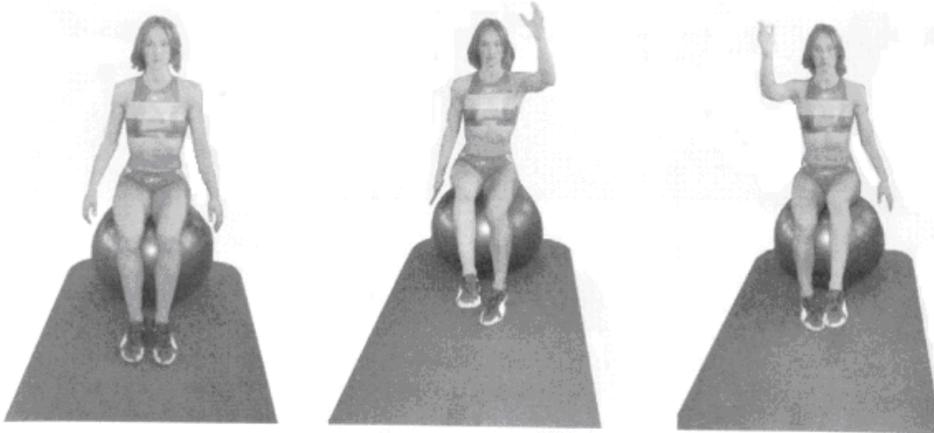


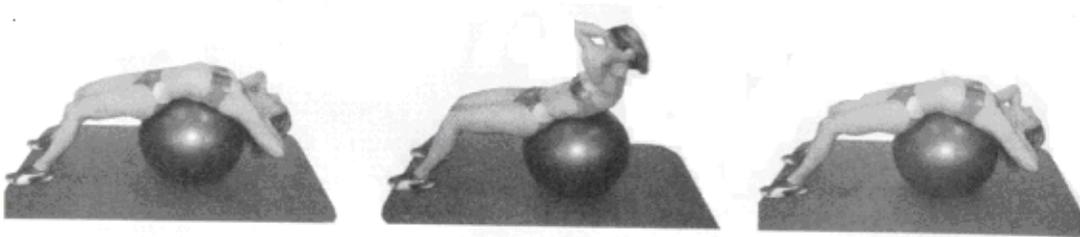
Core Stability Level 2

1.) Seated Marching on a Physioball

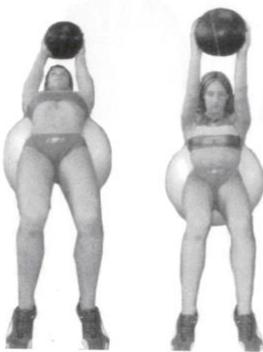


- Begin by sitting upright on a physioball, with the lumbar spine in a neutral position.
- Place the feet hip-width apart. While bracing the abdominal muscles, Lift one leg and foot off the ground.
- Then focus on controlling the weight shifting to the weight bearing limb while maintaining lumbopelvic stability.
- Progression: once lumbo-pelvic stability can be maintained with alternate left lifts, you can add opposite arm lifts.

2.) Spinal Flexion on a Fit-Ball

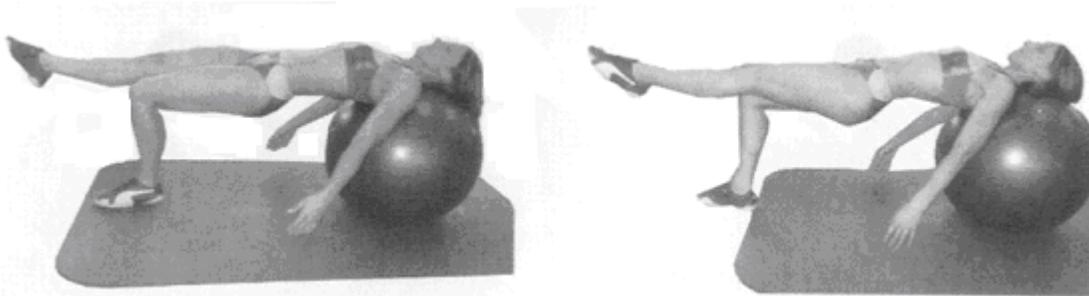


- The athlete preactivates her abdominal brace in the starting position and maintains this as she rolls back into spinal extension.
- Slowly raise the body, focusing the rotation in the thoracic spine. Picture the head and neck as a rigid block on the thoracic spine to prevent flexing the cervical spine.
- Concentrate on attempting to touch the bottom of your ribs to anterior superior iliac spine.
- The hands can be placed over the ears to eliminate pulling on the neck.



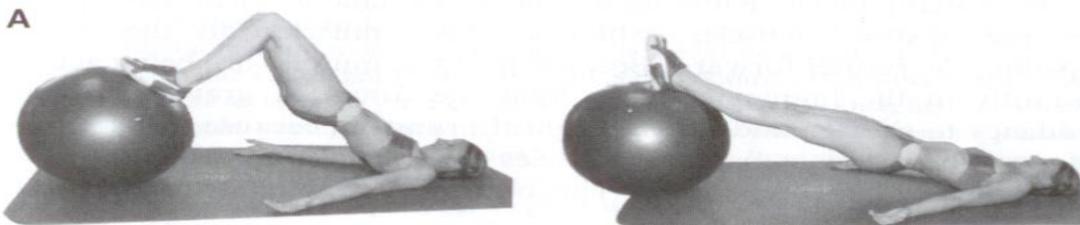
Progression: a 5-10 pound medicine ball is held in front of the chest with the arms extended. By reaching up and diagonally, the oblique muscles can be emphasized.

