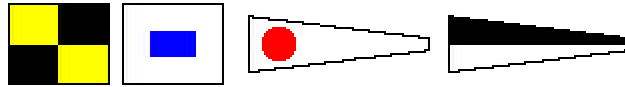


Chrysler LS-16 "Lone Star"



Original Spec Sheets

Thanks go to David Kain for scanning and sending these Lone Star 16 spec sheets.

- [Basic Boat Drawing](#)
- [Basic Boat Drawing # 2](#)
- [Hardware Equipment List for Basic Boat Drawings](#)

Thanks go to Michael Mason for scanning and sending the following Lone Star 16 specifications, circa 1968.

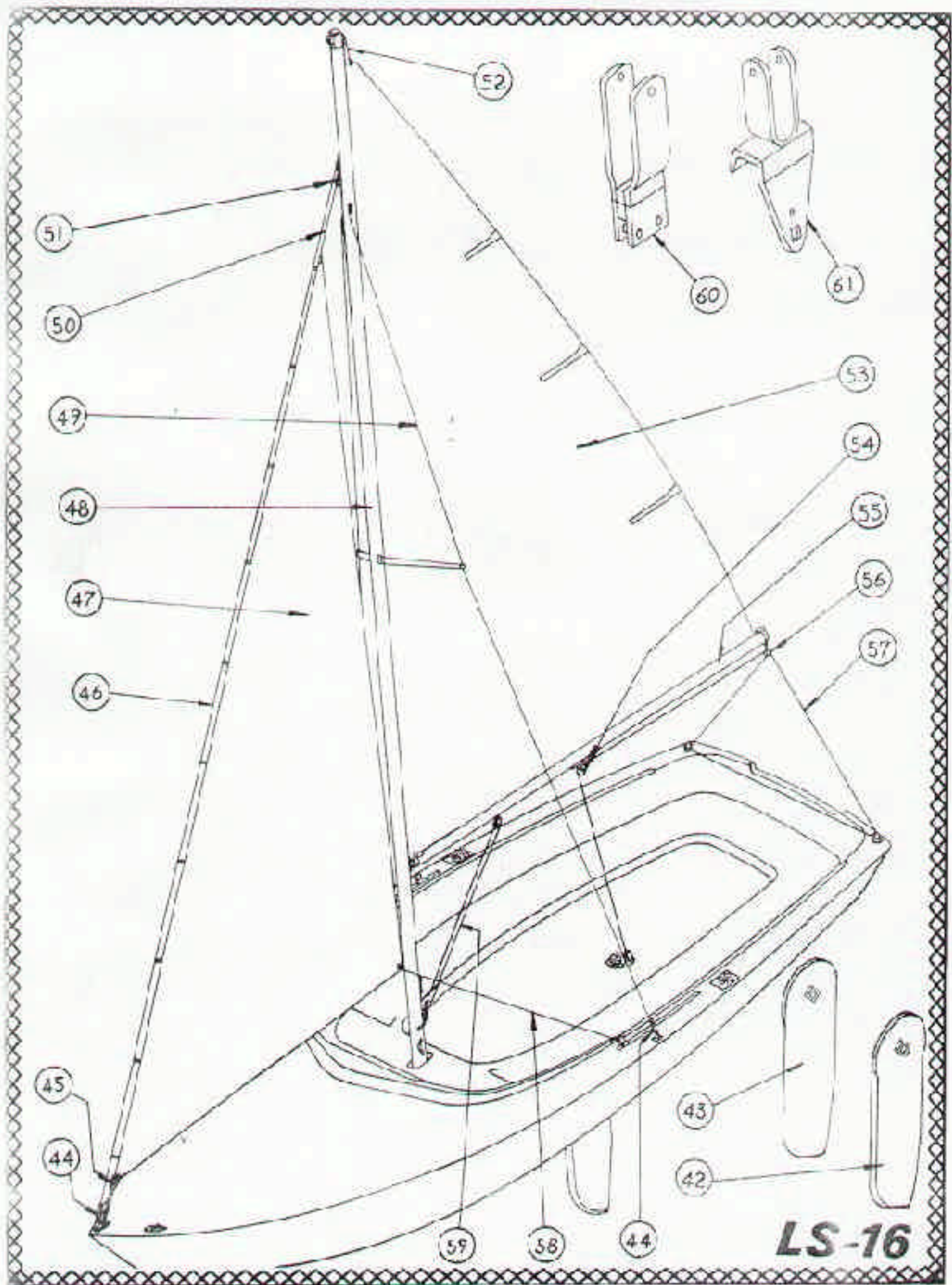
GENERAL: The sloop-rigged LS-16, carries 160' of sail with 164' spinnaker available at extra cost. The roomy cockpit seats 8 comfortably, no centerboard, adjustable bilgeboards, and big boat rigging. The versatile LS-16 with clubs forming nationwide in an exciting one-design racing boat and ideal for family day-sailing. *

