



MASSACHUSETTS

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## Medical Policy

### Temporomandibular Joint Disorder

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#### Policy Number: 035

New Policy Number: 2.01.21 (For Plan internal use only)  
NCD/LCD: N/A

#### Related Policies

- Biofeedback for Chronic Pain, #[210](#)
- Injections for Osteoarthritis, #[427](#)
- Low-Level Laser Therapy, #[522](#)
- Percutaneous Electrical Nerve Stimulation (PENS) and Percutaneous Neuromodulation Therapy (PNT), #[172](#)
- Transcutaneous Electrical Nerve Stimulation (TENS), #[003](#)

#### Policy

**Commercial Members: Managed Care (HMO and POS), PPO, and Indemnity  
Medicare HMO Blue<sup>SM</sup> and Medicare PPO Blue<sup>SM</sup> Members**

#### **DIAGNOSTIC PROCEDURES - Prior authorization is not required.**

The following **diagnostic procedures** may be considered **MEDICALLY NECESSARY** in the diagnosis of temporomandibular joint disorder (TMJD):

- Diagnostic x-ray, tomograms, and arthrograms
- Computed tomography (CT) scan or magnetic resonance imaging (MRI) (in general, CT scans and MRIs are reserved for pre-surgical evaluations)
- Cephalograms\* (x-rays of jaws and skull)
- Pantograms\* (x-rays of maxilla and mandible).

\*Cephalograms and pantograms should be reviewed on an individual basis.

The following **diagnostic procedures** are considered **INVESTIGATIONAL** in the diagnosis of TMJD:

- Electromyography (EMG), including surface EMG
- Kinesiography
- Thermography
- Neuromuscular junction testing
- Somatosensory testing

- Transcranial or lateral skull x-rays
- Intra-oral tracing or gnathic arch tracing (intended to demonstrate deviations in the positioning of the jaws that are associated with TMJ disorder)
- Muscle testing
- Standard dental radiographic procedures
- Range of motion measurements
- Computerized mandibular scan (this measures and records muscle activity related to movement and positioning of the mandible and is intended to detect deviations in occlusion and muscle spasms related to TMJD)
- Ultrasound imaging/sonogram
- Arthroscopy of the temporomandibular joint (TMJ) for purely diagnostic purposes
- Joint vibration analysis.

#### **NONSURGICAL TREATMENTS - Prior authorization is not required.**

The following **nonsurgical treatments** may be considered **MEDICALLY NECESSARY** in the treatment of TMJD:

- Intra-oral removable prosthetic devices/appliances (encompassing fabrication, insertion, and adjustment)
- Splint therapy, including a mandibular orthopedic repositioning appliance (MORA) and measuring, fabricating and adjusting the splint<sup>1</sup>
- Pharmacologic treatment (such as anti-inflammatory, muscle relaxing, and analgesic medications)
- Physical therapy.<sup>1</sup>

**Note:** Unless otherwise specified, the reasonable replacement frequency for a durable medical equipment (oral appliance) is once every five years. For additional information, see Durable Medical Policy Payment Policy.

The following **nonsurgical treatments** are considered **INVESTIGATIONAL** in the treatment of TMJD:

- Electrogalvanic stimulation
- Iontophoresis
- Biofeedback
- Ultrasound
- Devices promoted to maintain joint range of motion and to develop muscles involved in jaw function,
- Orthodontic services
- Dental restorations/prostheses
- Transcutaneous electrical nerve stimulation (TENS)
- Percutaneous electrical nerve stimulation (PENS)
- Hyaluronic acid
- Platelet concentrates
- Dextrose prolotherapy
- Botulinum toxin A.

#### **SURGICAL TREATMENTS - Prior authorization is required.**

The following **surgical treatments** may be considered **MEDICALLY NECESSARY** in the treatment of TMJD:

- Arthrocentesis
- Manipulation for reduction of fracture or dislocation of the TMJ
- Arthroscopic surgery in individuals with objectively demonstrated (by physical examination or imaging) internal derangements (displaced discs) or degenerative joint disease who have failed conservative treatment
- Open surgical procedures (when TMJD is the result of congenital anomalies, trauma, or disease in individuals who have failed conservative treatment) including, but not limited to, arthroplasties, condylectomies, meniscus or disc plication and disc removal.

## Prior Authorization Information

### Inpatient

- For services described in this policy, precertification/preauthorization **IS REQUIRED** for all products if the procedure is performed **inpatient**.

### Outpatient

- For services described in this policy, see below for products where prior authorization **might be required** if the procedure is performed **outpatient**.

	<b>Outpatient</b>
<b>Commercial Managed Care (HMO and POS)</b>	Prior authorization is <b>required</b> on surgical treatments only.
<b>Commercial PPO and Indemnity</b>	Prior authorization is <b>required</b> on surgical treatments only.
<b>Medicare HMO Blue<sup>SM</sup></b>	Prior authorization is <b>required</b> on surgical treatments only.
<b>Medicare PPO Blue<sup>SM</sup></b>	Prior authorization is <b>required</b> on surgical treatments only.

