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NAME OF VESSEL : **CLASSIC TEAK SLOOP**
REFERENCE : **XXXX**



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A. GENERAL NOTES

The following survey was carried out on [REDACTED] on behalf of:-



Scope

The survey was carried out as an insurance survey to establish the general condition of the vessel and its value. It contains fewer details and information than a full survey and should not be relied on by a prospective purchaser. References to condition are in relation to the vessel's age (i.e. good condition does not necessarily mean new).

Recommendations are restricted to:

- (A) items which should be addressed before the vessel is used and/or which may affect insurability and;
- (B) items which should be addressed in the near future order to prevent future problems.

Recommendations are printed in red italics for quick reference within the body of report and are also listed in the summary. They do not cover cosmetic or minor defects although suggestions to address these may be included.

Limitations

Parts of the vessel that were covered, unexposed or inaccessible due to fixed panels, linings etc. were not examined, so I cannot say these areas are free from defects. No fittings or fastenings were removed for examination. The mast was stepped so could only be inspected from deck level. It was not possible to set or spread out the sails.

Note in a survey of this nature it is not possible to detect latent or hidden defects without destructive testing.

The survey is for the client above. No liability is extended to anyone else.

Conditions

The vessel was examined at Hayling Island Yacht Company. The weather was fair. She was seen afloat where the engine was tested, then hauled out and further inspected on the hard standing.

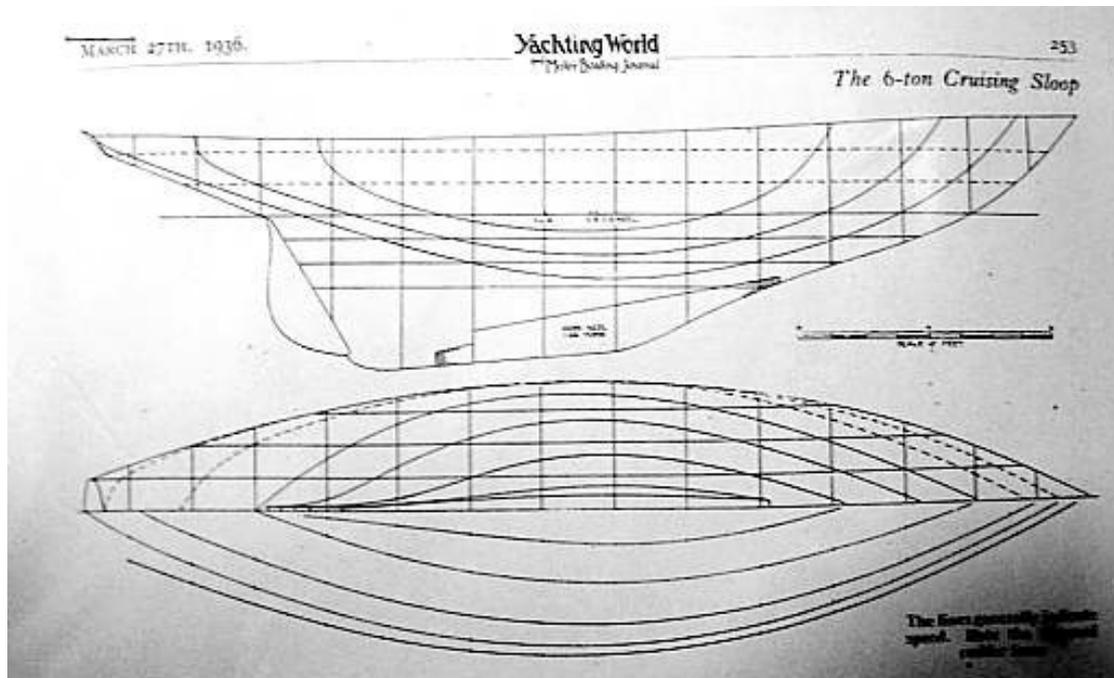
B. SUMMARY AND RECOMMENDATIONS

Summary

██████████ was built in 1936. She was registered under Part 1 of the British Ship Registration from new. She passed through several owners and sailed widely around the English Channel and Mediterranean. She was bought by her present owner six years ago after she was found laid up ashore in a dilapidated condition at Emsworth in Chichester Harbour. He carried out a complete restoration of the interior, topsides and rig, and installed a new Yanmar GM10. All of the cabin structures are new and to a high standard. The deck has been ply sheathed and epoxy coated, several planks below the waterline have been replaced and areas of broken frames either replaced or sistered. The rudder is new. Her structural and visual condition is such that it is clear she has been conscientiously restored to an impressive standard. She was re-launched in September 2007.