SPECIFICATIONS: *

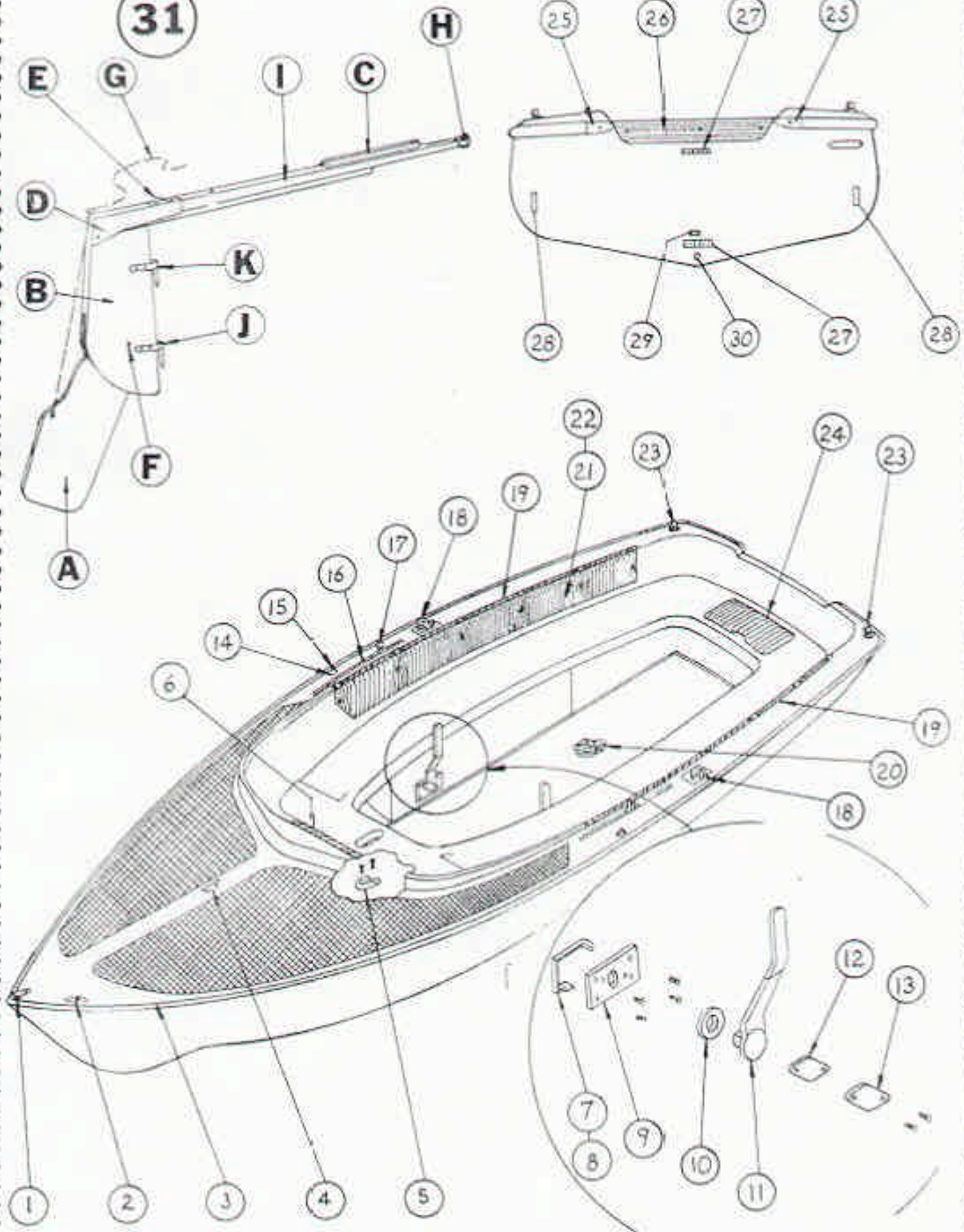
- Designer: Foul & Wittholz
- LOA: 16'
- LWL: Not Listed
- Beam: 6'1"
- Displacement: 450 lbs.
- Draft: 6' to 2'10"
- SA(sq.ft.): Main--110, Jib--50, Spinnaker--164
- Hull: Fiberglass
- Capacity: 900 lbs.

