

Spaulding Rehabilitation Network is focused on helping you or your loved ones recover from illness or injury. As a national leader in rehabilitation, we also work to prevent the need for rehab whenever possible. Use these simple exercises recommended by our Outpatient Centers to help you do just that.

BACK STRENGTH EXERCISES

CAT-COW EXERCISE



The Cat-Cow exercise is a great way to learn how to move your spine gently, and can help you focus on controlling your spine.

Start with your hands and knees on the ground. Gently tighten your abdominal muscles and curve your spine while tucking your tailbone down like an angry cat. Once you feel a stretch, let your abdomen descend towards the ground while bringing your tailbone up and curving your back towards the ground. While performing Cat-Cow, it is important to control your spine throughout the range of motion. Start with 1 set of 10-15 repetitions.

BIRD DOG EXERCISE



Bird Dog is an exercise that activates your abdominal muscles, lower back and hip muscles, all of which build core stability and can help you maintain a neutral spine.

Start with your hands and knees on the ground. Gently contract your abdominal muscles and slowly extend the opposite arm and leg, making sure your trunk and pelvis stay stable. Maintain the abdominal contraction and neutral trunk as you transition to the opposite leg and arm. Continue to alternate for 5-10 repetitions, holding each extended position for 3-5 seconds with each side or as long as you can maintain good form.

PLANK EXERCISE



The Plank is a stabilization and core conditioning exercise that helps support your back.

Place your hands on a stable surface such as a chair, counter-top or floor. With your arms at 90 degrees from your trunk, stabilize your core by contracting your abdominal muscles, hips and thighs, making sure to keep your shoulders strong with head and neck in line with the rest of your body. Hold this position for 3 sets of 15-30 seconds each.

CLAMSHELL EXERCISE



Hip strength is vital to maintaining a healthy back and knees. Clamshells strengthen your hip muscles, which assist in stabilizing your back and pelvis when you perform everyday activities such as walking and running.

Lay on your side with your hips stacked, trunk straight, knees bent, and feet in line with your trunk. Rotate your top leg like a clam opening its mouth, and then slowly lower it back down. With this exercise it is important not to allow your hips and trunk to rotate. Placing a hand on your pelvis can be a good way to feel your motion. Perform 3 sets of 15 repetitions with each leg.

KNEE STRENGTH EXERCISES

SQUAT EXERCISE



Squats can be one of the best ways to strengthen your lower body and support healthy knees and a healthy back.

To help maintain good form, place a chair at arm's length in front of you. Stand straight up with your feet shoulder-width apart and hands extended in front of you. Bend your knees slowly, keeping your back flat and hinging at your hips. Control your descent down to the chair, ensuring that your knees stay behind your feet and don't turn inward towards your midline. Perform 3 sets of 10-15 repetitions, tapping the chair and using your hips and glutes to push all the way back up.

CALF RAISE EXERCISE



A simple yet effective exercise, the Calf Raise improves lower leg strength, ankle mobility and leg alignment, all of which contribute to knee health.

Stand with your feet slightly apart and a stable surface such as a counter or chair in front of you. Press up onto the balls of your feet and raise your head as high as you can while keeping your knees straight. Make sure to squeeze your thighs and maintain good posture. Complete the motion by allowing your heels to descend all the way to the ground. Perform 2 sets of 20-30 repetitions on two feet. When this becomes easy, progress to single leg version starting at 2 sets of 10 with a goal of 20-30 repetitions.

QUAD STRETCH



The Quad Stretch is an excellent way to reduce stress on your knees and lower back, whether from running or the strain of everyday activities.

Position yourself between of a stable surface, such as a low table or chair, and something to hold onto for balance. Bring your foot onto the surface behind you. Standing upright with your knee slightly bent, draw your abdominals in and tuck your tailbone by pushing forward with your hips. Hold this stretch for 2 sets of 30 seconds each, making sure to keep the leg you are stretching slightly behind your standing leg.

CALF STRETCH



The Calf Stretch helps promote ankle mobility, which is an essential component for maintaining strong, healthy knees as well as ensuring good positioning through your hips and lower back.

Place your hands on a stable surface in front of you, such as a countertop or chair, and stagger your feet with one leg stretched straight behind you. With your heels pressed into the ground and your back foot slightly pointed inwards, press your hips forward while maintaining a strong core. Hold this stretch for 3-4 sets of 30 seconds each while keeping your head, neck and trunk alignment.

RUNNING EXERCISES

Most running injuries are related to training errors. One way to avoid this is to increase your mileage slowly – 10% per week is recommended. Varying your workouts varies the loading your body experiences. Try varying your surface and routes, and cross-train with other activities on non-running days. Most importantly, listen to your body. Pain is your warning that a tissue is getting overloaded, so scale back or take time off if you develop pain to reduce your risk for injury.

FOOT DOMING AND HOPPING



This exercise strengthens your arches and helps you strike the ground in good form.

Stand in front of a mirror with feet hip distance apart and toes pointing forward, knees slightly bent. Press your toes down into the ground (without curling them) and 'squeeze' your arch, drawing the ball of your foot back towards your heel and making your foot shorter. This should cause your arch to raise or 'dome'. Hold for a count of 10 and repeat 5 times. Once you can "dome" your foot, look at your knees in the mirror. If they are close together, squeeze your buttocks, to help draw them apart so your knees are directly in line with your feet. Finally, engage your lower abdominal muscles to help tuck your buttocks under you. Practice standing in this position as often as you can. This is called the Active Standing Position. Once you can maintain the Active Standing Position, perform a small hop. Use your ankles rather than your knees to hop off the ground and land quietly back in a dome position. Focus on keeping your knees in alignment and landing softly.

LUNGES



Both standing and walking lunges strengthen your entire lower body.

Begin in the Active Standing Position. Take one step forward and lower your back knee towards the ground, bending your front knee to 90 degrees. Then squeeze your buttocks and raise yourself up back up by straightening your back leg. Keep abdominals engaged and trunk erect. Repeat 10 times. Reverse leg positions and repeat 10 times. For a walking lunge, begin in the Active Standing Position. Perform standing lunge. Extend with your right leg, bringing your left leg up in the air with the hip and knee flexed and beside your right leg. Then step forward with your left leg and repeat the lunge. Keep abdominals and hips engaged to maintain an erect trunk and knee in alignment with your foot. Repeat 10 times with each leg.

KNEELING HIP FLEXOR STRETCH



If you have tightness in your hips or thighs, this exercise can help loosen up your muscles after a run.

Assume a half-kneel position with your right knee down on a soft surface and your left foot on the ground in front of you. Tuck your buttocks underneath by engaging your butt and lower abdominal muscles. This should draw your naval inward. You should begin to feel a stretch in the front of your right hip and thigh. Maintain this position and lean forward slightly to deepen the stretch without losing the pelvic position. Avoid extending your low back. Lift your right hand up towards the ceiling and continue to maintain this tuck position of your pelvis. Add a slight sidebend to the left to deepen the stretch. Repeat on opposite side.