

Ten Principles of Injury Prevention for Runners

By Dave Ochsendorf, MPT and Kristy Ochsendorf, DPT

By following these 10 principles when training, you can prevent injuries and maximize performance. Here are some tips to address some of the most common causes of injury:

- 1) *Don't do too much too fast.* When starting a running program (or resuming after an injury), runners tend to jump in and do too much too soon. This is a common problem with individuals suffering from shin splints and a number of other overuse syndromes. As you progress, remember to follow the 10% Rule. Not increasing the total number of minutes by more than 10% each week allows the tissues to adapt to new stresses.
- 2) *Listen to your body.* Don't run through pain. A minor injury, that has the potential to heal completely in less than a week, can become a significant injury which results in weeks or months of lost training. Running with pain can lead to altering your mechanics and putting increased stress on other areas. If you feel some pain while running immediately decrease your intensity. If the pain persists, stop running, gently stretch and apply ice. Rest for 2-3 days, and don't resume running until pain-free.
- 3) *Allow adequate recovery time.* Especially after a difficult workout. Schedule a day off or a light day after long or especially intense training sessions. As we age, we don't recover as quickly and may require 2-3 days of rest or lighter training. The article by Hugh Thomas, "Running Against Father Time" in the February Newsletter also has great suggestions specific to training as we age.
- 4) *Stretch.* Perform a light warm-up for 5-10 minutes at least and then stretch prior to running. After running, actively cool down and then stretch again.
- 5) *Strength train.* Supplementing your training with strength exercises can allow you to maintain proper running mechanics. We tend to lose muscle mass as we age and often develop weakness in the core, hip, ankle and foot muscles. One to two days a week of extra strengthening after you run can prevent this. Studies show that regular hip strengthening can improve your alignment and mechanics from your spine all the way to your ankles.
- 6) *Cross-train.* Repetitive stress injuries are often associated with performing the same tasks over and over in a work environment. Jogging at the same pace on the same surface several days a week is the epitome of repetitive stress. To avoid injury or maintain fitness while healing, consider swimming, cycling, elliptical or rowing machines.

- 7) *Run on different surfaces.* It is important to run on level surfaces, but running 1-2 days per week on dirt trails or grass can have great benefits. Not only is a softer surface more forgiving, it can change your impact stresses by slightly varying your foot strike, and strengthen your ankle and foot intrinsic muscles by forcing your foot to adapt.
- 8) *Vary your workouts.* I.e. incorporate speed work, tempo or interval runs. Make sure you have an adequate base before initiating higher intensity track/speed workouts.
- 9) *Shoes.* Wear the correct shoe for your foot type. See a specialist at a running store to make sure you have adequate cushioning or support for your foot type. Shoe size can change over the years as well, so proper measuring and fitting is important. Change shoes every 300-500 miles or 6 months (this is a general guideline). Rotating 2 to 3 pairs of shoes is also a good idea depending on the type of run and surface you are on that day.
- 10) *Get plenty of sleep!* Sleep is crucial for the body to recover and heal damaged cells.

Dave and Kristy are avid runners, MTC members, and owners of Siesta Key Sports and Physical Therapy. The orthopedic section of their physical therapy education included extensive instruction in foot and ankle biomechanics and they have worked with many runners in their 10 years of practice.