### Requesting Prior Authorization Using Authorization Manager

Providers will need to use [Authorization Manager](#) to submit initial authorization requests for services. Authorization Manager, available 24/7, is the quickest way to review authorization requirements, request authorizations, submit clinical documentation, check existing case status, and view/print the decision letter. For commercial members, the requests must meet medical policy guidelines.

To ensure the service request is processed accurately and quickly:

- Enter the facility's NPI or provider ID for where services are being performed.
- Enter the appropriate surgeon's NPI or provider ID as the servicing provider, *not* the billing group.

### Authorization Manager Resources

Refer to our [Authorization Manager](#) page for tips, guides, and video demonstrations.

## CPT Codes / HCPCS Codes / ICD Codes

*Inclusion or exclusion of a code does not constitute or imply member coverage or provider reimbursement. Please refer to the member's contract benefits in effect at the time of service to determine coverage or non-coverage as it applies to an individual member.*

*Providers should report all services using the most up-to-date industry-standard procedure, revenue, and diagnosis codes, including modifiers where applicable.*

*The following codes are included below for informational purposes only; this is not an all-inclusive list.*

**The above medical necessity criteria MUST be met for the following codes to be covered for Commercial Members: Managed Care (HMO and POS), PPO, Indemnity, Medicare HMO Blue and Medicare PPO Blue:**

### CPT Codes

<b>CPT codes:</b>	<b>Code Description</b>
21010	Arthrotomy, temporomandibular joint
21050	Condylectomy, temporomandibular joint (separate procedure)
21060	Meniscectomy, partial or complete, temporomandibular joint
21073	Manipulation of temporomandibular joint(s) (TMJ), therapeutic, requiring an anesthesia service (i.e., general or monitored anesthesia care)
21116	Injection procedure for temporomandibular joint arthrography

21240	Arthroplasty, temporomandibular joint, with or without autograft (includes obtaining graft)
21242	Arthroplasty, temporomandibular joint, with allograft
21243	Arthroplasty, temporomandibular joint, with prosthetic joint replacement
29800	Arthroscopy, temporomandibular joint, diagnostic, with or without synovial biopsy (separate procedure)
29804	Arthroscopy, temporomandibular joint, surgical

## Description

### Diagnosis of Temporomandibular Joint Disorder

In the clinical setting, temporomandibular joint disorder (TMJD) is often a diagnosis of exclusion and involves physical examination, patient interview, and a review of dental records. Diagnostic testing and radiologic imaging are generally only recommended for individuals with severe and chronic symptoms. Diagnostic criteria for TMJD have been developed and validated for use in both clinical and research settings.<sup>1,2,3</sup>

Symptoms attributed to TMJD vary and include, but are not limited to, clicking sounds in the jaw; headaches; closing or locking of the jaw due to muscle spasms (trismus) or displaced disc; pain in the ears, neck, arms, and spine; tinnitus; and bruxism (clenching or grinding of the teeth).

### Treatment

For many individuals, symptoms of TMJD are short-term and self-limiting. Conservative treatments (eg, eating soft foods, rest, heat, ice, avoiding extreme jaw movements) and anti-inflammatory medication are recommended before considering more invasive and/or permanent therapies (eg, surgery).

Note that low-level laser therapy for TMJD is addressed in in policy [#522](#).

## Summary

### Description

Temporomandibular joint disorder (TMJD) refers to a group of disorders characterized by pain in the temporomandibular joint and surrounding tissues. Initial conservative therapy is generally recommended; there are also a variety of nonsurgical and surgical treatment possibilities for patients whose symptoms persist.

### Summary of Evidence

For individuals with suspected temporomandibular joint disorder (TMJD) who receive ultrasound, surface electromyography, or joint vibration analysis, the evidence includes systematic reviews of diagnostic test studies. Relevant outcomes are test validity and other performance measures. None of the systematic reviews found that these diagnostic techniques accurately identified patients with TMJD, and many of the studies had methodologic limitations. The evidence is insufficient to determine that the technology results in an improvement in the net health outcome.

For individuals with a confirmed diagnosis of TMJD who receive intraoral devices or appliances or pharmacologic treatment, the evidence includes randomized controlled trials (RCTs) and systematic reviews of RCTs. Relevant outcomes are symptoms, functional outcomes, quality of life, and treatment-related morbidity. A systematic review of intraoral appliances (44 studies) and meta-analyses of subsets of these studies found a significant benefit of intraoral appliances compared with control interventions. Several studies, meta-analyses, and systematic reviews exploring the effectiveness of stabilization splints on TMJD pain revealed conflicting results. Overall, the evidence shows that stabilizing splints may improve pain and positively impact depressive and anxiety symptoms. The evidence related to pharmacologic treatment varies because studies, systematic reviews, and meta-analyses lack consistency in evaluating specific agents. Some systematic reviews have found a significant benefit of several pharmacologic treatments (eg, analgesics, muscle relaxants, and anti-inflammatory medications [vs. placebo]), but other studies showed a lack of benefit with agents such as methylprednisolone and botulinum toxin type. The evidence is sufficient to determine that the technology results in an improvement in the net health outcome.

