AXYS Technologies Inc.

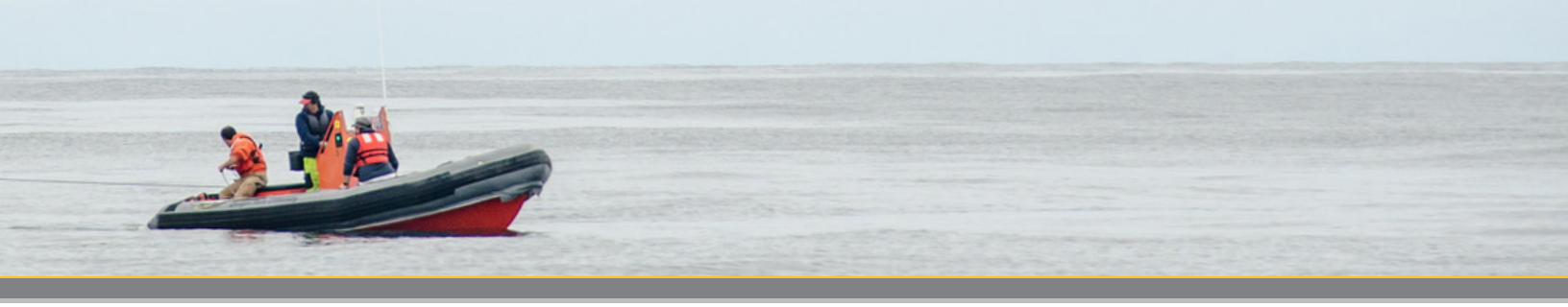
TRIAXYS™
Directional Wave Buoy

TRIAXYS™

The TRIAXYS™ Directional Wave Buoy is a precision instrument incorporating advanced technologies that make it an easy to use, reliable and rugged buoy for accurate measurement of directional waves.

FEATURES & BENEFITS

- Reliable operation in extreme weather or geographical locations
- Solar powered
- 5 year rechargeable battery life
- Supports AIS Aid to Navigation
- Supports any telemetry
- >2 years of data storage capacity
- Continuous wave sampling
- Spin and impact resistant



TRIAXYS™

Directional Wave Buoy

Economical and rugged, the TRIAXYS™ Directional Wave Buoy can withstand the rigours associated with deployment and recovery operations, specifically: impact shock, spinning, and temporary submergence.

The buoy's modular components are easily accessed and the clear dome allows sunlight to reach the solar panels, while maintaining a low profile and impact resistance. The buoy is solar powered with rechargeable batteries to reduce annual operating costs. The buoy can operate for years before the batteries need replacement.

The heart of the TRIAXYS™ Directional Wave Buoy is developed from the AXYS WatchMan500™ controller, which integrates sensor systems and provides onboard data processing, data logging, telemetry, and diagnostic/set-up routines. The software performs a zero-crossing analysis to compute various time-domain wave parameters. The buoy is capable of accurate motion data for roll and pitch angles up to 60 degrees. Surge and sway velocities measure wave kinematics that define directional wave properties.

The data transmitted from the buoy can include wave statistics, HNE (Heave, North and East Displacements), MeanDir (Wave Direction and energy as a function of frequency), directional and non-directional wave spectra, buoy configuration, status data, position and WatchCircle™ alarm messages. All data is stored on the internal data logger.

Specifications

- PHYSICAL DESCRIPTION

  Diameter: 1.10m outside bumper

  Weight (including batteries): 230 kg
  Obstruction Light: Amber LED. Programmable IALA ODAS flash sequence with three miles visibility.

- MATERIALS

  Hull: Stainless steel

  Dome: Impact resistant polycarbonate

  Solar Panel Assembly: Fibreglass over foam
  Clamping ring: Stainless steel

- POWER SYSTEM

  Batteries: 4 @ 12 Volt,100 Amp hr/battery

  Solar Panels: 10 @ 6 Watt
  Maximum Power Point Tracking (MPPT) Regulator
  External On/Off Switch: Turns buoy on when Magnetic Key is removed.

- TELEMETRY OPTIONS
  - VHF/UHF
  - IsatData Pro
  - INMARSAT M2M
  - IRIDIUM
  - HSPA Cellular (compatible with GPRS)
  - AIS Aid to Navigation

Resolution/Accuracy

	RANGE	RESOLUTION	ACCURACY
HEAVE	±20 m	0.01 m	Better than 1%
PERIOD	1.5 to 33 sec	0.1 sec	Better than 1%
DIRECTION	0 to 360°	1°	3°
WATER TEMP.	-5 to +50°C	0.1°C	±0.5°C

www.axystechnologies.com | 1.250.655.5850 | info@axys.com

AXYS TECHNOLOGIES INC.