

## **Stretching the Boundaries.**

**A flexibility program for everybody.**

**By Michael Sheynin, PT, CSCS, owner of Free Motion Rehabilitation Center**

### **Why stretch?**

Flexibility, the common synonym for joint range of motion, is a major consideration in athletic performance, rehabilitation, general fitness, and comfortable and proper posture. Flexibility is related to body type, gender, age, bone and joint structure, medical history, postural habits and fitness status. Sedentary living habits, work or exercise that cause overuse of the same muscles repeatedly day after day, confine joints within a restricted range of motion and reduce flexibility.

Flexibility is very important in building and maintaining optimum health. Carefully constructed stretching program can aid in prevention of injuries and postural problems and will promote general wellness and improve athletic performance.

### **Who should stretch?**

**EVERYBODY!!!**

Athletes and people who engage in regular exercise should stretch to minimize injuries, improve sports performance, and reduce tightness associated with repeated use of the same muscles. People with sedentary life style should stretch to improve posture and exercise their muscles and joints. Children should stretch to form positive habits that will help them to lead a healthy and fulfilling life. Older people should stretch to prevent and relief muscle-joint stiffness and decrease in muscle tone associated with aging process.

Among other things proper stretching will:

- relieve muscle soreness by promoting a supply of blood and oxygen
- promote general body relaxation and reduce emotional stress
- improve the capacity for activity
- minimize injuries to the muscles and joints
- serve as a major part of the pre-activity warm-up to increase tissue temperature through an increased metabolic rate
- serve as a part of the post-activity cool-down to increase blood flow to the fatigued areas, eliminate toxic waste products from cells, reduce soreness, increase muscle relaxation and improve flexibility

### **What is the proper way to stretch?**

An ideal stretching program should be minimally painful, easy to use and produce long lasting results. Active Isolated Stretching satisfies all these conditions. Active Isolated Stretching (AIS) is a revolutionary stretching technique developed by Aaron L. Mattes, a renowned kinesiologist famous for his work with world-class athletes. AIS is designed to improve flexibility and athletic performance and can be used as a rehabilitation modality to assist in prevention and recovery of various orthopedic, neurological and sports related injuries.

To understand why AIS works better than other stretching techniques let us look at the very popular hamstring stretch. Hamstrings are the muscles in the back of your thigh and their tightness not only can hinder athletic performance but also cause back pain. Most widely used method of stretching the hamstrings involves putting leg up on a chair or a bench while standing on the other leg. Then a person leans forward and holds

the stretch usually for 30 seconds to a minute. Sometimes, bouncing is used during the stretch. The problem with this stretch is that physiologically the hamstrings are not relaxed in the stretch position. The muscle is actually contracting to prevent further stretching. Bouncing further compounds the problem causing small tears in the muscles. These tears eventually become a scar tissue decreasing flexibility and potentially causing injury. Active Isolated Stretching involves physiological phenomenon called reciprocal inhibition. When a muscle contracts on one side of the joint, brain sends a signal to a muscle on the other side to relax, thus allowing the movement to occur. In our example, to fully relax the hamstrings muscle, a person has to contract the quadriceps muscle – muscles at the front of the thigh that straighten the knee. Active contraction of the opposing muscles during stretching adds the benefit of strengthening, reduces injury risk, warms up the body for the upcoming exercise and produces fast and long-standing results.

At Free Motion Rehabilitation Center we use this stretching technique not only to increase flexibility and improve athletic performance in runners, golfers and tennis players, but also to treat patients with variety of diagnoses including low back pain, neck pain, knee surgery, and other injuries. I have used different stretching techniques to treat my patients and to stretch myself. Active Isolated Stretching produces superior results comparing to other methods.

Whether you suffer from chronic pain, have undergone an orthopedic surgery, seek to improve your athletic abilities or want to start an exercise program, Active Isolated Stretching will help you as it has helped many others on your way to health and fitness.

To find out more about AIS please contact me at (732) 901-8844. Our Center is located at 530 New Friendship Road (Friendship Mall at the intersection of Route 9 South and New Friendship Road).