PORT CREDIT PCMS MARINE SURVEYS

- SAMS® Accredited Marine Surveyor
- ABYC® Standards Certified
- Transport Canada Licensed Captain
- Transport Canada Appointed Tonnage Surveyor
- BoatUS® Approved Surveyor

Lakeshore RPO 39513
Mississauga, ON. L5G 4S6
416-526-3845 www.pcmarinesurveys.com

Marine Survey Report

Report Number : 2013P/2885

Date of Inspection : July 10, 2013

Commissioned by : [redacted] for pre-purchase purposes

Address : [redacted]

e-mail : [redacted]

Phone : [redacted]

GENERAL

Make of Vessel : Silverton 410 Sportbridge

Name of Vessel : [redacted]

Model year : 2003

Date of mfg. : March 2003

License Number : [redacted]

HIN/MIC : STN[redacted]C303

HIN/MIC on upper starboard transom

TRANSPORT CANADA REGISTRY DATA

Register No. : n/a **Registry expires :** n/a

Note : Vessel previously USCG Documented. See Appendix 2.

PUBLISHED SPECIFICATIONS

The surveyor has made neither weight calculations nor measurements. All dimensions and weights are from published specifications such as original brochures The PowerBoat Guide, Mauch's Sailboat Guides, manufacturers or owners association web sites. Survey fees are based on such published L.O.A.,

L.O.A. : 46' 3" **Beam :** 14' 4"

Draught : 3' 10" **Ballast :** 367lbs. steel plates.

Displacement : 28495lbs. (dry) **Vessel type :** Monohull

SURVEY SITE

The vessel was inspected afloat and ashore in travel lift slings at Port Credit Yacht Club, Mississauga, Ontario. Weather was warm at 26°c, clear and dry. The client did attend.

GENERAL DESCRIPTION

The vessel is a standard production motor yacht manufactured by Silverton. She is diesel fueled and has galley, head compartment and sleeping quarters for four crew. Ontario license numbers are displayed at both bows and the vessel name is on the transom. The HIN/MIC is clearly moulded in the upper starboard topsides aft.

SCOPE OF SURVEY

The purpose of this inspection and survey report is to determine, insofar as possible within the limitations of visual and physical accessibility, through non-invasive and non-destructive means, the vessel's condition at time of survey by reporting deficiencies against the standards quoted in the "comments" section of this report and to present the surveyors personal opinion as to the vessel's condition. Certain parts of the structure, systems and equipment may be inaccessible without removing decks, tanks, bulkheads and headliners etc. or in the case of cored structure, drilling core samples. This would be prohibitively time consuming, potentially destructive, costly to restore and not within the scope of this survey. Coatings build up, corrosion, marine growth, excessive gear on board or dirt may have hampered the surveyor's ability to inspect. The vessel is surveyed as found. Loose gear and accessories are neither inventoried nor inspected.

All Seacocks are activated and tested by hand pressure only. Cosmetic or comfort issues may be addressed where there is a significant effect on the value of the vessel. Electronic and electrical equipment may be tested by powering up, only when power is already connected. A complete analysis of the vessels electrical systems would require the services of a qualified marine electrician. Only the external visual condition of wiring, connections and panels is reported. The surveyor recommends that a qualified marine mechanic inspect all engines, generators, V-drives, transmissions, saildrives and or stern drives. Normal wear and tear relative to the model and vintage will not generally be reported on. Fuel burning equipment or appliances will be visually inspected and not be started or ignited by the surveyor.

Any reference to bronze, aluminum or stainless steel metals is a colour reference for convenience only, as the actual metallurgy cannot be determined without laboratory testing.

The statements in this survey are the personal opinions and observations of the undersigned surveyor and are for the consideration of the party or persons retaining him, with no guarantees express or implied. The surveyor cannot predict how the vessel or its systems will perform over time and therefore this report is valid only at time of survey. No right of action against the surveyor for negligence, or breach of contract or otherwise, accrues to anyone other than the party retaining the surveyor and is both restricted and limited to the cost of the survey herein provided. All photographs remain the property of Port Credit Marine Surveys. This report may be used as an example of the surveyors work with all vessel and personal identifiers redacted. Acceptance and or use of this report constitutes agreement to these and all other conditions and limitations contained herein. This report remains the exclusive property of Port Credit Marine Surveys until the accompanying invoice is paid in full.

MOISTURE CONTENT

Be advised that moisture meter readings and percussive soundings on frozen structure are not reliable. Meter readings on composite structures are relative and moisture percentages cannot be determined by these meters. For a complete explanation of moisture meters and their limitations see "Moisture Meter Mythology" on our website.

Moisture levels where measured are taken with an Electrophysics, capacitance type digital meter. Relative meter readings related to balsa cored structure are interpreted as follows ….

Low : Meter reads 10-13 = Core is dry to the touch.

Slightly elevated : Meter reads 13-16 = Faint moisture can be drawn by applying some hand pressure to the core through a paper towel.

Elevated : Meter reads 17-23 = Slight amount of moisture is visible in core when squeezed by hand pressure.

High : Meter reads 24 + = Droplets can be squeezed from core with light finger pressure.

Near saturation : Meter reads 40 + = Moisture is clearly visible in the core without pressure applied.

STRUCTURAL COMPONENTS

General : Hull is fabricated from fiber reinforced resin and taken from a two piece female mold. Decks, topsides and superstructure are of FRP cored sandwich construction while the bottom is uncored. The hull and deck shells are supported by longitudinal and transverse encapsulated stringers, frames, floor members and plywood bulkheads attached to the hull with FRP.

Structural changes : No structural modifications sighted.