Source: [Sailboat Directory](#), 1968

If you have, or know of any other information about the Chrysler LS-16 "Lone Star", please send it to me via e-mail by clicking on the "e-mail" button in the left frame.



31



LS-16

REF. NO.	PART NO.	HARDWARE	QTY.
1	25009	Fitting Stem Head	1
2	25042	Chock Bow Skenes	1
3	419416	Vinyl Extr. Dia 419 x 416"	1
4	25043	Cleat Mooring	1
5	25044	Casting Mast Heel	1
6	811772	Lid. Assy. Fwd. Hatch	1
7	842464	Brikt. Lee Board Lock - St'bd.	1
8	842463	Brikt. Lee Board Lock - Port	1
9	841844	Plate Bedlog	2
10	821950	Gasket	2
11	811384	Lever Assy. Bd.	2
12	821991	Bushing Pressure Plate	2
13	841845	Plate Pressure	2
14	25013	Plate Chain	2
15	25006	Cover Chain Plate	2
16	830169	Track Sail	2
17	25041	Leader Adj. Jib Sheet	2
18	25028	Cleat With Fairlead	2
19	811847	Rope Assy. Grab	2
20	25026	Cleat Swivel Combination	1
21	811770	Back Rest Assy. - St'bd.	1
22	811771	Back Rest Assy. - Port	1
23	25000	Block Deck Swivel Base	2
24	811773	Lid Assy. Aft Hatch	1
25	23531	Casting Tran. P or S Mystic	2
26	842196	Mldg. Tran. Trim	1
27	25014	Gudgeon	2
28	23001	Casting Bow Eye	2
29	25008	Hold Down Rudder	1
30	23529	Ferrule Al. 1" O.D. x 1 1/8"	1
31	811900	Rudder Assembly	1
31A	842136	Rudder	1
31B	812548	Rudder Assembly Upper	1
31C	822794	Hiking Stick	1
31D	25156	Casting Tiller	1
31E	25054	Jam Cleat	1
31F	841665	Shim Rudder	1
31G	822479	Cord Rudder	1
31H	24958	Tip	1
31I	843600	Tiller	1
31J	25010	Pintle - Long	1
31K	25011	Pintle - Short	1
42	811774	Lee Board Assy. - Starboard	1
43	811775	Lee Board Assy. - Port	1
44	25032	Adjuster Shroud or Stay	1
45	25023	Shackle	1
46	811796	Jibstay Assy.	1
47	25051	Jib Sail	1
48	25047	Mast	1
49	811797	Shroud Assy.	2
50	812311	Halyard Assy.	1
51	25001	Block Shackel Swivel	1
52	811784	Halyard Assy. Main	1
53	25074	Main Sail	1
54	25041	Leader Adj. Jib Sheet	1
55	25057	Boom	1

REF. NO.	PART NO.	HARDWARE	QTY.
56	25002	Block Shackie	1
57	822775	Sheet Main	1
58	722774	Sheet Jib	1
59	811831	Boomvang Assy.	1
60	811325	Yoke Asst. Mast - Fwd.	1
61	811801	Yoke Assy. Mast - Aft.	1
	814580	Owners Manual Packet	
	801110	Dark Blue Repair Kit Exterior	
	51514	Dark Blue Gracoat Exterior	

LS-16

LS-16

RIGGING INSTRUCTIONS AND PARTS LIST



new boat.

