



**CLAIMS EVAL**

*Utilization Review and  
Peer Review Services*

## Notice of Independent Review Decision-WC

**DATE OF REVIEW: 5-25-11**

**IRO CASE #:**

### **DESCRIPTION OF THE SERVICE OR SERVICES IN DISPUTE**

Trigger Point Injection at the Right Bicep Tendon between 4/18/11 and 6/17/11;  
1 Intra-articular Steroid Injection at the Right Shoulder between 4/18/11 and 6/17/11

### **A DESCRIPTION OF THE QUALIFICATIONS FOR EACH PHYSICIAN OR OTHER HEALTH CARE PROVIDER WHO REVIEWED THE DECISION**

American Boards of Physical Medicine and Rehabilitation and Pain Management

### **REVIEW OUTCOME**

Upon independent review the reviewer finds that the previous adverse determination/adverse determinations should be:

Upheld

(Agree)

Overturned (Disagree)

Partially Overturned (Agree in part/Disagree in part)

Provide a description of the review outcome that clearly states whether or not medical necessity exists for each of the health care services in dispute.

### **INFORMATION PROVIDED TO THE IRO FOR REVIEW**

- 3-1-11 DC., office visit.
- 3-12-11 MRI of the right shoulder.
- 3-28-11 MD., office visit.
- 3-30-11 DC., office visit.
- 3-31-11 Letter of causation provided by DC.
- 4-4-11 MD., performed a Utilization Review.
- 4-5-11 MD., office visit.
- 4-12-11 MD., performed a Peer Review.
- 4-18-11 DC., provided a request for reconsideration.
- 4-21-11 MD., performed a Utilization Review.
- 5-9-11 North side pain relief notes.

### **PATIENT CLINICAL HISTORY [SUMMARY]:**

DC., the claimant is a male who was involved in an occupational-related injury while employed by the on xx/xx/xx On the day of injury, the patient was required to stop a water leak. The patient was sitting on the pipe that was leaking and was using a wrench to tighten a clamp. The patient experienced the immediate onset of pain in the right shoulder with cervical and low back pain experienced the following day. The patient was evaluated at the Center at the request of his company. Plain film radiographs were obtained of the shoulder region. The patient informed the examining doctor of pain in the cervical and lumbar regions, but he reports the doctor was only interested in the right shoulder. The claimant has continued working with light duty restrictions, but reports his employer is not respecting the light duty modifications and making him perform at full duty status. Due to symptoms not improving the patient decided to seek

additional medical assistance for his condition. The patient has been approved to change treating doctors and presents today for initial examination. The patient presents complaining of pain over the cervical, lumbar, mid right shoulder regions. He rates the pain 5-6/10 on a 10 cm visual analog scale that is frequent in nature. Pain travels down the right arm to the hand when performing push and pull type activities. He lists exacerbating activities as heavy lifting while at work with palliative activities listed as pain medication. On exam, (+) Minor's sign is noted when rising from a seated position. Palpatory assessment identifies moderate muscle spasm over the cervical and upper thoracic paravertebral and right scapular musculatures. Mild muscle spasm is present in the lumbar paravertebral musculatures bilateral. Palpatory tenderness is noted in the cervicothoracic paravertebral (right worse than left), right AC joint, right bicipital groove, and right scapular musculatures. Trigger point formation is identified over the thoracolumbar paravertebral region on the right. Diagnoses: Cervical sprain/strain, versus cervical IVD, lumbar sprain/strain versus lumbar IVD, cervical radiculitis, and shoulder sprain/strain versus shoulder internal derangement. Plan: Refer for plain film radiographs and MRI of the cervical, lumbar, and right shoulder regions to rule out significant osseous and soft tissue, schedule for medical evaluation for medication management, obtain medical records for the Medical Center, and recommend a physical medicine and rehabilitation program to be performed three times a week for four weeks to address range of motion deficits, muscle spasm, and inflammation.

3-12-11 MRI of the right shoulder shows moderate to marked right AC joint hypertrophic degenerative changes with mild lateral sloping of the acromion. Mild supraspinatus and infraspinatus tendinopathy. Consider correlation with MRI of the right shoulder arthrogram to better evaluate if clinically warranted.

3-28-11 MD., provided a prescription for Naproxen 500 mg, Zestoretic. The claimant reports that therapy has helped a lot.