Topsides : Check sound and appear fair and with some minor scuffs and abrasions and evidence of two repairs on the starboard side above the rub rail.

Transom : The transom checks sound with moisture levels in the low range. The top surface of the swim platform checks sound but shows high moisture levels around all fasteners at two exposed holes in the swim platform and two more on the transom above the shore power inlet.
See comment (1).

Bulkheads/frames : The hull skin shows arc shaped fractures and the tabbing of two transverse bulkheads has separated under the berth in the guest stateroom. There are matching fractures on the exterior surface and a small area of dull checking. **See comment (2).**

Interior - Fractures between separated bulkheads

Exterior - fractures between separated bulkheads.

Interior separated bulkhead tabbing

Bottom : Multiple coats of flaking and poorly adhered antifouling pain in very poor condition.
See comment (3).

Cockpit : The cockpit deck and hatch check sound with moisture levels in the low range. In the lazarette under the cockpit there is a leak at the starboard transom corner and approximately 367lbs. of inadequately secured and one unsecured steel ballast plates. **See comment (4).**

Approximately 367lbs. of unsecured and Inadequately secured ballast

Stb. transom leak

Decks : The rode locker hatch and area around the windlass foot switches check dull and show high moisture levels. The underside of the bow platform laminate is through fractured.
See comment (5).

Superstructure : The superstructure checks sound with moisture levels in the low range.

Hull to deck joint : The shoe box type joint is secured with stainless steel fasteners through the rub rail. There is no sign of separation or working of the joint.

Engine beds : FRP encapsulated transverse frames check sound and appear secure. With moisture levels in the low range.

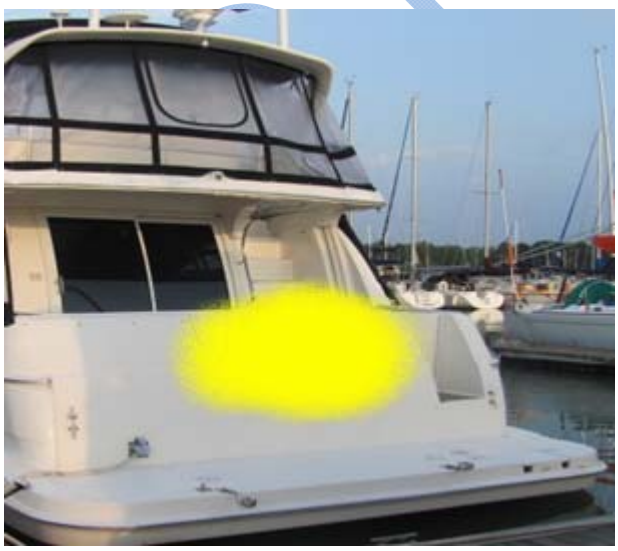
Underside bow platform fractured

COCKPIT EQUIPMENT

Sliding glass companionway door, single deck hatch to steering gear, fuel tank, bank of three batteries and stern thruster, integral molded steps leading to the flying bridge and all are sound and secure.

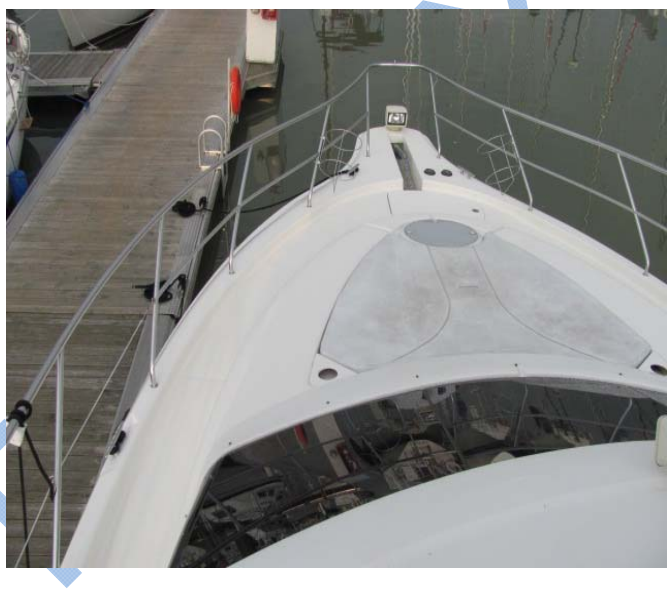
STERN EQUIPMENT

The stern is fitted with an attached swim platform through bolted to the transom and fitted with two deck inspection plates and overboard drains. The interior of the platform contained only a few ounces of water. A pull-out re-boarding ladder under a hatch, transom door and transom locker are all secure and in good order.



DECK / HOUSE/TRUNK EQUIPMENT

Stainless steel bow and side rails are secure as are bow, and stern mooring cleats. An integral bow platform with single anchor roller and rode locker hatch are secure. Molded toe rails are fair and sound.
On the trunk one escape hatch is sound. On the house, fixed safety glass windshield and two side, safety glass deadlights are secure and in good order.



FLYING BRIDGE EQUIPMENT

The flying bridge is accessed from the cockpit via a molded FRP steps. An aluminum radar arch, passenger and pilot seating and wet bar are all in good order. An icemaker did power up but could not produce ice as water tanks were empty. **See comment (6).**

RUNNING GEAR

Steering : Hydraulic to single ram and tie rod to tiller arms are secure and responsive with no visible leakage.