Items to be found in boat:

- ✓ Mast)
- Spreaders (2) (hollow metal rods approx. 22") In carton
- long with pins in ends))
- ✓ Boom)
- ✓ Set of sails - 1 Main, 1 Jib) in bag
- ✓ Wooden battens - (4))
- ✓ Paddle
- ✓ Rudder assembly
- ✓ Plastic bag of hardware

Items in hardware bag:

- ✓ Jib downhaul pennant - (1) - 15' 1/8 dia. line
- ✓ Clew outhaul pennant - (1) - 30' 1/8 dia. line
- ✓ Boom downhaul pennant - (1) - 30' 5/16 dia. line
- ✓ Main sheet - (1) - 38 ft. 5/16 dia. line
- ✓ Jib sheet - (1) - 32 ft. 5/16 dia. line
- ✓ Jibstay assembly - (1) - stainless wire 17 ft. 5-3/4" eye to eye
- ✓ Shroud assembly - (2) - stainless wire 16 ft. 5-3/4" eye to eye
- ✓ Jib halyard assembly - (1) - 45 ft. 5/16" dia. line - spliced to shackle
- ✓ Main halyard assembly - (1) - 54 ft. 5/16" dia. line - spliced to shackle
- ✓ Boom vang assembly - (1) with shackle
- ✓ Trailer yoke assembly rear - (1) rubberized aluminum
- ✓ Trailer yoke assembly front - (1) rubberized aluminum
- ✓ Racing numbers
- ✓ LS-16 Class registration
- ✓ Warranty packet
- ✓ Sailing primer booklet
- ✓ Small bag of fittings

Items to be found in small bag:

- ✓ Shackle - (1)
- ✓ Clevis pin - (3) 25/64 dia. 1/2" long

14 x 20 nut - (2) for bow trawling yoke
 Shroud or stay adjuster - (3)

Study Drawing Figure #7 to become familiar with the location of the different parts of the boat before attempting to do any rigging. Read the instruction below completely before you begin assembly.

PREPARE THE MAST FOR STEPPING

- A. Secure wire shroud to the tangs (metal straps) on the sides of the mast using the clevis pins and cotter pins. (See Figure #1)

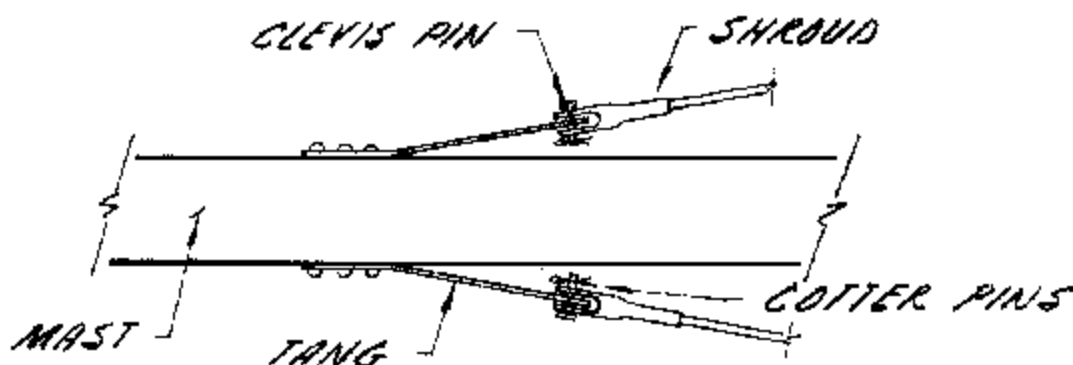


FIGURE #1

- B. Secure jib stay to the top tang of the two tangs located on the front of the mast, using the same method as was used for the shrouds.
- C. Attach the spreaders to the metal fittings on each side of the mast, using the pins in the above metal fittings.
- D. Secure shrouds in spreader slots with brass or copper wire and wrap with plastic or electrical tape. (Tape and wire not supplied.) The shrouds should be able to move up or down, but not out of the slot.
- E. Attach shroud or stay adjusters to eye ends of cables. (See Figure #2) All three adjusters are identical so it does not

mast is put in place further adjustments may be made.
(Keeper rings may be used in place of cotter pins, for easier adjustments.)

