

S P E C I F I C A T I O N S.

Construction of racing sloop yacht, No. 437.

Length over all,..... about 125 feet.
Deck stringer plates to be.....
Length on water line,..... 85"

Extreme beam,..... 26' 2"

Draft of water,..... 12' 3"

Keel to be of Tobin Bronze Plate 1/2" thick having bronze angles at edge to receive garboards.

Stem and stern post to be of bronze.

Frame for the principal part of yacht, of steel angles 3" x 2-1/2" x 9/32". The lower part through the center body of yacht to be 3" x 2-1/2" x 3/8", and at ends 3" x 2" x 1/4" and 2" x 2" x 1/4". The frame angles to be strengthened by reverse angles to extend beyond the hollow of floor and those in wake of mast, and alternate ones amidships, to extend to the gunwale.

Frames to be spaced 20" center to center.

Deck beams, on alternate frames, of steel bulb angles, 5" x 2-3/4", and to be secured to frames by gusset plates.

There will be a system of diagonal straps on top of deck beams, riveted to them and to the mast partners and deck stringers plates.

Floor plates to be 5/16", 1/4" and 7/32" thick, alternate ones as high as hollow of floor.

Plating, below the water line, to be Tobin Bronze;

Garboard plates to be 1/4" thick, second strake to be 1/4" thick, third strake to be 1/4" thick, 7/32" aft and forward.

All above to be 1/4" thick, reduced to 7/32" aft, and 7/32" & 3/16" aft.

Strakes laid in and on the starboard side to be a room for sailing master, fitted with berth, lockers and desk.

lockers and desk.

SPECIFICATIONS

For

Construction of racing sloop yacht, No. 489.

Length over all,.....about 125 feet.

Length on water line,....." 85 "

Extreme beam,.....28' 2"

Draft of water,....." 12' 3"

Keel to be of Tobin Bronze Plate $1/2$ " thick having bronze angles at edges to receive garboards.

Stem and stern post to be of bronze.

Frame for the principal part of yacht, of steel angles 3 " x $2\frac{1}{2}$ " x $9/32$ ". The lower part through the center body of yacht to be 3 " x $2\frac{1}{2}$ " x $3/8$ ", and at ends 3 " x 2 " x $1/4$ " and 2 " x 2 " x $1/4$ ". The frame angles to be strengthened by reverse angles to extend beyond the hollow of floor and those in wake of mast, and alternate ones amidships, to extend to the gunwale.

Frames to be spaced 20" center to center.

Deck beams, on alternate frames, of steel bulb angles, 5 " x $2\frac{3}{4}$ ", and to be secured to frames by gusset plates.

There will be a system of diagonal straps on top of deck beams, riveted to them and to the mast partners and deck stringers plates.

Floor plates to be $5/16$ ", $1/4$ " and $7/32$ " thick, alternate ones as high as hollow of floor.

Plating, below the water line, to be of Tobin Bronze.

Garboard plates to be $1/4$ " thick, second strake to be $1/4$ " thick, third strake to be $1/4$ " thick, $7/32$ " aft and forward.

All above to be $1/4$ " thick, reduced to $7/32$ " forward, and $5/16$ " & $3/16$ " aft. Strakes and beams to be fitted and butts double riveted and deck to be riveted.

Plating above water line to be Steel. Centerboard, and caseing, to be of Tobin Bronze, and bronze castings.

Deck stringer plates to be steel, $7/32$ " x 23" amidships reduced to $3/16$ " x 15" forward and aft. To be secured to plating by $2-1/4$ " x $2-1/4$ " steel angles.

Deck to be laid in narrow strakes of clear, seasoned white pine $2-1/2$ " thick.

Around the deck will be a covering board of yellow pine and above this to be a water way, or rail timber, about 3" high, of yellow pine with an elm or oak capping, constructed in such a way that it can be removed and bulwarks and stanchions substituted some future time.

Above water way to be light steel stanchions for a life line.

All coamings, skylights and companionways to be of teak and there are to be light racing hatches to take the place of skylights and booby hatch.

There is to be a light steel bulkhead aft of the fore-peak. In the fore-peak to be a water closet for crews use with flush ventilator in deck.

Forecastle to be about 25 feet long and to contain 22 folding berths, and lockers for the crews use. Aft of fore-castle to be the galley, fitted complete ready for use, with galley stove, sink, pumps connected to tanks, racks for dishes etc., etc.

On port side of galley to be a room for two cooks.

Ice room to be under after part of galley.

