# Using Foam Rollers & various other tools

for self myofascial release

#### Why roll?

- reducing tone of overactive muscles via trigger point release
- MAY help reduce scar tissue, adhesions
- improve circulation
- increased body awareness
- cheaper than weakly massage;-)

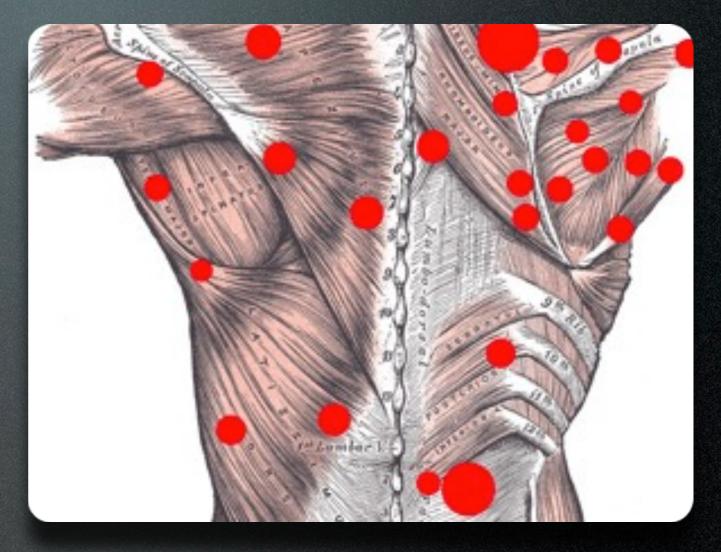
### a big reason runners benefit

Often...Stretching Along Is Not Enough

"Stretching is very beneficial and cannot be neglected. But in the case of muscle knots (or trigger points), stretching alone is not enough. When stretching a muscle with knots, you are only stretching the healthy muscle tissue. The knot remains a knot, laughing in the face of the stretch."

# What is a trigger point or "knot"?

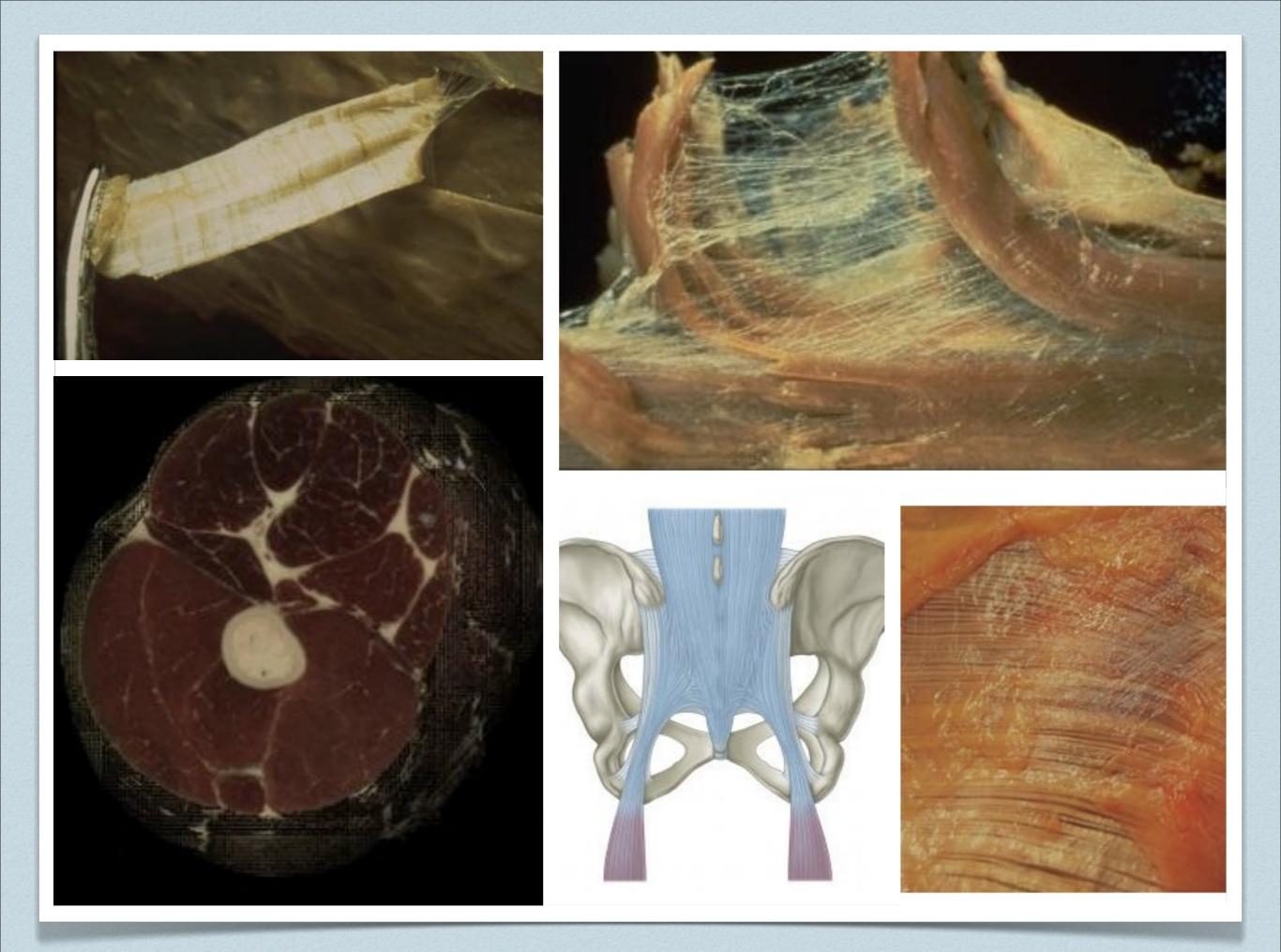
Trigger points or trigger sites are described as hyperirritable spots in skeletal muscle that are associated with palpable nodules in taut bands of muscle fibers. Trigger point practitioners believe that palpable nodules are small contraction knot and a common cause of pain. Compression of a trigger point may elicit local tenderness, referred pain, or local twitch response.



