

“But Doc, I Think it’s Just a Muscle”

By Dr. Robert DeVincentis

One of the most common statements I hear in my office today is, "but doc, I think it is just a muscle causing my pain". Just a muscle, well if it was only that simple. The muscles in the neck, middle back and lower back all attach to the spine. These muscles don't just sit in space; they have to attach to the individual vertebrae of the spine. Therefore, if these muscles go into spasm or become hypertonic (extremely tight), they will affect the mobility and alignment of each and every vertebrae that they attach to. If the vertebrae are fixated or don't move independently of each other or are misaligned, there will be irritation to both the discs and the nerves which are between the vertebrae. So you see, the majority of the time, it is a lot more than "just a muscle". It is called the neuromusculoskeletal system because the muscles, nerves, and bones worked together with each other. The muscles attach to the bones and the nerves travel in between the bones. And lets not forget the discs that are between each vertebra.

One very important concept to also understand about muscles is the concept of muscle "guarding". So many patients in my office have such extremely tight muscles, yet they were not lifting anything or suffered any injury to cause the muscle to go into spasm. So the question is, what could cause these muscles to go into spasm? The human body is extremely smart and adaptive to its surroundings. Whenever there is a hidden injury or problem with the spine, discs or nerves, the body says hold on, we have a problem. The brain will then tell the muscles that surround the injured area to tighten up and not let the spine move as a protective mechanism to prevent further injury to the spine. This is called muscle guarding. This is a great thing that the body does this, but if this guarding continues for an extended period of time we will have a problem.

A second common question I here is: Well does the muscle go into spasm first and then fixate and misalign the vertebrae or does the vertebrae fixate and misalign and then cause the muscle to guard this and go into spasm? The answer is that it can happen either way and each case is different. This will usually be determined by doing a thorough case history on a patient.

Regardless, when treating these conditions it is important to treat both aspects. In other words, treat both the muscle and the vertebral fixation/ misalignment. This way instead of temporary relief you will get longer lasting relief. If you only treat one part of the whole problem you will not get complete relief that stays. This is why chiropractic physicians and neuromuscular therapists should work hand in hand.

Another non-traumatic cause of muscle spasms and tightness is through repetitive motion injuries. This is when there is no specific trauma or overload to a muscle, but rather a cumulative micro-trauma to the affected area. A specific example of this is a preschool teacher who has his or her head looking down all day to help children. Holding the weight of their head that is bent forward for a few seconds is no problem, but do this for hours each day and the muscles will remain tight and be over-worked from constantly holding the head. Another example is typing at the keyboard improperly. If you don't have a pull out tray for your keyboard and you have to lift your arms and reach for the keys you will develop extremely tight upper back and neck muscles. Holding your arms out for a few seconds may be fine, but do this for hours and you will get stiff shoulder and neck muscles. Remember, as stated in a previous article, the muscles that hold out the arms are actually located at the base of the neck and upper back area.

The medical or allopathic treatment for these neuromusculoskeletal conditions is usually a prescription of muscle relaxors. If the condition is caused primarily from the muscle guarding or from repetitive motion, this may help temporarily. The medication will cause the muscle to relax and therefore ease the pressure off the spine and vertebrae and restore the mobility. However, when the medication wears off, and the underlying problem is not corrected, the muscle will go right back into spasm and fixate and misalign the vertebrae. Side effects of this medication are also a consideration. Muscle relaxors not only affect the tight muscles that cause the problem, but they affect the heart muscle and gastrointestinal muscles that aid in digestion.

In summary, the next time you say to yourself or your doctor, **“it’s probably just a muscle”**, ask yourself these four questions:

1. Where and what do these muscles attach to (the spine and vertebrae)
2. What will these tight muscles cause the vertebrae to do (become fixated and misaligned)

3. What is between each of the vertebrae (discs and nerves)

4. What will these fixations and misalignments eventually cause (pain, disc degeneration and nerve pressure). To get complete relief of your symptoms you must treat all aspects of the condition, the muscle and the bone. Remember, that is why it is called the neuro-musculo-skeletal system.

*Dr. Robert DeVincentis owns a sports chiropractic clinic located on
Beach Blvd. near San Pablo and can be reached at 223-1616.
www.doctor-d-chiro.com*