Aft of galley, on port side, to be a pantry fitted with sink, pumps, refrigerator, racks for dishes etc. On the star-board side to be a room for sailing master, fitted with berth, lockers and desk.

Amidships, and next aft of galley, to be a water closet in small room, with flush ventilator in deck and also a closet.

Next aft of these rooms to be an open space about 21 feet long, to be used as a sail room and there will be fitted in the port forward corner, a room for the steward, and in the starboard forward corner, berths and lockers for two mates.

The after part of vessel to be fitted with one large state room with two berths, lockers, drawers, wash bowl etc. also a toilet room with water closet and wash stand with pump from tank. Also a short cabin with settee berths on each side.

The officers, and crews quarters, to be provided with mattresses, pillows, bedding etc, and the galley to be provided with stove, cooking utensils, dishes and cutlery for use of crew.

The rooms aft to be provided with mattresses, springs and cushions not covered.

Below the floor to be chain lockers, coal lockers, provision room, ice room, waste tank and copper water tank of about 1000 gallons.

Plumbing to be complete and will connect the water tank by three pumps to sinks and wash stands above named, filling pipes and emptying cock for waste tank. Drain pipe into waste tank from two sinks, wash stand, ice room and refrigerator. Pump and connection, with seacock, for emptying waste tank. Piping and seacocks for three water closets. Bilge pump with connections and seacock. Deck force pump with 100 feet of 3/4" hose and sea suction.

Deck fittings to consist of bowsprit supporting and extending gear, two chain stoppers and hawser pipes, ventilation port over fore peak, booby hatch and coamings over fore-castle, capstan, small flush ventilating hatch over after part of fore-castle, small flush ventilating hatch over forward part of

galley, galley pipe iron, mast partners with fife rail, lead blocks etc. Hatch coaming and skylight over after part of galley, small ventilating port over water closet, large hatch and coaming over sail room, hatch and skylight over cabin, ventilating port over water closet, companionway, small skylight over after ~~xxxx~~ state room, plain metal binnacle, steering wheel and gear, flush hatch to lazarette, between binnacle and steering wheel.

The sleeping rooms to be ventilated, and lighted, by passage way and where extra light is required, glass to be set in the deck. All necessary cleats, chocks, eyes etc., to be secured to deck where needed.

Capstan head, deck cleats and chocks to be of bronze, all steel and iron work to be of best make and galvanized.

Binnacle to have a liquid compass with 7" card.

Steering wheel to be of mahogany with bronze trimmings, 42 inches diameter. Steering gear to be "Edsons Oscillating" or "Reeds Diamond Screw".

Rudder stock to be of forged steel covered with bronze where exposed to sea water.

Yacht to have two boats, one of 14 feet and one of 18 feet long respectively, built of cedar, with all fittings and hung at suitable davits of forged steel.

Ground tackle to consist of two steel anchors of about 450 and 350 pounds respectively, two 3/4" B.B.B. chain cables of 60 fathoms each, one steel anchor of about 112 pounds, 75 fathoms 3-1/2" manilla cable, also to be a hawser or tow line of 75 fathoms 5-1/2" manilla cable, 2 mooring lines of 12 fathoms each 4" manilla.

Yacht to have all necessary spars, blocks standing and running rigging to properly handle the sails and to be rigged with the object of racing in the American waters under the rules of the New York Yacht Club.

Mast,

Main boom, gaff, topmast, bowsprit and spinnaker boom to be of best quality Oregon Pine. Topsail yard and club of the best quality spruce or Oregon pine.

Blocks to be of best make with steel straps and attachments, with sheaves generally of brass and mineraline bushes. Each block to be tested.

Standing rigging to be of best quality crucible steel rope and set up with steel turn buckles.

Running rigging of flexible crucible wire rope and best quality three strand manilla.

Mast head work, and metal work generally on spars, to be of forged steel and light as possible for the required strains

Sails to consist of mainsail, fore staysail, jibs No. 1 and 2, gaff topsails Nos 1 & 2, jib-topsails Nos 1, 2 & 3, baloon foresail, baloon jib-topsail, spinnaker, No 3 jib and trysail, and supplied with sail covers and bags and sail stops. All sails but four last ones named, to be ~~of~~ made from Sea Island Cotton specially spun and woven.

Baloon jib-topsail and spinnaker of imported linen twill, and No 3 jib and trysail of 22" best duck.

Yacht to be ballasted entirely with lead, and to be placed as low as possible.

The inside wood work to be simple paneling, and matched work, light as possible. To be of white pine, varnished in the forward part and painted in the after part.