3-30-11 DC, the claimant reports his right shoulder is improving. The lumbar region and cervical region has not been treated, as they have not been approved as compensable. The claimant continues to have pain in the neck and low back. The claimant has returned to work with restrictions. The claimant is pending evaluation with ortho due to findings on shoulder MRI. The claimant is pending MRI of the cervical spine and lumbar spine. The claimant is to continue with physical medicine and rehabilitation.

3-31-11 Letter of causation provided by DC, " This letter is written to explain the mechanism and areas of pain report a by the patient as identified by clinical presentation. It appears the carrier has only accepted the right shoulder as being the area of compensable injury despite the mechanism of injury, pain complaint of the patient, and clinical findings. It should be reminded patient is a male who was involved in an occupational-related injury while employed by the on xx/xx/xx when the patient was required to stop a water leak. The patient was sitting on top of large pipe that was leaking utilizing a very large wrench to tighten a clamp. As he was leaning back with his full force and body weight to tighten the clamp he experienced the immediate onset of pain in the right shoulder with cervical and low back pain experienced the following day.

It appears the forceful contraction of the cervical and lumbar musculatures while performing full extension strength of the back and upper body caused injury to the low back and cervical spinal regions. The patient was evaluated by the company physician at the request of his employer who only evaluated the patient's right shoulder despite the patient informing the examining physician of pain in the neck and low back regions. The patient informed the examining doctor of pain in the cervical and lumbar regions, but he reports the doctor was only interested in the right shoulder. The patient was returned to work with light duty restrictions. The patient has continued to remain working on light duty status with treatment performed to the right shoulder only as authorized by his carrier. Pain continues to be experienced in the cervical and lumbar regions that have been unable to be treated due to the pre-authorization process. MRI of the right shoulder was obtained that identified AC joint hypertrophic changes with mild sloping of the acromion and mild supraspinatus and infraspinatus tendinopathy. Forces exerted by the patient were enough to cause injury to the shoulder and should be understood to have been enough to cause injury to the cervical and lumbar regions. MRI of the cervical and lumbar regions has not been able to gain authorization from the carrier. The patient is diagnosed with Rotator Cuff Syndrome, cervical sprain/strain versus cervical IVD, lumbar sprain/strain versus lumbar IVD, and cervical radiculitis.

4-4-11 MD., performed a Utilization Review. It was her opinion that the requests for right shoulder intraarticular steroid injection and right biceps trigger point injection were referenced in the submitted referral slip with the diagnoses of right shoulder pain, bursitis and right biceps tendonitis. There is no documentation from the referring physician of a recent patient assessment to substantiate the medical necessity of the proposed injections. Per medical report dated 3/1/11 signed by a different practitioner, the patient is complaining of right shoulder pain rated at 5-6/10 with radiation down the right arm to the hand during push and pull type of activities. Physical examination revealed moderate muscle spasm over the cervical and upper thoracic paravertebral and right scapular muscles, mild palpatory tenderness in the cervicothoracic paravertebral areas, positive Cervical Compression test on the right, positive Shoulder Depression, Supraspinatus, Apley's, Daswburns, and Speed's tests in the right shoulder, and significant right shoulder pain on ROM towards end ranges. There is no objective evidence that the patient has maximized benefits from adequate conservative management, including optimized pharmacotherapy, activity modifications, and PT. Regarding the requested right shoulder intraarticular injection, there is no documentation of which specific shoulder joint (glenohumeral, AC) is to be injected. The requested trigger point injection should have been supported by documentation of well-demarcated trigger points in the right biceps with evidence upon palpation of a twitch response as well as referred pain. In consideration of the foregoing issues and the referenced guidelines, the medical necessity of the requested right shoulder intraarticular steroid injection and right biceps trigger point injection has not been fully established.

