Epilepsy Treatment

LOB(s):	State(s):
☒ *Commercial*	☒ *Idaho* ☒ *Montana* ☒ *Oregon* ☒ *Washington* ☐ *Other:*
☒ *Medicare*	
☒ *Medicaid*	☒ *Oregon* ☐ *Washington*

Enterprise Policy

PacificSource is committed to assessing and applying current regulatory standards, widely-used treatment guidelines, and evidenced-based clinical literature when developing clinical criteria for coverage determination. Each policy contains a list of sources (references) that serves as the summary of evidence used in the development and adoption of the criteria. The evidence was considered to ensure the criteria provide clinical benefits that promote patient safety and/or access to appropriate care. Each clinical policy is reviewed, updated as needed, and readopted, at least annually, to reflect changes in regulation, new evidence, and advancements in healthcare.

Clinical Guidelines are written when necessary to provide guidance to providers and members in order to outline and clarify coverage criteria in accordance with the terms of the Member's policy. This Clinical Guideline only applies to PacificSource Health Plans, PacificSource Community Health Plans, and PacificSource Community Solutions in Idaho, Montana, Oregon, and Washington. Because of the changing nature of medicine, this list is subject to revision and update without notice. This document is designed for informational purposes only and is not an authorization or contract. Coverage determinations are made on a case-by-case basis and subject to the terms, conditions, limitations, and exclusions of the Member's policy. Member policies differ in benefits and to the extent a conflict exists between the Clinical Guideline and the Member's policy, the Member's policy language shall control. Clinical Guidelines do not constitute medical advice nor guarantee coverage.

Background

Epilepsy is a brain disorder that causes recurring, unprovoked seizures. Epilepsy may occur as a result of a genetic disorder or an acquired brain injury, such as a trauma or stroke. During a seizure, sudden, temporary, bursts of electrical activity in the brain that change or disrupt the way messages are sent between brain cells occur resulting in involuntary changes in body movement or function, sensation, behavior, or awareness and can cause loss of consciousness.

Epilepsy is one of the most common neurological disorders in the United States and has a prevalence of approximately 3 million adults. Management generally involves antileptic drugs, but for some patients, seizures are uncontrolled by medical therapy. For patients with focal seizure disorders, more invasive interventions might be warranted. Laser interstitial thermal therapy (LITT) and Responsive Neurostimulation (RNS) are potentially alternative treatment option.

Deep brain stimulation consists of the delivery of electrical impulses to specific areas of the brain, depending on the symptoms to be addressed. A burr hole is drilled into the patient's skull and introduces a lead wire into the brain; target brain tissue is identified with a combination of stereotactic neuroimaging (usually MRI or CT scan) and microelectrode recording. The procedure is generally performed in an awake patient with intraoperative observation of clinical response. After identification of the target brain tissue, a permanent electrode is inserted into the desired position. A neurostimulator is placed subcutaneously in the chest or abdominal wall; this can occur at the same time as the initial procedure or can take place 1 to 2 weeks later. An extension wire then connects the previously placed lead wire to the neurostimulator through a subcutaneous tract. Approximately 2 to 4 weeks after

implantation, the stimulator is activated and programmed to adjust the voltage, frequency, and polarity settings to achieve the best possible outcome.

Laser interstitial thermal therapy is indicated for use to necrotize or coagulate soft tissue through interstitial irradiation or thermal therapy under magnetic resonance imaging (MRI) guidance. Laser interstitial thermal therapy can be used for medically refractory epileptic seizures as an alternative to open brain surgery.

Responsive Neurostimulation (RNS) is for the treatment of drug-resistant refractory focal e~~E~~pilepsy. The RNS System uses a neurostimulator that is seated in the skull and connected to lead wires with electrodes that are implanted in the brain to monitor and respond to brain activity to attempt to prevent seizures at the source of the seizure.

Criteria

Commercial

Prior authorization is required

I. Deep brain stimulation for epilepsy

PacificSource considers deep brain stimulation for the treatment of epilepsy medically necessary when the following criteria is met:

A. MCG criteria for epilepsy: GRG: SG-NS (ISC GRG)

II. Laser Interstitial Thermal Therapy

PacificSource considers Laser Interstitial Thermal Therapy to be medically necessary when **ALL** of the following criteria is met:

A. Diagnosis of lesional Mesial Temporal Lobe Epilepsy (MTLE)

B. Documented seizure activity refractory to at least two (2) anti-epileptic drugs for three (3) months

C. Member is **NOT** a candidate for resective epileptic surgery

D. Member does not have either of the following contraindications:

1. An implanted device that contraindicates MRI

2. Progressive brain lesions and/or tumors not associated with epilepsy

III. Responsive Neurostimulation (RNS) (Insertion)

PacificSource considers Responsive Neurostimulation (RNS) to be medically necessary when **ALL** of the following criteria is met:

A. Member is 18 years of age or older

B. Diagnosis of focal epilepsy, with no more than two localized epileptogenic foci

C. Member experiences 3 or more seizures per month within 3 months prior to procedure

D. Refractory to 2 or more antiepileptic medications

E. Individual is not a candidate for focal resection epilepsy surgery

F. Individual is not a candidate for Vagus nerve stimulation

IV. Revision or Replacement of Responsive Neurostimulation (RNS)

PacificSource considers revision or replacement of an implanted Responsive Neurostimulator (RNS) to be medically necessary when the insertion criteria above is met.

Medicaid

PacificSource Community Solutions (PCS) follows Oregon Administrative Rules (OARs) 410-141-3820 through 3830 and the Oregon Health Plan (OHP) OHP Prioritized list of Health Services for surgical treatment of epilepsy.