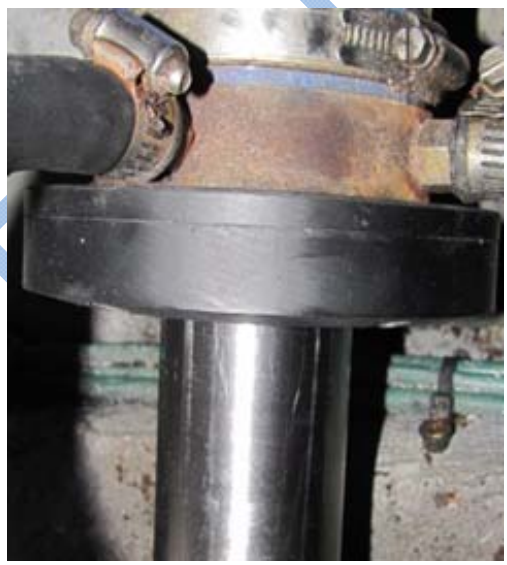
Rudders : Semi-balanced bronze spades with bronze compression type stuffing boxes show surface corrosion indicative of salt water usage but are secure and sound.

Propellers : Two 4-blade bronze units are fair and secured with nuts, jam nuts and cotter pins, all in good order. Port - 25LH29, Starboard – 25RH29

Shafting : Stainless steel shafts supported through intermediary and main struts with cutless bearings to dripless seal type stuffing boxes. The port shaft is not centered in the bearings. The port stuffing box retaining collar is very loose and the starboard retaining collar is missing. **See comment (7).**

Port running gear

Starboard running gear



Starboard shaft – stuffing retaining collar missing

Port shaft - Stuffing retaining collar loose

Port main- off center

Starboard main strut - centered

Port intermediary- off center

Starboard intermediary strut- centered

Trim tabs : Hydraulic trim tabs are secured and were heard to power up.

Thrusters : Bow and stern thrusters are secure and did power up. The bow thruster is not accessible for inspection from the interior without use of tools.

PROPULSION SYSTEM

Engine oil is moderately clean in the port engine and slightly thicker and dirtier in the starboard engine. Gear reduction fluid is clean and at proper levels in both engines. Coolant scraped from the bottom of the heat exchangers is clean and at sufficient level in both engines. Gear reduction fluid is clean and at proper levels in both engines. Engine bilge compartments are heavily fouled with coolant, oily fluids and sitting water.
See comment (8).

Various bilge compartments in engine room are heavily fouled

Port engine oil

Port engine coolant

Port gear fluid

Starboard engine oil

Starboard engine coolant

Starboard gear fluid

Drip pans : None fitted. **See comment (9).**

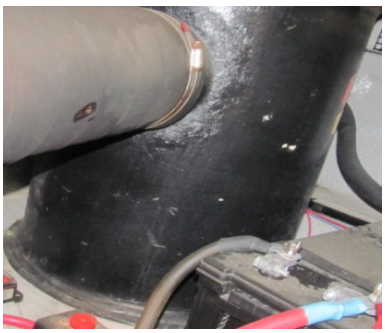
Engine controls : Dual function levers to electronic shift/throttles are secure and free moving. Engine ignition panel includes oil pressure gauges, temperature gauges, tachometers, hour meters, volt meters and a fuel gauge.

Engine mounts : Steel mounts with flexible bushings over longitudinal steel angle beams, bolted to FRP encapsulated transverse frames. All appear sound and secure.

Cooling system : Heat exchanger with raw water exhaust cooling. Port seawater intake hose is not well seated on the strainer. Port heat exchanger to exhaust elbow hose shows multiple fractures. **See comment (10).**

Ventilation : 12VDC powered exhaust blower and passive intake. System powered up and appears satisfactory.

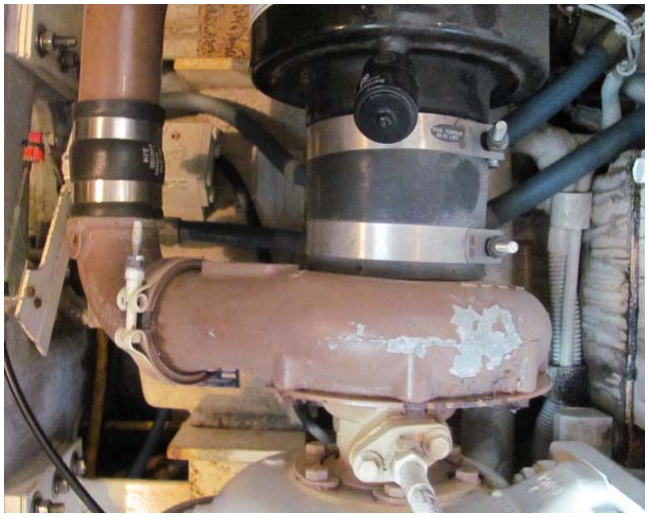
Exhaust system : Cast manifolds to FRP mufflers with type approved exhaust hose. All double clamped as required. A large area of the starboard muffler has been repaired with FRP as indicated by the un-gelcoated area. Muffler was originally gelcoated black.
See comment (11).



