

## CORSAIR 31R/F-31R AND CORSAIR 31/F-31 CLASS RULES

### 1. INTENT

1.1 The purpose of the Rules herein is to provide a basis for racing for restricted-design Class racing for Corsair 31R/F-31R and Corsair 31/F-31 sailboats and to provide a description of a Class-standard boat for reference in setting ratings when handicap racing in mixed fleets.

1.2 Except where variations are specifically permitted by these Rules, sailboats of this Class shall be alike as provided by Corsair Marine in hull, deck, beams, floats, daggerboard, rudder, mast, sail plan and equipment. Decks shall either be aft cockpit or center cockpit models. Masts shall be either carbon or aluminum.

### 2. ADMINISTRATION

2.1 **Authority** – The rules of the International Sailing Federation (I.S.A.F.) and U.S. SAILING shall apply except as modified by these Class Rules and by the Sailing Instructions.

2.2 **Builders** – A sailboat designated as a Corsair 31R/F-31R or Corsair 31/F-31 shall be built by Corsair Marine or other builders licensed by Corsair Marine and shall comply to the building specifications detailed by the copyright holder, and allow for only the modification herein.

2.3 **Owner's Responsibility** – It is the responsibility of the owner to ensure that the yacht complies at all times with the current class rules.

### 3. BOAT AND EQUIPMENT MODIFICATIONS

3.1 If information regarding modification cannot be found in these Rules, assume that no modification is allowed.

3.2 Under no circumstances shall modifications be allowed solely for the purpose of reducing weight.

3.3 Corsair Marine shall have the right to veto any modification to the Class Rules they believe are detrimental to the safety or marketability of the Corsair 31R/F-31R and Corsair 31/F-31. Boats modified in ways that are deemed unsafe by the Class Measurer or his designated representative shall not be scored in Class-sanctioned events.

3.4 Boats racing in the Corsair 31R/F-31R or Corsair 31/F-31 Class at CTOA

sanctioned events shall not display advertising on hulls, or sails, except for sailmaker and builder marks as allowed in U.S. SAILING Category A events. Event or Organizing Authority-required advertisement (i.e., bow stickers, pennants) is also allowed.

#### 4. **RIGHT TO PROTEST INFRINGEMENTS OF CLASS RULES**

4.1 Protests will be handled according to procedures outlined in Part 5 of The Racing Rules of Sailing published by the I.S.A.F.

#### 5. **EQUIPMENT RULES**

5.1 **Safety Equipment** – Participants shall comply with the safety requirements of the U.S. Coast Guard and other local authorities. It will be the participants' responsibility to have the appropriate safety gear for any given course or conditions.

5.2 **Standard Equipment** – Removal of standard interior and exterior items supplied with the boat is prohibited. Standard exterior items include bow pulpit and hatch boards. Standard interior items include 12 volt lead/acid battery, storage bin covers, companionway steps, aft cabin cushion, head, holding tank, water tank, galley sink, water pump, and stove. Removal of V-berth and settee cushions, stove elements, and cabin floor carpet is allowed.

5.3 **Hulls and Decks** – The hull and deck shall not be modified in shape, weight or construction, except as specified below. General maintenance (i.e., wet sanding, painting) and repairing are allowed. The following are also not permitted:

- a) Use of carbon fiber in repairs, except that carbon fiber may be used when repairing parts originally constructed of carbon fiber.
- b) Reshaping, filling in, drilling out or replacement of materials, grinding or relocating standard equipment to reduce weight, or to improve moments of inertia, or change standard shapes.
- c) Reshaping of the hull profiles or contours.

#### 5.4 **DAGGERBOARD AND RUDDER**

Neither the daggerboard nor rudder as supplied by Corsair Marine may be

altered in planform, cross section or material of construction except that fairing of the rudder and daggerboard is allowed, as is smoothing of the leading and trailing edges. The daggerboard and rudder shall not be modified in any way that would prevent retraction or kicking up.

## 5.5 TILLER AND EXTENSIONS

The tiller may be constructed or modified according to the owner's liking, providing that it does not prevent the rudder from kicking up. A tiller extension of the owner's choice may be used.

## 5.6 SPARS

Spars shall be made of aluminum or carbon fiber.

### 5.6.1 MAST

No alterations or modifications to the mast are permitted except to facilitate the attachment and use of running rigging as allowed in these Rules.

