LOWRANCE



B&G

StructureScan HD Transom mount Installation Guide

ENGLISH



A Warning: It is your sole responsibility to install and use the instrument and transducer(s) in a manner that will not cause accidents, personal injury or property damage. Always observe safe boating practices.

The choice, location, and installation of transducers and other components of the system are critical to the performance of the system as intended. If in doubt, consult your Navman dealer.

To reduce the risk of misusing or misinterpreting this instrument, you must read and understand all aspects of this Installation and Operation Manual. We also recommend that you practice all operations using the built-in simulator before using this instrument on the water. **Sonar performance**: The accuracy of the sonar depth display can be affected by many factors, including the type and location of the transducer and water conditions. Never use this instrument to gauge depth or other conditions for swimming or diving.

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Installation preparation

Accessories

If you received this manual with a StructureScan accessory, you will notice that some information in the document does not apply to the accessory. This manual has installation instructions for your accessory, and accessory pack content tables on the back cover.

Contents

Your StructureScan box is packed with the StructureScan HD module, a Power cable, fuse and fuse holder, StructureScan transducer, mounting bracket, 15 foot (4.5m) ethernet cable and a hardware kit. The transducer has a 20 foot (6m) cable attached.

Hardware Mounting Kit (included)			
E DODODO	Transom mount screws (2)	Ð	Transducer attachment lock nuts (6)
	Bracket assembly bolts (2)	E DOD	StructureScan HD mounting screws (4)
0	Bracket assembly washers (4)		Closed end crimp connector (1)
Ø	Bracket assembly nuts (2)		Zip ties (2)
E.	Transducer attachment screws (6)		

Required tools and supplies (not included)	
Drill	Phillips (slotted-head screwdriver)
Drill bits	Marine grade above-or-below waterline sealant

Mounting options

The StructureScan transducer can be mounted on the transom, jackplate, step or directly to your boat's hull.

When mounting it directly to the hull, you must purchase a highquality, marine grade above- or below-waterline sealant/adhesive compound.

Use the following table to determine which mounting option is best suited to your boat/installation preferences.

→ Note: When mounting the StructureScan transducer, make sure there is nothing around the mounting location that could interfere with StructureScan transducer sonar beams.



StructureScan HD transducer mounting options		
Transom mount (Page 8)	Keeps transducer in the water when the boat is on plane, allowing you to track bottom at high speeds Transducer angle can be adjusted so it is parallel with the water Transducer more likely to collide with obstructions in the water and adds drag to the boat	
Jackplate mount (Page 9)	Transducer is not in the water when boat is on plane; protects transducer and prevents drag from transducer Transducer angle can be adjusted so it is parallel with the water Allows you to mount transducer without drilling holes in your boat Does not track bottom when boat is on plane	
Step mount (Page 10)	Transducer is not in the water when boat is on plane; protects transducer and prevents drag from transducer Transducer angle can be adjusted so it is parallel with the water Does not track bottom when boat is on plane	
Direct mount/Step (Page 11)	Transducer is not in the water when boat is on plane Protects transducer and prevents drag from transducer Transducer angle can not be adjusted so it is parallel with the water Does not track bottom when boat is on plane	
Trolling motor mount (sold separately)	Visit www.transducershieldandsaver.com	

Installation

Bracket and transducer assembly

The StructureScan bracket comes with four washers, two bolts and two nuts.

If you plan to mount the StructureScan transducer directly to the step (Step Mount) or on the trolling motor, you do not need to assemble the bracket.







Transducer angle

After mounting the StructureScan transducer, make sure the transducer is adjusted so it will be parallel with the waterline when moving at trolling speed.



Downscan Overlay

The StructureScan transducer should be installed within approximately 1 foot of the broadband sounder transducer to get optimum performance from the Downscan Overlay feature.

It is recommended you turn off Downscan Overlay when using your trolling motor as the sonar source, unless the StructureScan transducer and broadband sounder transducer both are installed on the trolling motor.

Downscan overlay performance could be degraded if the StructureScan transducer is too far away from the broadband sounder transducer installed on the trolling motor.