Port muffler

Starboard muffler

Turbo-chargers : While both turbos show signs of significant use and scorched paint, the starboard unit has lost virtually all of its paint and its mounting base shows much more corrosion than the port unit. **See comment (12).**



Port turbo

Starboard turbo

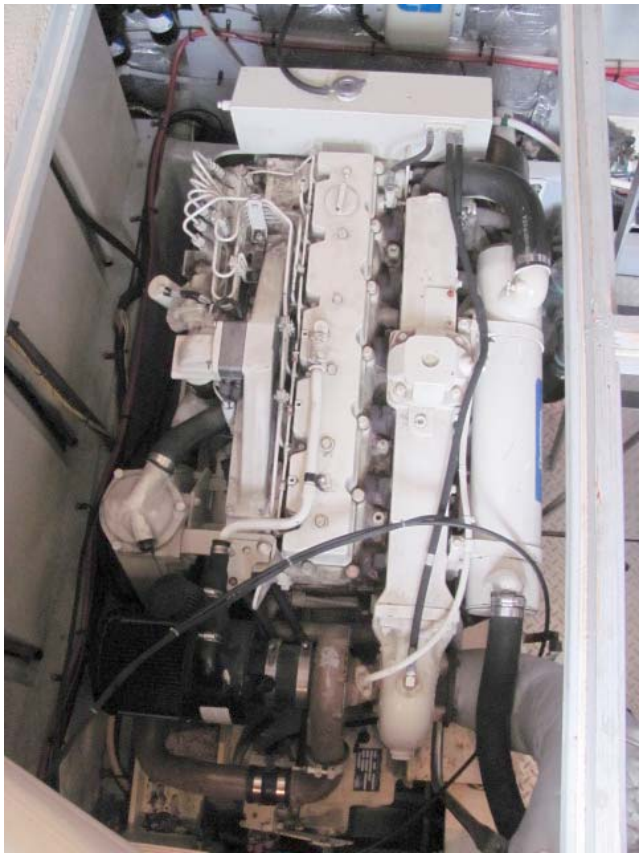
NOTE : The surveyor arrived at 0715hrs. At 0830 inspection of the engine compartment commenced to find the port engine near operating tyemperature (127°F) while the starboard engine was at 82°F, suggesting the engine had been run earlier that morning. At no time did the surveyor start the engines. **See comment (13).**

Port engine temp before startup 0830hrs

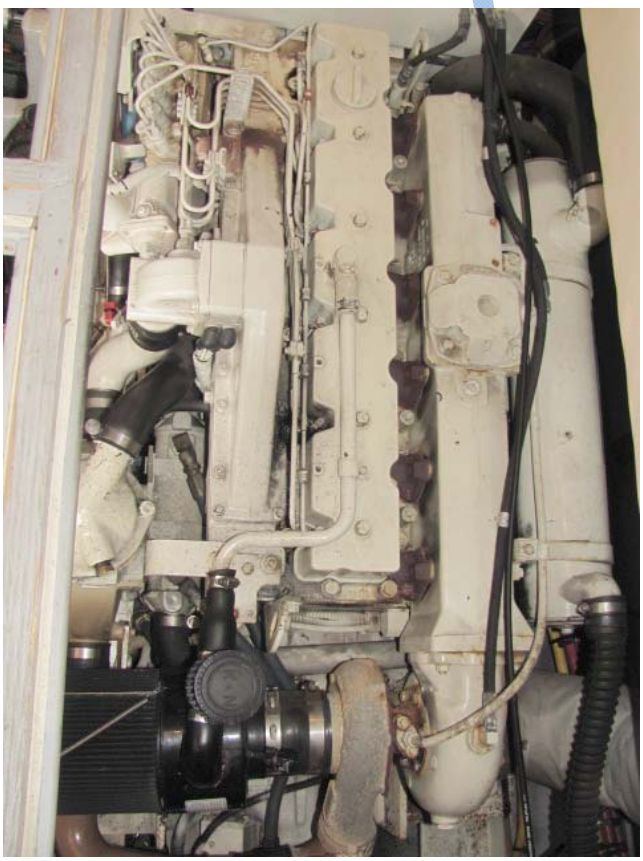
Starboard engine temperature before startup – 0830hrs

Engine mfg. :	**Port/single :**	Cummins, Diamond	**Starboard :**	Cummins, Diamond
Engine model :	**Port/single :**	M14TA family	**Starboard :**	M14TA family
Engine type :	**Port/single :**	Turbo charged	**Starboard :**	Turbo charged
Engine serial No. :	**Port/single :**		**Starboard :**	
Horse power :	**Port/single :**	450	**Starboard :**	450

Engine hours :	**Port/single :**	1829.6 per meter	**Starboard :**	1825.2 per meter
Gear mfg. :	**Port/single :**	ZF Marine	**Starboard :**	ZF Marine
Gear mod. No. :	**Port/single :**	ZF280-1 A	**Starboard :**	ZF280-1 A
Gear Ser. No. :	**Port/Single :**		**Starboard :**	
Gear ratio :	**Port/Single :**	2.00 **:** 1	**Starboard :**	2.00 **:** 1



Port engine



Starboard engine

FUEL SYSTEM

Fuel lines(s) : Type approved and double clamped where accessible as required.

Tanks : One 5052 grade aluminum tank is secure with insulated metal straps and is fitted aft of the engines in the lazarette.

Ground : Grounds could not be fully traced but fill to engine and engines to tank show continuity of less than 1ohm which is within the required standard.

Ventilation : Fuel tank is vented overboard through vent fitting with flame suppression screen as required.

Fuel filters : Racor element type primaries with clear plastic bowls without heat shields are both mounted between the engines. Fuel in port filter is cloudy and both bowls contain some bacterial growth. **See comment (14).**

Port fuel filter

Starboard fuel filter

Anti-siphon : None sighted.

Shut-off valves : At fuel filters.

Fuel overflow : Overflow from filling will run overboard as required.

GENERATOR

The generator is fitted within a sound box with integral drip pan. Exhaust is double clamped with type approved hose to and FRP muffler. Coolant is clean. Oil is thick and dirty. The fuel in the filter bowl is cloudy with a high water level.
See comment (14).

