

Teledyne CDL

# MINISENSE2

## MEMS SENSOR

The Teledyne CDL MiniSense2 is a second generation MEMS (Micro-Electro-Mechanical System) based motion sensor. Building on the success of the original MiniSense product, the MiniSense2 uses the latest high accuracy 6DoF (Degrees of Freedom) MEMS technology to deliver high accuracy pitch & roll measurements in the smallest of devices. In addition, the MiniSense2 is capable of full INS (Inertial Navigation System) performance with aiding accepted from a variety of inputs such as USBL, LBL, DVL, GPS and depth .

Within MiniSense2 is a built in magnetic heading sensor that provides 2 degrees (1 sigma) heading accuracy while the 6DoF sensor automatically aids the heading output in the presence of ferrous metals to provide good heading performance and maintain accuracy in areas where many fluxgate compasses struggle.

MiniSense2 is available in various formats: OEM (puck or standard) as well as in a subsea housing (3000m or 6000m).



### PRODUCT FEATURES

- Low Cost Motion Reference Unit
- Inertially Aided Heading
- Light Weight
- Small Footprint
- OEM Form Factor Available
- Low Power



**TELEDYNE CDL**  
Everywhere you look™

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## TECHNICAL SPECIFICATIONS

### Performance:

Heading accuracy	2 (deg)*
Static Pitch and Roll accuracy	0.1 deg*
Dynamic Pitch and Roll accuracy	0.2 deg*

### Operating Range/Environment:

Heading	+/- 360 deg
Pitch/Roll	+/- 90 deg or +/- 180 deg
Operating temperature	-5 to +55°C
Depth Rating	3000m (standard), 4000m – 6000m (options)

### Interface:

RS-232/RS-422	2 inputs/2 outputs
Baud rates	Up to 115.2 kbaud
Data output	Up to 50Hz
Power supply	10 – 36 VDC
Power consumption	<2W

### Physical Characteristics:

Dimensions	45mm (square base) x 191mm high
Weight in air/water	0.4kg / 0.1kg
Connectors	1 x 8 pin Seacon