██████████ is in sound structural condition, having been extensively repaired and refitted over the last five years. Her original construction was to a high standard and the recent professional restoration work has been equally thorough. Her engine, sails and equipment are all new and good quality.

Most of the hull structure is original and, whilst there is no sign of significant deterioration or movement in the structure at present, it would be prudent to draw and inspect the centerline fastenings over the next year, particularly if extensive offshore cruising is planned. There are some minor issues to address regarding the stern gear detailed in this report and I understand these have already been dealt with.



Recommendations

A. Defects which should be rectified before vessel is used and/or which may affect insurability.

1. *The stern shaft bearing is loose and needs to be refitted (A).*
2. *The propeller is not firm on the prop shaft and should be refitted with a suitable washer to take up play between the shaft thread and end of the taper (A).*

B. Defects which should be rectified in the near future order to prevent future problems.

1. *Access to the bilge should be improved by cutting removable sections into the cabin sole so that the area can be checked quickly when needed. (B).*
2. *The nut and washer on the third keel bolt from forward should be replaced within the next year. In the longer term all the keel bolts should be drawn for inspection (B).*
3. *Fastenings securing the frames to the horn timber should be inspected and replaced as necessary (B).*
4. *Hull coatings should be stripped from soft areas of the stem capping when the vessel is next ashore and the wood allowed to dry. Any soft patches should be removed and filled with thickened epoxy (B).*
5. *The nuts on the through bolts holding the inner shaft log need to be tightened (B).*
6. *The plated steel hose clip to the engine cooling water intake hose should be replaced with stainless steel clips (B).*
7. *The cooling water hose needs additional support at the exhaust injection bend to prevent it distorting (B).*

8. Valuation

In my opinion in her present condition as surveyed on 13 August 2008, I estimate the [REDACTED] to have a current market value in the region of **£30,000.**

This is based on a check of similar vessels on the market as of August 2008 which found the following:

YEAR	TYPE	LOD	PRICE	BROKER/SOURCE
1949	Luke 5 ton Bermudan sloop	25'	£23,750	Sandemans
1964	Buchanan sloop	32'	£37,850	Sandemans
1965	Laurent Giles Wanderer	30'	£29,000	Wooden ships
1965	Buchanan sloop	32'	£32,500	Wooden ships
1961	Fred Parker Sloop	30'	£29,000	MJ Lewis
1961	Robb Lion Twilight	35'	£40,000	Classic Boat (July)

Although older than the comparator vessels listed [REDACTED] has a teak hull in good condition. She was recently professionally restored to a high quality (she was exhibited at the 2006 Excel Boat Show) and with respect to her equipment and rig, she is effectively a new vessel. Her likely asking price would be higher.

This valuation relates only to the date and place referred to and assumes a willing buyer and seller and generally conducive market conditions. It excludes any dinghy or life-raft which should be considered separately.



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15 August 2008

C. VESSEL DATA

Dimensions (as given, not checked)

LENGTH OVERALL	:	31' 7"	9.62 m
LENGTH WATER LINE	:	22' 1"	6.73 m
BEAM	:	7' 9"	2.36 m
DRAFT	:	4' 9"	1.45 m
DISPLACEMENT	:	6 tons	6100 kgs
BALLAST	:	not known	
REGISTRATION	:	Lloyds Register No. [REDACTED]	
YARD NUMBER	:	unknown	
MOULDING NUMBER	:	n/a	
FUEL CAPACITY	:	25lts	
WATER CAPACITY	:	20lts	
SAIL AREA	:	not stated	
ENGINE	:	Yanmar GM10, 9hp/ 6.7kw, new 2005.	

D. Hull, deck and structure

D1. Keel, centreline structure and floors

The vessel has her original cast iron ballast keel. The joint between this and the keel and deadwood was tested with a thin blade and found tight with no signs of movement. The joint is sealed with a flexible bedding compound which is firm and in good condition. The ballast keel is attached with five ¾" bolts which pass through the keel and grown floor timbers. The keel surface is in good condition and virtually free of surface rust.