Manufacturer : Kohler

Model No. : 8E0Z

Serial No. :

Output : 8kw

Hours : 2092.6 per meter

Coolant

Oil

Fuel filter

GROUND TACKLE

Windlass : Maxwell 12VDC vertical unit with chain gypsy. The unit did power up but jammed. The housing is broken and the chain does not appear to fit the gypsy or be of an appropriate grade metal. The "power" button at the control panel at is broken. **See comment (15).**

Anchors : One approximately 20kg Bruce type. The anchor is jammed in the bail of the roller. The bail is too small and the anchor will not self launch. Damage to the underside of the bow platform appears caused by the improperly fitted anchor. **See comment (15).**

Rode : An unidentified length of approximately 5/16, 3G chain is lightly plated and does not appear to be suitable for the marine environment. **See comment (15).**

Broken "power" button.

NAVIGATION EQUIPMENT

Navigation lights : Running lights and anchor light did power up but the forward running light and anchor light cannot display the over the arc required by Collision Regulations as they are partially blocked by the Satellite antenna domes. **See comment (16).**

Compass : Ritchie 4" fluid damped type is clear and responsive to magnetic influence.

Radar : Furuno Open array unit powered up and displayed an apparently accurate return.

Radar reflector : None sighted. **See comment (17).**

Chart plotter : Furuno Navnet LCD unit powered up but could not secure a proper fix and appears to take its signal from the separate GPS unit. **See comment (18).**

GPS : Furuno GP37 did power up.

Depth sounder : Standard Horizon digital unit powered up.

Sound signal : 12VDC unit powered up.

Knot log : In GPS and plotter.

Marine radios : Standard Horizon Spectrum DSC VHF but powered down when windlass was activated.
See comment (19).

Autopilot : Simrad AP20 powered up.

Wipers : None fitted.

Spotlight : Remote control unit powered up.

Wind : No wind instruments fitted.

AC ELECTRICAL SYSTEM

Shore power - 120VAC/50amp

NOTE: Shore power was connected and AC systems powered up.

Ignition Protection : Not required in diesel fuel or engine compartments.

AC panel : Original equipment type panel with triple pole main breaker, polarity indicator, volt meter, ammeter and accessory breakers in good visual order but sharing a panel with the DC system.
See comment (20).

AC panel

AC/DC Bond : The AC and DC system grounds are bonded as required.

Neutral/ground : As required, AC neutral and grounding conductors are not bonded on the vessel.

Conductors : Stranded copper conductors where accessible marked as 600V as required.

G.F.C.I. : Where and as required and functional.

Other Outlets : All secure with correct polarity.

Battery charger : One Xantrex 60amp unit and one Protech 10amp unit and both powered up.

Inverter : None fitted.

DC ELECTRICAL SYSTEM **Ships power - 12VDC**

NOTE : Batteries were fitted and DC systems powered up.

Ignition Protection : Not required in diesel fuel or engine.

DC panel : Original equipment type circuit breaker panel with volt meters, ammeters and accessory breakers in good visual order.

Conductors : Stranded copper where accessible and generally secure. The three accessory switches on the far starboard side of the helm are excessively hot at 105°F compared to the adjacent three which show only 89°F. **See comment (21).**

3 adjacent switches in same bank

3 starboard side. switches

Alternator : Two 12VDC did provide output. Checked after hired captain started engines.

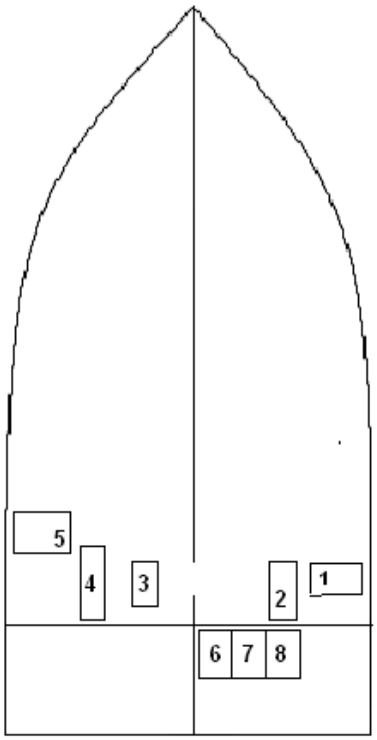
Battery switches : All 2-way units. Two in the saloon/sleeping accommodation companionway, One in the lazarette fuel compartment and two in the engine compartment. **See comment (22).**

Batteries : There are eight 12VDC batteries with three being AGM and five being lead acid wet cells. Only four of the eight are in acid resistant trays, Only four are adequately secured. Almost all conductors are connected with wing nuts and almost all of those are extremely loose. Only one is fitted with secure positive terminal protection.

The fuse cover on the positive conductor to starboard of the generator is melted and the fuse mounting tang is also melted and the fuse is discoloured but intact.

The number 4 wet cell battery is over gassing and excessively hot with an at rest temperature of 141°F and exposed plates.