Transom mount

The StructureScan transducer can be mounted just like a skimmer transducer, where it is in the water when you are on plane or can be mounted so it is only in the water, when you are moving at trolling speed.

Transom Mount Supplies (not included)		
1/8" Drill bit (Transom mount pilot holes)	Marine grade above- or below- waterline sealant	
Transom Mount (Aluminum Hull) Supplies (not included)		
M4 Machine Screws	Marine grade above- or below- waterline sealant	
Starboard (prevents corrosion between bracket and aluminum hull)		

To Mount StructureScan transducer on Transom:

- 1. Choose a transducer location and then route the transducer cable to the location where the StructureScan module will be installed.
- 2. Place the transducer bracket against the transom and then align the bottom of the transducer with the bottom of boat. Use a pencil to mark the pilot holes through the slots in the transducer bracket.
- 3. Drill the pilot holes into the boat's transom.
- 4. Apply a high-grade above- or below-waterline sealant to the pilot holes.
- **5.** Align the bracket slots over the pilot holes and fasten the bracket to the transom using your drill and the supplied screws.
- 6. To make adjustments to transducer position, loosen the screws and slide bracket up or down.
- 7. Connect the transducer cable to the StructureScan module sonar port.



Jackplate Mount

The StructureScan transducer can be mounted inside or outside of the jackplate by drilling through the jackplate and then running bolts though the hinge hole in the side of the bracket into the jackplate.

Jackplate Mount Supplies (not included)	
M6 or 1/4" Drill bit (Jackplate Mount) pilot holes	1/4" (M6) jackplate mount bolts

▲ *Warning:* Before installing the StructureScan HD transducer on the jackplate, lower the jackplate to its lowest setting to make sure there is enough clearance between the jack plate/engine and the transducer. Lack of clearance could damage the transducer when the engine is all the way down.

To Mount StructureScan on Jackplate:

- 1. Choose a transducer location on the inside or outside of the jackplate.
- 2. Adjust the jackplate up and down to make sure the transducer will not obstruct jackplate movement.
- 3. Make sure nothing blocks the sonar beam on either side of the transducer.
- **4.** Route the transducer cable to the location where the module will be installed.
- 5. Move the transducer bracket into the desired position and use a pencil to mark the holes through the hinge hole and hole in the side of the bracket.
- 6. Using a M6 or equivalent drill bit, drill the holes into the jackplate.
- **7.** Slide the bracket inside the jackplate and align the bracket holes with holes you drilled in the jackplate.
- 8. Slide M6 bolts with washers into each hole on the side of jackplate.
- 9. Guide the bolts through the StructureScan bracket holes.
- **10.** Place a washer over the end of the bolts and tighten the nuts.
- **11.** Connect the transducer cable to the StructureScan module sonar port.



StructureScan HD | Installation

Step Mount

Mounting the StructureScan transducer under the step not only protects the transducer from hitting objects in the water, but does not cause any drag on your boat when it is on plane.

Step Mount Supplies (not included)	
1/8" Drill bit (Transom mount pilot holes)	Marine grade above- or below- waterline sealant

To use Step Mount:

- 1. Choose a transducer location.
- 2. Route the transducer cable to the location where the StructureScan module will be installed.
- **3.** Move the transducer bracket into the desired position and then use a pencil to mark the pilot holes through the slots in the bracket.
- 4. Drill the pilot holes.
- 5. Apply a high-grade above- or below-waterline sealant to the pilot holes.
- 6. Align the bracket slots over the pilot holes and fasten the bracket to the transom using your drill and the supplied screws.
- 7. To make adjustments to transducer position, loosen the screws and slide bracket up or down.
- 8. Connect the transducer cable to the StructureScan module sonar port.



Direct/Step Mount (No Bracket)

When using the direct mount installation shown below, you MUST turn on the Flip Left/Right feature. Refer to your Operation manual for more information..

