Footstop Dimensions

By: Mike Purcer

1. **Footstop Angle** – is the measurement, in degrees, between the horizontal plane of the boat and the plane of the soles of the shoes.

This angle is set typically between 37 and 45 degrees and reflects the athlete's ankle flexibility.

2. **Footstop Height** – is the distance from a point on the top of the seat measured vertically to the lowest point in the heel of the shoe.

This measurement typically between 14 cm and 19 cm reflects the shoe size and the athlete's shin length/torso height proportion.

3. Footstop Distance – is the distance from the pin line (centre line of oarlock pins) to the lowest part of the shoe heel cup measured parallel and horizontally to the boat.

This distance varies significantly with the length of the athlete's legs and their seat and oarhandle position at the finish of the stroke.

4. Shoe Splay – is the angle between the shoes and reflects the degree the feet are pointed apart on the footboards.

This angle should reflect the natural alignment of the feet when the athlete is standing and pushing to maximize the comfort and power transfer through legs.

5. **Heel Separation** – is the distance between the centreline of the shoes at the heels.

This distance along with the shoe splay angle provides a comfortable placement for the shoes in the boat.

6. Shoe Size – special shoes designed to connect to the footplate are measured in standard US Men's shoe sizes and key to connecting the athlete to the shell.

The proper shoe size is critical for comfort and a solid connection between the athlete and the boat.



FOOTSTOP DISTANCE

MEASURING

POINT

FOOTSTOP

HEIGHT



