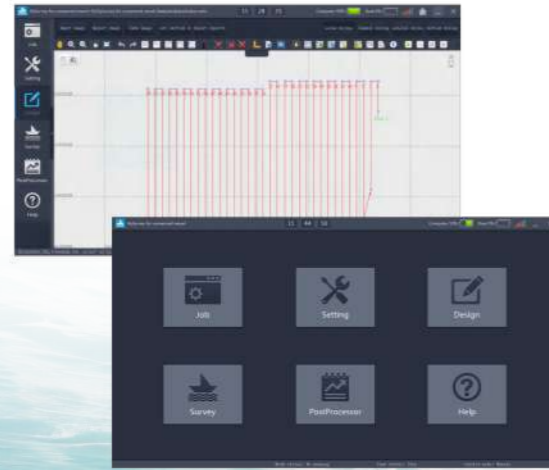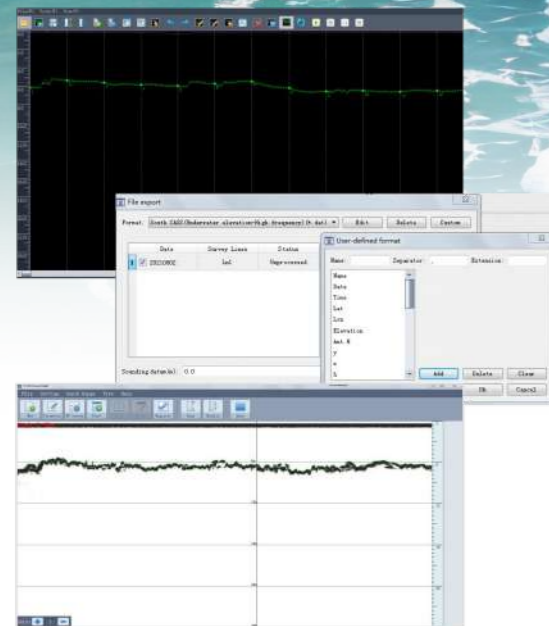# ■ SOFTWARE

SNPilot

The SNPilot is ground control software based on a Linux system. You can customize tasks, manually control operations, monitor task progress, and input coordinate systems. The system supports automatic return in the event of low power or signal loss, with the option to set a specific return point. Additionally, it provides real-time viewing of trajectory, sounding data, waveform, and video. Data can be stored locally on the device or within the vessel for further analysis and reference.

EchoSurvey

EchoSurvey is a post-processing software. The software supports data replay, overlay of waveform depth data, depth data correction, tide correction, data delay correction, attitude correction, and coordinate parameter conversion. It allows re-sampling of collected data based on time or distance. Data can be exported in a custom format, facilitating data export and facilitating data post-processing more easily. It can display different depths in varying colors, with the capability for rollback and undo functions.

■ SPECIFICATIONS

Vessel Specifications

Hull Dimension(L × W × H)	1.18m x 0.7m x 0.39m
Material	Carbon Fiber Composite Material
Hull Shape	Trimaran
Water Proof & Dust Proof	IP67
Weight Without Battery	24kg
Maximum Payload	35kg
Draft	9cm
Moon Pool	23cm in Diameter (Customized)
Anti-wave & Wind	3rd Wind Level & 2nd Wave Level
Equipable Devices	ADCP, Water Sampling Equipment, Water Quality Meter, Sub-bottom Profiler, Side Scan Sonar, Single Beam Echo Sounder, Miniaturized Multi-beam Echo Sounder
Security Configuration	Shoal Automatic Astern, Millimeter-wave Radar Automatic Obstacle Avoidance, 360° Life Video, Dual-hull Anti-sinking Design, Rubber Bumper, Support Temperature and Humidity Detection, Indicator Light for Vessel Operation, Built-in Mounting Motor with Tangling-free Housing