Access to the centre line structure inside the boat is limited by the fixed teak cabin sole. Although there are inspection hatches, it is not possible to examine all the keel bolts or the mast step assembly. This may cause problems if it is necessary to inspect or carry out emergency repairs below the waterline in future. *It is recommended that access be improved by cutting a line of removable sections into the cabin sole so that the entire bilge area can be accessed quickly if needed. (B).*

Where access could be gained, the keel bolts were hammer sounded and the nuts tested for tightness. The fifth (aftermost) bolt was tight and in satisfactory condition. The fourth bolt was in reasonable condition. The nut on the third bolt is in poor condition. This appears to be a non marine grade stainless steel 'Nyloc' nut which has corroded as shown. A limited inspection of the second bolt (using a mirror) showed it to be good quality nut in reasonable condition but it was not possible to hammer test it or apply a spanner for the reasons mentioned in the above paragraph. No access could be gained to the first bolt.



It is recommended that the nut on the third keel bolt be replaced, bedding this down on a new metal plate washer, about 5 x 5 cm size (B).

Given the lack of any signs of movement within the keel and backbone structure at present, it is considered sufficient to carry out this work within the next year. However if extended offshore cruising is planned, it is recommended that all the keel bolts be removed for inspection and replacement as necessary.

The keelson is a substantial elm timber which was hammer sounded and spike tested where accessible. No signs of visible deterioration were found. It was not possible to access the mast step but it is understood this was replaced during the recent refit.

There are ten, grown elm floor timbers through which the keel bolts are fastened. These timbers were hammer sounded and spike tested and no signs of visible defect found.



There are signs of deterioration to the fastenings which secure the horn timber to the frames as shown. This structure was hammer tested and no signs of movement noted, or any weakness in the surrounding structure. *However given the signs of corrosion, it is recommended these fastenings be drawn for inspection and replaced as necessary within the next year (B).*



The stem is constructed of a substantial inner, elm, timber running from the keelson to the fore foot. The garboard and hood ends attach to this. The stem capping piece is made up of several shorter sections, through fastened to the inner stem. These timbers have become saturated and softened where they are butt jointed as shown. *Although sufficient strength remains at present, it is recommended that when the vessel is next hauled out, the coatings are stripped from this area and the wood allowed to thoroughly dry. Any remaining soft patches should be removed and filled with thickened epoxy (B).*

D2. Planking below the waterline

The carvel teak planking beneath the waterline was hammer and spike tested and no significant signs of visible deterioration found. The garboard seams are tight and the planks lie fair on both sides. The hull surface is smooth. There are relatively few butt joints given the length of the vessel and these are well spread. The coatings was removed in sample areas to check the stopping over the caulking and fastenings, particularly at the hood ends. This was found firm and secure where tested with no signs of raised caulking or blown fastenings.



The underwater area is anti-fouled. This is smooth, adhering well with no signs of flaking or excessive build up.

A leak was noted from behind the engine when the vessel was afloat. This appears to come from the lower edge of the inner shaft log (the rectangular wooden block which supports the stern tube for the offset propeller, shown upper right). This further supported by the fact that one of the two securing bolts for the outboard shaft bearing has sheared (see Section E2 - sterngear). The flow can be seen as two brown lines either side of the frame which emerges from the shaft log.

There were also signs of seepage from the heads of the bolts which hold the shaft log in place. These are paired galvanized bolts, set at an angle through the outer and inner shaft logs. The nuts are accessible and appear in good order. *It is recommended these be tightened or replaced (B).*

D3 Topsides above waterline including rubbing strake etc.

The sheer line is fair and shows no signs of distortion around the chain-plates.

The teak topside planking is fair and smooth. It was gently hammer sounded throughout and no signs of deterioration or movement noted. The seams are tight. The transom was hammer sounded and no signs of deterioration found. The enamel finish is in good condition apart from a few minor abrasions and areas near the water line where the seam compound has lifted.

A laminated teak rubbing rail was fitted during the refit. This is secure.

D4. Frames and timbers

The hull is framed with steamed oak timbers. Around half a dozen have been sistered with laminated frames at the turn of the bilge on the port side aft of midships where there is a line of fractures. A single fractured frame was noted forward on the port side but has sound timbers either side. The heels of the frames at the keelson were found to be hard where accessible.