For individuals with a confirmed diagnosis of TMJD who receive acupuncture, biofeedback, transcutaneous electric nerve stimulation, orthodontic services, hyaluronic acid, platelet concentrates, or dextrose prolotherapy, the evidence includes RCTs, systematic reviews of these RCTs, and observational studies. Relevant outcomes are symptoms, functional outcomes, quality of life, and treatment-related morbidity. Systematic reviews evaluating acupuncture for TMJD have found inconsistent improvement in outcomes compared with sham or active controls. A 2023 meta-analysis of 22 RCTs failed to find improved pain or maximum mouth opening with acupuncture compared with active controls. Systematic reviews evaluating hyaluronic acid have found similar outcomes to corticosteroids or placebo. Platelet-rich plasma has been compared with hyaluronic acid in a number of systematic reviews and RCTs, but the studies are small and have methodologic limitations. The evidence is insufficient to determine that the technology results in an improvement in the net health outcome.

For individuals with a confirmed diagnosis of TMJD who receive arthrocentesis or arthroscopy, the evidence includes RCTs, systematic reviews of RCTs, and observational studies. Relevant outcomes are symptoms, functional outcomes, quality of life, and treatment-related morbidity. One review, which included 3 RCTs, compared arthrocentesis or arthroscopy with nonsurgical interventions for TMJD. Pooled analyses of the RCTs found that arthrocentesis and arthroscopy resulted in superior pain reduction compared with control interventions. A network meta-analysis, which included 36 RCTs, revealed that arthroscopy and arthrocentesis improve pain control and maximum mouth opening. Two recent meta-analyses identified RCTs comparing arthrocentesis to various conservative management strategies. At 6 months, one analysis found improved maximum mouth opening with arthrocentesis while the other found similar outcomes between arthrocentesis and conservative treatments. Similarly, pain was improved with arthrocentesis in one analysis, but not the other. The evidence is sufficient to determine that the technology results in an improvement in the net health outcome.

## Policy History

Date	Action
4/2023	Annual policy review. Description, summary, and references updated. Policy statements unchanged.
9/2023	Policy clarified to include prior authorization requests using Authorization Manager.
7/2023	Annual policy review. Botulinum toxin A added as investigational under nonsurgical treatments of TMJD. Clarified coding information. Effective 7/1/2023.
11/2022	Policy clarified. A note was added stating that unless otherwise specified, the reasonable replacement frequency for a durable medical equipment (oral appliance) is once every five years. For additional information, see Durable Medical Policy Payment Policy.
9/2022	Policy clarified. Prior authorization is required for surgical treatments of TMJD only. Diagnostic procedures and nonsurgical treatments do not require prior authorization.
9/2022	Policy clarified. Splint therapy, including a mandibular orthopedic repositioning appliance (MORA) and measuring, fabricating and adjusting the splint added under nonsurgical treatments of TMJD.
7/2022	Policy revised. Investigational policy statement modified to include dextrose prolotherapy. Effective 7/1/2022.
6/2022	Prior authorization information clarified for PPO plans. Effective 6/1/2022.
1/2022	Clarified prior authorization information.
7/2021	Annual policy review. Investigational policy statement modified to include platelet concentrates. Effective 7/1/2021.
3/2021	Clarified coding information.
10/2020	Clarified coding information.
4/2020	Annual policy review. Description, summary, and references updated. Policy statements unchanged.
1/2020	Investigational statement on acupuncture as non-surgical treatment of TMJD was removed. Effective 1/1/2020.
4/2019	Annual policy review. Description, summary, and references updated. Policy statements unchanged.

11/2018	Annual policy review. Description, summary, and references updated. Policy statements unchanged.
4/2018	Annual policy review. Dysfunction changed to “Disorder” in the policy statement and title. Policy statements otherwise unchanged.
1/2018	Clarified coding information.
3/2017	Annual policy review. New references added.
6/2016	Annual policy review. New references added. Gothic in second policy statement corrected to “gnathic.”
5/2016	Clarified coding information.
9/2014	Annual policy review. Prior authorization information clarified.
9/2014	Physical therapy coverage clarified as specified in the subscriber certificate. Effective 9/1/2014.
6/2014	Updated Coding section with ICD10 procedure and diagnosis codes, effective 10/2015.
1/2014	Annual policy review. New investigational indications described. Effective 1/1/2014.
2/2013	Annual policy review. Changes to policy statements. Effective 2/4/2013.
11/2011-4/2012	Medical policy ICD 10 remediation: Formatting, editing and coding updates. No changes to policy statements.
3/1/2012	Annual policy review. Changes to policy statements.
6/2011	Reviewed - Medical Policy Group - Orthopedics, Rehabilitation Medicine and Rheumatology. No changes to policy statements.
3/1/2011	Annual policy review. Changes to policy statements.

## Information Pertaining to All Blue Cross Blue Shield Medical Policies

Click on any of the following terms to access the relevant information:

[Medical Policy Terms of Use](#)

[Managed Care Guidelines](#)

[Indemnity/PPO Guidelines](#)

[Clinical Exception Process](#)

[Medical Technology Assessment Guidelines](#)

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## Endnotes

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<sup>1</sup> Based on Subscriber Certificate