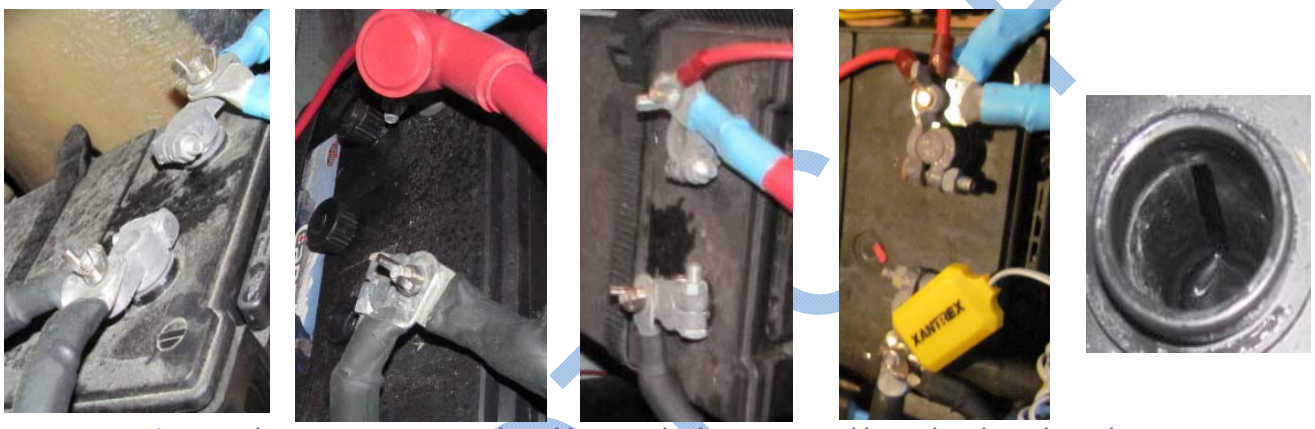
All batteries voltage dropped too fast with chargers turned off. **See comment (23).**



Battery map

No. 5 battery at rest 141°F

Others at rest 82°F



Loose wing nuts, unprotected positive terminals, unsecured batteries, low electrolyte

CORROSION PROTECTION

Anodes : Anodes on the bow thruster, stern thruster, trim tabs, rudders, shafts and transom show either no continuity with the metals to which they are mounted or excessive resistance in the megohm range. **See comment (24).**

Bonding : The underwater metal components are bonded.

Current impressor : None fitted

Transformer : No isolation transformer fitted.

Galvanic isolator : One fitted but indicator not lit. **See comment (25).**

INTERIOR

The interior headliners, sole panels, and cabinetry are in clean, sound and secure condition. Carpeting is lightly soiled and bilges are moderately clean and dry.

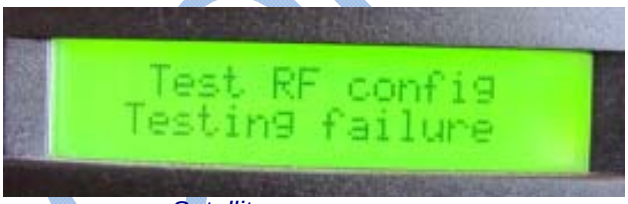
Cabin layout : From the companionway one enters the saloon to find the galley and dinette forward to port, to starboard is the companionway to the sleeping accommodations with guest stateroom to port with double entry shower, to starboard is the head compartment and forward the master stateroom with island double berth.

Air conditioning : Two Cruisair reverse cycle systems did power up on both ac and heat sides.

Heating system : Electric fire place did power up.

Vacuum system : Beam central vacuum system did power up.

Entertainment : Four LCD TV's did power up but received no signal from the KVH antenna which showed an error message. A KVH satellite phone was not tested. **See comment (26).**



Satellite error message

GALLEY

All fixtures and fittings are clean, secure and in good condition.

Refrigeration : 12VDC refrigerator freezer powered up. U-line icemaker on flying bridge deck powered up.

Potable water : 12VDC pressure system supplied from two polyethylene tanks in the engine compartment. The system did power up but the tanks were empty therefore it is not known if the system leaks or holds pressure. The starboard tank shows leak tracks around a molded "button" on the inboard side of the tank. **See comment (27).**

Leak stain on water tank

Water heater : 10US gallon 120VAC/heat exchanger unit mounted directly on a deck without airspace underneath and the heat exchanger is not connected. **See comment (28).**

Stove : 2-burner AC unit powered up.

Other : Sharp microwave oven and B&D coffee maker powered up.

SANITATION

See comment (29).

Heads : One vacuum type marine head did power up but no water was available for test flushing.

Shower : Separate compartment.

Black water : Polyethylene black water tank is connected to a deck pumpout fitting as required. A macerator discharge is also fitted and the system is operable.

SAFETY EQUIPMENT

Safety equipment that is not integral to the vessel or permanently installed has not been inventoried or inspected by the surveyor. The Transport Canada “Safe Boating Guide” should be consulted.

Carbon monoxide detector : Yes as required.

Smoke detector : None sighted.
See comment (30).

Gasoline Fume detector : No gasoline aboard.

Fixed fire fighting system : A fixed Halon 1301 and a Safe-t-Alert fire/fume detector do not have current inspection tags and the test function lights do not power up.
See comment (31).

Propane Fume detector : No fixed propane system aboard.

Re-boarding ladder : At stern.

Emergency tiller : None sighted.

USCG RECALLS

A search of the “USCG Recall Notice” database revealed no issues with this model.

BoatUS® TECHNICAL EXCHANGE NOTICES

A search of the BoatUS® “Technical Exchange” database revealed no issues with this model

BoatUS® CONSUMER COMPLAINT DATABASE

A search of the BoatUS® “Consumer Protection” database revealed no issues with this model.

SEA CONNECTIONS

There were 5 below the waterline through hull fittings located on this vessel.

