



Common Soccer Injuries

Created by Michael Deegan DPT Hillsboro Physical Therapy

Recognizing, Treating, and Preventing common soccer injuries

As any player knows, soccer is a high performance sport that requires speed, strength, flexibility, agility, and endurance. In order for athletes to remain in top physical condition they need to train properly and also know how to manage and treat the various injuries that are bound to occur while playing in highly demanding games and over long seasons that often become year round regimens.

It is important that athletes, coaches, and parents be able to recognize common soccer injuries and be knowledgeable about how to prevent and treat certain kinds of injuries so that the athlete can continue to play and perform at a level that is appropriate for the demands of the game.

The information that is given below is the first of a four part series on common soccer injuries, and will hopefully give the athlete guidance about how to maintain health in the face of injury and potential injury.



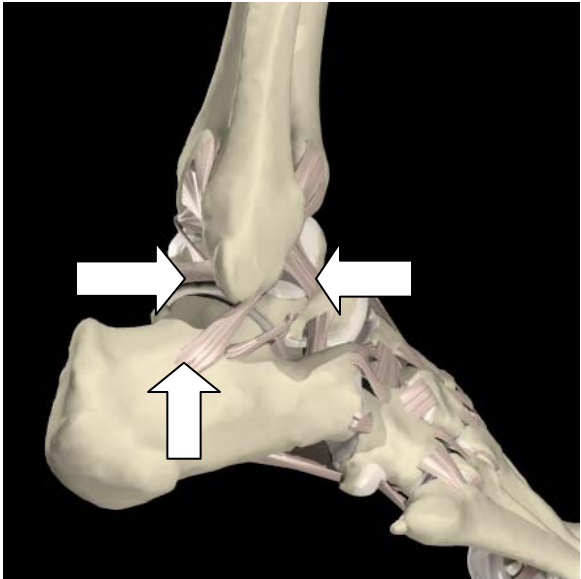
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Ankle sprains:

How does the injury occur?

Generally the athlete is able to describe a history of “rolling the ankle in” after changing direction, stepping down from a height, or landing on the outside of his or her foot at the time of injury.



There are three ligaments that are located on the outside of the ankle including: the anterior talo-fibular, calcaneal fibular, and posterior talo-fibular (from right to left on the picture)

Interactive Foot and Ankle 2 © 2001 Primal Pictures Ltd

How can ankle injuries be prevented from occurring?

The best way to prevent injury is to develop strength in the muscle groups that help to support and stabilize the ankle.

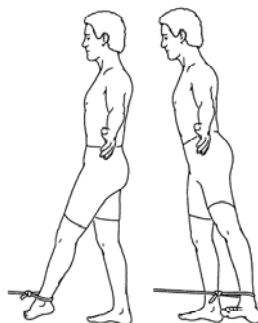
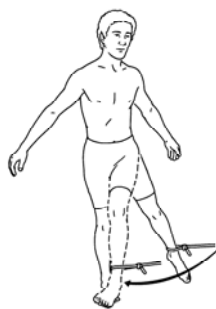
It is also necessary to train the ankle’s proprioceptive (balance) capabilities so that the ankle can respond quickly to conditions that may lead to injury

Strengthening for the ankle:



Visual Health Information

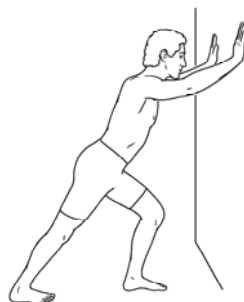
Resistance bands can be used to isolate muscles on the inside and the outside of the ankle.
Resistance bands are available at Therapeutic Associates Hillsboro Physical Therapy.



