



Core Stability for Sailing

What is it?

- The “core” is essentially the mid-section of the body.
- It comprises the deep and superficial muscles of the trunk, such as the abdominals, obliques, spinae erector, transverse abdominals & multifidis.
- These muscles work in concert with the hip flexors, gluteus maximus and gluteus medius of the hips and rhomboids in the upper back.
- Core stability refers to the relative strength and flexibility of these muscles. If these muscles are strong, supple and in balance, one will have good core stability.

Why is it important?

- A strong core is the basis for all human movement.
- If the core is strong and stable, all other movements are more efficient and more effective.
- Poor core stability means that power (therefore energy) is wasted. Instead of the force being applied by the arms or legs to the movement, it is absorbed by a weak, sloppy trunk.
- An example is hiking. If the core is strong, the body can be held rigid and less stress placed on the legs. If the core is unstable, the

body will sag at the hips and it will be difficult to maintain ideal hiking position. Extra stress is placed on the legs, which leads to extra fatigue.

- Similarly in the act of sheeting, if the core is strong, all the force that is developed is applied to the pulling action. If the core is weak there will be excess movement in the trunk and some of the power will be dissipated or absorbed.
- In addition, a strong stable core reduces the stress on particular muscle groups and joints.
- In the case of sailing, the back and the knees are affected. Poor core stability increases the likelihood of injury in these areas. Excess stress is placed on these areas if the trunk is weak.

How do I develop core stability?

- It is strongly advised to get a musculo-skeletal screening from a sports physiotherapist. This will help to determine any specific needs, including muscle imbalances and areas lacking flexibility.
- The easiest approach is to do a small number of exercises, with correct form as regularly as possible (everyday for 15 minutes would be ideal).

Belly to Spine

- This involves drawing the navel down towards the spine. This is done with a normal breathing pattern.
- This activates the transverse abdominals which are crucial for controlling the trunk.

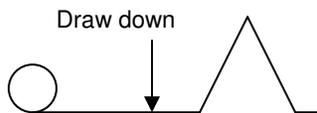
- Utilising this movement when doing core exercises is an important step to developing good core stability.

Core Stability Exercises

- The number of core stability exercises is unlimited. The following are just a sample of some of the exercises you may be able to utilise.
- It is absolutely crucial to maintain perfect technique throughout each exercise.

1. Lying Core Stabiliser (10sec/rep)

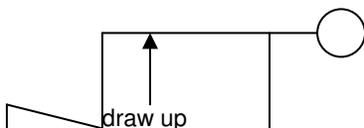
- Lie flat on back, legs bent. Draw belly button to spine and hold for 5 seconds. Breath naturally throughout each repetition.



- **Advanced version:** Lift one leg off the ground and hold position.

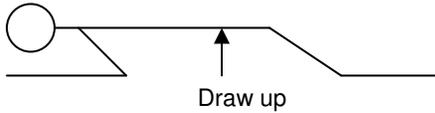
2. Kneeling Core Stabiliser (10-20sec/rep)

- Get on hands and knees, keeping head neutral. Draw belly button to spine.

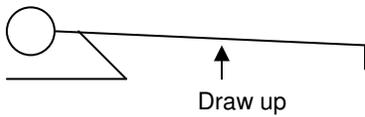


3. Abdominal Lift (10-30sec/rep)

- Similar to above, however get on your elbows and get lower to the ground.

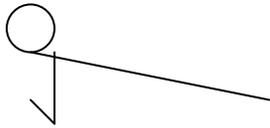


- **Advanced Version:** Perform the exercise on elbows and toes.

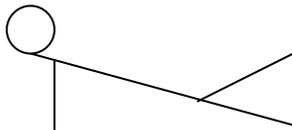


4. Side Hold (10-30sec/rep)

- Lie on your side, resting weight on one elbow. Lift hip up off the ground and hold body in a straight line.

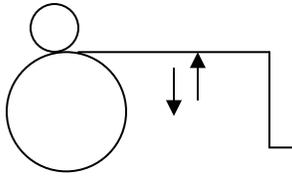


- **Advanced Version:** Perform exercise on one hand, not on the elbow & lift one leg up.



5. Bridging (20-60sec)

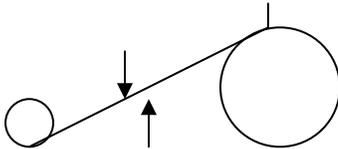
- Place shoulders on the swiss ball, with body straight and feet on the ground. Squeeze glutes and draw belly to spine to hold position.



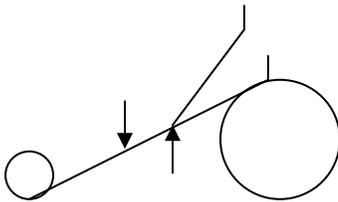
Advanced Version: Try to perform the same exercise, but lift one leg off the ground

6. Reverse Bridge (20-60sec)

- Place shoulders on the ground, with body straight and feet on the ball. Squeeze glutes and draw belly to spine to hold position.

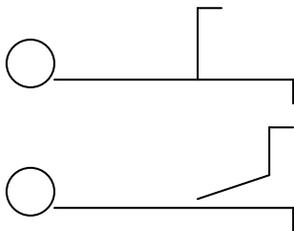


Advanced Version: Try to perform the same exercise, but lift one leg off the ball.



7. Glute Lift (15-30reps)

- Lie on ground on stomach. Bend one leg at right angles. Squeeze glutes and lift bent leg off the ground



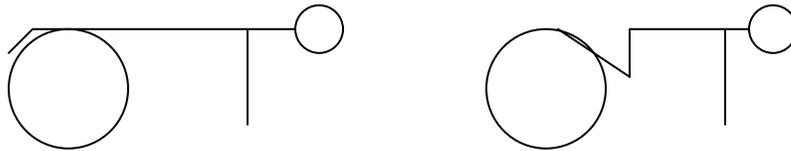
8. Glute Raise (15-30reps)

- Lie on ground on back, with one leg bent and one leg straight. Lift hips off the ground.



9. Swiss Ball Hamstring (10-20reps)

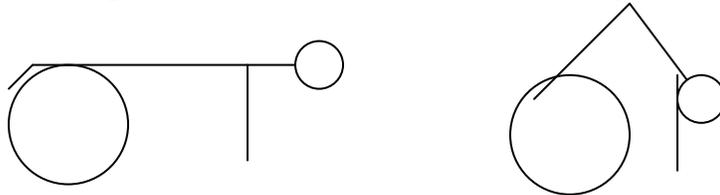
- Place feet on the ball and hands on the ground. Curl the ball back underneath the body. Keep trunk as still as possible.



Advanced Version: Try to perform on one leg.

10. Ball Pike (8-15reps)

- Set up exactly the same as the hamstring exercise. Keep the legs straight and draw ball up to the body.



11. Hip Abduction (20-40reps)

- Lie on side, one leg on top of the other and body straight. Lift the top leg up to 45 degrees. Keep the feet apart at the bottom of the movement.

