PerformanceTherapy in Prevention and Rehabilitation

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- As soon

- As i start to recover

- As soon

  - I will be ready to perform again

Fascia

Fascia is a connective tissue which is found all throughout the body. It is highly innervated which means it plays a role in kinesthetic awareness, joint stabilization and movement.

Fascia is largery composed of water, which allows each layer to freely slide across one another. Inflammation or injury can begin to disrupt this enviroment and can encourage the development of adhesions which can increase the risk of injuries.

Myofascia is referring to the muscle and fascia together. Muscle and fascia work together to help drive and control movement.

Trigger Point

When Myofascia becomes inflamed or injured a Myofascial Trigger Point can be the result.

A Myofascial Trigger Point is a hyperirritable spot in the skeletal muscle that is associated with a hypersensitive palpable nodule or tough band.

Trigger Points often lead to :

- Decreased range of motion
- Local tenderness
- Pain
- Increased fatigue in the affected muscle

The Trigger Point Performance Therapy tools are *Grid Foam Rolling* and *Myofascial Compression Techniques*.

TP Massage Ball

TP QuadBaller™

Foam rolling

''Poor man massage''

Foam rolling is a form of self-induced massage which consists of using a cylindrical device to attempt to mobilize soft tissue. The foam rollers vary in terms of density and size which can play an important role in the depth of tissue effected

History

1928 First patent on a self-massage tool

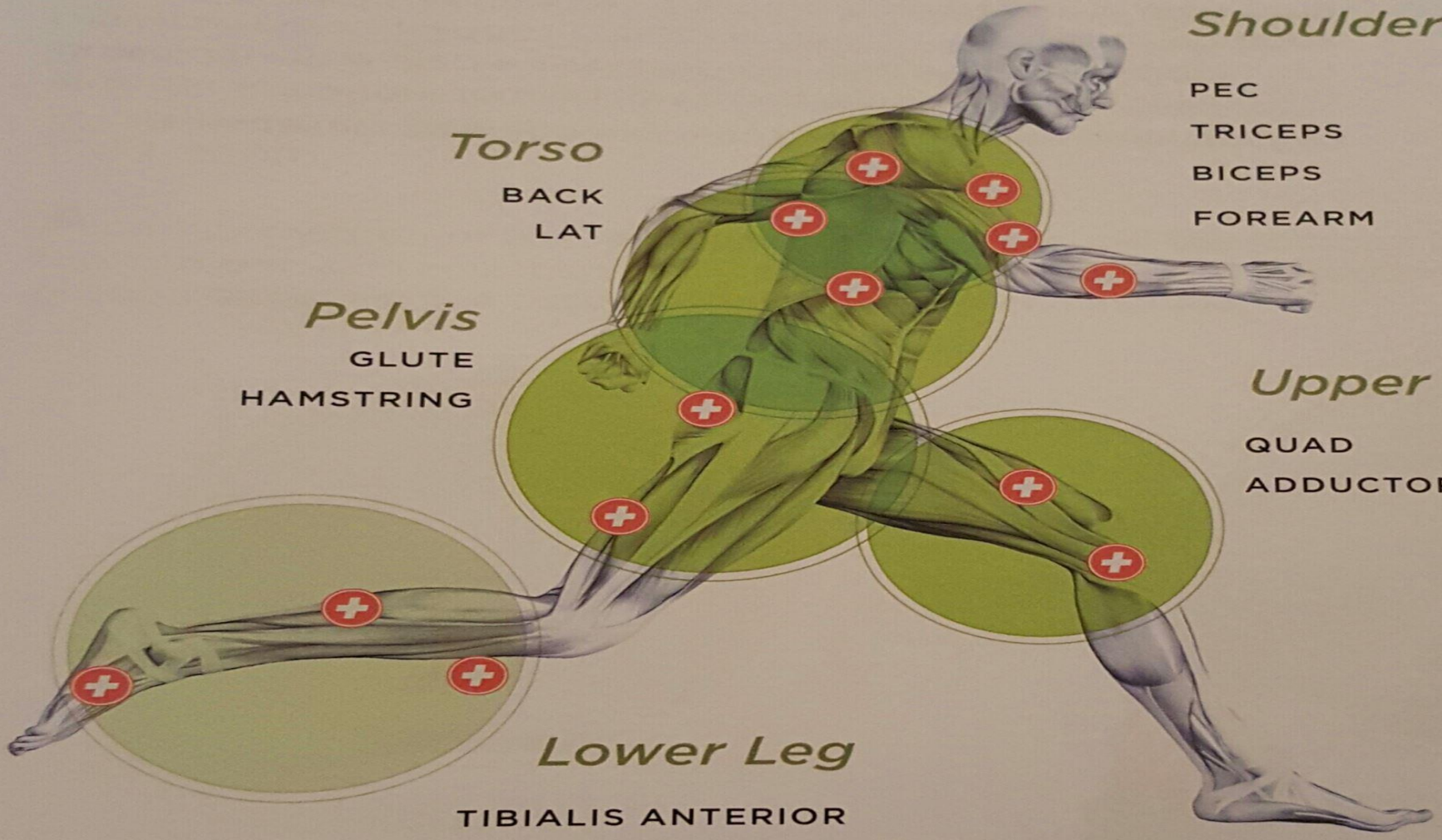
1984 Massage therapist at the Summer Olympics

