

Safe Storage of Boats Ashore



Guidance for Pleasure Craft Users



Harbours Division, Department of Infrastructure

Introduction

Vessels stored on dry land are out of their natural environment and are subjected to stresses and strains which differ considerably from those which act upon their hulls when they are in the water. The requirements for vessels of different hull shape, type, design and different construction materials vary greatly, but certain fundamental principles should be followed with all vessels out of the water however short the time of storage or repair is intended to be.

General

Incorrect support manifests itself in a variety of ways, the most obvious being a visible "hog" or "sag" in the vessel's keel or in a localised indentation at an area of excessive point-loading.

Many people damage boats during lift out without ever knowing as the symptoms of the strain may not show until long afterwards and may not easily relate to the lifting/storage event of months before. Examples of this could be immediate leaks at the time of re-launch caused by cracks in seams, joints and even the seals of fittings; or slow, persistent and difficult to trace leaks caused by fastenings in wooden hulls being strained.

Anyone who lays a boat up on dry land and finds cracks appearing at seams, or cabin doors and removable interior panels, or cupboard doors which jam shut or open, windows and deck fittings which "spring", wires which appear excessively tight or loose, flexible mountings which adopt an obvious bias in one direction, should carefully look at the type and amount of support the vessel has been given.

As a general rule boat trailers of any type do not provide enough support for long storage periods, particularly if it is intended to clamber about inside the boat for repair and maintenance work.

Very small vessels stored on trailers should not be subjected to the weight of a person on board without the additional support and jacking up of suspension units and it is not unknown for both the boat and trailer to be permanently damaged by this practice.

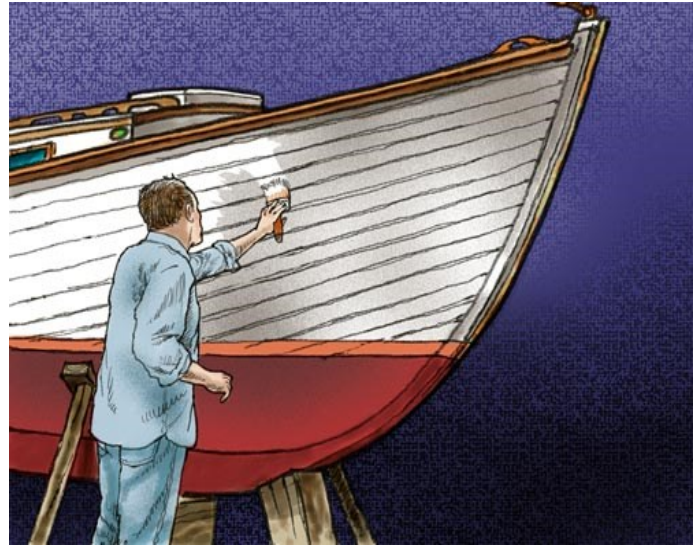


Do's

1. Follow builders guidance before lifting or supporting a boat out of water.
2. Remove all excess weight e.g. fresh water, bilge water, gas bottles, loose gear especially chains and anchors, sails, soars and masts (if possible).
3. Remove all masts if possible for stability reasons.
4. Check builders recommendations on engine and gearbox mounting, alignment of prop shafts, flexible shaft couplings etc. Long shafts on high powered vessels may require special care.
5. Obtain a properly designed support cradle and ensure it is mounted on firm level ground with adequate additional provision for stability of the cradle itself.
6. Allow extra supports if you are going to fit or remove heavy equipment, engines etc.
7. Provide extra bow and stern supports if maintenance staff are going to climb or work aboard, especially on short keel sailing boats.
8. Allow a slight "lead" in keel support to throw water towards drainage openings, if any, and ensure these drains are clear.
9. Link together any composite supports to reduce the risk of individual items being dislodged. e.g. wooden blocks should be fixed together.
10. Fix transverse cross-braces to cradle supports to prevent spreading of wings or uprights.
11. Fit longitudinal cross braces to prevent "tripping" of shaped support sections.
12. Fit angled side struts or braces to high boats or cradles which could be unstable as a composite unit.
13. Drive hardwood wedges hard home to make them difficult to dislodge maliciously or accidentally, and always use them in pairs driven against each other if space and access permits.
14. Provide continuous keel support if possible, or ensure supports never exceed 3ft spacing.
15. Allow sufficient fall towards drainage holes but limit this to a maximum of 1:150 to avoid any "slipway " effect.
16. Keep storage height to a minimum commensurate with the planned maintenance work to reduce the risk of damage in the event of a major accident.
17. Store masts and long spars level and well supported at intervals along their entire length.
18. Allow plenty of ventilation under any covers used, but lash them down well.
19. Check the security of your property regularly as early detection of problems will minimise damage and claims.
20. Check your insurance policy to ensure your particular risks are covered.

Don'ts

1. Lift vessels with unnecessary weight on board, e.g. fuel, water, chains etc.
2. Lift vessels with masts in place unless it is unavoidable.
3. Stack blocks so high as to make them unstable, i.e. height exceeding width.
4. Stack blocks too high without fixing them together.
5. Stack support blocks without bracing one stack to another.
6. Use empty oil drums or beer kegs—they cannot be properly wedged and may collapse suddenly.
7. Use concrete or brick supports unless they have a high compressive strength i.e. vibrated concrete or special engineering blocks.
8. Use concrete or brick supports without timber pads.
9. Use concrete or brick supports if they are so high as to require linking together.
10. Use nails to construct support trestles, only bolts or threaded steel bars should be used.
11. Don't forget — strong winds can capsize or dislodge a boat from its supports just as easily as contact from a vehicle or crane.



USEFUL CONTACTS

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Harbour Offices (all start 01624)

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Southern Harbour Offices: 823549

Peel Harbour Office: 842338

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