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Subject: Manipulation Under Anesthesia

THIS MEDICAL COVERAGE GUIDELINE IS NOT AN AUTHORIZATION, CERTIFICATION, EXPLANATION OF BENEFITS, OR A GUARANTEE OF PAYMENT, NOR DOES IT SUBSTITUTE FOR OR CONSTITUTE MEDICAL ADVICE. ALL MEDICAL DECISIONS ARE SOLELY THE RESPONSIBILITY OF THE PATIENT AND PHYSICIAN. BENEFITS ARE DETERMINED BY THE GROUP CONTRACT, MEMBER BENEFIT BOOKLET, AND/OR INDIVIDUAL SUBSCRIBER CERTIFICATE IN EFFECT AT THE TIME SERVICES WERE RENDERED. THIS MEDICAL COVERAGE GUIDELINE APPLIES TO ALL LINES OF BUSINESS UNLESS OTHERWISE NOTED IN THE PROGRAM EXCEPTIONS SECTION.

Position Statement	Billing/Coding	Reimbursement	Program Exceptions	Definitions	Related Guidelines
Other	References	Updates			

DESCRIPTION:

Manipulation is intended to break up fibrous and scar tissue to relieve pain and improve range of motion. Anesthesia or sedation is used to reduce pain, spasm, and reflex muscle guarding that may interfere with the delivery of therapies and to allow breaking up joint and soft tissue adhesions with less force than would be required to overcome resistance or apprehension. Manipulation under anesthesia is generally performed with an anesthesiologist in attendance. Manipulation under anesthesia is an accepted treatment for isolated joint conditions, such as arthrofibrosis of the knee and adhesive capsulitis. It is also used to reduce fractures (eg, vertebral, long bones) and dislocations.

Summary and Analysis of Evidence: UpToDate review "Frozen shoulder (adhesive capsulitis)" (Hudnall, 2024) states, "Manipulation of the shoulder has proven to be effective; however, it does not allow for a controlled release of the pathologic tissue restricting motion and carries an increased risk of humerus fracture and intraarticular shoulder injury. Arthroscopic release is now more commonly performed." Rangan et al (2020) conducted a randomized trial with 503 patients with severe symptoms of frozen shoulder of at least 9 to 10 months. Participants were assigned to treatment with manipulation under anesthesia, arthroscopic capsular release (ACR), or structured physiotherapy. Manipulation and ACR were followed by post-procedural physical therapy. Supplemental glucocorticoid injection was given to patients treated with manipulation but was optional in the ACR group. Physical therapy involved mobilization techniques and a graduated home exercise program supplemented by a glucocorticoid injection. At 12-month follow-up, differences in a validated score of shoulder function (Oxford Shoulder Score 0-48) among the ACR, manipulation, and physical therapy groups reached statistical significance favoring ACR, but the differences were unlikely to be clinically important. ACR carried a significantly higher risk of adverse events, which included chest infection, stroke, and deep vein thrombosis.

UpToDate review "Complications of total knee arthroplasty" (Martin, Harris; 2024) states, "Arthrofibrosis refers to a postoperative limitation of range of motion resulting from scar tissue

formation that may result in functional impairment. Although there are no universally accepted criteria to diagnose stiffness, studies have shown that patients require the following amounts of knee flexion for different activities: 67 degrees to complete the swing phase of gait, 83 degrees to ascend stairs,100 degrees to descend stairs, 93 degrees to rise from a standard chair, and up to 105 degrees to rise from a low chair. Stiffness may be caused by patient-related (preoperative) factors, technical (intraoperative) factors, and numerous postoperative factors (patient compliance with therapy, heterotopic bone, infection, pain syndromes). The best predictor of postoperative stiffness is preoperative range of motion. Treatments include MUA, arthroscopic lysis of adhesions, and revision knee replacement. MUA is safest and most effective if performed within the first three postoperative months." Baum et al (2018) reviewed 78 patients who underwent MUA using a novel technique between 2011 and 2016. Mean age at the time of MUA was 61.4 years. The majority of patients requiring MUA had primary TKA as the index procedure (69/78). Of the remaining patients, 5 patients had a revision TKA and 4 had a unicompartmental knee replacement prior to manipulation. The average time from TKA to MUA was 60.2 days. A total of 5 complications were observed. Two patients had ongoing stiffness and required repeat MUA, 2 patients required revision total knee for continued stiffness, and 1 patient had a thigh hematoma and continued stiffness. There were no reported fractures or extensor mechanism disruptions. Evaluation of ROM demonstrated that knee extension remained unchanged from pre-MUA to post-MUA, but that significant improvement in flexion was achieved. At 1 year follow-up, 52 of 78 patients had ROM data available. Flexion remained significantly improved compared to pre-MUA.

