

## ME120 HYDROGRAPHIC SURVEY USV



**10 KN**

Max. Speed

**8h @ 4KN**

Endurance

**45 KG**

Payload



MBES



Water Probe



Side Scan Sonar



ADCP

The ME120 is designed for autonomous hydrographic and oceanographic surveys from inland waters to coastal areas. Compatible with small multibeam sonars as well as other survey instruments, the convertible catamaran design can be easily assembled and disassembled, quickly changing and installing different instruments during a survey, and transported by van.

### Application Scenario

Hydrographic Survey and underwater inspection in lakes, rivers, harbors, construction sites, nearshore etc.

### Key Features

- 1 Intelligent route planning Autonomous navigation collision avoidance
- 2 Catamaran hull enhances sailing stability and data quality
- 3 Auto wet-end lifter to protect instruments and improve sailing speed
- 4 Easy to maintain: batteries, instruments and engines can be quickly replaced
- 5 Modular design for quick transportation and deployment
- 6 Mobile online survey, can return video and acoustic data in real time

# SPECIFICATIONS

## Physical

Dimension	2.5m(L)*1.4m(W)
Weight	150kg
Payload	45kg
Draught	0.45m
Hull Material	Carbon fiber composite

## Power & propulsion

Propulsion	Duct type thruster
Power	43.2V/50Ah lithium battery*4

## Performance

Survey Speed	4kn
Maximum Speed	10kn
Endurance	8h @ 4kn
Real-time Video	Yes
Collision Avoidance	Yes

## Control & Communication

Remote Control	1km
Data Telemetry	2km / 5km
Control	OceanAlpha USV Control Software

# INTEGRATIONS

Single Beam Echo Sounder

Compact Multibeam Echo Sounder

Inertial navigation system

Lidar

ADCP

RTK GNSS receiver

Multi parameters water probe

etc.

# CASE APPLICATION



## UNMANNED BOAT APPLIED IN BRINE LAKE OF HIGH SALINITY

### EQUIPMENT USED:

ME120 USV, Single-beam depth sounder

### RESULT:

ME120 joined the national potash mining project to conduct routine bathymetry surveys in Brine Lake, which has a salinity ten times that of seawater. The anti-corrosion and anti-salt spray capabilities of the USV successfully met this challenge. At the same time, the smooth communication of video and data can be well achieved through the private network of the USV, regardless of the poor public network communication in the remote Tarim Basin.