1. Generator intake. Metal lever activated ball valve, double clamped and free moving.

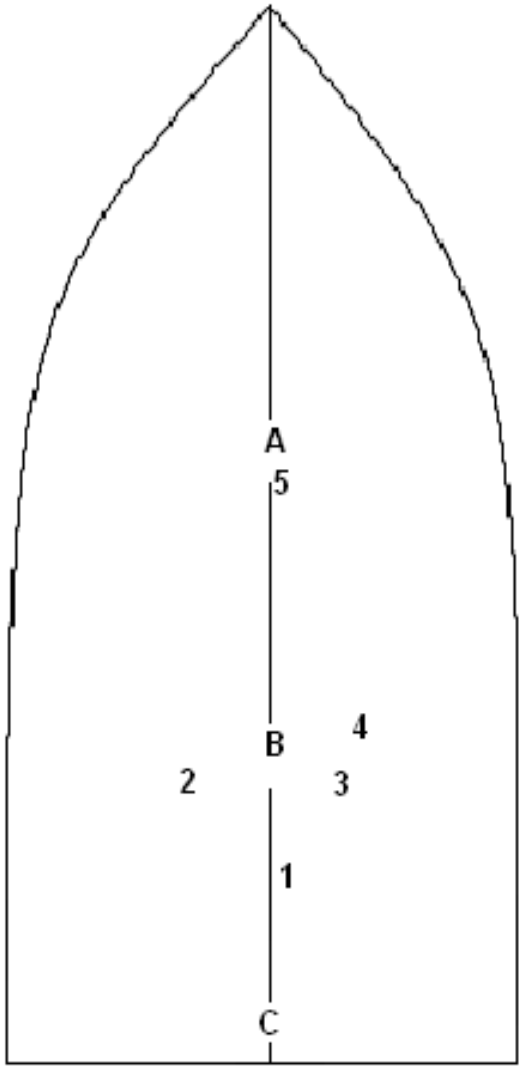
2. Engine intake. Metal lever activated ball valve, double clamped and free moving.

3. Engine intake. Metal lever activated ball valve, double clamped and free moving.

4. a/c intake. Metal lever activated ball valve, double clamped and free moving. The intake hose shows multiple fractures and the strainer is missing its basket screen.

5. Macerator discharge. Metal lever activated ball valve, double clamped and free moving.

See comment (32).



BILGE PUMPS

No manual and 3 electric bilge pumps were located.

A. 12VDC bilge pump powered up.

B. 2VDC bilge pump powered up.

C. 12VDC bilge pump powered up.

HIGH WATER BILGE ALARM

Yes, at bilge pump B

MANDATORY STANDARDS USED

Canada Shipping Act (CSA2001) and all regulations under the Act including “Small Vessel Regulations, "Construction Standards for Small Vessels" – TP1332E and "International Regulations for Preventing Collisions at Sea, 1972 with Canadian Modifications" are mandatory.

TP1332E is mandatory to the date of manufacture and states "existing pleasure craft shall comply with this standard insofar as it is reasonable and practicable to do so". TP1332E frequently refers to and is in the process of being harmonized with ABYC® Standards.

American Boat and Yacht Council® TP1332E authorizes the use of E-10 Storage Batteries and E-11 AC & DC Electrical Systems as alternative approved standards and I have chosen this option.

US Code of Federal Regulations – For vessels to be USCG Documented or state registered, United States Code of Federal Regulations Title 33 and 46 requirements will be applied.

VOLUNTARY STANDARDS USED

American Boat and Yacht Council® – ABYC® "Standards and Technical Information Reports for Small Craft" are generally voluntary (E-10 & E-11 excepted) and accepted throughout the marine pleasure craft industry as “the” standard.

National Fire Protection Association - NFPA302 "Fire Protection Standard for Pleasure and Commercial Motor Craft" are generally a voluntary with some of its standards mandated by TP1332E.

US Code of Federal Regulations – For vessels to being exported to the United States of America, United States Code of Federal Regulations Title 33 and 46 requirements will be applied.

Note : The vessel is surveyed as found. Loose gear and accessories are neither inventoried nor inspected. Appropriate authorities should be consulted as to required safety gear to be carried for this size and type of vessel.

COMMENTS

Comments based on a specific authority are cited as such. Other comments are based on the opinion of the surveyor as being of "good marine practice". Standards used are the latest editions and may not have been in place when this vessel was built.

A : Issues in need of immediate attention.

10. Replace fractured hose.

21. Determine cause of excessively hot switches at helm and repair as required.

23. The client and the hired captain were advised that the one excessively hot battery is dangerous and should be disconnected. Given the fast rate of voltage drop, all batteries must be considered suspect. Replacement is advised however load testing by a qualified marine electrician may save one or more batteries.

Only one battery was protected by a fuse and that fuse has a melted mounting tang and a melted cover, the fuse holder should be replaced.

ABYC "Storage Batteries" Standard E-10 and TP1332E require in part that batteries be secured so as not to move more than one inch in any direction, be contained in boxes or trays resistant to electrolyte, that positive terminals be protected by dielectric material, prohibits wing nuts as a means of securing conductors 6AWG and larger and requires positive conductors be fused within 7" of the battery or 40" if the conductor is fully enclosed with the exception of the conductor running to the engine starter motor.

32. Replace missing intake strainer basket and fractured intake hose at a/c pump.

B : Issues that may enhance safety and or value of vessel.

2. Repair separated and fractured tabbing under guest berth and seal external gelcoat fractures.

3. Strip anti-fouling paint and re-coat.

4. Secure ballast.

5. Re-bed windlass foot switches and repair underside of bow platform.

7. Shaft mis-alignment may be due to position in slings and blocking. Port shaft should be closely monitored for vibration during sea trial. Loose retaining collar on port shaft to be secured. Missing retaining collar on starboard shaft. To be replaced. Both stuffing boxes to be closely monitored during sea trial and if there is movement, this becomes an "A" recommendation.

8. Clean engine bilges of all foul material and monitor for source.

9. The Canada Shipping Act prohibits the discharge of petroleum products. The addition of drip pans under the engines will help prevent such discharges through the bilge pumps.

14. Clean engine and generator filter bowls of water and bacterial growth. Fuel analysis of remaining fuel in tank is advised.

