

# **SPORTS MEDICINE HOTLINE NUMBER (248) 469-3551**

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# **Proper Warm-up and Cool Down in Youth Sports**

#### Why is a warm-up important?

A warm-up is important because it prepares the athlete for the practice/competition to follow and it reduces the risk of injuries. Goals of a warm-up are to get them moving, get the heart rate up and to get increase blood flow to the muscles. Teaching a child at a young age to properly warm-up will carry with them through the years as they continue in athletics.

#### What should a warm-up include?

A warm-up should include an initial cardio warm-up as well as stretches.

- 1. Begin with a light cardio lasting 5-10 minutes. This can include a light jog or a more creative cardio activity. Keeping it simple, fun and interactive, especially for the younger kids.
- 2. Stretch for approximately 10-15 minutes. This can be done in two ways: dynamic or static
  - a. Dynamic stretching has been shown to be very beneficial and even more beneficial than static stretching during warm-up. A simple way to explain dynamic stretching is slow and controlled movements. Examples of dynamic stretches include walking butt kicks and walking high knees. These exercises should be completed slowly and in control; the stretch can be held for a few seconds prior to moving on to the other leg. Always remember to include the upper body. Please see below for examples of dynamic stretches.
  - b. Static stretching is stretching that you do while your body is at rest. This is the "normal" stretching that most people are aware of. This stretching has been shown to be more effective as part of cool down activities; however, you may add some static stretching to your warm-up routine as needed. Each static stretch should be held for 30 seconds and repeated 3 times.
- 3. End your warm-up routine with a moderate cardio activity lasting 5-10 minutes. This can include games such as tag or other sport specific activities that include increasing speed and having to change directions or you can do simple activities such as sprints and cutting drills. If you like to include speed and agility drills in your practice plan; you can do those at this time.

#### Why is a cool down important?

A cool down should always be performed after every practice and competition. A proper cool down is important because it can help relax the muscles and decrease any potential muscle soreness as well as aide the body inreturn to a resting state.

#### What should a cool down include?

- 1. 5-10 minutes of light cardio; this can include jogging or even walking. You can incorporate a fun activity in this as well.
- 2. 5-10 minutes of static stretching using the guidelines above

Your warm-up and cool down routines can be adapted to fit your needs and the children you are working with; however, no matter the age of the athletes it is very important to include these in your daily practice activities as well as competitions. You can find many resources to help you develop the best warm-up and cool down for your team.

For further information on this topic or for general questions call the Sports Medicine Hotline Number

# **Examples of Dynamic Stretches**

# 1. High Knees

This is basic running form while bringing the knees up higher than normal – ideally beyond your waistline. Aim to keep your feet moving as fast as possible and your ankles, knees, hips and shoulders facing forwards.

### 2. Butt Kicks

Similar to high knees except you keep your thighs perpendicular to the ground while kicking your heels up towards your backside. Again, move fast and keep ankles, knees, hips and shoulders in alignment.

### 3. Carioca

Moving laterally to your left, cross your right foot in front of your left, then step with your left, then cross your right foot behind the left and repeat.

#### 4. Step Slide

Assume a low athletic position with your feet slightly wider than shoulder-width apart, your ankles, knees, hips and shoulders facing forwards and your knees slightly bent. Pushing off your right leg, slowly step laterally to the left with your left leg and then slide your right leg back to its original position, making sure your feet don't touch or cross.

### 5. Glute Walk

In the process of your walk, put your left hand on your left knee and right hand on your left ankle, then pull both in towards your chest. Take a step and repeat on the other leg.

#### 6. Back Pedal

Run backwards maintaining a little bit of a forward lean (shoulders over your toes). Reach back with your leg as far as you can with each step to help stretch the hip flexor muscles.

### 7. Frankenstein March

Keeping your left leg straight, kick it up in front of you as high as you can, trying to tough the fingertips of the opposite arm – basically a straight leg march – then repeat with the right leg.

#### 8. Knee Hug

While walking forward, hug your left knee into your chest, then step and repeat on the right leg, continuing with alternate legs.

#### 9. Pointers

Keeping your left leg straight (and right leg bent) and left foot pointed upwards, reach down with your right hand to try to touch your left toe. Then take a step and repeat on the other side.

#### 10. Quad Walk

While walking forwards, pull your left heel in to your buttocks, then step and repeat with the right leg, continuing with alternate legs.

# 11. Walking Lunge

Step forward with your left leg into a lunge position (ankles, knees, hips and shoulders facing forward, torso upright) and then return to a standing position. Alternate legs as you walk a prescribed distance.

#### 12. Over the Fence

Facing in the opposite direction to the way you want to travel, raise your left knee as high as possible and rotate it behind you as if you were trying to walk backwards and step over an imaginary fence. Repeat on the right leg and continue with alternate legs.

#### 13. Scorpion

Lie face down on the ground with arms extended out to the sides, palms facing down, so your body forms a 'T' shape. Maintaining this facedown position and keeping your shoulders flat on the ground, bring your left heel and swing it back towards your right hand in a reverse twisting motion. Repeat on the other leg.

#### 14. Inchworm

Assume a push-up position on the ground, and walk your feet close to your hands while keeping the legs as straight as possible. Then return to the start position. Repeat over the prescribed distance, making sure your hands and feet never leave the ground.