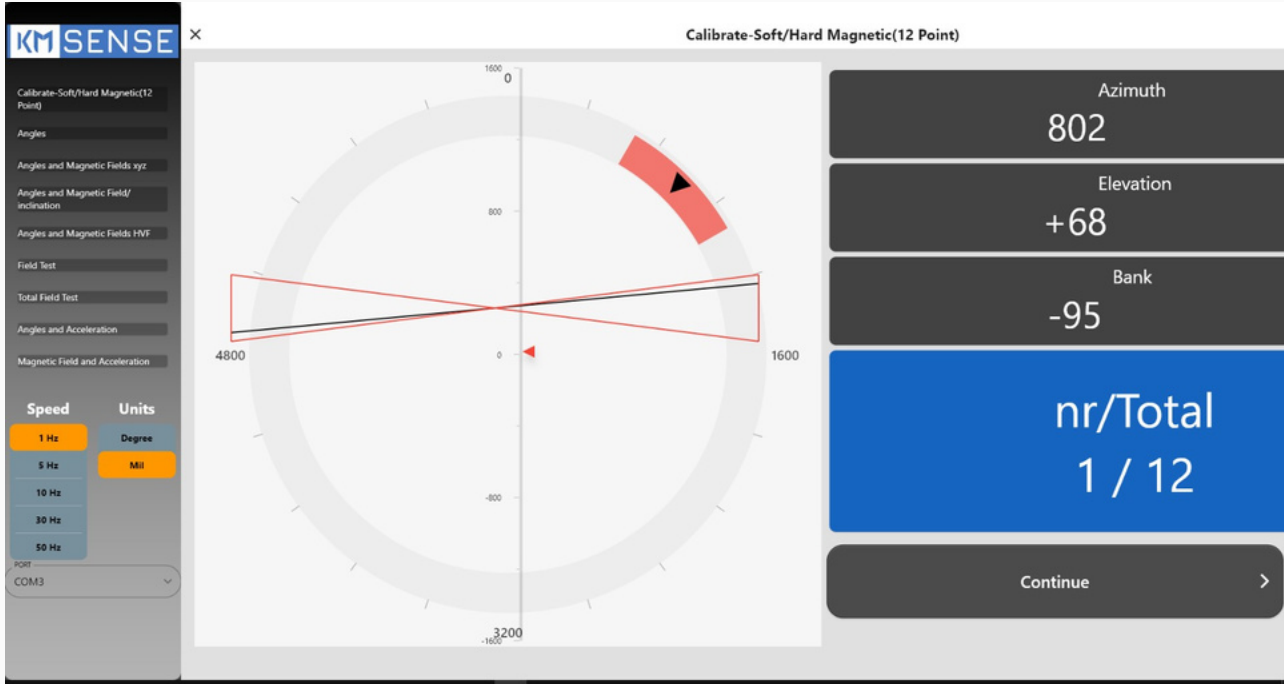
*Values may change due to magnetic distortion and metal objects around the system. Typical heading accuracy is 0.1° for K-PUS-GY2 series

PHYSICAL AND ELECTRICAL PROPERTIES	
Communications Interface	UART (TTL)
Power Supply	5 V (± %5)
Dimensions	33x31x13.5 mm
Sampling Rate	1 to 50 Hz
Dimensions	33x31x13.5 mm
Weight	< 26 gr
Power Consumption	300mW
Operating Temperature	-32°C to 65°C



K-PUS series mechanical drawing, dimensions are in mm

K-PUS series sensors User Interface



Sensor systems can be connected to a windows based computer via USB interface, so that users perform easy calibration, easy configuration and real time visualization of the sensor.

KMSense is a brand of KARAKAMLAR AEROSPACE

Karakamlar Aerospace and Defense Industry Inc. Ivedik O.S.B. 2224. Cad. No:1 E-Blok 108
Teknopark Ankara, 06378 Yenimahalle/ANKARA

Phone: +90 312 385 88 20
Email: info@kmsense.com
Website: www.kmsense.com