Clinical Practice Guideline: **Joint and Soft Tissue Arthrocentesis, Aspiration, and Injection**

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Product: **Specialty**

GUIDELINES

Arthrocentesis is the puncture of a joint space with a needle in order to aspirate (withdraw) accumulated fluid from the joint and/or to inject an anesthetic agent and/or a steroid agent into the joint to relieve inflammation and pain.

A. American Specialty Health – Specialty (ASH) considers procedures identified with CPT Code 20600, 20605, and 20610 for arthrocentesis, aspiration, and/or injection of small, intermediate, or large joint or bursa allowable for **up to 3 per year per site** (foot is considered one site).

    1. Expectations for this request include the following conditions and symptoms:
        - Mono- or polyarticular joint swelling, warmth, and/or pain;
        - Advanced osteoarthritis, rheumatoid arthritis, and other inflammatory arthritides such as gout, or synovitis or an arthrosis such as turf toe requiring diagnostic aspiration or therapeutic injection of the knee, ankle, or first metatarsophalangeal joints;
        - Large effusions due to traumatic injury to a joint causing pain and/or limited range of motion.

    When a small, intermediate, or large joint or bursa arthrocentesis, aspiration and/or injection (CPT code 20600, 20605, and 20610) is performed, anesthesia may be provided by the surgeon using a digital nerve block (CPT code 64450). Because this type of anesthesia provided by the surgeon performing the procedure is not separately payable, CPT code 64450 is bundled into CPT code 20600, 20605, and 20610 when the same physician performs both procedures.

    After 3 procedures have been performed, the practitioner should re-evaluate and attempt another intervention. If CPT code 20600, 20605, or 20610 is requested again within the year and for the same site, medical necessity review will be directed to like practitioner for peer-to-peer review.

B. Additionally, ASH considers CPT codes 20610 and 20611 to be medically necessary when any of the following indications have been met:
   - A diagnostic procedure for evaluation of joint pain and/or swelling to help establish the etiology (i.e., septic arthritis, gout, rheumatoid arthritis, injury).
   - Periodic treatment of unremitting joint pain that has not responded to alternative or conservative measures including (at minimum) an adequate trial of non-steroidal anti-inflammatory medication or non-narcotic analgesics.
   - Treatment of acute inflammatory conditions when intralesional therapy is the treatment of choice.
   - Treatment of monoarticular conditions where the benefits of periodic steroid injection exceed the risk of systemic therapy.

C. ASH considers procedures identified with CPT Code 20612 for aspiration and/or injection of ganglion cyst(s), any location, allowable for up to 2 per year per site (foot is considered one site).

   Expectations for this request include the following conditions and management:
   - Ganglion cyst(s) is/are noted at any location; AND
   - Patient has failed conservative management consisting of at least 1 of the following:
     - Monitoring, but no treatment. If the cyst causes no pain and does not interfere with walking, the practitioner may decide it is best to carefully watch the cyst over a period of time.
     - Shoe modifications/padding. Wearing shoes that do not rub the cyst or cause irritation may be advised. In addition, placing a pad inside the shoe may help reduce pressure against the cyst.

   After 2 procedures have been performed, the practitioner should re-evaluate and attempt another intervention. If CPT code 20612 is requested again within the year and for the same site, medical necessity review will be directed to like practitioner for peer-to-peer review. When an aspiration and/or injection of ganglion cyst(s) any location (CPT code 20612) is performed, anesthesia may be provided by the surgeon using a digital nerve block (CPT code 64450). Because this type of anesthesia provided by the surgeon performing the procedure is not separately payable, CPT code 64450 is bundled into CPT code 20612 when the same physician performs both procedures.

D. ASH considers (CPT Code 20611) - knee injections with ultrasound guidance- only to be medically necessary when **at least one of the following** requirements has been met and thoroughly documented:
   - History of severe trauma which would derange the normal architecture of the joint.

- Erosive systemic arthritis (rheumatoid disease) or other systemic disease (e.g., lupus, gout).
- Failure of the initial attempt of a knee joint injection.
- Size of the knee due to morbid obesity (BMI ≥ 30) or disease process.
- Aspiration of a Baker's cyst.

Additional repeat treatments allowable for **up to 3 per year per site** (knee is considered one site) are considered medically necessary and can be billed for patients being treated for osteoarthritis of the knee, who meet both of the following criteria:

- Significant improvement in knee pain and known improvement in functional capacity resulted from previous series of injections which has been documented in the record; and
- At least 6 months have lapsed since the prior series of injections.

Other indications for CPT® codes 20604, 20606, and 20611 (arthrocentesis, aspiration and/or injection with ultrasound guidance) may include:

a. Failed palpation-guided procedure.
b. Diagnostic injection where accurate injectate placement is critical for diagnosis.
c. Inability to precisely localize the target using palpation or surface landmarks due to one of the following:
    i. Body habitus
    ii. Congenital, postsurgical, or posttraumatic deformity
    iii. Deep location of the target structure (e.g., flexor hallucis longus tendon at the posterior process of the talus)
d. Therapeutic injection in which therapeutic benefit is predicated on accurate placement.
e. Relatively high risk of complications that can be reduced by ultrasound guidance:
    i. Avoidance of inadvertent tendon injection to reduce rupture risk.
    ii. Proximity to neurovascular structures (i.e., hip) or organs at risk.
    iii. Bleeding risk secondary to anticoagulants or bleeding diathesis.
f. In select patients with significant apprehension about injections to ameliorate procedure- related pain and/or anxiety.

Additional repeat treatments allowable for up to 3 per year per site for codes 20604 (toe is considered one site) and 20606 (ankle is considered one site) upon meeting the criteria listed above.