- a) On the 42'6" rotating mast, the distance from the center of the ball supporting the mast to the most forward part of the deck sheerline shall not be more than 133 inches, nor less than 130 inches.
- b) The mast section shall not be tapered, cut-out, or lightened, except to allow halyards to exit the mast above the mast base.
- c) The type of spreader, spreader length, or method of attachment may not be modified except as approved by the Class Measurer.
- d) The height of the mast extrusion shall not exceed 510 inches.
- e) The distance between the forestay attachment point on the mast and lower edge of the mast base-plate shall not exceed 357 inches.
- f) The distance between the bearing point of the screecher halyard on the mast and the lower edge of the mast base-plate shall not exceed 382 inches. As an exception when using a 2:1 purchase halyard, the bitter end of the halyard may be tied or spliced to an eyelet or other fitting located no more than 7 inches above the bearing point of the screecher halyard on the mast sheave. However, in the hoisted and tensioned position, the distance between the top of the screecher swivel and the lower edge of the mast base-plate shall not exceed 382 inches.

- g) The distance between the bearing point of the spinnaker halyard on the mast and the lower edge of the mast base-plate shall not exceed 412 inches.

#### 5.6.2 **BOWSPRIT**

Bowsprits may be made of aluminum or carbon fiber and shall not exceed 72 inches from the forward edge of the molded deck to the furthest forward tip of the spar. The distance from the screecher attachment point to the forward edge of the molded deck shall not exceed 54.4 inches. Bobstay may be stainless steel 1x19 strand wire or synthetic line of equal or greater strength.

- 5.6.3 **MAINBOOM** a) The boom may not be tapered, cut out to remove weight, or permanently bent. b) Location of the boom-to-mast connection shall not be altered.

#### 5.7 **STANDING RIGGING**

The mast standing rigging shall consist of one forestay, two shrouds, and diamond wires supported by spreaders as supplied by Corsair Marine. The standing rigging may be of stainless steel 1x19 strand wire or synthetic line of equal or greater strength.

- 5.8 **RUNNING RIGGING** Left to the owner's discretion.

#### 5.9 **SAILS**

- a) The 31 Class insignia shall be contained within a 27x36 inch rectangle in the top third of each side of the mainsail.
- b) Sail numbers shall be placed on the mainsail, and it is strongly recommended that numbers are also placed on the spinnaker in accordance with the prescriptions of the U.S.S.A. Numbers must consist of a contrasting color such that they are clearly legible. Sail numbers must be positioned starboard on top of port with a minimum of 3 inch separation. Sail numbers shall not be less than 11.8 inches (30 cm) in height, 7.9 inches (20 cm) in width (except the figure 1), 1.75 inches (4.5 cm) in thickness, and separated by at least 2.4 inches (6 cm).
- c) Sails may be made from any material.

- d) Tolerances are given in these rules only to permit minor building errors or distortion through age.

5.9.1 **MAINSAIL** (All measurements include boltrope or slugs)

- a) The HEAD shall be defined as the point of intersection of the line of the Luff, including the boltrope, and the highest point of the sail perpendicular to the Luff. The Head Width shall be measured from the HEAD and shall not exceed 38 inches.
- b) Maximum length of Luff is 487 inches measured as the distance between two points along a line parallel to the sail Luff from which lines drawn at 90 degrees intersect the highest point on the HEAD of the lowest point of the Foot, respectively.
- c) c) Maximum length of Foot is 171.6 inches (14.3 feet) measured as the two farthest points along the Foot.
- d) The cross width measurements shall be taken from the seven-eighths, three-quarter, and one-half points on the Leech, located when the HEAD is folded to the Clew for the half height point, and when the HEAD is folded to the half height point to determine the three-quarter point. The seven-eighths point is located by folding the Head to the three-quarter point. Girth is measured as the shortest distance from Leech points to Luff, and shall not exceed the following measurements (including boltrope): Maximum MGT (max 7/8 point girth): 72 inches (6.0 feet). Maximum MGU (max 3/4 point girth): 107 inches (8.92 feet). Maximum MGM (max 1/2 point girth): 144.6 inches (12.05 feet).
- e) At least one set of reef points shall be built into the mainsail.
- f) A cunningham hole or attachment point may be fitted in the Luff.
- g) A Leech line is permitted
- h) Spreader and anti-chafing patches are allowed.
- i) The mainsail shall be attached to the mast with a boltrope and/or slugs or cars.

- j) The mainsail may be loose-footed.
- k) The mainsail may be roller or stack furled, and may be roller or slab reefed.
- l) Battens are to be full length, and the number of battens is optional. However, only one leech batten shall extend above MGT (excluding any vertical batten at the HEAD, if used).