4-5-11 MD., The patient is a right-hand dominant male who sustained a work related injury. He was employed by xx. and was required to stop a water leak. The patient was sitting on the leaking pipe, using a wrench, to tighten it when he experienced immediate

onset of pain right shoulder as well as neck and low back. He was evaluated at Medical Center at the request of his employer where x-rays were obtained of the right shoulder and he was placed on restricted duty. He complains of right shoulder pain that comes and goes, rates the pain a 6 out of 10. Physical exam: Abduction right shoulder 140, forward elevation 160. Resisted abduction strength 5/5. Impingement signs are positive. Diagnosis: Chronic right shoulder pain x one-and-a-half months, impingement right shoulder, rotator cuff tear right shoulder. Treatment/plan: The patient had 12 sessions of physical therapy, he, three times a week for four weeks and continues to be symptomatic. The evaluator reviewed the MRI findings with the patient and pointed out the positive findings, steroid injection right shoulder in conjunction with supervised active rehab program. Pain medications, muscle relaxants.

4-12-11 MD., performed a Peer Review. It was his opinion that when noting the reported mechanism of injury, the initial clinical findings and the severe ordinary disease of life degenerative changes noted on MRI; there is no causal relationship between the sequela of the compensable event and the current complaints. There was never a mention of a low back situation. The shoulder pain was noted, and the inclusion of the cervical spine scenario is not a function of trying to fix a leak. The marked acromioclavicular joint arthritis, any pathology in the cervical or lumbar spine, and any cervical radiculitis or radiculopathy. When noting how the chiropractic provider expanded this simple shoulder strain to a cervical spine injury, lumbar spine injury and cervical radiculitis in the face of the significant degenerative changes noted on MRI, no treatment would be considered reasonably required to address the sequela of this compensate event.

4-18-11 DC., provided a request for reconsideration. It appears the patient has been recommended to have trigger point injection to the right biceps tendon and intra-articular injection to the right AC joint has been denied by the carrier. A peer review phone call was not received to discuss the request. It appears the denial has been determined by MD. The requested procedures are recommended by the ODG Guidelines and should be allowed to expedite the patients' recovery. The reasons for denial are due to the reviewing physician stating that the patient has not maximized his pharmacotherapy, had activity modifications, and a physical therapy treatment plan. This is incorrect. The patient has continued to utilize pain medications, but does not wish to become addicted to the narcotic medications. The patient has changed his activities of daily living and remains on off work status. The patient has exhausted what the ODG Guidelines has recommended for a therapy treatment plan. The reviewer also reports the right shoulder intra-articular steroid injection and right biceps trigger point injections has not been established. This too is incorrect. The patient has been recommended to have these procedures due to medical literature stating the procedures are beneficial and they are even recommended by the ODG Guidelines. Please reconsider your denial of these requests and allow the patient medical care he is entitled.

4-21-11 MD., performed a Utilization Review. It was his opinion that the request for 1 intraarticular steroid injection at the right shoulder and 1 trigger point injection at the right bicep tendon is non-certified. The patient does have evidence of significant

degenerative changes within the acromioclavicular joint that has not responded to physical therapy. The patient may require further consideration for injections in the right shoulder; however, there is no clinical documentation to support the requested trigger point injections at the right biceps tendon. There is no objective documentation of trigger points at the right biceps tendon that would reasonably require trigger point injections. It is unclear if the patient has been prescribed any type of anti-inflammatories or muscle relaxants that have failed to control the patient's pain. Given the lack of objective findings at the right biceps tendon consistent with trigger points, certification for the request as submitted is not established at this time.

5-9-11 North side pain relief notes the claimant was involved in an injury while trying to stop a leak on a pipe utilizing a wrench to tighten a clamp and felt immediate pain. The claimant has completed 12 sessions of physical therapy. The claimant is pending IRO denial for trigger point injections and intraarticular injection. The claimant complains of cervical, lumbar and right shoulder pain. On exam, the claimant is tenderness to palpation at the right clavicle, upper right trapezius, right paracervical and right upper back. There are muscle spasms at the right paracervical and right upper back. Range of motion of the cervical spine is normal. Range of motion of the right shoulder is painful. Impression: Right shoulder bursitis/pain, right biceps tendonitis, right AC joint bursitis. Plan: Intraarticular steroid injection to the right shoulder, right AC joint, and right biceps tendon, trial of oral steroids. Prognosis is guarded.

