



Specialty Independent Review Organization

Notice of Independent Review Decision

DATE OF REVIEW: 3/11/2008

IRO CASE #:

DESCRIPTION OF THE SERVICE OR SERVICES IN DISPUTE

The item in dispute is the prospective medical necessity of transforaminal epidural steroid injection @ bilateral L5 #2 with some reinforced with catheter under fluoroscopy and epidurography (64483, 64484, 77003, 72275, 62311, and 64999).

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

The reviewer is a board certified physical medicine and rehabilitation physician with greater than 10 years of experience in this field.

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)

The reviewer disagrees with the previous adverse determination regarding the prospective medical necessity of transforaminal epidural steroid injection @ bilateral L5 #2 with some reinforced with catheter under fluoroscopy and epidurography (64483, 64484, 77003, 72275, 62311, and 64999).

INFORMATION PROVIDED TO THE IRO FOR REVIEW

Records were received and reviewed from the following parties:

MD

These records consist of the following (duplicate records are only listed from one source): Records received from MD: Dr. reconsideration letter-1/17/08; Dr. Follow-up notes-12/19/07-9/18/07; Dr. initial patient consult-8/21/07; Imaging

Center MRI lumbar spine, cervical spine, left knee and right shoulder-10/2/07; and Dr. operative report-11/29/07.

Records received from: denial letter-1/3/08, second denial letter-2/8/08; Print notes-2/7/08-1/3/08; Specialty Clinic pre-authorization request-12/28/07; DO DDE report-12/18/07

A copy of the Official Disability Guidelines was not provided for this review.

PATIENT CLINICAL HISTORY [SUMMARY]:

The patient was injured when tripping on the job. A lumbar MRI on xx/xx/xx verified L4-5 DDD with facet hypertrophy causing central and lateral stenosis and facet hypertrophy at L5-S1. She underwent ESI on 11/29/2007, noted 40-50% improvement, and denied complications. ESI was done via transforaminal cannulization at L5-S1 bilaterally and insertion under fluoroscopic guidance to L4-5 level. The clinical examination revealed SLR to be less intense and full with normal neurological examination on 12/19/07. This improved compared to the examination documented on 10/23/2007. At this time he documents SLR is positive at 45 degrees. Restrictions in lumbar AROM is also observed.

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

According to the ODG:

Recommended as a possible option for short-term treatment of radicular pain (defined as pain in dermatomal distribution with corroborative findings of radiculopathy) with use in conjunction with active rehab efforts. See specific criteria for use below. Radiculopathy symptoms are generally due to herniated nucleus pulposus or spinal stenosis, although ESIs have not been found to be as beneficial a treatment for the latter condition.

Short-term symptoms: The American Academy of Neurology recently concluded that epidural steroid injections may lead to an improvement in radicular pain between 2 and 6 weeks following the injection, but they do not affect impairment of function or the need for surgery and do not provide long-term pain relief beyond 3 months. Epidural steroid injection can offer short-term pain relief and use should be in conjunction with other rehab efforts, including continuing a home exercise program. There is little information on improved function or return to work. There is no high-level evidence to support the use of epidural injections of steroids, local anesthetics, and/or opioids as a treatment for acute low back pain without radiculopathy.

Use for chronic pain: Chronic duration of symptoms (> 6 months) has also been found to decrease success rates with a threefold decrease found in patients with symptom duration > 24 months. The ideal time of either when to initiate treatment or when treatment is no longer thought to be effective has not been determined. Indications for repeating ESIs in patients with chronic pain at a level previously injected (> 24 months) include a symptom-free interval or indication of a new clinical presentation at the level.

Transforaminal approach: Some groups suggest that there may be a preference for a transforaminal approach as the technique allows for delivery of medication at the target tissue site, and an advantage for transforaminal injections in herniated nucleus pulposus over translaminar or caudal injections has been suggested in the best available studies. This approach may be particularly helpful in patients with large disc herniations, foraminal stenosis, and lateral disc herniations. *Fluoroscopic guidance:* Fluoroscopic guidance with use of contrast is recommended for all approaches as needle misplacement may be a cause of treatment failure. *Factors that decrease success:* Decreased success rates have been found in patients who are unemployed due to pain, who smoke, have had previous back surgery, have pain that is not decreased by medication, and/or evidence of substance abuse, disability or litigation. Research reporting effectiveness of ESIs in the past has been contradictory, but these discrepancies are felt to have been, in part, secondary to numerous methodological flaws in the early studies, including the lack of imaging and contrast administration. Success rates also may depend on the technical skill of the interventionalist. Also see Epidural steroid injections, “series of three” and Epidural steroid injections, diagnostic. ESIs may be helpful with radicular symptoms not responsive to 2 to 6 weeks of conservative therapy. As noted above, injections are recommended if they can facilitate a return to functionality (via activity & exercise). If post-injection physical therapy visits are required for instruction in these active self-performed exercise programs, these visits should be included within the overall recommendations under Physical therapy, or at least not require more than 2 additional visits to reinforce the home exercise program.