### 5.9.2 HEADSAIL

- a) The Head to Tack (Luff) length shall not be more than 411.6 inches (34.3 feet). For purposes of Headsail measurement, the Tack is defined as the point where the Luff and Foot, if extended, would intersect each other. The Head is defined as the point of intersection of the line of the Luff, including the boltrope, and the highest point of the sail perpendicular to the Luff. The Clew is the point where the Leech and Foot, if extended, would intersect each other.
- b) The diagonal (LP) shall not be more than 144 inches (12 feet). The LP is defined as the shortest distance from the Luff to the Clew.
- c) The mid-girth shall not exceed 90 inches (7.5 feet). The mid-girth is measured by folding the Head to the Clew to find the mid-leech. The distance from the mid-leech to the closest point on the Luff is the mid-girth.
- d) The number and length of battens is at the owner's discretion.
- e) The headsail may be roller furled.
- f) A Leech line is permitted.
- g) Spreader and anti-chafing patches are allowed.

### 5.9.3 SPINNAKER

- a) The spinnaker shall be three cornered, with the total length of the Luff, Leech, Foot and mid-girth combined not to exceed 145 feet. The mid-girth shall be measured from the one-half point on the Luff

to the one-half point on the Leech. These one-half points shall be found by folding the Head to the Tack for the one-half point on the Luff, and folding the Head to the Clew for the one-half point on Leech. The Foot is measured as the two farthest points along the Foot. The Luff is measured as the distance between two points along a line parallel to the sail Luff from which lines drawn at 90 degrees intersect the highest point on the Head or the lowest point on the Foot respectively.

- b) The maximum sail area for the spinnaker is 1005 sf, and larger spinnakers shall not be allowed unless grand fathered. The spinnaker sail area shall be measured as follows:

$(\text{Luff} + \text{Leech}) * (\text{Foot} + 4 * \text{Mid Girth}) / 12 = \text{SA}$  (measurements are entered in feet and fractions)

- c) Any spinnaker exceeding the maximum area and built prior to December 1, 2003 shall be grand fathered and handicapped at one second per each 1.67% increase in sail area over the maximum, rounded to the nearest second
- d) A maximum of two spinnakers may be carried on board while racing.
- e) This sail may be tacked to any of the three bows, to any point along an allowable bowsprit or to any point inside and/or aft of these points. This sail may be sheeted to any point within the dimensions of the boat.

#### 5.9.4 SCREECHER

- a) This sail shall be three-cornered.
- b) The Head to Tack (Luff) length shall not be more than 468 inches (39 feet). For purposes of Screecher measurement, the Tack is defined as the point where the Luff and Foot, if extended, would intersect each other. The Head is defined as the point of intersection of the line of the Luff, including the boltrope, and the highest point of the sail perpendicular to the Luff. The Clew is the point where the Leech and Foot, if extended, would intersect each other.

- c) The diagonal (LP) shall not be more than 282 inches (23.5 feet). The LP is defined as the shortest distance from the Luff to the Clew.
- d) One vertical batten may be used at the Foot of the sail.

#### 5.10 **DECK HARDWARE**

Deck hardware may be added, changed, modified or removed at the owner's discretion but the position or length of the jib car tracks may not be altered.

#### 5.11 **NUMBER OF CREW**

If not specified in the Notice of Race or the Sailing Instructions, the number of crew shall be left to the discretion of the skipper.

#### 5.12 **OUTBOARD MOTOR AND FUEL**

An operable outboard motor of at least 9.9 HP (manufacturer's rating) must be mounted on the transom at all times while racing, and a fuel tank containing a minimum of 1.5 gallons of fuel shall be on board at the start of the race.

### 6. **ELIGIBILITY**

- 6.1 **Steering** – The registered skipper as well as any of the crew are allowed to steer without violation of the rules.

#### 6.2 **WEIGHT CERTIFICATE**

In order to facilitate handicapping between the 31 and 31R, each boat must obtain a weight certificate signed by the class measurer or one of the current officers of the class. Scales to weigh the boat will be provided by Corsair Marine at national championship events. The official weight of the boat will include the dry hulls, rudder, centerboard, mast with standing and running rigging, boom with mainsail attached, bowsprit and bobstay, operating outboard motor (min 9.9 HP) and all standard equipment prohibited from removal as defined in section 5.2. All other gear including but not limited to v-birth and settee cushions, sails, lines, blocks, winch handles, tools, hardware, personal items, standard equipment which is allowed to be removed per section 5.2, and safety gear will be removed.



Water and holding tanks, and hulls will be emptied, fuel and propane tanks will be removed. Trailers will be made with parts and equipment supplied by the original or aftermarket manufacturer including standard size spare tire, bunk-boards, winch, etc. and shall include no weight adding modification or additions. Trailers may be weighed separately at the discretion of the measurer. Weight will be rounded to the nearest 50 lb. increment. Boats will be weighed dry on (ideally paved) level ground while on the trailer. The trailer will be unhitched from the tow vehicle and adjusted to a standard height of 18 inches from the bottom forward edge of the hitch ball coupler to the ground.