1997 Massage was 3rd most common Alternative care

2000-Present TriggerPoint tools and programming are the most advanced form of self myofascial release available

Myofascial Compression Techniques

Consist in a method of soft-tissue release designed to build compression into a targeted muscle and then use basic functional movements to re-establish ones normal range of motion.


Shoulder
PEC
TRICEPS
BICEPS
FOREARM
Torso
BACK
LAT
Pelvis
GLUTE
HAMSTRING
Upper Leg
QUAD
ADDUCTOR/ VM
Lower Leg
TIBIALIS ANTERIOR
CALF/PERONEALS
FOOT

Benefits

In the past five years the research considering foam rolling has increased due to growing popularity of massage and a paradigm shift towards realizing the lasting benefits of consistent soft tissue work.

Colectively the researchers said that foam rolling and myofascial release are beneficial before and after the practice.

Foam Rolling warm-up delays onset of fatigue

A 2013 study by K.C. Healey was focused on whether or not foam rolling would affect athletic performance

The researcher concluded that while there was no significant difference in the performance tests, there was a significant difference in the time to fatigue.

Foam Rolling increases flexibility

The researchers tested 17 subjects looking at flexibility, muscle activation, maximum voluntary isometric contraction, knee flexion and electromechanical delay before and after four different interventions of hamstring foam rolling.

The study concluded that foam rolling pre-exercise was effective at increasing flexibility measured by a sit and reach assessment, with no detriment to the force production of the hamstrings. (Sullivan, 2013)

Foam Rolling reduces soreness

After 2012 there were made lots of studies to assess delayed on-set muscle soreness.

The conclusion was that foam rolling as part of the cool down reduce the negative effects of delayed onset muscle soreness allowing more frequent exercise sessions

Foam rolling and static stretching

In a study made by A. D'Amico and C.Morin were compared foam rolling and static stretching as part of trying to increase tissue extensibility and joint range of motion. Static stretching is commonly used as part of cool down to help restore proper muscle length and prevent muscle soreness.

After the test the autors concluded that both static stretching and foam rolling significantly improved joint range of motion. This could suggest that foam rolling is as effective as static stretching as part of cool down following exercise.

Myofascial release is the foundation of addressing most of the biomechanical restrictions

Utilizing myofascial release is scientifically equivalent to adding water to dried clay, hence making it malleable once again and ready to be shaped towards functionability

As myofascial release eliminates the restrictive patterns within the body, the brain can now effectively reshape its mechanical behavior.

Conclusions

Foam rolling before a session of training can improve joint range-of-motion and flexibility without a concurrent decrease in performance.

Foam rolling after training has been found to reduce the negative effects of delayed onset muscle soreness.

The goal of Myofascial Compression Techniques is to restore normal biomechanics in an effort to reduce the need for the painful nodules.

Trigger Point Performance Therapy can be a very good tool to use on the court in order to perform better.

Thank you !