No high-quality RCTs on spinal manipulation under anesthesia (MUA) have been identified. Peterson et al (2014) reported on a prospective study of 30 patients with chronic pain (17 lower back, 13 neck) who underwent a single MUA session with follow-up at 2 and 4 weeks. The primary outcome measure was the Patient's Global Impression of Change. At 2 weeks, 52% of the patients reported clinically relevant improvement (better or much better), with 45.5% improved at 4 weeks. There was a statistically significant reduction in numeric rating scale scores for pain at 4 weeks, from a mean baseline score of 4.0 to 3.5 at 2 weeks post-MUA. Bournemouth Questionnaire scores improved from 24.17 to 20.38 at 2 weeks and 19.45 at 4 weeks. This study lacked a sham group to control for a potential placebo effect. Also, the clinical significance of improved numeric rating scale and Bournemouth Questionnaire scores is unclear. A comprehensive review of the literature by Digiorgi (2013), described studies by Kohlbeck et al (2005), and Palmieri and Smoyak (2002) as being the best evidence available for medicine-assisted manipulation and MUA of the spine. Kohlbeck et al (2005) reported on a nonrandomized comparative study that included 68 patients with chronic low back pain. All patients received an initial 4- to 6-week trial of spinal manipulation therapy, after which 42 patients received supplemental intervention with MUA and 26 continued with spinal manipulative therapy. Low back pain and disability measures favored the MUA group over the spinal manipulative therapy only group at 3 months. This difference attenuated at 1 year. The relative odds of experiencing a 10-point improvement in pain and disability favored the MUA group at 3 months. Palmieri and Smoyak (2002) evaluated the efficacy of self-reported questionnaires to study MUA in a convenience sample of 87 subjects from 2 ambulatory surgery centers and 2 chiropractic clinics. Thirty-eight patients with low back pain received MUA and 49 received traditional chiropractic treatment. A numeric rating scale for pain and the Roland-Morris Disability Questionnaire were administered at baseline, after the procedure, and 4 weeks later. Average pain scale scores in the MUA group decreased by 50% and by 26% in the traditional treatment group; Roland-Morris Disability Questionnaire scores decreased by 51% and 38%, respectively. Although the authors concluded that the study supported the need for large-scale studies on MUA and that the assessments

were easily administered and dependable, no large-scale studies comparing MUA with traditional chiropractic treatment have been identified.

POSITION STATEMENT:

Manipulation under anesthesia (MUA) **meets the definition of medical necessity** for the following:

- Adhesive capsulitis of the shoulder (e.g., frozen shoulder), defined by **ALL** of the following:
  - Refractory/progressive shoulder pain with functional limitations for at least 6 weeks, **AND**
  - Persistent limited (at least 50% reduction) active and passive glenohumeral motion, **AND**
  - Failure of at least 6 weeks of conservative medical management that included the following:
    - Analgesics and/or corticosteroids, unless contraindicated, **AND**
    - At least 4 weeks of physical therapy
- Post-surgical or post-trauma arthrofibrosis of the knee
- Post-surgical arthrofibrosis of joints other than the shoulder or knee, where there is significant decreased range of motion (ROM) unresponsive to conservative therapy, which included at least 6 weeks of physical therapy and appropriate splinting
- As a treatment modality for radiographically-confirmed joint dislocations at any joint

Spinal manipulation under anesthesia (SMUA) is considered **experimental or investigational**. There is insufficient evidence from the available peer-reviewed literature to conclude that spinal manipulation under anesthesia is an effective method of treatment for musculoskeletal problems.

Manipulation under anesthesia (MUA) performed for other joint disorders of the body not listed above is considered **experimental or investigational**. There is insufficient published clinical evidence to support the safety and effectiveness of this method of treatment for these applications.

Spinal manipulation and manipulation of other joints under anesthesia involving serial treatment sessions is considered **experimental or investigational**. Available clinical evidence is insufficient to support effectiveness of MUA for this application.

Manipulation under anesthesia involving multiple body joints is considered **experimental or investigational** for treatment of chronic pain. There is insufficient published clinical evidence to support the safety and effectiveness of MUA involving multiple body joints concurrently.

LOINC Codes:

The following information may be required documentation to support medical necessity: physician history and physical, physician treatment notes including documentation of failure conservative medical management, treatment plan, radiology and surgical reports, physical therapy notes (if applicable).

Documentation Table	LOINC Codes	LOINC Time Frame Modifier Code	LOINC Time Frame Modifier Codes Narrative
Physician history and physical	28626-0,	18805-2	Include all data of the selected type that represents observations made six months or fewer before starting date of service for the claim.
Physician treatment/ visit notes including documentation of failure of conservative medical management	18733-6	18805-2	Include all data of the selected type that represents observations made six months or fewer before starting date of service for the claim.
Treatment plan	18776-5	18805-2	Include all data of the selected type that represents observations made six months or fewer before starting date of service for the claim.
Radiology study report	18726-0	18805-2	Include all data of the selected type that represents observations made six months or fewer before starting date of service for the claim.
Physician operative note	28573-4	18805-2	Include all data of the selected type that represents observations made six months or fewer before starting date of service for the claim.
Physical therapy notes	28579-1	18805-2	Include all data of the selected type that represents observations made six months or fewer before starting date of service for the claim.