Visual Health Information

The resistance bands can be used to challenge the stability and strength of the ankle that is not moving

Stretching for the ankle



Visual Health Information

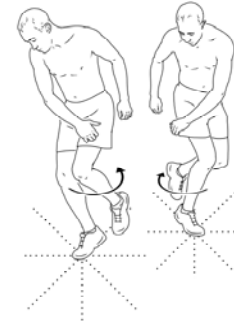
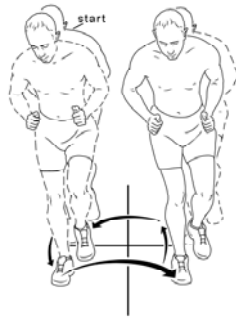
Stretching the two muscle groups at the back of the calf is a good way to help maintain flexibility

Proprioception (balance) for the ankle



Visual Health Information

Standing on an unstable surface such as foam or a pillow while having the eyes closed will challenge the ankle to maintain a stable position



Visual Health Information

Performing hopping activities in different directions challenge s the ankle in a dynamic and more sport specific manner

How do you treat an injury when it occurs?

Acute:

- Rest, Ice, Compression, and Elevation (RICE) are the main stays of initial treatment to help protect the joint, control inflammation, swelling, and pain

- Bracing may be used initially to help promote rest and healing, however, long term use is not recommended

- Physical therapy is often used to help guide the athlete with appropriate range of motion and beginning strengthening exercises to maintain movement and to help stabilize the joint.

Recovery:

- Physical therapy continues to help give the athlete exercises that further promote range of motion, ankle strengthening, proprioception (exercises to help the ankle gain better balance), and guidance with sport specific activities

What would be expected from a course of physical therapy?

Average number of visits is 8

Goals during PT would include

Pain rating:

2 on a scale of 0-10

Range of motion:

Plantarflexion (ankle movement with toes pointing down) = 40 degrees

Dorsiflexion (ankle movement with toes pointing up) = 10-15 degrees

Strength:

The athlete would demonstrate 5/5 (full strength grade) strength with all muscle groups of the ankle

Stability:

The athlete would not demonstrate pain or laxity with stress testing of the lateral ankle ligaments

Proprioception:

The athlete would demonstrate proper ankle control and balance for greater than 30 seconds with progressively challenging activities in standing. The athlete would also demonstrate proper control with dynamic hopping and jumping activities as well.

Function:

The athlete would demonstrate independence in a progressive home exercise program emphasizing function

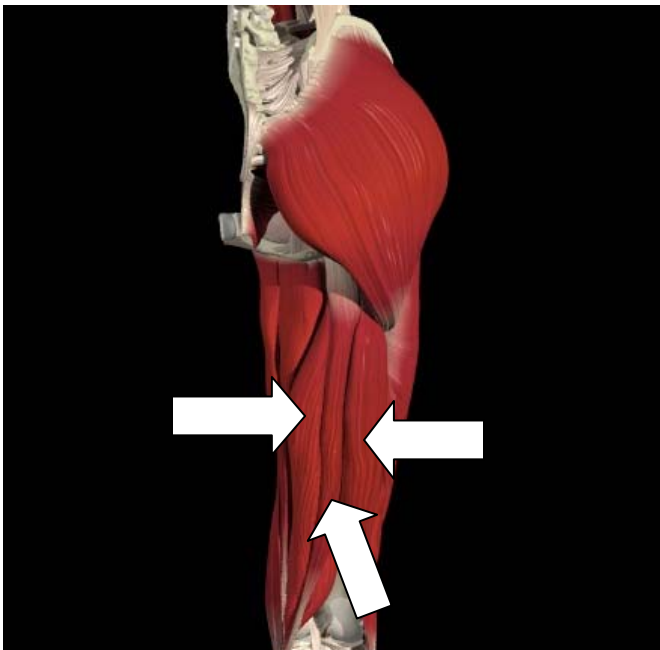
Hamstring strain:

How does the injury occur?

Pain / weakness is usually sudden and often occurs as a result of explosive movement such as sprinting.

It is thought that injury is usually the result of poor flexibility and strength along with inappropriate warm-up and running technique.

