

# IXSEA ROVINS GYRO TO INS



## GENERAL DESCRIPTION

ROVINS is a survey grade gyrocompass and full featured Inertial Navigation System (INS) for depths to 3,000m. Designed specifically for offshore survey and construction works, ROVINS improves the efficiency of all operations where accurate position, heading and attitude are key benefits.

### FEATURES

- Web based software
- Upgradeable
- Interface to standard surface and subsea positioning systems (GPS, USBL, DVL, depth sensor)
- Identical OCTANS housing and footprint
- Fibre Optic Gyroscope (FOG), unique strap-down technology

### BENEFITS

- Instant interface via web browser
- 'ROVINS gyro only mode' to 'ROVINS full INS'
- Based on proven OCTANS gyrocompass & PHINS INS architecture
- Interchangeability
- Acoustically quiet and maintenance free



**Making  
technology  
work for you!**

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**Accredited to BS EN ISO 9001:2000**

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## TECHNICAL SPECIFICATIONS

### PERFORMANCE

With acoustic positioning system	Three times better than aiding system
With Doppler Velocity Log	0.2% of traveled distance (6 m/h at 2 knots)
Without aiding sensor (1min/2min)	1.5m/6m
Heading	
Accuracy	0.05 deg secant latitude <sup>(1)</sup> <sup>(2)</sup>
Resolution	0.01 deg
Heave	
Accuracy	5 cm or 5% (whichever is highest)
	Set-up free (SAFE-HEAVE <sup>TM</sup> )
Roll / Pitch	
Dynamic accuracy	0.01 deg
Range	No limitation
Resolution	0.001 deg
Settling time (static conditions)	5 min

### OPERATING RANGE / ENVIRONMENT

Vibrations	1 g sine (5 to 50 Hz)
Follow-up speed	Up to 750 deg/s
Shocks Operating / Survival	30 g 6 ms / 50 g 11 ms
MTBF	30,000 hours
Operating / Storage Temperature	-40 °C / -40 °C to +55 °C / +80 °C
No warm-up effects, insensitive to thermal shocks	
Up to 85° latitude (NS)	

### PHYSICAL CHARACTERISTICS

Depth rating (m)	Material	Weight in air/water (kg)	Total dimensions (Ø x H mm)	Base plate dimensions (Ø x H mm)	Mounting	Connector	Inputs	Outputs	Power supply consumption
3000	Titanium	15 / 6.6	213 x 374	213 x 36	6 off M6 Holes	26-Pin Seacon 16-Pin Seacon 12-Pin Seacon	5 serials Ethernet	3 serials Ethernet	24 VDC / 15 W

### INTERFACES

Output protocols	Industry standards: NMEA 0183, binary
Serial I/O	RS232 or RS422 (user configurable)
Baud rates	600 bauds to 115 kbauds
Output frequency	0.1 Hz to 200 Hz
Ethernet	TCP client / server or UDP

(1) Secant latitude = 1 / cosine latitude - (2) RMS value



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