3.) Alternate Leg Bridge with Shoulders on Ball



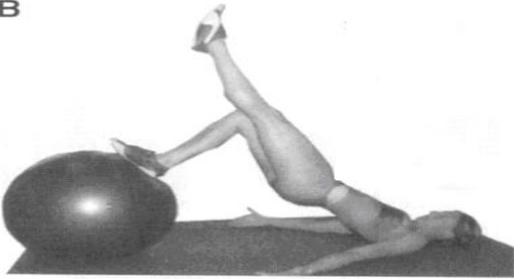
- Start this exercise by sitting on the physioball and walking forward with your feet on the ground, slowly leaning back until back rests on the ball. This is called the bridge position.
- The head, neck and shoulder blades should be supported on the ball. Knees should be bent at 90 degree angle, with feet on the ground.
- While bracing the abdominal muscles, the raise the foot and extends the leg off the ground. The weight is to be shifted to one side, and should focus on maintaining stability of the lumbo-pelvic region. You should strive for stability and balance, while holding this position for 10 seconds and alternating lower limbs. Progression: lift the arms up in the air or out to the sides.

4.) Leg curls on the Physioball



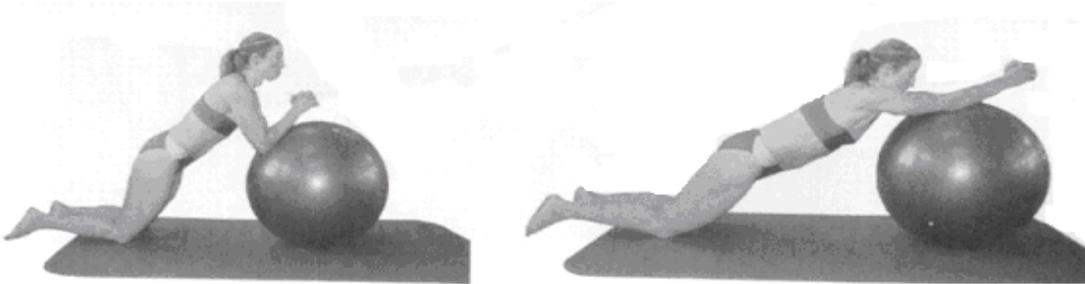
(A) The purpose of this dynamic core stabilization exercise is to recruit both actions of the hamstrings—hip extension and knee flexion—while maintaining dynamic stability of the lumbar spine. In a supine position on the floor, the athlete places both feet on the physioball. (Shoes should be removed to allow increased proprioception from the exteroceptors of the feet) the athlete keeps her arms on the floor at the sides of the body for balanced and raises the hips off the ground until the knees, hips and shoulders create a straight line. She should focus on holding the spine in a neutral midrange position. In the position, the athlete pushes the ball forward with the feet while maintaining the bridge. The goal is to keep the pelvis elevated (hip extension) as both legs extend and flex at the knees. While the knees extend and flex from this elevated bridge position, the athlete focuses on maintaining lumbopelvic stability.

B



(B) **Progression:** continue with single-leg hamstring curls in the same position.

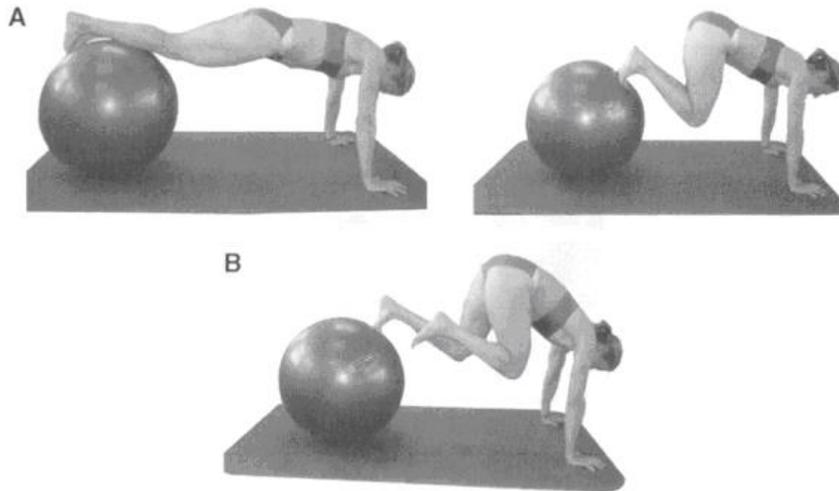
5.) Abdominal Rollout



This is an excellent exercise to train the abdominals eccentrically. The athlete kneels behind the ball, with both hands on the ball. Keeping the abdominals braced and lower back in a neutral position, she rolls the ball away from her body a short distance until this is a straight line from shoulder to hips. While maintaining alignment, she pulls the ball back towards them a short distance, then pushes it away a short distance. The movement should occur only at the shoulders, not the back. Progression: gradually straighten the body until up on the toes. There should be a straight line from the back of the head to the knees. Now move ball away and back towards the body a short distance with the arms.



6.) Ball Thrust



Keeping the abdominals braced and lower back and shoulder blades in a neutral position, the athlete uses her abdominal contraction to move the ball forward and back. Keep the spine in neutral alignment throughout the movement. If the exercise is too challenging, start the shins instead of the toes on the ball. (B) **Progression:** perform the exercise with only one foot on the ball.