BILLING/CODING INFORMATION:

CPT Coding:

22505	Manipulation of the spine requiring anesthesia, any region (**Investigational**)
23655	Closed treatment of shoulder dislocation, with manipulation; requiring anesthesia
23700	Manipulation under anesthesia, shoulder joint, including application of fixation apparatus (dislocation excluded)
24300	Manipulation, elbow, under anesthesia
25259	Manipulation, wrist, under anesthesia
26340	Manipulation, finger joint, under anesthesia, each joint
26675	Closed treatment of carpalmetacarpal dislocation, other than thumb, with manipulation, each joint, requiring anesthesia

26705	Closed treatment of metacarpophalangeal dislocation, single, with manipulation; requiring anesthesia
26775	Closed treatment of interphalangeal joint dislocation, single, with manipulation; requiring anesthesia
27198	Closed treatment of posterior pelvic ring fracture(s), dislocation(s), diastasis or subluxation of the ilium, sacroiliac joint, and/or sacrum, with or without anterior pelvic ring fracture(s) and/or dislocation(s) of the pubic symphysis and/or superior/inferior rami, unilateral or bilateral; with manipulation, requiring more than local anesthesia (ie, general anesthesia, moderate sedation, spinal/epidural)
27275	Manipulation, hip joint, requiring general anesthesia
27570	Manipulation of knee joint under general anesthesia (includes application of traction or other fixation devices)
27860	Manipulation of ankle under general anesthesia (includes application of traction or other fixation apparatus)

REIMBURSEMENT INFORMATION:

Refer to section entitled **POSITION STATEMENT**.

PROGRAM EXCEPTIONS:

Federal Employee Program (FEP): Follow FEP guidelines.

State Account Organization (SAO): Follow SAO guidelines.

Medicare Advantage products: No National Coverage Determination (NCD) and/or Local Coverage Determination (LCD) were found at the time of the last guideline review date.

If this Medical Coverage Guideline contains a step therapy requirement, in compliance with Florida law 627.42393, members or providers may request a step therapy protocol exemption to this requirement if based on medical necessity. The process for requesting a protocol exemption can be found at **Coverage Protocol Exemption Request**

DEFINITIONS:

Adhesive capsulitis: Constant severe limitation of the range of motion of the shoulder due to scarring around the shoulder joint. Adhesive capsulitis is an unwanted consequence of rotator cuff disease – damage to the rotator cuff, the set of four tendons that stabilize the shoulder joint and help move the shoulder in diverse directions. Diabetes is also a risk factor for adhesive capsulitis. The affected joint is characteristically painful and tender to palpation. Physical therapy and corticosteroid injections (a "cortisone shot" into the joint) are often helpful. Surgery is reserved for more advanced cases.

Appendicular: relating to the limbs, as opposed to axial, which refers to the trunk and head.

Arthrofibrosis: internal scarring of the joint, with consequent stiffness.

Dislocation: a disturbance or disarrangement of the normal relation of the bones entering into the formation of a joint; incomplete dislocation may also be referred to as subluxation.

Subluxation: an incomplete dislocation where a relationship is altered, but contact between joint surfaces remains.

RELATED GUIDELINES:

None applicable.

OTHER:

None applicable.

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COMMITTEE APPROVAL:

This Medical Coverage Guideline (MCG) was approved by the Florida Blue Medical Policy and Coverage Committee on 06/27/24.

GUIDELINE UPDATE INFORMATION:

10/15/07	New Medical Coverage Guideline.
03/25/08	Revisions consisting of removing “Spinal” from title, revision of position statement relating to spinal manipulation under anesthesia and manipulation under anesthesia for other joints, addition of CPT codes related to manipulation under anesthesia.
03/15/09	Scheduled review. No change in position statement. References updated.
03/15/10	Scheduled review; position statement revised to include post-surgical arthrofibrosis; coding section updated; references updated.
09/15/10	Revisions consisting of updating Position Statement regarding adhesive capsulitis and formatting changes.
03/15/11	Scheduled review; position statement unchanged; references updated.
09/15/11	Revision; formatting changes.
06/15/12	Position Statement revised to provide clarification of the coverage criteria; references updated; formatting changes.
09/15/13	Position Statement revised to add clarification regarding post surgical arthrofibrosis; Program Exceptions section updated; formatting changes.
04/15/14	Revision of Billing/Coding Information.
10/15/16	Formatting changes.
01/01/17	Annual CPT/HCPCS update. Added 27198. Deleted 27194.
07/15/18	Scheduled review. Revised description section and criteria for manipulation under anesthesia of the knee. Revised program exceptions section. Updated references.
07/15/19	Scheduled review. Maintained position statement and updated references.
07/15/20	Scheduled review. Maintained position statement and updated references.
11/15/20	Revision, added clarifying language for conservative therapy related to adhesive capsulitis (frozen shoulder).
05/15/22	Scheduled review. Revised description and CPT coding. Maintained position statement and updated references.
08/15/22	Revision of Billing/Coding Information.
05/23/23	Update to Program Exceptions section.
08/15/23	Scheduled review. Revised MUA-shoulder criteria and MUA-knee criteria. Updated references.
07/15/24	Scheduled review. Revised description. Maintained position statement and updated references.