

St #1½a Spindle, Golgi, Origin & Insertion

Spindles and Golgi tendon apparatus are **proprioceptive cells within the muscles** and connective tissue. Proprioceptors sense where something is in relation to another.

Spindles - detect change in **length**

Golgis - detect change in **tension**

Origin & Insertion - muscle attachments that switch muscle off if under too much strain as a protection mechanism

Metaphysics

Attachments in life - becoming neutral to these

How far away are you from reaching your goal

Do you need to stretch or pull back

Do you need to relax - get some space

Do you need to pull it together

Are you being to lax in relation to your goal

Reign things in

Do you switch off when you are under pressure

Evaluation:

1. Mode in circuit - IM unlocks
2. CL MAP for meridian - 1st lock
3. Find muscle involved off meridian - 1st lock
4. Golgi, spindle or origin & insertion - 1st lock
5. Close circuit
6. Find emotion
7. Test involved muscle

Balance:

1. Balance muscle based on whether it locked or unlocked in evaluation

Spindle - 'push to mush' in muscle belly (if muscle locked) / lengthen to strengthen in muscle belly (if muscle unlocked)

Golgi - 'separate to sedate' at ends of muscle (if muscle locked) / together to tonify at ends of muscle (if muscle unlocked)

Origin & insertion - press into ends of muscle and 'jiggle' (while client visualises the muscle fibres reattaching or being reinforced) (do the same process whether the muscle locked or unlocked)

Checking changes:

1. Retest muscle
2. Check emotion
3. Check mode

Notes:

Spindle cells:

Both the length and the rate of change in the length of the muscle are monitored by the neuromuscular spindle cell mechanism that is built into the belly of muscles.

Golgi tendons:

Muscle tension (tone) and the rate of change of tension are both measured by the golgi tendon apparatus, located near the origin and insertion of muscles.

Origin & Insertion:

The integrity of the muscular attachments is partially maintained by the O & I mechanism. Which will switch the muscle off if it is under too much strain rather than the muscle tearing.

Technique Specifics:

Strengthen muscle - spindle cells

LENGTHEN TO STRENGTHEN

Apply light pressure near the belly of the muscle with both thumbs and pull the thumbs apart towards the muscle ends.

Strengthen muscle - golgi tendon apparatus

TOGETHER TO TONIFY

Apply light pressure near both the origin and insertion with the fingers and push towards the centre of the muscle.

Weaken muscle - spindle cells

PUSH TO MUSH

Apply light pressure fairly near the belly of the muscle with both thumbs and push the thumbs together.

Weaken muscle - golgi tendon apparatus

SEPERATE TO SEDATE

Apply light pressure near both the origin and insertion with the fingers and pull away from the centre towards the origin and insertion.