Power

Battery Capacity	33V/45Ah, Li-ion Battery, Support Hot Swap
Propeller Type	Brushless DC
Direction Control	Veering without Steering Engine
Motor Power	850W (Single Motor)
Maximum Speed	3.5 knots (7 m/s)
Battery Endurance	5.5h @ 2 m/s (Single Battery) (Longer Battery Life Optional)

Communication

Transmission Range	2.5 km (Network Bridge) Unlimited Distance (4G Mode)
SIM Card Slot	Support Nano & eSIM
Video Communication	4G, Network Bridge
Data Communication	4G, Network Bridge, Radio
R/C Communication	4G, Network Bridge, Radio 2.4GHz
Data Storage	Multi-channel Storage (Remote Controller, Vessel, Server)

Remote Controller	9.2 Inches Display (Support Different Memory, Vessel Control, Data Collection, Video Viewing, Working Modes Switch)

Positioning

Signal Tracking	GPS:	L1C/A, L2C, L2P
	BDS:	B1I, B2I, B3I, B2b
	GLONASS:	G1,G2
	Galileo:	E1, E5b
	QZSS:	L1C/A, L2C
	SBAS:	L1C/A
	L-Band	
Recapture Time	<1s	
RTK Initialization Time	<5s	
Velocity Accuracy	0.02m/s	
Single Point Position (RMS)	≤ 1.5m (Horizontal) ≤ 2.5m (Vertical)	
PPP Accuracy	≤ 10cm	
RTK Positioning Accuracy	±8mm+1ppm(Horizontal) ±15mm+1ppm (Vertical)	
Heading Accuracy	0.15° @1m Baseline	
Roll / Pitch Accuracy	0.25° @1m Baseline	
IMU Update Rate	200Hz	

Single Beam Echo Sounder

Weight	0.75 kg
Sounding Range	0.3 - 300m / 900ft
Sounding Accuracy	±0.01m ± 0.1%D (D is the depth of water)
Resolution	0.01m
Frequency	200 kHz
Beam Angle	7°
Supply Voltage	9-15V DC, Less than 25w, 110~265V AC (Optional)
Water Proof & Dust Proof	IP67

AUTHORIZED DISTRIBUTION PARTNER

ComNavTech

SV600

Unmanned Surface Vessel

■ INTRODUCTION

The SV600 is an advanced Unmanned Surface Vessel (USV) specifically engineered for hydrographic surveys. Offering remote control capabilities, it seamlessly integrates adaptive water flow straight-line and hovering technology for enhanced efficiency.

Equipped with a dual-moon pool design, this vessel facilitates the simultaneous deployment of multiple payloads. From Acoustic Doppler Current Profilers (ADCP) to single-beam echo sounders (SBES), side-scan sonars, pipeline detectors, and compact multi-beam echo sounders, the SV600 enables versatile surveying capabilities. Thanks to its rapid installation feature, transitioning between missions is effortless, allowing for seamless switching between various modes of measurement operations.

Vessel Battery Status	Integrate GNSS Antenna	Integrated Master Control Design	Obstacle Avoidance Radar System	Dual Moon Pool