# The second target tissue: fascia

It is a layer of fibrous tissue that permeates the human body. A fascia is a connective tissue that surrounds muscles, groups of muscles, blood vessels, and nerves, binding those structures together in much the same manner as plastic wrap can be used to hold the contents of sandwiches together. It consists of several layers: a superficial fascia, a deep fascia, and a subserous (or visceral) fascia and extends uninterrupted from the head to the tip of the toes.

from Wikipedia



#### The Science

Ligaments, aponeuroses, tendons & fasciae are dense regular connective tissues, containing closely packed bundles of collagen fibers oriented in a wavy pattern parallel to the direction of pull.

Fasciae are consequently flexible structures able to resist great unidirectional tension forces until the wavy pattern of fibers has been straightened out by the pulling force. These collagen fibers are produced by the fibroblasts located within the fascia.

#### **How It Works**

For various reasons including disuse, not enough stretching, or injuries, the fascia and the underlying muscle tissue can become stuck together.

This is called an adhesion and it results in restricted muscle movement.

It also causes pain, soreness and reduced flexibility or range of motion.

Myofascial release is a body work technique in which a practitioner uses gentle, sustained pressure on the soft tissues while applying traction to the fascia.

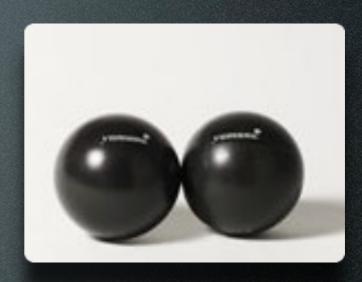
This technique results in softening and lengthening (release) of the fascia and breaking down scar tissue or adhesions between skin, muscles and bones.

If you can't always see a therapist, using these various round tools can help mimic the same effect.

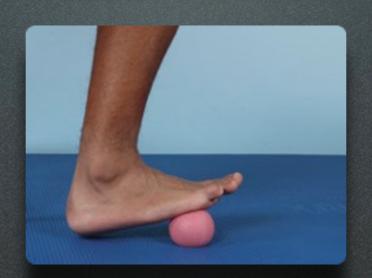
from About.com (see resources at end of document)















The Tools

#### The Rules

- Perform foam roller sessions when your muscles are warm or after a workout.
- Keep your first few foam roller sessions short. About 15 minutes is all you need.
- Rest a day between sessions when you start.
- Drink plenty of water after a session, just as you would after a sports massage.
- After a few weeks you can increase your session time and frequency if you choose.
- Do not use a foam roller without your physician's approval if your have any heart or vascular illness or a chronic pain condition.

#### The Technique

- Position the roller under the soft tissue area you want to release or loosen.
- Gently roll your body weight back and forth across the roller while targeting the affected muscle.
- Move slowly and work from the center of the body out toward your extremities.
- If you find a particularly painful area (trigger point), hold that position until the area softens.
- Focus on areas that are tight or have reduced range of motion.
- Roll over each area a few times until you feel it relax. Expect some discomfort. It may feel very tender or bruised at first.
- Stay on soft tissue and avoid rolling directly over bone or joints.