**ANALYSIS AND EXPLANATION OF THE DECISION INCLUDE CLINICAL BASIS, FINDINGS AND CONCLUSIONS USED TO SUPPORT THE DECISION.**

BASED ON THE RECORDS PROVIDED, THERE IS NO DOCUMENTATION OF THE TWITCH RESPONSE OR REFERRED PAIN TO WARRANT TRIGGER POINT INJECTIONS. MEDICAL RECORDS DO NOT REFLECT THE CLAIMANT HAS MAXIMIZED CONSERVATIVE CARE TO THE SHOULDER TO WARRANT MORE INVASIVE TYPE TREATMENT. THEREFORE, THE REQUEST FOR TRIGGER POINT INJECTION AT THE RIGHT BICEP TENDON BETWEEN 4/18/11 AND 6/17/11 AND 1 INTRA-ARTICULAR STEROID INJECTION AT THE RIGHT SHOULDER BETWEEN 4/18/11 AND 6/17/11 IS NOT REASONABLE OR MEDICALLY INDICATED.

**ODG-TWC, last update 2-17-11 Occupational Disorders of the Shoulder – Corticosteroid injection:** Recommended as indicated below. Steroid injections compared to physical therapy seem to have better initial but worse long-term outcomes. One trial found mean improvements in disability scores at six weeks of 2.56 for physical therapy and 3.03 for injection, and at six months 5.97 for physical therapy and 4.55 for injection. (Hay, 2003) Variations in corticosteroid/anesthetic doses for injecting shoulder conditions among orthopaedic surgeons, rheumatologists, and primary-care sports medicine and physical medicine and rehabilitation physicians suggest a need for additional investigations aimed at establishing uniform injection guidelines. (Skedros, 2007) There is limited research to support the routine use of subacromial injections for pathologic processes involving the rotator cuff, but this treatment can be offered to

patients. Intra-articular injections are effective in reducing pain and increasing function among patients with adhesive capsulitis. Although injections into the subacromial space and acromioclavicular joint can be performed in the clinician's office, injections into the glenohumeral joint should only be performed under fluoroscopic guidance. (Burbank, 2008)

*Rotator cuff.* For rotator cuff disease, corticosteroid injections may be superior to physical therapy interventions for short-term results, and a maximum of three are recommended. (Green-Cochrane, 2003) If pain with elevation is significantly limiting activities, a subacromial injection of local anesthetic and a corticosteroid preparation may be indicated after conservative therapy (i.e., strengthening exercises and NSAIDs) for two to three weeks, but the evidence is not yet overwhelming, and the total number of injections should be limited to no more than three. (van der Heijden, 1996) (Green-Cochrane, 2002) (Grant, 2004) A recent meta-analysis concluded that subacromial corticosteroid injection for rotator cuff disease and intra-articular injection for adhesive capsulitis may be beneficial although their effect may be small and not well maintained. (Buchbinder-Cochrane, 2003) On the other hand, for post-traumatic impingement of the shoulder, subacromial injection of methylprednisolone had no beneficial impact on reducing the pain or the duration of immobility. (McInerney, 2003) Subacromial injections of corticosteroids are effective for improvement for rotator cuff tendonitis up to a 9-month period. They are also probably more effective than NSAID medication. Higher doses may be better than lower doses for subacromial corticosteroid injection for rotator cuff tendonitis. (Arroll, 2005) Another recent trial concluded that subacromial injection of betamethasone with lidocaine was no more effective than lidocaine alone in the treatment of patients with chronic rotator cuff tendinosis unresponsive to nonsteroidal anti-inflammatory drugs and physical therapy. They add that despite the popularity of this intervention, they were unable to document any benefit to subacromial corticosteroid injection in these patients. (Alvarez, 2005) Imaging-guided subacromial steroid injection may be of benefit in the short-term management of clinically and MRI-proven subacromial impingement, with 83% of patients reporting symptom relief at 6-month follow-up evaluation. Studies have shown that in many procedures performed without imaging guidance, the needle is not sited in the subacromial bursa, hence steroid is delivered to the peribursal soft tissues at best, and the outcome was better when the injection was accurately placed. (Hambly, 2007) Short-term pain relief provided by subacromial corticosteroid injection is greater vs placebo and is at least equal to that provided by treatment with nonsteroidal anti-inflammatory drugs (level of evidence, B). During physical rehabilitation, corticosteroid injections can help control pain from rotator cuff syndrome. Subacromial injection is helpful to distinguish between shoulder weakness caused by impingement (shoulder strength improves after injection) and true rotator cuff tear (no change in strength). (Stephens, 2008) Modest improvements in self reported complaints and range of motion after steroid injection seen in this and previous studies suggest that steroid injection is not a sufficient treatment strategy for patients with rotator cuff disease. Better outcome in terms of range of motion is reported after attendance at an active physical therapy program. (Ekeberg, 2009)