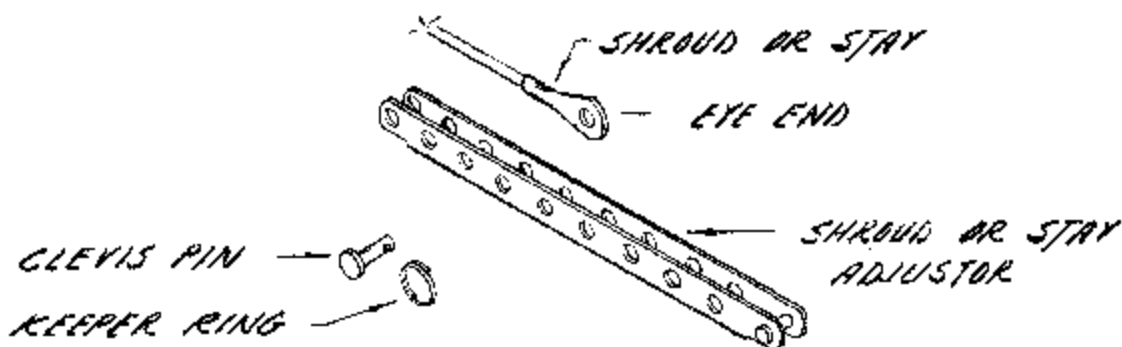


FIGURE #2

- F. Attach swivel shackle block (pulley with swivel shackle) to the tang just below the jib stay tang. Feed the jib halyard (45' - 5/16" line with attached shackle) through the block and secure both ends to the cleat on the port side of the mast near the bottom.
- G. Feed the main halyard (54 ft. 5/16" line with shackle) over the mast head pulleys making sure the shackle end is toward the grooved side of the mast. Secure both ends to the cleat on the starboard side of the mast.

STEPPING THE MAST

- A. Lay the butt of the mast near the oblong slot forward in the cockpit, laying the mast on the transom - GROOVE SIDE DOWN.
- B. Ease the butt of the mast into the oblong slot. Raise mast to vertical position and fit butt of mast onto metal casting on the floor. Mast groove should now face aft. (See Figure #3)
- C. Lean mast backward slightly until you are able to secure spring loaded pins in shroud adjusters through holes in chain plates (metal strap with hole in it that protrudes through edge of deck in each side).
- D. Pull jib stay taut and fasten to forward hole in stem head plate (plate at front of boat). Adjustments may have to be

LS-16

made by changing holes in the adjusters until correct tension of cables is acquired. Cables should be fairly tight but not so tight that there is no play in them at all.

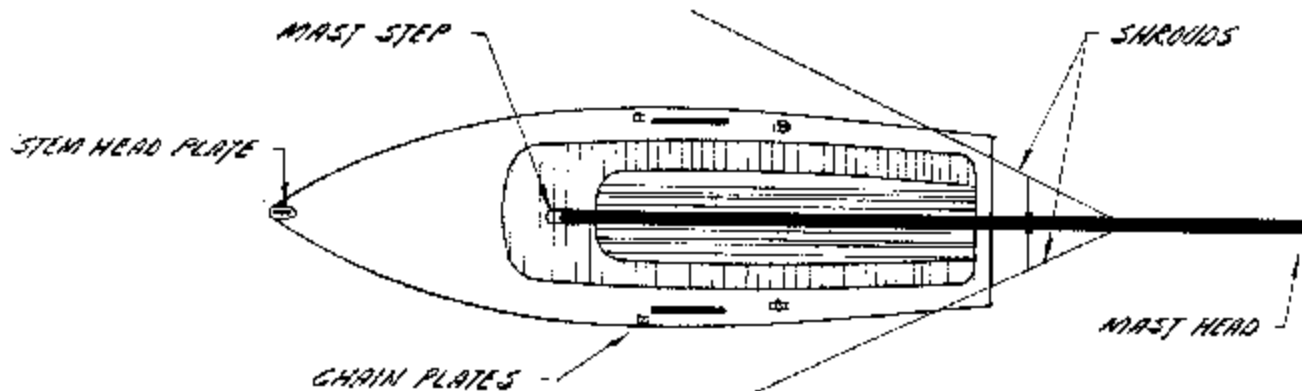


FIGURE #3

ATTACHING AND RIGGING BOOM (See Figure #4)

- A. Insert the gooseneck (forward end of boom) into the groove of the mast. GROOVE SIDE UP.