Typically injury will also occur when there has already been an injury and the athlete returns to activity too quickly



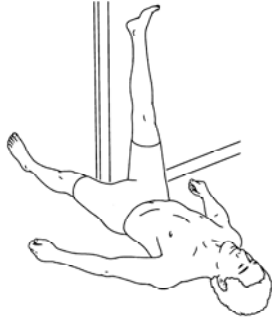
The hamstrings consists of three different muscles including: the biceps femoris, semitendinosus, and semimembranosus (from right to left on the picture)

Interactive Hip © 2000 Primal Pictures Ltd.

How can hamstring injuries be prevented from occurring?

The best way to help prevent injury is to develop strength and flexibility of the hamstrings

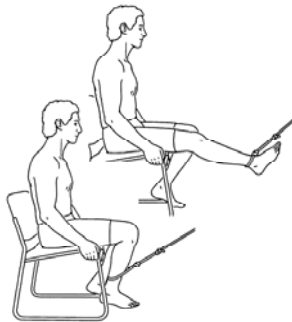
Stretching the hamstrings:



Visual Health Information

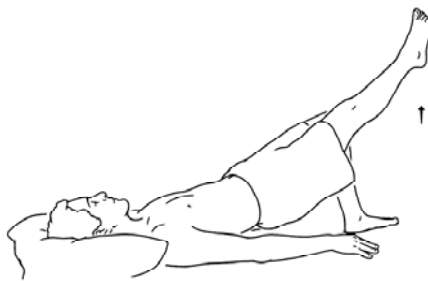
Stretches need to be held for 30 seconds in order to be effective. It is important to limit motion through the low back so that the stretch is selective for the hamstrings only.

Strengthening the hamstrings:



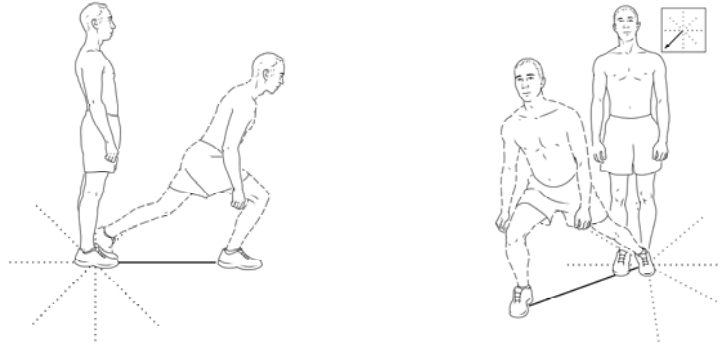
Visual Health Information

Resistance bands can be used to isolate the hamstring and strengthen through a full range of motion. Resistance bands are available at Therapeutic Associates Hillsboro Physical Therapy.



Visual Health information

The hamstring along with the buttocks can be isolated by keeping one leg off the ground while lifting the hips off the floor



Visual Health Information

The hamstrings can be strengthened more functionally along with the quadriceps by performing lunges

How do you treat an injury when it occurs?

Acute:

- Rest, Ice, Compression, Elevation (RICE) are the main stays of initial treatment to help control inflammation and pain

- An ACE bandage wrap or compression sleeve can be used to maintain compression and decrease pain with normal activities

- Physical therapy is often used to help the athlete perform range of motion and beginning strengthening exercises that are safe and effective in the initial stages of the injury

Recovery:

- Physical therapy is continued to help the athlete progress with their range of motion, strengthening, and functional sport specific activities

What would be expected from a course of physical therapy?