D5. Bulkheads and Stringers.

The vessel has a single elm stringers at the turn of the bilge. This is secure and in good condition.

The bulkheads are new. They are made of pine tongue and groove, well fitted and secure. The (new) framing for this and the bunks and work surfaces is arranged to provide continuous additional structural support along the vessel's length.

D6. Deck (include beams)

The deck is believed to be yellow pine. This is overlaid with 6mm marine ply bedded in sikaflex and epoxy sheathed, the sheathing being carried over the sheer line and beneath the rubbing strake. The sheathing is coated with non slip paint which is adhering well. The work was carried out in the last two years. The coach roof has the same construction. The edges are well radiused and the epoxy sheathing carried over and covered by teak trim.

All horizontal surfaces were hammer sounded and no signs of any deterioration or give under load found.

The deck beams, half beams and carlines are oak and mostly varnished. Samples were hammer and spike tested and found to be sound and well secured. The beam shelf is painted and assumed to be oak or teak. Again there are no signs of visible defects or movement. Wrought iron hanging knees are bolted by way of the mast partners along with elm lodging knees. The iron knees are secure with no signs of corrosion.

There is a new oak bridge deck beam, some 75 mm by 100mm section, which provides significant additional strength.

The stem has a solid breast hook . This was hammer tested and found secure.

The deck has a varnished teak toe rail which is in good condition and secure.

D7. Coamings.

The coachroof sides and cockpit coaming are made of single, varnished teak boards. The wood is in good condition and shows no signs of movement. The varnish is beginning to deteriorate and should be touched up or overcoated.

D8. Cockpit:

The cockpit is self draining with a teak sole and side opening lockers port and starboard. , Access to the area under the stern counter is aft. The drains do not cross beneath the sole but are fitted with sea cocks. As the lockers and stern access have a threshold of some 100mm above the cockpit which is itself some 200mm above sea level, it would be advisable to close the drain sea cocks in open waters.

D9. Fastenings.

The planking is fastened with roved copper nails. There is no sign of movement in the stopping over the heads externally. Sample roves were hammer tested throughout the structure and no signs of loosening or powdering noted.

Throughout the vessel a complete lack of any significant movement is apparent and it would be reasonable to assume that there is no serious failure of the copper fastenings at this time. However there are signs of corrosion to the iron fastenings on the vessel's centerline structure and these should be checked and replaced where necessary to ensure adequate strength should the vessel be hard pressed.

E. Steering, Stern Gear, and Skin Fittings etc.

E1. Rudder and Steering.

The rudder is new, constructed of several layers of plywood which have been epoxy sheathed. This was lightly hammer sounded and found well constructed and in good condition. It has a curved galvanised strap which connects to a metal stock within a rudder tube. There are minor signs of corrosion to the strap and the lower bearings (see Section E3, cathodic protection), but sufficient structural strength remains at present.



The stock has an adjustable collar which bears on the top of the rudder tube beneath the counter. The tube is well braced and secure. An elm tiller is bolted to a bracket at the top of the stock and is in good condition.

E2. Stern Gear.



The vessel has a three blade solid propeller which has fixed outboard and floating inboard shaft bearings. The propeller was hammer tested and found to ring clear.

The outboard propeller shaft bearing is loose, one of its two bronze securing screws being broken off at the head and the other slack. This may explain the leak mentioned in section D2. *It is recommended that the bearing be refitted, with a suitable oil based mastic used to fill any gap between the shaft*

tube and shaft log (A). The existing broken fastening needs to be removed and the hole plugged and re-drilled so that the bearing can be reinstalled in the same position to allow the water scoops to align with the existing cutouts in the shaft log. If this is not possible, it may be possible to plug the existing holes and turn the bearing through about 5° on the shaft so that new pilot holes can be drilled without blocking the water scoops. The bearing should be well bedded in a suitable mastic and secured with bronze coach bolts, care being taken to avoid misaligning the shaft.