NOTE: (Pull out on the boom and you will note that the gooseneck is spring loaded for roller reefing. Roll the boom a couple of turns then leave the groove on the boom in the UP POSITION.)

- B. Tie the downhaul (5/16" x 30' braided line) to the ring on the bottom of the boom gooseneck.
- C. Secure the nonswiveling shackle block (pulley) to the tang (metal strap) at the rear end of the boom.
- D. Attach one of the fairlead block and cars (pulley on a car) to the track on the underside of the boom.
- E. Using main halyard to hold boom approximately level:
1. Make end of main sheet fast to pulley strap at outboard end of lower side of boom.
 2. Feed through starboard deck block, across to port deck block, and up to aft block on boom;

- 4 -

LS-16

through midship block on boom and down through floor block. Do not cleat at this time.

- F. To attach boom vang, insert ball on wire end into key slot on underside of boom. Attach shackle on opposite end of boom vang to metal loop strap on mast near the top of the seat.

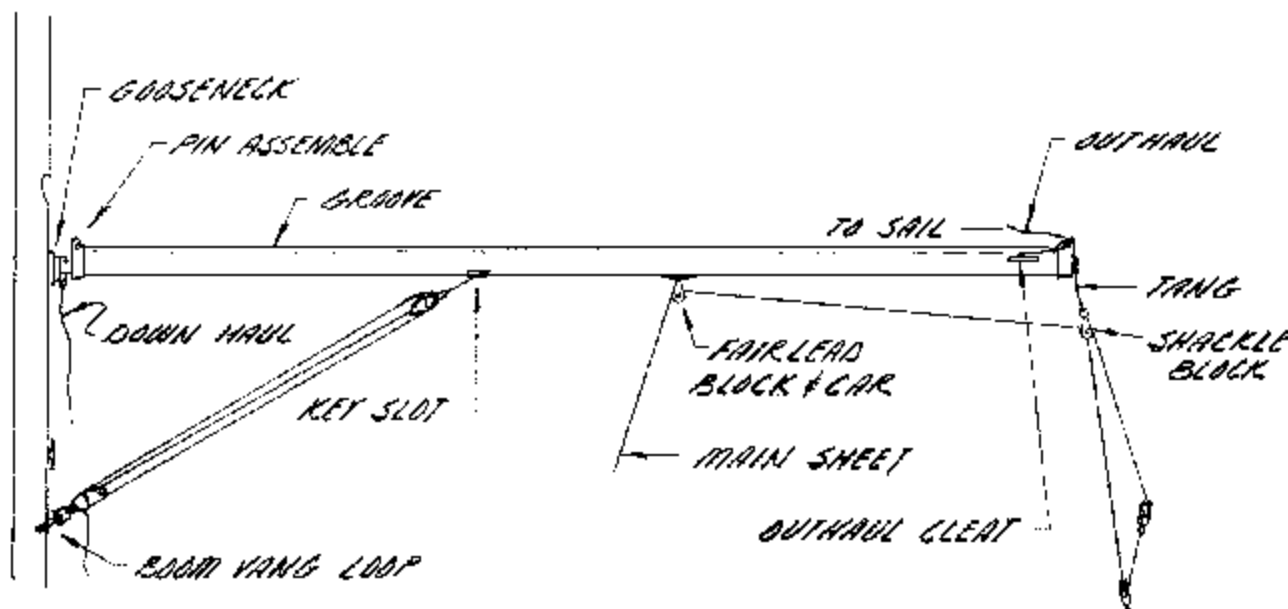


FIGURE #4

RAISING THE JIB

- A. Identify the front lower corner of the jib (the tack). Along with the cable that comes out at the tack, there are also two small lines. Bind these lines around the cable and through the loop. By the tension applied to these lines the shape of the sail can be adjusted.
- B. Using the jib downhaul pennant (15" 1/8 braided line), secure the cable eye at the jib tack to the fixed shackle. (This pennant is used so that you can raise or lower the sail in

. 3 .

