



## OCEANOGRAPHIC DATA BUOY

Evans-Hamilton, Inc. (EHI) can assemble an oceanographic monitoring buoy custom-built to suit your needs. These Oceanographic Data Buoys (ODB) serve a variety of needs, including:

- Oceanographic and meteorological research
- Weather forecasting
- Marine forecasting
- Assistance to fisheries

### SERVING YOU WITH SOLUTIONS

The ODBs are solar powered and can accommodate a variety of instrumentation systems depending on the project requirements. They can be integrated with a radio, cell phone, or satellite telemetry system to allow real-time transmission of data to a shore station. Additionally, acoustic modem telemetry allows direct communication with bottom-mounted instrumentation (wave and current gages).



The buoys have been designed for long-term deployments with minimal servicing requirements. The standardized electronics chassis allows easy access to instrumentation during servicing, when required. In addition, the subsurface instruments on the buoy (water quality sensors, acoustic modem), are installed to allow for easy recovery and servicing from the topside of the buoy.

Satellite tracking of the ODB is available, which continually monitors the buoy's position and notifies the client via email if the buoy drifts outside of a user-defined area.

EHI works closely with various instrument manufacturers to optimize electronics packaging and power consumption requirements, critical components to buoy design.

Data collection parameters available on buoys include the following:

- **Currents**
- **Waves**
- **Water Level**
- **Meteorological Data**
  - Wind speed and direction
  - Air temperature
  - Barometric pressure
- **Water Quality**
  - Salinity
  - Dissolved oxygen
  - Temperature
  - pH

