



miniCTD Profiler



The miniCTD has been developed to provide a cost effective tool for the collection of CTD Profiles, without compromising the quality of the data. Ideally suited to ROV, coastal, or small boat applications, the miniCTD will appeal to survey companies, military and academia alike, being both simple to use and easy to handle.

Sensors

The miniCTD is fitted with Valeport's unique digital, high stability conductivity sensor, a PRT temperature sensor, and strain gauge pressure transducer. In addition to the measured parameters listed, Salinity and Density values are also calculated by the software.

Conductivity

Range:	0 - 80 mS/cm
Resolution:	0.001mS/cm
Accuracy:	±0.01mS/cm

Temperature

Range:	-5°C to +35°C
Resolution:	0.001°C
Accuracy:	±0.01°C

Pressure

Range:	5, 10, 30, 50, 100, 300 or 600 Bar
Resolution:	0.001% range
Accuracy:	±0.05% range

Data Acquisition

Features a selection of pre-programmed sampling regimes, covering many standard applications. Data may be sampled from 1 to 8Hz, making it suitable for rapid profiling or for continuous measurement at a fixed point

Sampling Modes

Continuous:	Regular output from all sensors at 1, 2, 4 or 8Hz.
Profile:	Logs data as the device falls (or rises) by a defined amount through the water column.

Communications

operates autonomously, with setup and data extraction performed by direct communications with PC. Also operates in real time, with a choice of communication protocols fitted as standard and selected by pin choice on the output connector:

RS232	Up to 200m cable, direct to serial port
RS485	Up to 1000m cable
Baud Rate:	38400 - 460800
Protocol:	8 data bits, 1 stop bit, No parity, No flow control
Bluetooth:	Bluetooth logger and communication set are available for cable free data recovery (500m rated)

Memory

Fitted with a solid-state, non-volatile Flash memory, storing over 10 million lines of data (equivalent to 10,000 profiles to 500m at 1m profile resolution).

Electrical

Internal:	1x C cell, 1.5V alkaline or 3.6V lithium
External:	9 - 28V DC
Power:	<250mW
Battery Life:	~30 hrs (alkaline) ~90 hrs (lithium)
Connector:	SubConn MCBH10F



miniCTD with Titanium Housing



Optional Bluetooth Module

Physical

Materials:	Acetal or Titanium housing (as ordered), Polyurethane and ceramic sensor components Stainless steel (316) deployment cage
Depth Rating:	500m (Acetal) and 6000m (Titanium) Note: Maximum deployment depth may be limited by transducer range
Instrument Size:	Main Housing 48mmØ Sensor Body 54mmØ Length 370mm (including connector)
Deployment Cage:	110mmØ x 450mm long
Weight:	1kg (Acetal) 1.8kg (Titanium)
Shipping:	51 x 42 x 27cm, 10kg

Software

Supplied with DataLog x2 PC software, for instrument setup, data extraction and display. DataLog Express is license free.

Ordering

0660003-XX	miniCTD Profiler in Acetal Supplied with: <ul style="list-style-type: none"> • Deployment frame • Switch plug • 3m comms lead • DataLog x2 software, • Manual and transit case
0660003BT-XX	miniCTD Profiler in Acetal Supplied with: <ul style="list-style-type: none"> • Bluetooth logger/communication set • Deployment frame • Switch plug • DataLog x2 software • Manual and transit case
Note:	XX denotes pressure transducer range Select from 5,10, 30 or 50bar
0660004-XX	miniCTD Profiler in Titanium Supplied with: <ul style="list-style-type: none"> • Deployment frame • Switch plug • 3m comms lead • DataLog x2 software • Manual and transit case
Note:	XX denotes pressure transducer range Select from 100, 300 or 600bar