- D. Attach the center of the jib sheet (32 ft. of 5/16" line) to the lower rear corner of the sail (clew). Run one end inside the shrouds, through the fairlead block and through the jam cleat into the cockpit. Repeat on other side. Tie a figure eight knot at each end to prevent the sheet from slipping through the cleat. Do not cleat jib sheet at this time.
- E. Attach sail to jib stay. Attach halyard to head of sail and raise sail.

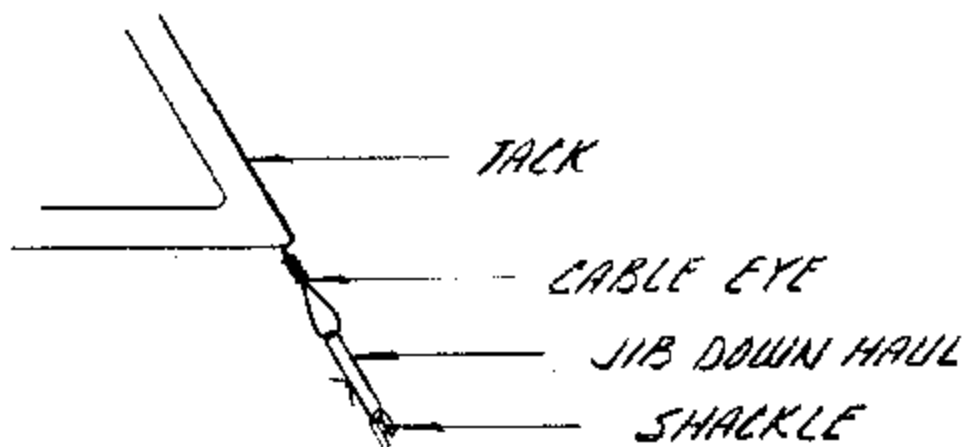


FIGURE #5

RAISING THE MAINSAIL

- A. Find clew (rear lower corner of sail). Slide bolt rope (foot of sail) into slot in top of boom.
- B. Secure front lower corner of sail (tack) to front end of boom with pin assembly on boom.
- C. Tie the outhaul pennant (15" of 1/8 line) through the grommet at the rear end of sail (Clew) and run through fitting at end of boom. Stretch foot on sail lightly and secure to cleat on side of boom.

LS-16

- D. Insert battens into pockets in sail (thin end first).
- E. Ascertain that the sail is not twisted. Connect the main halyard to the top of the sail (head), and feed the bolt rope into slot on mast as you raise the sail.
- F. Raise sail until it is to the full height of the mast then cleat the halyard on the starboard side of the mast. Pull the downhaul until desired tension is reached and secure to cleat on aft side of mast.

