

TRV-005



ROV General Specifications:

Depth Rating	3300 ft. (1000m) standard (deeper options)
Payload	30 lbs. (15 kg)
Height	18 in. (457 mm)
Length	60 in. (1524 mm)
Width (forward)	36 in. (914 mm)
(aft)	48 in. (1219 mm)
Weight in Air	550 lbs. (250 kg)

Maximum Static Thrust:

Forward	230 lbs.
Reverse	150 lbs.
Lateral	110 lbs.
Vertical	230 lbs.

Maximum Velocity: (100 ft. tether excursion)

Forward	3.08 m/s (6 kts)
Reverse	2.05 m/s (4 kts)
Lateral	1.54 m/s (3 kts)
Vertical	Up to 3 m/s
Turning Rate	120° per second max.

Surface Control Unit:

Height	12.28 in. (312 mm)
Width	16.50 in. (419 mm)
Depth	22.25 in. (565 mm)
Weight	291 lbs. (132 kg)
SCU Power Requirements	220 VAC 3Ø 25kw

Tether Dimensions:

Tether (standard length–live boat mode)	3300 ft. (1000 m)
Diameter.....	22.5 mm (.886 in.)
Weight in Air	345 lb/kft (513 kg/km)
Weight in Seawater	71 lb/kft (106 kg/km)
Breaking Load	2500 lbf (11.2 kN)

Thruster Technology:

5 x Brushless DC motors with internal drive modules.

Chassis:

T6061 Aluminum

Buoyancy:

1000m Syntactic Foam (standard, deeper options available)

Hand Control Unit:

Height	3.25 in.
Width	8.5 in.
Length	12.0 in.
Weight	5.0 lbs. (2.27 kg)

Hand Control Functions:

Thruster Control: Fore, Aft, Lateral, Vertical (Normal), Vertical (Pitch), Rotate
0-100% Gain Control on Port, Stb. & Lateral
0-100% Gain Control on Verticals
0-100% Gain Control on Forward Bias
Auto Depth, Auto Heading, Auto Altitude
Thruster enable/disable
Normal/Pitch Mode Switch

Cameras:

Pan, Tilt, Zoom & Focus on Colour Camera
Pan, Tilt Fixed Focus Colour Camera
Manipulator Colour Camera
Remote Control for aft 360° Colour Rotate Camera

Manipulators:

Swing Left/Right
Arm Up/Down
Jaw Rotate CW/CCW
Jaw Open/Close

Lights:

2 x LED Light potentiometers 0-100% intensity

Remote Hand Control Unit:

Height	2.25 in.
Width	7.75 in.
Depth	4.75 in.
Weight	1.0 lbs.

Remote Hand Control Functions:

Thruster Control: Fore, Aft, Lateral, Vertical, Rotate, Thruster Enable/Disable Switch. Lights: On/Off (Full Intensity)

Sonar:

MS 1000 Sonar Head

Modular Components:

Telemetry Can, Power Can, Capacitor Bottle, HPU, 4-Function Valve Pack

Navigation:

Gyro/Fluxgate Combination w/pitch & roll.

Lighting:

5 x LED High Power Light Systems

Auto Functions:

Auto Depth, Heading & Altitude

Cameras: 4

Sony Color Zoom, Focus, Pan & Tilt
Low Light Colour, Pan & Tilt
Rotary Color 360° Viewing
Colour Manip Camera
Cameras on two Video CCT's (any combination of two cameras can be viewed at any time)

Additional Vehicle Function:

Pilot-controlled vehicle pitch