



PACK 216

Trussville, AL 35173 • Proudly Sponsored by Trussville Parks and Recreation • www.pack216.org

Pack 216 Raingutter Regatta 2023

The **spirit** of Pack 216's Raingutter Regatta is to keep the boat shapes simple so construction is not time consuming and so all families can build and decorate a fun and competitive boat in a short amount of time.

The **Raingutter Regatta event** consists of **4 basic principles**:

- 1) Build and decorate a functional model
- 2) Learn a little about boats and wind propulsion
- 3) Learn how to smoothly sail the boat
- 4) Have fun while doing the above!



Awards – Pack 216's Raingutter Regatta will have a racing class for each rank. Awards will be given for the top 3 places in each class, the Pack's top three scouts overall, a Pack-wide **best in show**, and a Pack-wide **most piratey boat**.

Race Conduct

- 1) Races will be conducted to determine the top three boats for each rank (Lion, Tiger, Wolf, Bear, Webelos I and Arrow of Light) and the top three boats for the Pack as a whole.
- 2) Racers may not touch the boat or the water during the race. Please secure any items that might fall or drag in the water prior to racing, i.e. neckerchiefs, slides, etc.
- 3) The boats will start behind a starting line marked on the sides of the gutter.
- 4) Once the race has started, the racer may not touch the boat. If the boat capsizes or becomes stuck, a race official may step up to correct it.

Rules

- 1) Use the **BSA Raingutter Regatta Trimaran Boat Kit** and build the boat in the shape shown on the box.
- 2) The **plastic** piece may not be reshaped, cut down, or otherwise modified. Points and corners may be sanded for cosmetics, but not for speed.
- 3) The **plastic** need not be centered fore-aft on the balsa wood hulls, but it should not extend past the wood.
- 4) You are free to shape the balsa wood **hulls** by sanding away material, but they may not be cut and glued.
- 5) The **sail** must be on the mast and generally vertical. It may not be attached to anything but the mast. The mast must be full length.
- 6) The **sail** may be trimmed and mildly shaped (for instance to reduce size or to clear the gutter edges), but it should be kept in a generally traditional shape on the mast.
- 7) **The sail should be Super Glued** to the mast to prevent it from shifting during races.
- 8) **The mast should be Super Glued** into the mounting hole on the plastic piece to prevent movement during races.
- 9) **Nothing** may stick out beyond the plastic/wood hulls above the waterline except the edges of the sail.
- 10) **Decorations** may be added above the water line (Keep in mind that a heavier sailboat is generally slower.).

~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~ ~/)~

Tips!

Shaping the Hulls

- 1) Be careful not to trim away too much wood. There is not much extra **buoyancy!**
- 2) The hulls are balsa wood, which is very soft and can easily be shaped using only sandpaper.
- 3) Kids often find it easier if the sandpaper is glued or taped down to a flat surface (floor, table, counter) so that they can use their hand(s) to move the hulls across the sandpaper.
- 4) Using rubber bands, or painters tape to hold the hulls together while shaping makes it easier to maintain symmetry.

Finishing

- 5) Use a **finish** (paint, sealer, varnish, polyurethane, lacquer, etc...) that is not water soluble on the wood hulls. This prevents the hulls from absorbing water (balsa is thirsty!) and improves buoyancy.
- 6) A quick and simple way to finish and decorate a boat is to seal the wooden hulls with a clear finish and then decorate (the wood, plastic, and sail) with permanent markers.
- 7) Decorations are wonderful additions. Just keep in mind that heavier boats are generally slower.