

STRAIN or SPRAIN? THAT IS THE QUESTION!

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Strains are amongst the most common injuries sustained during activities of daily living, work duties, recreation, hobbies and sports. **When you hear the word strain, think of muscle and or tendon involvement.** Muscle and tendon perform as a unit and must be working properly for pain free movement. A strain is damage to some part of the unit (muscle, tendon or the attachment to bone) occasioned by overuse (chronic strain) or overstress (acute strain). Mild, moderate and severe strains are also classified as first, second and third degree or Grade I, II or III strains respectively. The strain will occur at the weakest link of the muscle tendon unit. When stress occurs the tendon may rupture, the muscle tendon junction may give way or the damage may be to the muscle itself (a contusion or hematoma) or to its boney attachment. Impairment of any part of the unit affects the whole. Each part must be restored to its normal condition if normal function is to be maintained.

When there is chronic muscle strain from over function, the muscle fatigues but we keep going like the energizer bunny and then muscle spasms and myositis (inflammation of the muscle) and ischemia (localized obstruction of blood flow) develop. Irritation and inflammation of the musculotendinous junction or tenosynovitis along the tendon or at its attachment site to the bone may also occur.

Sprains are injuries to the ligament resulting from overstress which causes some degree of damage to the ligament fibers or their attachment to bone. If the attachment site pulls loose with a fragment of bone it is called an avulsion fracture. **When you hear the word sprain, think of ligament and joint stability.** Ligament holds bone to bone and is designed to prevent abnormal motion of a joint while permitting normal functional joint motion. A blow to a ligament can also be called a contusion, just like a blow to a muscle. If we overstretch a joint or force joint motion causing abnormal joint motion, then instability of the joint will result. The joint will feel sloppy or lax with motion. Ligamentous laxity can be mild, moderate or severe. Sprains are also classified as first, second and third degree or Grade I, II or III sprains respectively. If the joint is severely lax, a third degree or Grade III sprain, a dislocation, an actual displacement of one of the bones of the joint can occur. If the bone displaces and returns to its original position or partially dislocates then it is called subluxation.

Sprains or strains require prompt physical therapy to prevent irregular tissue formation during the process of healing. This is how we get adhesions or scar tissue build up that causes pain and prevents motion, activity and sport.

You can accomplish a speedy recovery by contacting us and **make an appointment within 48 hours** to get the quickest recovery results. You can expect a thorough evaluation of the injury site, immediately followed by controlling inflammation or swelling, pain reflex release techniques to break the painful spasm, joint limitation cycle, joint mobilizations, strengthening and stretching, posture education, functional activities, sports specificity training and of course instruction on what you need to do at home to manage your problem such as home self - care pain management and exercise. We will be able to identify if your injury is severe requiring an orthopedic consultation.

For more information about Lake Country Physical Therapy and Sportscare, PC, please call (585) 396-1400, email Zoe@lakecountrypt.com, Robert @lakecountrypt.com or visit us at www.lakecountrypt.com.