Average number of visits 6-8

Goals for PT would include:

Pain:

0 on a scale of 0-10

Range of motion:

Knee ROM: 0-135 degrees

Hip ROM: -10-135 degrees

Strength:

The athlete would demonstrate 5/5 (full strength grade) of the hamstrings

Function:

The athlete would demonstrate independence with their home exercise program and would be able to perform all exercises without pain

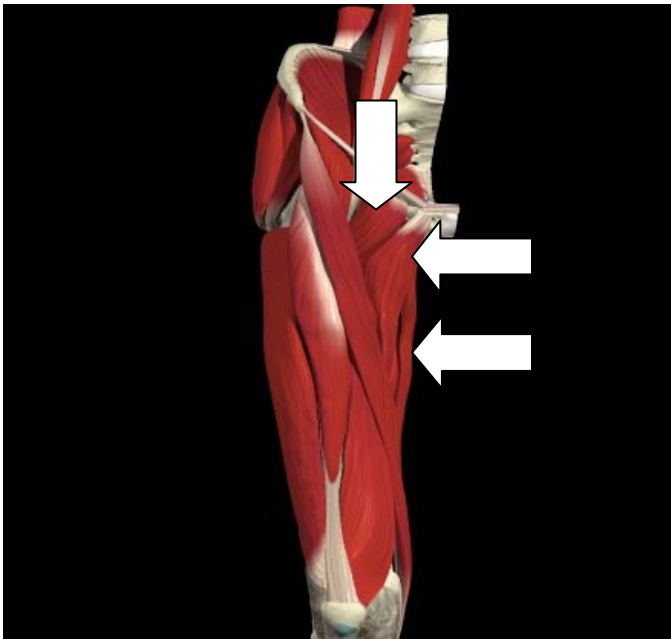
Adductor strain

How does the injury occur?

Injury to the adductors usually occurs following a forced push off in a side to side motion. Acute injuries are often described as a sudden ripping or stabbing pain in the groin

With regard to soccer players a common mechanism of injury occurs when the athlete attempts to kick the ball and meets resistance from the opposing player who is trying to kick the ball in the opposite direction

Less frequently the adductors can also be injured by jumping or over stretching of the muscles



There are five muscles that make up the adductor muscle group including: the pectineus, adductor longus, adductor brevis, adductor magnus, and gracilis. Only three are visualized here, since some of the muscles are layered in this region

Interactive Hip © 2000 Primal Pictures Ltd.

How can adductor injuries be prevented from occurring?

The best way to prevent injury is to develop strength and flexibility of the adductors

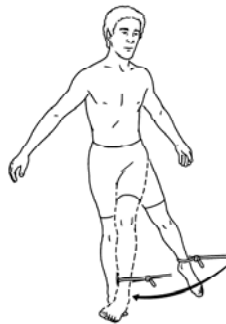
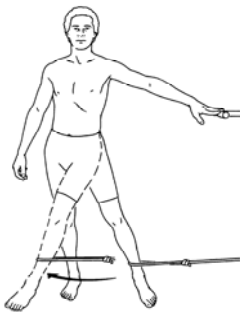
Stretching the adductors



Visual Health Information

Stretches need to be held for 30 seconds in order to be effective. Stretching the adductors and the hip flexors (muscles at the front of the hip) is important.

Strengthening the adductors



Visual Health Information

Resistance bands can be used to isolate the adductors and strengthen through a full range of motion. Resistance bands are available at Therapeutic Associates Hillsboro Physical Therapy.

How do you treat the injury?

Acute:

- Rest, Ice, Compression, Elevation (RICE) are the mainstays of initial treatment to help control inflammation and pain
- Painful activities should be avoided and the use of crutches is an option to help relieve pain and allow for rest during the first few days after injury.
- Physical therapy is often used to help guide the athlete in performing early range of motion exercises as well as isometric (force applied in the muscle without active movement) muscle contractions to promote strengthening.

Recovery:

- Physical therapy is continued to help the athlete progress with their range of motion, strengthening, and functional sport specific activities.

What would be expected from a course of physical therapy?

Average number of visits 6-8 Goals for PT would include:

Pain:

0 on a scale of 0-10

Range of motion:

Abduction (leg away from the body): 0-45

Adduction (leg across the body): 0-25:

Strength:

The athlete would demonstrate 5/5 (full strength grade) strength of the hip flexors and the hip adductors

Function:

The athlete would demonstrate independence with their home exercise program and would be able to perform all exercises without pain