15. Repair broken windlass casing, Repair broken windlass control at helm. Replace anchor chain with galvanized chain appropriate to the windlass gypsy. Replace bail on anchor roller with one that fits anchor.

16. Re-position forward running light to an unobstructed position.

18. Repair chart plotter as required.

19. Resolve electrical issue that cause windlass to interfere with VHF radio operation.

20. Transport Canada “Constructions Standards For Small Vessels”, TP1332E requires AC and DC distribution systems not share the same panel board and if both systems share a common enclosure must have a means of clearly separating the two systems with a dielectric barrier. At least ensure that such separation is fitted.

22. Transport Canada TP1332E and ABYC “AC & DC Electrical Systems” require that a vapour proof battery disconnect switch be readily accessible. TP1332E defines readily accessible as “means capable of being reached for inspection, maintenance or usage under emergency conditions”. Most boat fires start in the wiring in the engine compartment. *In case of engine compartment fire, one of the first actions recommended is to turn off the battery switches and opening the engine compartment to do so will supply fresh oxygen to a fire. Therefore it is the surveyors’ opinion that these switches in the engine compartment are not readily accessible.*

24. Ensure continuity of less than one ohm between any anode and the metal to which it is secured.

25. Repair galvanic isolator as required.

27. Fill water tanks and inspect the leak stain on the starboard tank. Test pump for ability to hold pressure.

29. The Ontario Water Resources Act provides for fines up to $50,000 and vessel seizure for discharge of certain materials including fuel, oil, dangerous chemicals and sewage. The Environmental Act, Ontario Regulation 343 states “ Water outlets for the head and/or holding tank must have no physical connection to an overboard discharge valve.

Test vacuum toilet for ability to hold vacuum after water tanks are filled.

30. NFPA 302 “Fire Protection Standard for Pleasure and Commercial Motor Craft” requires the installation of a smoke detector.

31. Repair Safe-T-Alert fume/fire detector. Repair automatic fire extinguisher control panel.

ABYC "Fire fighting Equipment" Standard A-4 and NFPA 302 “Fire Protection Standard for Pleasure and Commercial Motor Craft” in part require that fire extinguishers and fixed fire fighting systems be inspected annually and carry tags indicating date of inspection.

C : Offered for information or suggested as maintenance or upgrades.

1. Seal holes in transom and re-bed nearby fasteners to inhibit water intrusion.

6. Test ice maker when water is available.

11. Monitor patched muffler at sea trial.

12. Monitor turbo chargers for overheating at sea trial.

13. Cold start test port engine.

17. Canadian Coast Guard "Collision Regulations" require a vessel of less than 20 meters or constructed of non-metallic materials to be equipped with a passive radar reflector if the vessel will operate in an area where radar navigation is in use, after sundown or in unfavourable environmental conditions.

26. TV antenna may not function due to a lack of a service contract. A satellite TV specialist should be consulted

28. Be aware that this water heater may be connected to engine heat exchanger for hot water underway. Water heaters can be expected to have a significantly shortened life due to corrosion if no air space is provided underneath such as this installation.

VALUATION

Valuation is primarily determined through www.soldboats.com but may also be derived from consultation with knowledgeable boat brokers, personal experience, current listings and available pricing sources such as Boat For Sale Value Guide, Computer Boat Value Guide and N.A.D.A. Marine Appraisal Guide or the BUC Value Guide. Boat values vary considerably due to local market demands and significant premiums may be paid for fresh water vessels in exceptional condition. Currency conversion is done on date of survey using www.xe.com Universal Currency Converter. Valuation does not include taxes.

www.yachtworld.com Currently lists four such models for sale in North America asking from $156,613 to $202,489

www.soldboats.com Listed below are the sales data for all such models sold through yachtworld.com in North America since January 2010.

Length	Boats	Year	Listed Can$	Sold Can$	Location	YachtWorld Mem
41'	Silverton 41...	2003	219,900 (02/10)	160,000 (09/11)	ON, Can	Bronte Shore...
41'	Silverton 41...	2003	210,821 (06/12)	195,107 (08/12)	RI, USA	Symbol Yacht...
41'	Silverton 41...	2003	174,014 (06/09)	158,194 (07/12)	FL, USA	Internationa...
41'	Silverton 41...	2003	168,635 (11/09)	158,194 (04/12)	NC, USA	Intracoastal...
41'	Silverton 41...	2003	167,686 (04/11)	156,613 (06/12)	FL, USA	Savage Yacht...
41'	Silverton 41...	2003	157,140 (11/11)	134,993 (02/13)	NJ, USA	Comstock Yac...
41'	Silverton 41...	2003	131,829 (10/12)	126,556 (04/13)	FL, USA	Knot 10 Yach...
41'	Silverton 41...	2003	184,455 (11/08)	174,014 (05/11)	NY, USA	Strong's Marine

"Current fair market value" is the price, in terms of currency or its equivalent that a willing seller will accept for property from a willing buyer, neither part being under undue pressure to act in the matter.
The assigned value assumes that components, systems or equipment not inspected during the survey are in serviceable condition commensurate with age.

This valuation opinion is intended for insurance and financing purposes only and is not intended to influence the purchase or purchase price of the subject vessel. The surveyor has no interest in the vessel financial or otherwise. It is the opinion of the surveyor that current fair market value of this vessel is … $[redacted]

Prepared without prejudice

Captain Wallace Gouk AMS®
Society of Accredited Marine Surveyors® seal #757
Transport Canada Appointed Tonnage Measurer
Transport Canada Licensed Master
ABYC® Certified Technician #10952
BoatUS® Approved Surveyor