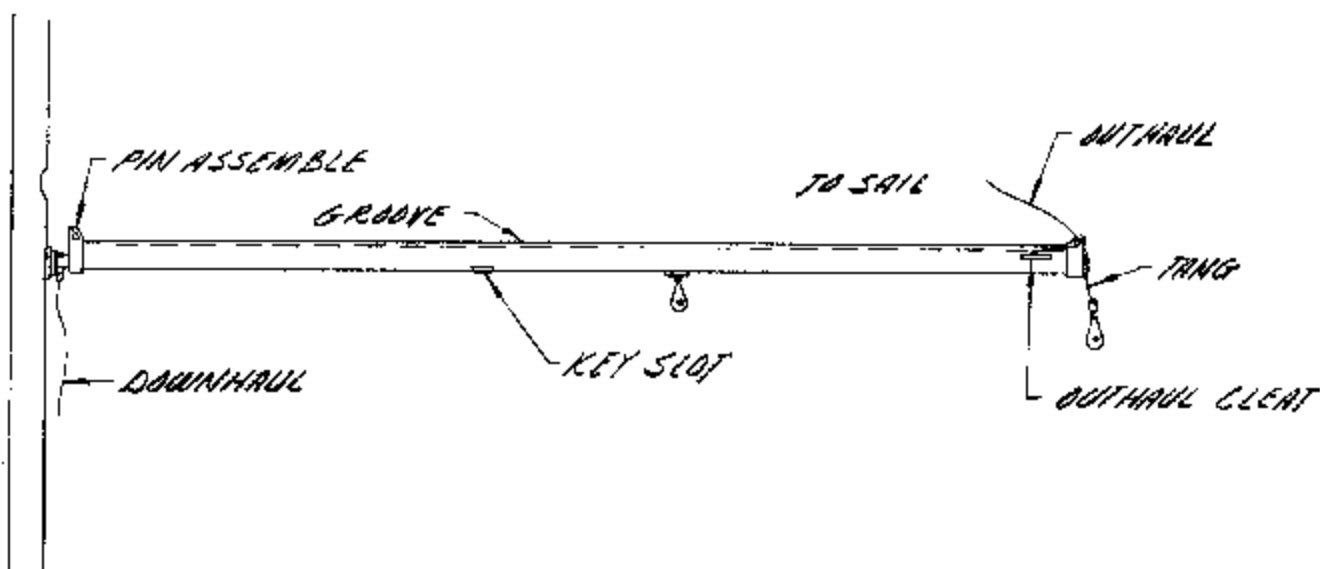


FIGURE #6

ATTACHING RACING NUMBERS

Your racing number is the last four digits of your serial number which is located on the stern of your boat on the starboard side. If the first of the last four digits is a zero, you use only the last three numbers. The numbers supplied have a treated back and go on easily. The numbers on the starboard side of the sail should be located higher than those on the port. For location see Figure #7.

LAUNCH BOAT

After the boat is in the water, put the rudder in place with the tiller above the main sheet across the transom and between the lines to the boom end. Lock rudder down with the swing clip on the transom. If water is shallow, the rudder blade may be raised and secured with the line and jam cleat on the tiller cap.

Check that the bilge board screw tension is sufficient to hold boards in any position. Leave boards down, or lower boards and rudder blade as soon as water is deep enough.

YOU ARE NOW READY TO SAIL

REEFING

Remove adjustable block and vang assembly from boom. Roll the sail onto the boom while lowering it. (The boom is spring loaded and must sharply pulled aft away from mast in order to rotate it.) If desired reef reaches batten pocket, remove batten. Keep sail smooth. Halyard should be tightened and cleated after reefing.

YOUR MAIN SHEET NOW LEADS FROM AFT END OF BOOM

GENERAL

The "Minimum" sailing primer should be studied very carefully if you are a beginner. Once the basic movements are mastered, there are many splendid books published on racing, tuning and enjoying your sailboat.

If you plan to trailer your boat, travel yokes are provided to support the mast. One fits over the stem head plate and is secured with two bolts and nuts supplied. The other fits over the transom and is secured to the upper grudgeon with a piece of line. Local or state regulations should be checked for proper lights, flags or other safety measures involved in mast overhang.

Your LS-16 is furnished with everything necessary for a sail-away package. The paddle doubles as a boom crotch and is installed by inserting it in the cutout in the upholstered lid of the aft storage compartment and locating notch in the keelson.

A suggested list of additional items for your sailing pleasure and safety would be:

1. Approved life jacket for each person aboard.
2. Suitable anchor and approx. 100 ft. of 1/4" nylon line.
3. A 2-1/2 gallon bucket.
4. A sponge or two (big thirsty type).
5. Adequate lights for night sailing -- including a good flashlight.
6. A small roll of brass safety wire.
7. A small tool to fit each nut or screw concerned with tension or rigging.
8. One or more extra cotter pins.
9. A roll of 1/8" braided line.
10. Your boat can accept up to a 9.9 h. p. outboard. We recommend an air cooled, lightweight, self-contained fuel tank, easily stowed Chrysler 3.5 h. p. This is adequate for those days when _____

HAPPY SAILING!