The propeller is loose on its shaft. On inspection it was found that the shaft nut was tightened to the limit of the threaded section at the end of the shaft leaving a 5 mm gap between the nut and the propeller boss. There is no sign that the angle of the shaft taper is mismatched, although it may be that the new propeller taper (fitted last year) was drilled to a slightly larger diameter than the original propeller, or that the original had a longer boss. *It is recommended that a washer or washers be fitted between the propeller and its securing nut to make good the gap. This should have an exterior diameter of 35 mm, interior diameter of 20 mm and be 5.5 mm thick (A).*

E3. Cathodic Protection.



There is no cathodic protection system and it is recommended that one be installed given signs of early pitting noticed on the propeller and the erosion of the bronze rudder strap as shown in the photos.

It is recommended that a button anode be fitted to one of the existing bolts that secure the upper rubber strap. It is further recommended that either a 1" shaft anode be fitted (this will need to be no more than 30 mm length in order to allow sufficient play and flow of water through the stern bearing) or that a through hull

anode be fitted on the vessel's port side and connected to the shaft via the engine, using bridging wires across the flexible shaft coupling.

Note anodes should be electrically connected to items they protect. For further information see: http://www.mgduff.co.uk/pdfs/Fitting_Instructions.pdf.

E4. Skin Fittings and other through hull apertures.

All skin fittings were closely examined in side and out, hammer tested and their hoses aggressively loaded. Valves were tested for smooth movement

There are two drains at the fore end of the cockpit which lead straight down to bronze skin fittings, both fitted with ball valve sea cocks. These are in good order (but see comment in section D8, cockpit).



The engine cooling water intake skin fitting and seacock are new and in good condition but show early signs of corrosion due to seepage from the hose attachment. *It is recommended that the existing plated steel hose clip, which appears corroded, be replaced with two stainless steel clips (B).*

A through hull nylon combined impellor and transducer is fitted forward on the starboard side. This is in good condition at present. However any kind of nonmetallic skin fitting beneath the waterline is a potential leak

hazard so should be checked regularly. It is also good practice to stow a tapered wooden bung alongside skin fittings. Some manufacturers further recommend that a fillet of epoxy paste be applied to the securing nut.

A through-hull nylon skin fitting on the port side forward is blanked off. This is sound but serves no purpose and should either be replaced with a capped bronze skin fitting (which would allow a sink drain to be fitted at some future point) or removed and made good with a plug and wooden backing block.

The sea toilet intake and outflow have bronze skin fittings forward on the starboard side. Both have ball-valve sea cocks. These were closely examined and hammer tested and no signs of visible defect found. The hoses are secured to the sea cocks with stainless steel clips and looped up to the deck head to avoid siphoning.

F. Deck structures and fittings.

F1. Main Companionway and other Accesses to Accommodation.

The main sliding companionway hatch is new and constructed of teak to a high standard. It moves smoothly and is secure. Louvered doors provide access to the cabin over the bridge deck. There are slots to mount wash boards inside the doors.

The fore hatch has been replaced in teak and is secure and in good condition.

F2. Ports Windows etc.

Four bronze opening portholes are fitted to the coachroof sides. All have been restored, are in good condition and have new glass.

F3. Pulpit, Stanchions, Pushpit, Lifelines and Jackstays.

Substantial handrails are fitted port and starboard to the coachroof. These are through bolted and secure. Jackstay eyebolts are fitted in the cockpit.

F4. Rigging Attachment Points.

The vessels chain-plates are paired and lead through the deck where they are through bolted together with the iron hanging knees to the frames. These were hammer tested and found secure. The shrouds are secured to horizontal galvanized plates bolted to the chain-plates. There is a galvanized stem fitting which supports both the forestays and the anchor rollers. This is very substantial and well secured.

There is a galvanized mainsheet horse which is secure.

Staysail sheet tracks are fitted port and starboard. These were hammer tested and found secure. There is no dedicated backstay tensioning arrangement such as Highfield levers. These are made off to the sheet tracks at present and it would be advisable to inspect this at the end of the season to ensure there has been no movement.

F5. Ground Tackle and Mooring Arrangements.

The vessel has an original galvanized manual anchor winch which is well secured to the foredeck. The barrel revolves freely and the pawls engage smoothly.

There is a 35lb Danforth bower anchor and fisherman pattern kedge. 40m of 5mm chain and a 100m 14mm rode is stored beneath the bunks in the fore cabin, fed through a teak spurling pipe from the foredeck. All the ground tackle is new and in good condition.