PacificSource Community Solutions follows the coverage criteria in Guideline Note 14 of the OHP Prioritized List of Health Services for treatment of refractory epilepsy with Laser Interstitial Thermal Therapy.

PacificSource Community Solutions follows the coverage criteria in Guideline Note 221 of the OHP Prioritized List of Health Services for treatment of refractory epilepsy with Deep Brain Stimulation.

Additionally, for members under the age of 21, PCS follows OARs 410-151-0000 through 410-151-0003 for coverage of surgical treatments for epilepsy.

Medicare

PacificSource Medicare follows CMS guidelines and criteria. In the absence of CMS guidelines and criteria, PacificSource Medicare will follow internal policy for determination of coverage and medical necessity.

Experimental/Investigational/Unproven

PacificSource considers Laser Interstitial Thermal Therapy to be experimental, investigational, or unproven for any neurological indication not listed above and including, but not limited to the following:

- Treatment of primary or metastatic brain tumors
- Radiation necrosis of the brain

Coding Information

The following list of codes are for informational purposes only and may not be all-inclusive. Deleted codes and codes which are not effective at the time the service is rendered may not be eligible for reimbursement.

61736 Laser interstitial thermal therapy (LITT) of lesion, intracranial, including burr hole(s), with magnetic resonance imaging guidance, when performed; single trajectory for 1 simple lesion

61737 Laser interstitial thermal therapy (LITT) of lesion, intracranial, including burr hole(s), with magnetic resonance imaging guidance, when performed; multiple trajectories for multiple or complex lesion(s)

61850 Twist drill or burr hole(s) for implantation of neurostimulator electrodes, cortical

61860 Craniectomy or craniotomy for implantation of neurostimulator electrodes, cerebral, cortical

61863 Twist drill, burr hole, craniotomy, or craniectomy with stereotactic implantation of neurostimulator electrode array in subcortical site (e.g., thalamus, globus pallidus, subthalamic nucleus, periventricular, periaqueductal gray), without use of intraoperative microelectrode recording; first array

61864 Twist drill, burr hole, craniotomy, or craniectomy with stereotactic implantation of neurostimulator electrode array in subcortical site (e.g., thalamus, globus pallidus,

subthalamic nucleus, periventricular, periaqueductal gray), without use of intraoperative microelectrode recording; each additional array (List separately in addition to primary procedure)

61867 Twist drill, burr hole, craniotomy, or craniectomy with stereotactic implantation of Neurostimulator electrode array in subcortical site (e.g., thalamus, globus pallidus, subthalamic nucleus, periventricular, periaqueductal gray), with use of intraoperative microelectrode

61868 Twist drill, burr hole, craniotomy, or craniectomy with stereotactic implantation of neurostimulator electrode array in subcortical site (e.g., thalamus, Globus pallidum, subthalami nucleus, periventricular, periaqueductal gray), with use of intraoperative microelectrode recording; each additional array (List separately in addition to primary procedure)

61880 Revision or removal of intracranial neurostimulator electrodes

61885 Insertion or replacement of cranial neurostimulator pulse generator or receiver, direct or inductive coupling; with connection to a single electrode array

61886 Insertion or replacement of cranial neurostimulator pulse generator or receiver, direct or inductive coupling; with connection to 2 or more electrode arrays

61888 Revision or removal of cranial neurostimulator pulse generator or receiver

61889 Insertion of skull-mounted cranial neurostimulator pulse generator or receiver, including craniectomy or craniotomy, when performed, with direct or inductive coupling, with connection to depth and/or cortical strip electrode array(s)

61891 Revision or replacement of skull-mounted cranial neurostimulator pulse generator or receiver with connection to depth and/or cortical strip electrode array(s)

61892 Removal of skull-mounted cranial neurostimulator pulse generator or receiver with cranioplasty, when performed

64999 Unlisted procedure, nervous system

L8679 Implantable neurostimulator, pulse generator, any type

L8680 Implantable neurostimulator electrode, each

L8681 Patient programmer (external) for use with implantable programmable neurostimulator pulse generator, replacement only

L8682 Implantable neurostimulator radiofrequency receiver

L8683 Radiofrequency transmitter (external) for use with implantable neurostimulator radiofrequency receiver

L8685 Radiofrequency transmitter (external) for use with implantable neurostimulator radiofrequency receiver

L8686 Implantable neurostimulator pulse generator, single array, nonrechargeable, includes extension

L8687 Implantable neurostimulator pulse generator, dual array, rechargeable, includes extension

L8688 Implantable neurostimulator pulse generator, dual array, nonrechargeable, includes extension

L8689 External recharging system for battery (internal) for use with implantable neurostimulator, replacement only

L8695 External recharging system for battery (external) for use with implantable neurostimulator, replacement only

Definitions

Epilepsy - a neurological disorder marked by sudden recurrent episodes of sensory disturbance, loss of consciousness, or convulsions, associated with abnormal electrical activity in the brain

Focal Epilepsy - Seizures that begin in one area of the brain and area of origin may be identifiable by the provider

Mesial temporal lobe epilepsy (MTLE) - a seizure disorder in which the individual has lesions (abnormal tissue) involving the medial or internal structures of the temporal lobe of the brain

Related Policies

Brain, Spinal Cord, and Peripheral Nerve Stimulators

Epilepsy Treatment

Thalamotomy

References

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MCG Health. Neurosurgery or Procedure GRG, GRG: SG-NS (ISC GRG)

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Appendix

Policy Number:

Effective: 2/1/2021 **Next review:** 8/1/2025

Policy type: Enterprise

Author(s):

Depts: Health Services

Applicable regulation(s): OARs 410-120-1320, 410-141-3820 to 3830,410-151-0000 through 0003

Commercial Ops: 12/2024

Government Ops: 1/2025