

13:00 SABRE SPARS AND RIGGING TUNING AND ADJUSTMENT -
DOUBLE SPREADER RIGS (Cont'd)

the shackle and measure the distance from the weight to the aft edge of the mast at the gooseneck. This will give you the rake, expressed in inches.

NOTE: The amount of rake desired depends on how "balanced" the boat is under sail. Increasing rake increases weather helm (ie: the tendency of the boat to round-up into the wind). Decreasing rake decreases the amount of weather helm. In general, a full cut mainsail will require less rake, while a flatter mainsail may require slightly more to balance the helm.

13:04 INTERMEDIATE SHROUDS: The intermediate shrouds, terminating at the base of the upper spreaders, should next be adjusted to have approximately 75% of the tension of the upper shrouds. A first adjustment should be made with the boat sailing at approximately a 25 degree angle of heel. The mast should have a barely noticeable smooth curve to leeward without S-curves or excessive fall-off of the masthead at this angle of heel.

13:05 FORWARD AND AFT LOWER SHROUDS should next be adjusted to provide the following slight curves in the mast with the boat sailing at a 25 degree angle of the heel.

- a) A very slight sideways curve in the mast. This slight sideways curve is necessary as normal stretching of the shrouds under load will cause the masthead to fall off from 4" to 6", with about 1½" curve to leeward at the lower spreaders. The slight curve to leeward at the spreaders is necessary to provide a smooth curve from the mast step (up through the partners, S-34, 36, 38 only) to the spreaders and onto the top of the mast.

Lower shrouds that are too loose will result in an "S" curve in the mast from top to bottom. Lower shrouds that are too tight will result in a straight mast up to the spreaders, with a sharp fall-off to leeward above the spreaders.

- b) A slight forward curve or pre-bend in the mast of about 1" to 2" forward at the spreaders. If excessive "pumping" of the mast is noted in a seaway (fore and aft movement at the spreaders), then the forward lower shrouds should be adjusted to increase