IP67 IP67 Dustproof & Waterproof	Quick Installation	High-speed Propeller with Long Life	Auto Measurement of Cross Section & Line	360° Live Video
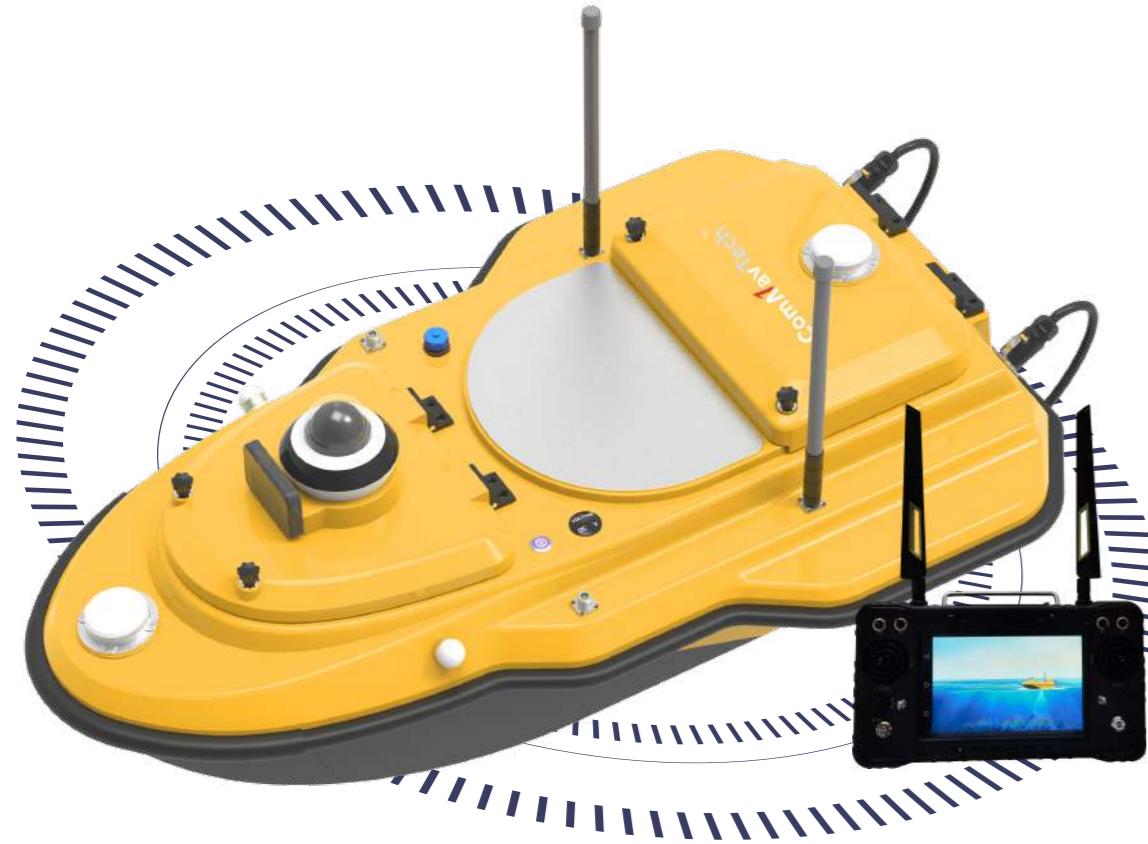
■ FEATURE

Uninterrupted Positioning with GNSS+IMU

The SV600 is outfitted with ComNavTech's dual-antenna GNSS module, featuring full-constellation multi-frequency tracking. This enables precise positioning and navigation. With an integrated IMU, it ensures continuous availability of position data, even during temporary GNSS signal loss.

360° Life Video

With 360° real-time video technology, you can immerse yourself in the environment, enhancing navigation safety.

Streamline Design

The master control of the SV600 is highly integrated, effectively minimizing the complexity of cables within the vessel's cabin.

Vessel Battery Status Display

Checking the battery status of the vessel is as easy as pressing button, eliminating the need to open the remote controller or access the cabin.

Double Hull Design

The double hull design of the SV600 ensures its resilience against sinking and damage from unexpected impacts, safeguarding its integrity even in the face of unforeseen incidents.

Millimeter-wave Radar Automatic Obstacle Avoidance

With its advanced radar technology, the obstacle avoidance radar system ensures safe operations by detecting obstacles and providing timely alerts to users, allowing for quick and effective navigation even in low-visibility conditions.

Dual Moon Pool

With the capacity to carry payloads of up to 42kg, the dual-moon pool design provides ample space and strength to accommodate various scanning devices, offering versatility in hydrographic surveying.

Smart Remote Control

SV600 remote controller support radio and 4G connection. Its maximum communication range of network bridge is up to 2.5km. The controller is equipped with a 9.2" screen that the image captured by camera can be viewed at any time, truly enhance the utility and compatibility.