

# K-PUS Micro

Digital Magnetic Compass



## K-PUS Micro DMC Sensor

### High performance Heading, Bank and Elevation

K-PUS Micro 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)

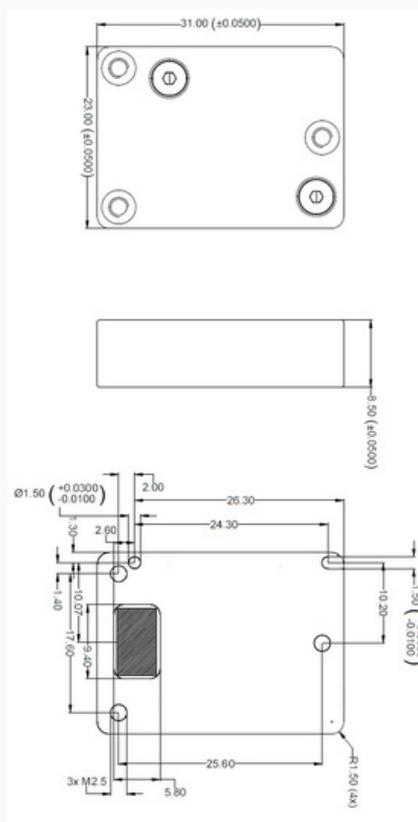
Roll/Pitch Accuracy	Heading Accuracy
0.1° RMS	0.25° RMS

## K-PUS Micro SPECIFICATONS

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

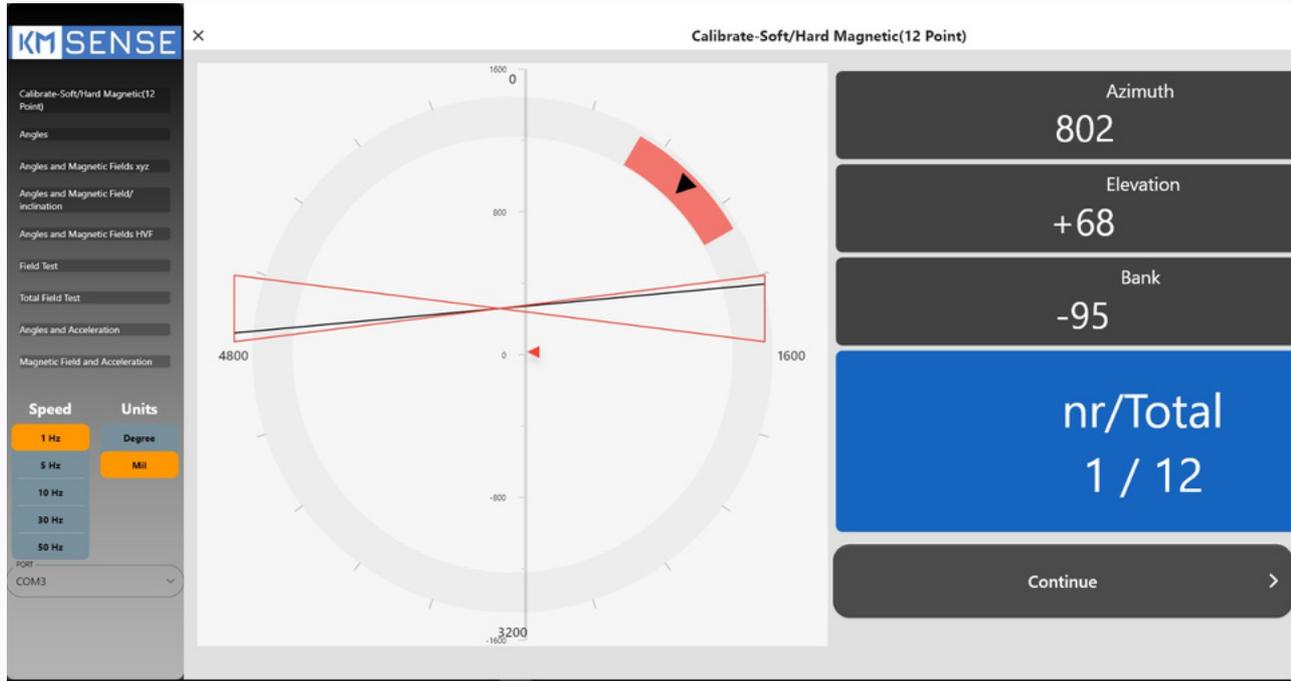
\*Values may change due to magnetic distortion and metal objects around the system. Typical heading accuracy is 0.1°

PHYSICAL AND ELECTRICAL PROPERTIES	
Communications Interface	UART (TTL)
Power Supply	3.3 V (± %5)
Dimensions	31x23x8.5 mm
Sampling Rate	1 to 50 Hz
Weight	< 11 gr
Power Consumption	160 mW
Operating Temperature	-32°C to 65°C



K-PUS Mikro 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**

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