Criteria for the use of Epidural steroid injections:

Note: The purpose of ESI is to reduce pain and inflammation, restoring range of motion and thereby facilitating progress in more active treatment programs, and avoiding surgery, but this treatment alone offers no significant long-term functional benefit.

(1) Radiculopathy must be documented. Objective findings on examination need to be present. For unequivocal evidence of radiculopathy, see AMA Guides, 5th Edition, page 382-383.

(2) Initially unresponsive to conservative treatment (exercises, physical methods, NSAIDs and muscle relaxants).

(3) Injections should be performed using fluoroscopy (live x-ray) and injection of contrast for guidance.

(4) At the time of initial use of an ESI (formally referred to as the “diagnostic phase” as initial injections indicate whether success will be obtained with this treatment intervention), a maximum of two injections should be performed. A second block is not recommended if there is inadequate response to the first block. A second block is also not indicated if the first block is accurately placed unless: (a) there is a question of the pain generator; (b) there was possibility of inaccurate placement; or (c) there is evidence of multilevel pathology. In these cases a different level or approach might be proposed. There should be an interval of at least one to two weeks between injections. To be considered successful after this initial use of a block/blocks there should be documentation

of at least 50-70% relief of pain from baseline and evidence of improved function for at least six to eight weeks after delivery.

(5) No more than two nerve root levels should be injected using transforaminal blocks.

(6) No more than one interlaminar level should be injected at one session.

(7) In the therapeutic phase (the phase after the initial block/blocks were given and found to produce pain relief), repeat blocks should only be offered if there is at least 50-70% pain relief for six to eight weeks, with a general recommendation of no more than 4 blocks per region per year.

(8) Repeat injections should be based on continued objective documented pain relief, decreased need for pain medications, and functional response.

(9) Current research does not support a routine use of a "series-of-three" injections in either the diagnostic or therapeutic phase. We recommend no more than 2 ESI injections for the initial phase and rarely more than 2 for therapeutic treatment.

(10) It is currently not recommended to perform epidural blocks on the same day of treatment as facet blocks or sacroiliac blocks or lumbar sympathetic blocks as this may lead to improper diagnosis or unnecessary treatment.

(11) Cervical and lumbar epidural steroid injection should not be performed on the same day.

The criteria for ESI per the ODG appear to have been met as follows:

1. A review of box 12-4, page 382-383 in the **AMA Guides to Evaluation of Permanent Impairment, 5th Ed** is performed.

"Radiculopathy for the purposes of the **Guides** is defined as significant alteration in the function of a nerve root or nerve roots and is usually caused by pressure on one or several nerve roots. The diagnosis requires a dermatomal distribution of pain, numbness, and/or paresthesias in a dermatomal distribution. A root tension sign is usually positive. The diagnosis of herniated disk must be substantiated by an appropriate finding on an imaging study. The presence of a finding on an imaging study in and of itself does not make the diagnosis of radiculopathy. There must be clinical evidence as described above.

In this case the patient has not had electrodiagnostic studies to assist in verifying radiculopathy.

In this case the DDE reveals no evidence of root tension signs.

However, Dr. clinical examination reveals nerve root sign (SLR) before the initial ESI. A follow up examination indicates diminished nerve root sign and improved symptoms by up to 50%. This finding assists one in verifying the presence of radiculopathy as the initial ESI is used as a diagnostic as well as therapeutic intervention.

2. Prior to the initial ESI attempt, the patient has been unresponsive to conservative measures.

3. The proposed ESI is to be done under Fluoroscopic guidance.

4. A follow up examination indicates diminished nerve root sign and improved symptom by up to 50% after the initial ESI trial.

5. Only one root level is to be addressed.

6. this is to be done via catheterization transforaminally at one level at L5-S1 with advancement of the cannula to the L4-5 level.
 7. A follow up examination indicates diminished nerve root sign and improved symptom by up to 50% after the initial ESI trial.
 8. The second injection is recommended based on clinical evidence of a positive response to the initial trial.
 9. This is not applicable at this point of treatment.
 10. This is not applicable at this point of treatment.
 11. This is not applicable at this point of treatment.
- Given that the criteria for ESI per the ODG have been met, the proposed ESI is determined to be medically necessary.

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)**