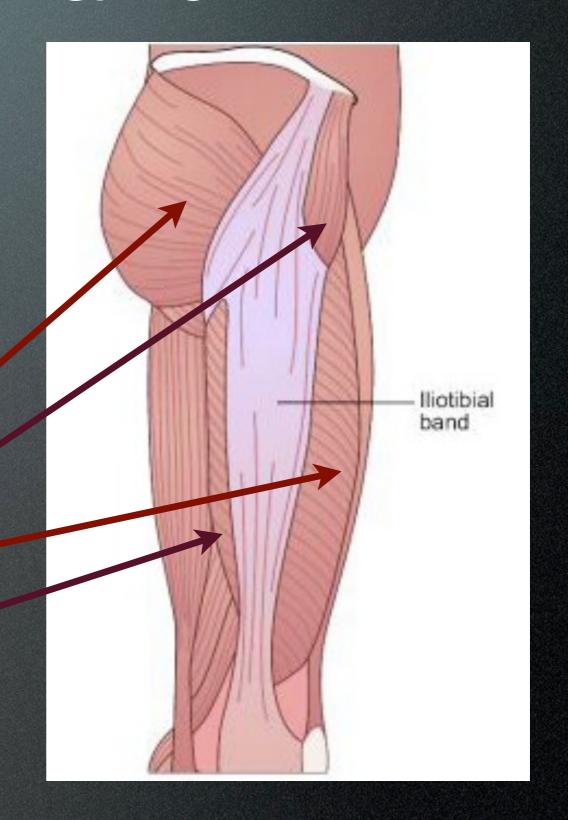
### the front of the leg

- the mighty quads
- rolling versus pinning
- add flexing the knee
- can be quite painful



#### the IT Band

- the band isn't released per se, instead the MUSCLES inserting into are, creating the release
- The BIG 4: Glute Max, Tensor fascia lata, lateral quads and lateral hamstrings



#### Outer leg

- tensor fascia lata- just below pelvis crest
- lateral quads (can be quite painful!!!)
- I like to add a stretch while I'm there
- could continue down to lower leg



## back of the hip & thigh

- butt/piriformis
- hamstrings (medial and lateral)
- back of the knee (popliteus) soft ball!

