

ANKLE INJURY PREVENTION

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An ankle sprain is a very common occurrence on the basketball court and the long term consequences of an ankle sprain is a common cause of chronic ankle pain. The inversion ankle sprain is most common type of sprain. With an inversion sprain the ankle rolls over on the outside.

An ankle sprain causes stretching and tearing of ligaments. Most commonly involved is the anterior talo-fibular ligament and sometimes the calcaneo-fibular ligament can also be damaged.

Many situations can cause an ankle sprain but the most common way for it to happen is jumping and landing on someone else's foot. There are factors that predispose someone to having an ankle sprain but the only factors that an athlete has any control over are the following:

- 1) The strength of the muscles that cross the ankle joint especially a muscle group known as the peroneals. These muscles run down the fibula on the outside of the leg and attach on various areas of the foot. Stronger peroneals can minimize the amount of inversion reducing the chance for injury. Research has demonstrated this.
- 2) Joint proprioception (proprioception is the ability to sense where a joint is and react to it) or more simply your ability to balance.
- 3) Flexibility of the calf muscles

The stronger an athlete is going into an injury, the quicker they will return. The stronger the muscles are, the less likely the joint will be re-injured. If the ankle does get injured, the severity of injury will be less. Since nobody plans to get injured, it is best to include regular strengthening exercises for the ankle into your strength and conditioning program. Keep in mind that most of the muscles that cross the ankle joint cannot handle a lot of weight. For exercises to be effective the resistance should be enough to challenge the muscle but not be so much that the joint is not able to work through the full range of motion.

What to do when it you get an ankle sprain or sprained ankle?

The sooner treatment starts for a sprained ankle, the greater chance to prevent chronic pain and long term instability.

For all grades of ankle sprain follow the **R.I.C.E.** principles as soon as possible:

- * **R**est your ankle - do not walk on it.

* **I**ce - this helps to keep the swelling down. Use ice on the injury several times a day for 15-20 minutes (more than 20 minutes is not advised)

* **C**ompressive bandages are needed to immobilize the ankle sprain and to support the injury.

* **E**levate the ankle above your heart level for as much as you can for 48 hours.

If the sprain is a 2nd or 3rd degree ankle sprain, seek professional advice immediately

References:

<http://www.usyouthsoccer.org>

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