## **ODG-TWC, last update 5-13-11 Occupational Disorders - Pain – Trigger point**

**injections:** Recommended for myofascial pain syndrome as indicated below, with limited lasting value. The advantage appears to be in enabling patients to undergo remedial exercise therapy more quickly. The primary goal of trigger point therapy is the short-term relief of pain and tightness of the involved muscles in order to facilitate participation in an active rehabilitation program and restoration of functional capacity. TPIs are generally considered an adjunct rather than a primary form of treatment and should not be offered as either a primary or a sole treatment modality. (Scott, 2005) See Myofascial pain. A recent systematic review came to the conclusion that the efficacy of TPIs was no more certain than it was a decade ago, and that there continued to be no clear cut evidence of either benefit or ineffectiveness. There is no evidence-based or consensus research to suggest an optimal technique. The mechanism of inactivation of the trigger point remains unknown. Many consider dry needling as effective as a TPI. It has been suggested that the main effect is placebo. (Cummings, 2001) There are no studies that compare “stretching” treatment alone or “no treatment” to TPIs. Most current studies have evaluated the use of a TPI as a stand-alone treatment. (Scott, 2008) (Staal, 2008)

Indications: The main indication is to inactivate the trigger point in order to reduce pain and restore function. This may enable physical therapy. The injection is also used as a diagnostic tool. (Scott, 2008) *Whiplash and chronic head, neck, shoulder and back pain:* The evidence for TPIs when used as a sole treatment for patients with whiplash syndrome or chronic head, neck, shoulder or back pain (regardless of injectate) is inconclusive and the treatment does not appear to be more effective than treatments such as laser or ultrasound. These injections are not recommended for typical chronic low back or neck pain, nor are they recommended for radicular pain. *Fibromyalgia:* There is no evidence to support trigger point injections for this condition using randomized controlled trials. Uncontrolled trials suggest that dry needling or soft-tissue injections with lidocaine are equally effective. (Goldenberg, 2004) *Cervicogenic headaches:* The effectiveness is unknown. (Scott, 2005) *Osteoarthritis:* There is one randomized controlled trial that indicates that the addition of TPIs to intra-articular injections improves pain and function over and above the latter injection alone. (Yentur, 2003)

Needling procedures: The standard definition of TPIs (also called direct wet needling) involves injecting fluid directly into the trigger point. (Cummings, 2001) Other needling techniques include injection of fluid over the trigger point into the skin or subcutaneous tissue, direct dry needling, or indirect dry needling (the needle is placed superficially or deep into classic acupuncture points or over a tender spot, but not into the trigger point). See Acupuncture.

Injection fluids: The injection of a local anesthetic can reduce the pain of a trigger point. TPIs with an anesthetic such as bupivacaine are recommended for non-resolving trigger points. In addition, the addition of a local anesthetic can reduce the pain of injection. The addition of a corticosteroid is not generally recommended and there is moderate evidence that TPIs with corticosteroids do not produce significantly different results from placebo injections using short-term self reports. Current evidence does not support the use of Botulinum toxin in trigger point injections for myofascial pain. (Ho, 2007) (Peloso, 2007)

Adverse effects: The following have been published in case reports: cervical epidural abscess; accidental intrathecal injection; muscle atrophy at the injection site; pneumothorax; development of asystole. There is also a concern that when used as a primary therapy patients may become dependent on this treatment, diverting from the underlying factors causing and maintaining pain. (Borg-Stein, 2002) Vasovagal responses are the most frequent complication. Other complications include bleeding, cuts or tears to the muscle, injury to nerve fibers, damage to blood vessels, infection, and allergic reactions (including anaphylaxis). Contraindications: Acute cases of muscle trauma; Allergies to anesthetic agents; Bleeding disorders; Local or systemic infection; Anticoagulant use.