Refer to ASH clinical practice guideline *Ultrasound and Fluoroscopic (Non-Spinal) Guidance for Needle Placement and Fluoroscopy (Separate Procedure) (CPG 268 - S)* for ultrasound guidelines.

CPT® Codes and Descriptions

CPT® Code	CPT® Code Description
20600	Arthrocentesis, aspiration and/or injection, small joint or bursa (e.g., fingers, toes); without ultrasound guidance
20604	Arthrocentesis, aspiration and/or injection, small joint or bursa (e.g., fingers, toes); with ultrasound guidance, with permanent recording and reporting
20605	Arthrocentesis, aspiration and/or injection; intermediate joint or bursa (e.g., temporomandibular, acromioclavicular, wrist, elbow or ankle, olecranon bursa); without ultrasound guidance
20606	Arthrocentesis, aspiration and/or injection, intermediate joint or bursa (e.g., temporomandibular, acromioclavicular, wrist, elbow or ankle, olecranon bursa); with ultrasound guidance, with permanent recording and reporting
20610	Arthrocentesis, aspiration and/or injection, major joint or bursa (e.g., shoulder, hip, knee, subacromial bursa); without ultrasound guidance
20611	Arthrocentesis, aspiration and/or injection, major joint or bursa (e.g., shoulder, hip, knee, subacromial bursa); with ultrasound guidance, with permanent recording and reporting
20612	Aspiration and/or injection of ganglion cyst(s) any location

DESCRIPTION/BACKGROUND

Joint or Bursa Arthrocentesis, Aspiration, and/or Injection

Arthrocentesis (synovial fluid aspiration) is considered to be a safe and useful procedure. The practitioner performing the procedure should be familiar with the anatomy of the specific joint in order to avoid puncture of tendons, blood vessels, and nerves. Joint aspiration and injection can be both diagnostic and therapeutic because it can facilitate the identification and treatment of pathologic agents as well as provide significant pain relief. There are numerous conditions affecting adults and children that may lead to mono- or polyarticular joint swelling. These conditions can range from rheumatic to infectious to idiopathic, and thorough investigations of each may require specific serologic studies or specialist consultation. Diagnostic aspiration or therapeutic injection of the ankle or first metatarsophalangeal joints can be performed for management of advanced osteoarthritis, rheumatoid arthritis, and other inflammatory arthritides such as gout, or synovitis or an arthrosis such as ‘turf toe.’ Synovial fluid aspiration may be indicated in any joint with an

effusion, or even in a normal-appearing joint when the diagnosis is in doubt. There are many causes for joint effusions in adults and children. Traumatic injury to a joint may cause hemarthrosis and effusions ranging from small to large, tense, and painful. Aspiration of large traumatic effusions can ease pain and can permit increased range of motion.

Contraindications

Diagnostic arthrocentesis has few contraindications. Introduction of organisms into the joint space is of concern, therefore periarticular cellulitis, septicemia, or infections are considered contraindications to joint aspiration. The concern is that the joint might be seeded by organisms of the overlying skin infection during percutaneous access. However, if the joint is believed to be the cause of the infection, diagnostic aspiration should be performed. Also, in patients with bleeding disorders or who are taking anticoagulants, joint aspiration is contraindicated. Inducing traumatic hemarthrosis is also a concern. However, the risk of significant hemarthrosis after arthrocentesis is low (Bettencourt & Linder, 2010).

Ganglion Cysts

Intraneural ganglion cysts are rare, benign, mucinous lesions that originate from a tendon sheath or joint capsule and are often found near joints affecting neighboring nerves or vessels. Extraneural cysts are more common and extrinsically compress nerves, whereas intraneural ganglia are located within the perineurium or epineurium and most commonly found at the fibular neck involving the common peroneal/fibular nerve. Although these cysts are often palpable masses, patients with intraneural ganglion cysts often complain of motor weakness, paresthesias, muscle cramping, and/or atrophy with localized or referred pain. Aspiration and injection of corticosteroids has found use as a minimally invasive alternative to surgery for the management of intraneural ganglion cysts (Liang et al.,2013).

A ganglion cyst may present with one or more of the following symptoms:

- A noticeable lump – often this is the only symptom experienced.
- Tingling or burning if the cyst is touching a nerve.
- Dull pain or ache – which may indicate the cyst is pressing against a tendon or joint.
- Difficulty wearing shoes due to irritation between the lump and the shoe.

PRACTITIONER SCOPE AND TRAINING

Practitioners should practice only in the areas in which they are competent based on their education, training, and experience. Levels of education, experience, and proficiency may vary among individual practitioners. It is ethically and legally incumbent on a practitioner to determine where they have the knowledge and skills necessary to perform such services and whether the services are within their scope of practice.

It is best practice for the practitioner to appropriately render services to a member only if they are trained, equally skilled, and adequately competent to deliver a service compared to others trained to perform the same procedure. If the service would be most competently delivered by another health care practitioner who has more skill and training, it would be best practice to refer the member to the more expert practitioner.

Best practice can be defined as a clinical, scientific, or professional technique, method, or process that is typically evidence-based and consensus driven and is recognized by a majority of professionals in a particular field as more effective at delivering a particular outcome than any other practice (Joint Commission International Accreditation Standards for Hospitals, 2020).

Depending on the practitioner's scope of practice, training, and experience, a member's condition and/or symptoms during examination or the course of treatment may indicate the need for referral to another practitioner or even emergency care. In such cases it is prudent for the practitioner to refer the member for appropriate co-management (e.g., to their primary care physician) or if immediate emergency care is warranted, to contact 911 as appropriate. See the *Managing Medical Emergencies (CPG 159 – S)* policy for information.

References

American Medical Association. (current year). Current Procedural Terminology (CPT) Current year (rev. ed.). Chicago: AMA

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