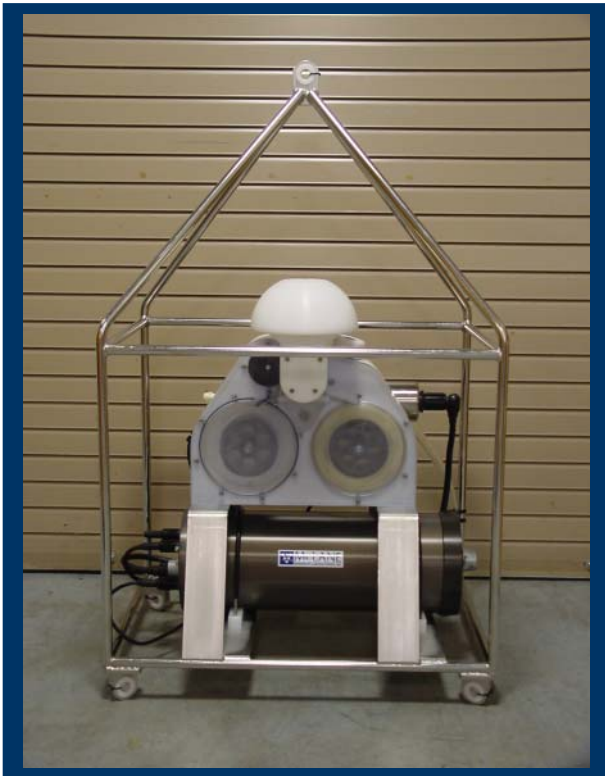


Zooplankton Sampler (ZPS)

Application: Collects and preserves up to 50 *in situ* zooplankton samples without damage to the organisms. Specimens are rolled onto a Nitex mesh collection belt and preserved in fixative solution. After recovery, the zooplankton can be examined on the collection mesh or transferred.

Zooplankton Sampler Features and Benefits



- ❖ Filter water at **20 liters per minute** for each sample.
- ❖ Each sample belt collects up to **50 samples**.
- ❖ User-programmable **back flush** cleans the intake path between samples and further reduces biofouling.
- ❖ **Adjustable** fluid volume and flow rate for diverse scientific needs.
- ❖ Hemispherical dome creates a **uniform** flow path around the intake.
- ❖ A new 3.5 x 6cm Nitex mesh frame is **automatically** positioned for each **sampling cycle**.
- ❖ **Precise** sample belt positioning.

Sample schedule options: Define a time-series sampling schedule by specifying the date and time of each sample, or a start date and fixed time intervals, or equally space samples between start and end dates.

Customized hardware and software: Use optional sensors to trigger sampling events based on external independent environmental changes.

Deployment: Electropolished stainless steel frame attaches to a stand-alone mooring. If other deployment platforms are preferred, the collector and the controller housing can be removed from the frame and installed onto the platform.

ZPS Specifications

Dimensions	Length	73 cm (29 in)
	Width	53 cm (21 in)
	Height	120 cm (47 in)
Weight	In air	102 kg (225 lbs)
	In water	68 kg (150 lbs)
Collector	Number of samples	50
	Sample window	4.8 x 9.5 cm
	Sample window mesh	Pecap (polyester) 50 – 500 μ m
	Cover mesh	Pecap (polyester) 50 – 500 μ m
	Other belt materials	Urethane, sealed aluminum foil
	Recommended fixative	Glutaraldehyde/sea water buffer
	Materials	Polycarbonate and Acetal block
Pump	Flow rate	15 – 25 liter/minute
	Maximum total volume	25,000 liters
	Rec. volume/sample	250 liters
	Type	Rotary
	Volume error	\pm 5% average
	Drive	Brushless 3 phase DC motor
	Controller	Housing material
Power supply		36 VDC, 30Ahr alkaline battery pack
Power consumption		7000 mAh (3 month deployment)
Communications		Serial (RS-232)
Frame	Material	316 electro-polished stainless steel
	Structure	In-line mooring, weldment
	Bridle configuration	In-line mooring, weldment, 4 in-line
	Frame & bridle eyes	19 mm diameter, insulated
	Max in-line tension	2,300 Kg (5,000 lbs)
Operation Conditions	Maximum depth	5,500 meters
	Max. deployment time	12 months (based on volume/flow rate)
	Operating temperature	0 – 50° C

Specifications Subject to Change without Notice



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