

SOFT TISSUE / TRIGGER POINTS

Fascial Manipulation

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This past November, I was privileged to speak on Graston Technique at the 2nd Fascia Research Conference in Amsterdam. There is much to report about the new material that was presented at the conference, which I will do in this and future articles. I became especially interested at the final day of the six-day conference when I attended a workshop titled "The Fascial Manipulation Technique and Its Biomechanical Model - A Guide to the Human Fascial System." The course was presented by Carla Stecco, MD, an orthopedic surgeon and assistant professor of human anatomy and movement sciences, University of Padova, Italy; and Julie Ann Day, a physiotherapist also from Padova.

Fascial manipulation is a soft tissue technique developed by Luigi Stecco, PT, who over the past 30 years has continually updated his fascial method of treatment. As a fellow "fascist," Luigi and I have communicated over the years and he has sent me a copy of his last two books, which were translated into English. ¹⁻² I highly recommend these texts to anyone interested in soft-tissue treatment.

Luigi's daughter, Carla, and his son, Antonio, the latter of whom is an MD, have been involved in writing many peer-reviewed papers relating to the fascia based on their dissections of fresh cadavers. Much of the information derived from the dissections has verified the fascial treatment points Luigi has mapped out over the human body - treatment points that have effectively solved many patient complaints. He has observed that many of these points are similar to acupuncture points or Travell's trigger points.

A recent paper on fascial manipulation, written in the Journal of Bodywork and Movement

Therapies,³ demonstrated the effectiveness of this method on 28 subjects with chronic posterior brachial pain. The paper explains how fascial anatomy provides a biomechanical explanation for why certain fascial treatment locations are more effective than, for example, any point that happens to be tender. Most of the treatment points are at a distance from the area where the subject experiences pain.

The anatomical studies³ demonstrate a myofascial continuity; for example in the entire posterior upper extremity, provided by muscular insertions onto the fascia. The authors hypothesized "that these muscular insertions allow the fascia to perceive stretch produced by a muscle and that this tension can be transmitted at a distance, both in a distal and a proximal direction." This explanation redefines locations of referred pain that until now have been unexplainable.⁴

At the workshop, it was explained that muscle spindles are embedded in the endomyceum and are parallel with muscle fibers. If fascia is too rigid, it may alter the stretch of the muscle spindle and adversely affect its normal firing. Fascial restrictions may also create an adverse effect on the free nerve endings (which also function as mechanoreceptors), resulting in changes in tissue viscosity⁵ - especially when the restricted fascia is over-stretched. Densified fascia may alter afferent signals, resulting in muscle incoordination along the myokinetic chain and causing abnormal biomechanics,

eventual abnormal muscle compensation and pain. Maintenance of normal fascial physiological elasticity becomes essential for proper neurological function. (This is only a partial explanation of the effect of restrictive myofascial tissue and its adverse effects.)

The best part of my visit to the fascial conference was an invitation to be a guest at the home of Luigi Stecco. Luigi and his wife, Lena, live in a beautiful home in Arzignano, where Luigi practices in his clinic. I was privileged to observe him treating some of his patients. After a thorough case history, he performs a fascial functional examination to determine which myofascial unit is involved. He then determines by palpation the points that he considers causative and may treat one to several points along one or more myofascial units. The patient is often unaware of these tender points.

These points are treated with a compression friction-type massage for up to about two minutes. The patient is asked to designate the pain as a "10" and treatment is continued until the pain reaches about a "5." Luigi seldom treats a patient for more than one visit. Most of the patients he treated were last seen three to 10 years ago for all types of musculoskeletal and visceral complaints.

References

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