Direct Step Mount Supplies (not included)	
3/32 Drill bit (Direct/Step	Marine grade above- or below-
mount pilot holes)	waterline sealant

To use Direct Mount:

- 1. Make sure the boat's step is the same length or longer than the StructureScan transducer.
- 2. After selecting a mounting location, route the transducer cable to the location where the StructureScan module will be installed.
- **3.** Hold the transducer in the desired position and then use a pencil to mark pilot holes through the mounting holes on the transducer.
- 4. Drill the pilot holes.
- 5. Apply a high-grade above- or below-waterline sealant to the pilot holes.
- 6. Align the transducer mounting holes over the pilot holes and mount the transducer to the step using self-tapping metal screws (not supplied). Do NOT overtighten the screws; otherwise you could strip out the fiberglass pilot holes or crack the mounting holes on the StructureScan transducer.
- 7. Connect the transducer cable to the StructureScan module and then turn on the Flip Left/Right feature on your display unit.



→ NOTE: When using a Direct Step Mount, you must turn on the Flip Left/Right feature in your display unit to ensure what is shown on the left/right side on your display, corresponds with what is on the left/right side of your boat.



Parts and accessories

StructureScan Module (000-10801-001)	
StructureScan module mounting screws (4)	Closed-end crimp connector
Fuse and fuse holder	

StructureScan Skimmer Bracket (000-10874-001)		
Transom mount screws (2)	Bracket assembly nuts (2)	
Transducer attachment lock nuts (6)	Transducer attachment screws (6)	
Bracket assembly bolts (2)	Zip ties (2)	
Bracket assembly washers (4)		

StructureScan Skimmer Transducer (000-10802-001)		
Transom mount screws (2)	Bracket assembly nuts (2)	
Transducer attachment lock nuts (6)	Transducer attachment screws (6)	
Bracket assembly bolts (2)	Zip ties (2)	
Bracket assembly washers (4)		

StructureScan Specifications		
Power Requirement	12 Volts	
Voltage Input	10V - 17V	
Transmit Power	WRMS: 500W WPK: 4000W	
Current Drain	Max: .75A Typical: .60A Inrush: 4.7A pk	
Fuse Type	External: 3A Fast Acting Automotive Blade	
Transducer Cable	20 feet (6m)	
Target Separation	1.5″ (38.1mm)	
Transducer Frequency	455kHz	
Communication	Ethernet	
Shared devices supported	3	
Weight	StructureScan module (1.8lbs) Transducer (1.9lbs) Transducer with bracket (2.55lbs)	

Sidescan Specifications		
Max Range	455kHz (500ft — 250 per side)	
Max Speed	35 mph (56 kmh)	
Mark objects	15 mph (24 kmh)	
Optimum speed	10 mph (16 kmh) or less	

	Downscan Specifications
Max Depth	300 ft (455kHz)
Max Speed	55 mph (88 kmh)
Mark objects 35 mph (56 kmh)	
Optimum speed	10 mph (16 kmh) or less

StructureScan LED Guide			
Indicator	LED Status	Definition	
Transducer LED	Off	Transducer not connected or cable/transducer is broken	
Transducer LED	Green/ stays on	Transducer detected/locked on to bottom	
Transducer LED	Green/ flashing	Transducer detected/not locked on to bottom	
Power LED	Off	No power or not switched on	
Power LED	Red/stays on	Product in booting process	
Power LED	Green/stays on	Product has power/operating	
Power LED	Red/Green/ slow flashing	Product in factory mode; ethernet communication working	
Power LED	Red/Green fast flashing	Product in factory mode; no ethernet communication (cable unplugged or bad cable)	
Ethernet LED	Off	No ethernet communication (cable unplugged, bad cable or remote unit not powered)	
Ethernet LED	Yellow/ Flashing	Ethernet communication is working (link/active light)	

StructureScan Troubleshooting Tips			
StructureScan not displayed	 Make sure StructureScan HD is powered Check unit software; must have at least version 2.5 Make sure yellow wire is connected to switched power source Check fuse 		
No Data	Check range or turn on auto range		
Data washed out/ same color	Turn down contrast; try different palettes		
Left/right data swapped on screen	Toggle the Flip Left/Right feature		
No Source is displayed	 Make sure HDS unit and StructureScan are powered and connected to ether- net network Make sure all switches are powered Check link/active light to see which units are not communicating 		



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