

## THE RYA PORTSMOUTH YARDSTICK SCHEME



### *60 Years of fairer racing*

In order for a club to use the scheme to its full potential and meet the main objective of giving fair racing between different classes of boats, a club will need to develop its own list of Portsmouth Numbers (PN's).

As a club starts using the scheme it may decide to rely on the national list as this has historically been seen as a list of long established numbers. However, the national list is based on a summation of recommendations from clubs nationwide. The list of national numbers may not be appropriate for every club individually. This is due to a number of factors including the type of boats sailed at each club, the predominant wind trends, tidal factors, size of water etc.

Because the national list will not suit every club, each individual club should develop its own list of handicap numbers from their race results. A club should do this by periodically carrying out an analysis of their race data. By doing this a club will be able to see if any of the classes/configurations of boat are over or under performing to the PN they are currently racing on and can adjust the number accordingly.

There are a number of ways a club may conduct a review of PN's. Examples include:

- The RYA analysis website ([www.pyonline.org.uk](http://www.pyonline.org.uk))
- The specimen race sheet and analyse each individual race
- Educated guess work

#### **pyonline.org.uk**

The RYA recommends that clubs use the race analysis website to carry out any number review as it will give the most consistent review of numbers and requires the least amount of effort/time/knowledge from the user. Along with a variety of other features that will benefit a club the PYOnline website will produce a dynamic club list of numbers and associated class reports. Using the website will also ensure that the club's race data is submitted to the RYA and the club will not need to do a separate annual return. For more information please visit the website ([www.pyonline.org.uk](http://www.pyonline.org.uk)) or contact [RYA Technical Department](#).

### **Specimen races**

The Specimen races take a club through the steps required to analyse each race. This allows a club to work through each race and get a feeling for which boats are performing to their handicaps and those that may need a local adjustment. However this method can be very time consuming.

### **Educated guess work**

If a club does not want to use the website or use a mathematical method to analyse race data they can very simply apply manual adjustments to obvious anomalies in their club list. For example if a specific class seem to win every race regardless as to who sails them the chance is the PN is too high and needs reducing. The club could then reduce the PN for said class in stages until it is brought in line with the other fleets. This can be done in reverse for classes underperforming to their number. This is the least accurate method of carrying out number adjustment and should be used cautiously but can be applied to obvious outliers in a club's results.

### **Applying adjustments**

Once a club has analysed all of its race results either in the PYOnline website or with another method, the club will be presented with a set of recommendations on classes that should be adjusted and those that shouldn't. Before applying any adjustment it is important for a club to identify which class is their "benchmark" class (a class that is well established at the club and has a fair representation in most if not all races and is considered the core fleet). By establishing this (having one number at a club fixed where possible), a club can avoid all of their numbers being adjusted in differing directions and potentially making their club list less reliable.

Once a club is sure that an adjustment needs to be made, the level of adjustment should also be considered. If a class is recommended to be moved by 50 in a certain direction, then by moving the full adjustment could mean that the number is subsequently adjusted in the reverse direction after the next batch of races, before it settles into its correct position. Remember, analysis of your race results will show trends rather than answers and you should adjust the numbers accordingly rather than by taking the recommendations as being perfect every time. A method of dealing with this would be to adjust by a percentage of the recommendation. If a new class or a class with a trial number is highlighted as needing adjustment the club may decide to adjust by 50% of the recommendation, where as a well-established club number may only be adjusted by 10% for example.

By using the PYOnline analysis website the reports will give you a confidence factor for all of the recommended adjustments. These should help a club identify the numbers that are in need of adjustment and by how much of the recommendation the adjustment should be applied. For example if a recommendation has a high confidence factor the club should consider moving the number in higher increments than a low confidence recommendation.