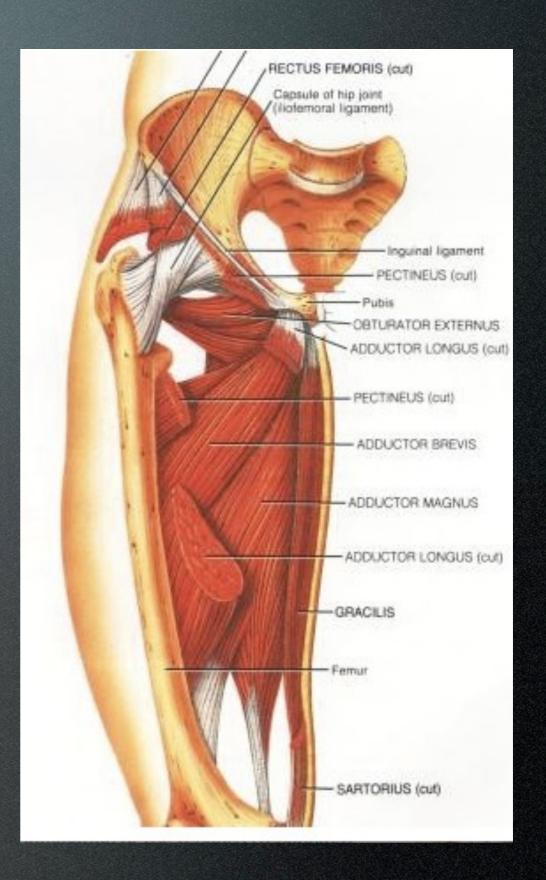




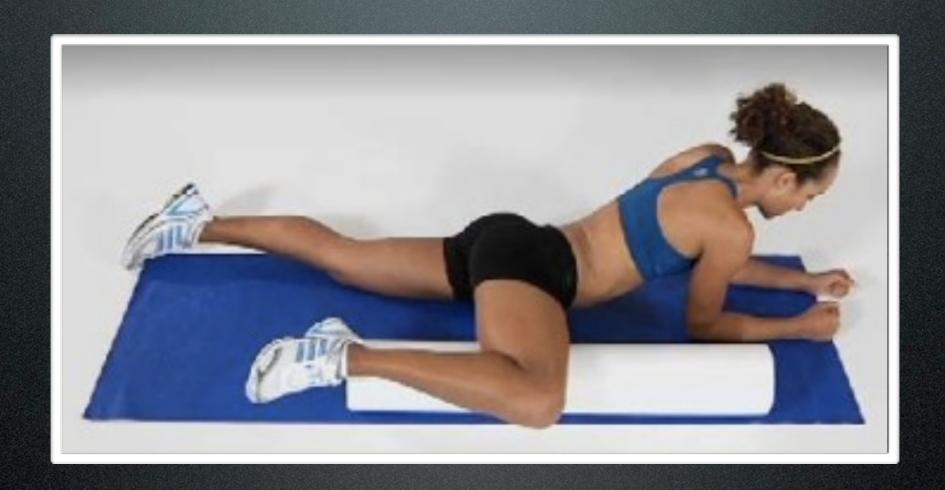


#### the inner thigh

- a fan of very large muscles
- some are towards the front and work with hip flexors & quads
- others are on the back next to the hamstrings and work with the glutes



### Accessing the adductors



#### the lower leg

- how to add pressure
- front shin, medial versus lateral calf, soleus & peroneals
- flex & point
- special tools for calf release





#### the foot

- heel
- midfoot
- add toe stretching
- special tools
  (half a lacrosse
  ball, spikey
  ball)



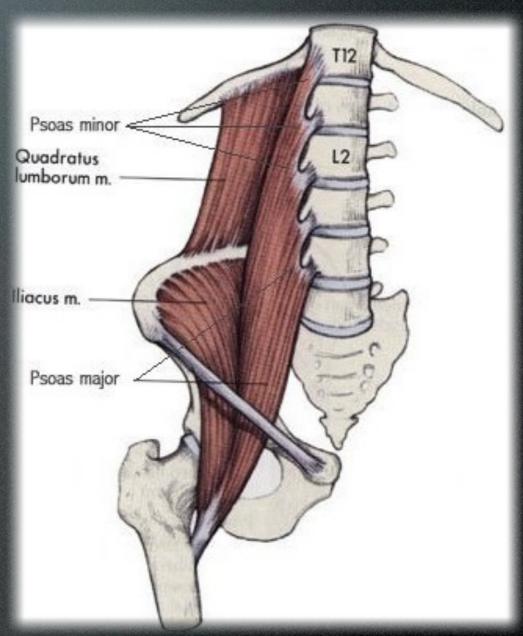
• NO ROLLER- fascia ball or trigger point ball ONLY the abdomen!

• its effects are indirect to psoas as it is too deep!

abdominal muscles have trigger points

#### Precautions:

- 1) Any kind of fresh surgery and scar
- 2) Pregnancy (possibility of pregnancy)
- 3) Inflammatory gut syndrome or condition
- 4) Pelvic inflammatory disease
- 5) Any type of stomach or intestinal/visceral cancer



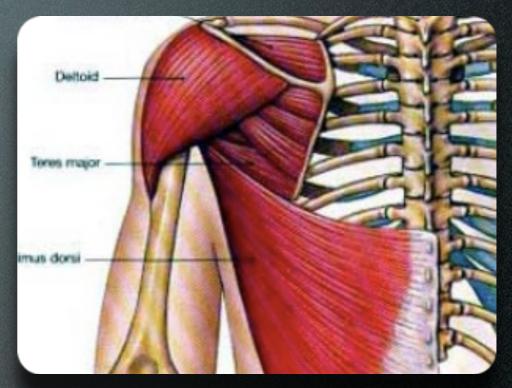
#### the midback

- permits better trunk rotation, upright posturing and ease in the arm swing
- long back muscles
- rhomboids (between shoulder blades)
- more specific with ball



#### Shoulder Girdle

• lats (back muscle that goes into the shoulder, through armpit area)



• pecs (front chest)



#### the half foamie

- stretch calves
- unstable surface for doing core exercises
- more gentle chest stretch



#### rolling tool resources

- Fitter1.com (based in Calgary) carries stick, rollers, FitBalls
- Pink Balls come from the States- best to get from the clinic
- TP Therapy.com makes the Quad Baller & Calf Baller & THE GRID can be bought at Fitness Town, multiple locations in the lower mainland
- Foot Savers & Spiky half ball come from Yamuna Body Rolling (New York based)

#### Content Resources

"On a Roll: A tool that boosts flexibility and recovery."

By Michelle Hamilton Image by Steve Boyle From the May 2010 issue of Runner's World

"The (almost) Magical Foam Roller

Working your injuries"

By Clint Verran

As featured in the JanFeb 2007 issue of Running Times Magazine

"Foam Roller Exercises for Easing Tight Muscles"

By Elizabeth Quinn, About.com Guide

Updated February 18, 2011

About.com Health's Disease and Condition content is reviewed by the <u>Medical Review</u> Board

Mike Robertson MS CSCS of Mike Robertson Training Systems e-Book "Self Myofascial Release: Purpose, Method & Techniques" RobertsonTrainingSystems.com