Trigger point definitions: A trigger point is a hyperirritable foci located in a palpable taut band of skeletal muscle, which produces a local twitch in response to stimulus to the band. Pain is generally reported on compression, with common evidence of characteristic referred pain. This may or may not be accompanied by an autonomic response. Trigger points may be present in up to 33-50% of the adult population. There is currently no satisfactory objective, biochemical, electromyographic, or diagnostic imaging test to diagnosis trigger points. (Scott, 2008) Active trigger point: Continuous pain is generated in the zone of reference with or without palpitation. Latent trigger point: No evidence of spontaneous pain but evidence of restricted movement and muscle weakness. Primary trigger point: develop independently of other trigger points. Satellite trigger points: result from stress and muscle spasm caused by neighboring trigger points. (Scott, 2005) Myofascial pain syndrome is a regional painful muscle condition with a direct relationship between a specific trigger point and its associated pain region. A cluster of symptoms is noted including pain, autonomic phenomena and muscle dysfunction. Examples of primary myofascial pain syndrome include tennis elbow, frozen shoulder and chronic tension type headache. Secondary myofascial pain is found in the presence of conditions such as whiplash, TMJ dysfunction, and osteoarthritis. Psychosocial factors may contribute to muscle tension and an increase in pain, in particular, anxiety. (Esenyel, 2000) (Nifosi, 2007) (Altindag, 2008) (Graff-Radford, 2004) (BlueCross BlueShield, 2004) (Nelemans-Cochrane, 2002)

Criteria for the use of TPIs (Trigger point injections):

TPIs with a local anesthetic may be recommended for the treatment of chronic low back or neck pain with myofascial pain syndrome when all of the following criteria are met: (1) Documentation of circumscribed trigger points with evidence upon palpation of a twitch response as well as referred pain; (2) Symptoms have persisted for more than three months; (3) Medical management therapies such as ongoing stretching exercises, physical therapy, NSAIDs and muscle relaxants have failed to control pain; (4) Radiculopathy is not present (by exam, imaging, or neuro-testing); (5) No more than 3-4 injections per session; (6) No repeat injections unless a greater than 50% pain relief with reduced medication use is obtained for six weeks after an injection and there is documented evidence of functional improvement; (7) Frequency should not be at an interval less than two months; (8) TPIs with any substance (e.g., saline or glucose) other than local anesthetic with or without steroid are not recommended; (9) There should be evidence of continued ongoing conservative treatment including home exercise and stretching. Use as a sole treatment is not recommended; (10) If pain persists after 2 to 3

injections the treatment plan should be reexamined as this may indicate a lack of appropriate diagnosis, a lack of success with this procedure, or a lack of incorporation of other more conservative treatment modalities for myofascial pain. It should be remembered that trigger point injections are considered an adjunct, not a primary treatment.

**A DESCRIPTION AND THE SOURCE OF THE SCREENING CRITERIA OR OTHER CLINICAL BASIS USED TO MAKE THE DECISION:**

- ACOEM- AMERICAN COLLEGE OF OCCUPATIONAL & ENVIRONMENTAL MEDICINE UM KNOWLEDGEBASE
- AHCPR- AGENCY FOR HEALTHCARE RESEARCH & QUALITY GUIDELINES
- DWC- DIVISION OF WORKERS COMPENSATION POLICIES OR GUIDELINES
- EUROPEAN GUIDELINES FOR MANAGEMENT OF CHRONIC LOW BACK PAIN
- INTERQUAL CRITERIA
- MEDICAL JUDGEMENT, CLINICAL EXPERIENCE AND EXPERTISE IN ACCORDANCE WITH ACCEPTED MEDICAL STANDARDS
- MERCY CENTER CONSENSUS CONFERENCE GUIDELINES
- MILLIMAN CARE GUIDELINES
- ODG- OFFICIAL DISABILITY GUIDELINES & TREATMENT GUIDELINES
- PRESSLEY REED, THE MEDICAL DISABILITY ADVISOR
- TEXAS GUIDELINES FOR CHIROPRACTIC QUALITY ASSURANCE & PRACTICE PARAMETERS
- TEXAS TACADA GUIDELINES
- TMF SCREENING CRITERIA MANUAL
- PEER REVIEWED NATIONALLY ACCEPTED MEDICAL LITERATURE (PROVIDE A DESCRIPTION)
- OTHER EVIDENCE BASED, SCIENTIFICALLY VALID, OUTCOME

**FOCUSED GUIDELINES (PROVIDE A DESCRIPTION)**