CB-50 Data Buoy

A data buoy system shall be provided to monitor the water quality in (Specify Location).

The buoy flotation shall be constructed of a closed cell, cross-linked polyethylene foam hull with a polyurea skin and Kevlar reinforced top coat providing 50 lbs of buoyancy. The flotation shall be yellow in color in accordance with international data buoy standards.

The buoy structure shall consist of an internal type 316 stainless steel frame, (3) topside lifting eyes and subsurface mooring eye for single-point mooring. The frame shall support attachment of instrument mounting cages directly below the center of the buoy.

The buoy shall be lightweight, portable and easy to deploy by a single person.

The buoy shall accommodate a battery powered data logger in the center of the buoy hull with radio, cellular and satellite telemetry options and waterproof sensor ports.

The buoy shall support mounting of both topside and subsurface sensors. A top plate shall be pre-drilled for mounting a 1-3 nautical mile range LED beacon, weather station mast and other sensor supports.

The complete data buoy system shall be Series CB-50 as manufactured by NexSens Technology, Inc. or approved equal.