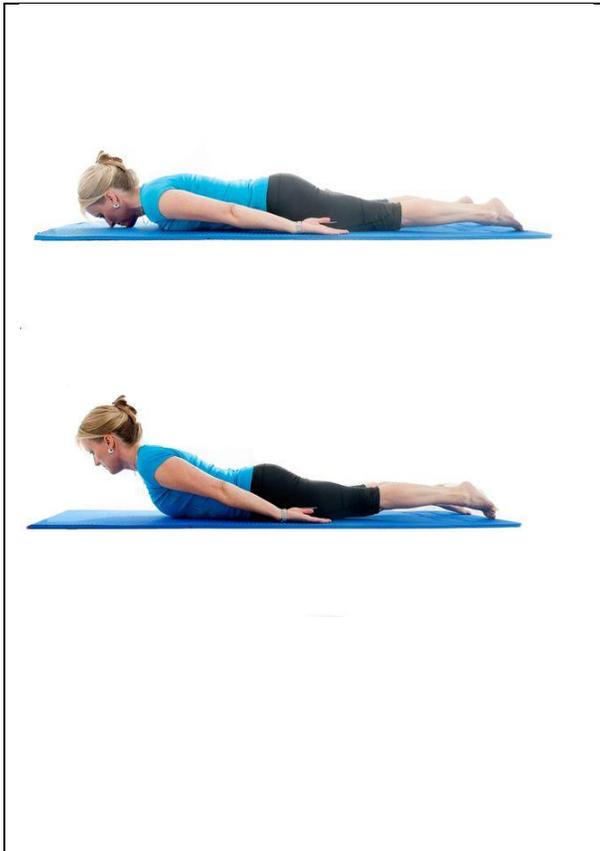
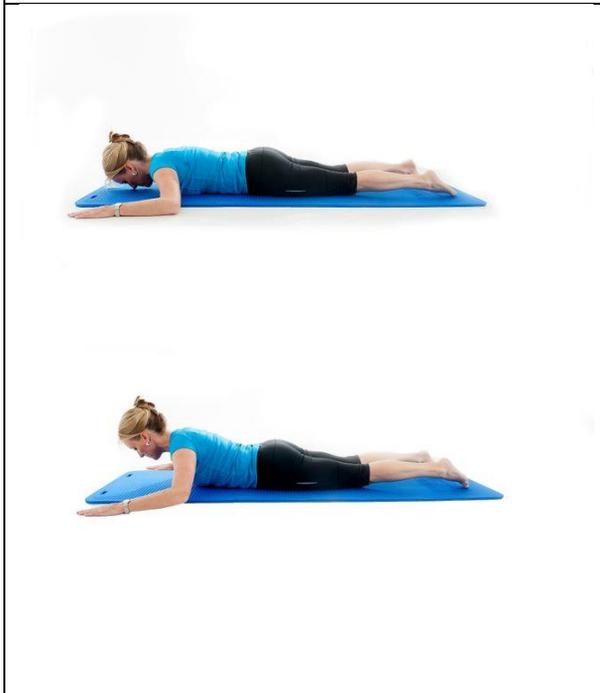


## Lumbar Extensor Strengthening Exercises



### **Back extension without arms supporting**

- Lying face down, place the arms by the side of the body.
- Gently pull in the lower stomach muscles to activate the core muscles and protect the spine.
- Raise the upper body off the floor. Keep breathing throughout the exercise.
- If you feel any tension in the lower back return to the start position and rest for a few breaths.
- This will allow the muscles to relax before you perform a second lift.
- A slightly more challenging option is to then raise the arms off the floor. This will increase the effort of the extensor muscles of the spine.
- Hold the position for 10 seconds.
- Repeat 10 times.



### **Back extension with arms supporting**

- Lying face down. Bring the arms to a bent arm position so that the forearms rest on the floor as shown in the photo.
- Gently pull the stomach muscles in to protect the spine.
- Gently raise the body off the ground whilst gently resting on the forearms.
- Avoid using your arms to lift you up, instead lightly rest on the forearms and use your back muscles to lift you. Avoid hyper-extending the spine to avoid 'pinching' the lower back.
- Hold the position for 10 seconds and then return to the resting position.
- Repeat 10 times.



### **Plank with knees bent to strengthen the core muscles.**

- The plank is a 'strong' exercise.
- A good way to start is with knees bent.
- Bend the arms and place the forearms on the floor. With knees bent, keep the trunk of the body off the ground.
- Hold for 10 seconds and then rest.
- Over time increase the time in the position to 20 seconds, 30 seconds and eventually 60 seconds. If you start to shake, take a rest.
- Repeat 2 or 3 times.



### **Bridge Curl**

- Lie on your back with knees bent and feet hip width apart.
- Slowly and gently lift the spine off the floor one vertebrae at a time.
- Slowly lower the spine back to the floor, again one vertebrae at a time.
- If the core muscles are weak, the movement can feel 'jerky'. Over time, the movement will become more smooth.
- Repeat the movement 5 times.



### **Table Top**

- Start in the 'table top' position.
- Gently draw in your lower stomach muscles to activate your core muscles.
- It is good to imagine that you are keeping a tray on your back with glass of water that you wish to balance.
- Gently lift one arm whilst maintaining your balance. If that feels easy, then repeat this with eyes closed.
- Alternate arm lifts.
- Check that your lower stomach muscle contraction is maintained.
- Repeat 10 times.