A substantial oak mooring post is fitted to the stern deck.

F6. Other Deck Gear and Fittings. All of adequate size and secure.

F7. Davits and Boarding Ladders. None.

G. Rig.

G1. Spars.

The mast is keel stepped and is a grown Sitka Spruce pole. It has been repaired by gluing splines into longitudinal splits. The work appears well done and the mast in good condition.

The boom is fir and in good condition. Both spars have been recently varnished.

G2. Standing Rigging.

The vessel standing rigging is 8 mm stainless steel wire, age uncertain. The shrouds are spliced and seized over hard eyes and secured to the chain-plates with bronze rigging screws of adequate size. The forestay has a swaged terminal and the backstay a compression fitting terminal. All were seen to be in good condition and secure. The shrouds were swigged and no undue movement noted. Note the mast was stepped so it was not possible to inspect the mast terminals or spreaders.

G3. Running Rigging.

Running rigging where seen is mostly braided polyester hemp line, new and in good condition.

G4. Sails and Covers etc.

The sails were seen but not inspected in their bags. It is understood they are new this year.

H Safety.

H1. Navigation Lights.

Masthead tri-colour, port and starboard running lights, stern light and forward steaming light all seen working. All comply with current regulations.

H2. Bilge Pumping Arrangements.

An electric bilge pump is controlled by a float switch and manually from the chart table. This was seen in working order. The discharge is well above the waterline on starboard side.

An original bronze 'Whale' barrel pump is fitted at the forward end of the cockpit. This discharges 2lt per stroke.

H3. Firefighting Equipment.

1 x 1 ½ kg dry powder PCF fire extinguisher seen in date and up to pressure. A fire blanket should be fitted once the proposed spirit stove is installed.

H4. Lifesaving and Emergency Equipment.

None seen on board on the day of survey but it is understood lifejackets, harnesses and flares are carried when the vessel is in commission.

I. Engine.

I1. Engine and Installation.

The engine is a Yanmar GM10, purchased new in 2005. It is direct seawater cooled. It is offset to port. It was rocked on its mounts and found to be firm. The beds are new, hardwood and of adequate length.



The engine was observed running in neutral and in gear before the vessel was hauled out. It started quickly on the first attempt, ticked over smoothly and the exhaust smoke was clean.

The engine starting panel is fitted over the chart table. Usual warning lights and buzzer are fitted and were seen working. Gearbox and engine oil were up to level and clean.

The engine has a single lever brass control to the port side of the cockpit. This is secure and operates smoothly.

The cooling water supply hose to the exhaust injection bend is kinked where it turns too tight a radius, as shown. This will worsen when the engine becomes hot. *It is recommended that the hose be given additional support either by securing it with a large cable tie to a screw eye in the bulkhead above or by fitting plastic reinforcing to the curve such as used on domestic washing machine outflows (B).*

The exhaust is flexible hosing which leads to a Vetus water lock and is then looped up under the counter before exiting at the transom. This is secure.

12. Fuel System.

There is a 25lt plastic fuel tank which is securely mounted and connected to the engine with fuel line to ISO 7840. The installation meets current Recreational Craft Directive standards.

J. Accommodation and on Board Systems.



J1. Accommodation General.

The accommodation joinery and upholstery is to a high standard. There are two berths amidships, a hanging space and sea toilet forward, and two further berths in the forepeak. Two symmetrical work surface areas are fitted either side of the main hatch. The entire structure is new.

J2. Gas Installation. None

J3. Fresh Water Tanks and Delivery. None fitted at present.

J4. Heads.

A restored original Baby Blake sea toilet is fitted. This is securely mounted and in good condition.



J5. Electrical Installation.

The electrical installation is new with all wiring led aft to a control panels over the chart table.

A terminal strip for the mast electrics (lights, radar, VHF) is on the forward side of the heads bulkhead. This is unprotected at present but the owner intends to fit a cover.

There are two 12v 70AH batteries secured beneath the chart table.

J6. Electronic and Navigation Equipment.

The vessel has a new radar, digital select calling VHF and GPS. Control panels are mounted over the chart table. All were powered up and seen in working order.

The magnetic card compass is an Autonautica, secured at the aft end of the cockpit when in use.

J7. Heating and refrigeration None fitted.

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15 August 2008