Clinical Policy: Cochlear Implant Replacements

Reference Number: LA.CP.MP.14 Revision Log

Date of Last Revision~~ew Date~~: ~~09~~8/2020

Coding Implications

See Important Reminder at the end of this policy for important regulatory and legal information.

Description

This policy outlines medical necessity criteria for the replacement of cochlear implants and/or cochlear implant components. The cochlear implant has 4 basic components: a microphone, worn externally behind the ear, which picks up sounds; an external speech processor which converts sounds to electrical signals; a transmitter and receiver/stimulator which forward the signals; and implanted electrodes, which stimulate the fibers of the auditory nerve.[6]

Policy/Criteria

I. It is the policy of Louisiana Healthcare Connections that ***replacement*** of a cochlear implant(s) and/or its external components (external speech processor, controller, etc.) is considered **medically necessary** when any one of the following is present:

- **A.** The existing device(s) is no longer functional and cannot be repaired; ~~or~~
- **B.** A change in the member/enrollee's condition makes the existing unit(s) inadequate for the hearing-related activities of daily living and improvement is expected with a replacement unit(s); ~~or~~
- **C.** A sound processor replacement if the current processor is at least five years old.

II. It is the policy of Louisiana Healthcare Connections that ***replacement or upgrade*** of an existing, properly functioning cochlear implant and/or its external components (external speech processor, controller, etc.) is considered **not medically necessary** when requested only for convenience or to simply upgrade to a newer technology.

Background

Sensorineural hearing loss, or nerve deafness, is a type of hearing loss that results from problems with the inner ear, related to the cochlea, eighth nerve, internal auditory canal, or brain. A common cause of hearing loss in adults is presbycusis, a progressive condition caused by the loss of function of hair cells in the inner ear.[7] Severe to profound hearing loss in children most often is caused by genetics, prenatal, perinatal, or postnatal causes.[5] A cochlear implant, an electronic device surgically placed under the skin, bypasses the hair cells and directly transmits sounds through multiple electrodes, which stimulate the auditory nerve.[7] Once the auditory nerve is activated, signals are sent to the brain. The brain learns to recognize these signals and the person experiences this as hearing.[2]

Cochlear implants have been studied since the 1950s and were approved by the FDA in adults in the mid-1980s.[2,5] National Institute of Health (NIH) scientists determined cochlear implants to be cost beneficial. ~~The cost of cochlear implantation, adjustments and training averages $60,000 whereas the services, special education and adaptation related to a child that is deaf before age three costs more than $1 million.~~

Recent studies have been conducted evaluating the use of bilateral cochlear implants compared to unilateral implants. -Many of these studies have shown that children obtained significantly higher hearing thresholds in the bilateral implants. -Speech recognition scores in quiet and noisy conditions were also improved in bilateral users. -Studies also have shown better scores on sentence and word recognition tests for bilateral users.[1]

Very little data has been published comparing differences between bilateral cochlear implants and cochlear implant with a hearing aid on the opposite ear. -One small study showed improved localization abilities and speech perception scores for two former users of cochlear implant/hearing aid within the first 6 months after the second implant was activated. -However, performance showed a slight decline after 6 months of use.- Further studies are needed in this area to determine efficacy for bilateral cochlear implants in adults.[1]

While evidence is increasing regarding the use of bilateral implants, bilateral implantation is not without problems. -Limited nerve survival that remains may be asymmetrical, resulting in an unnatural pattern of neural activity in stimulation with electrical pulses. -This asynchronous stimulation across devises might result in individual neural impulses which are unlikely to result in useful cues related to interaural differences. -Also, bilateral implantation doubles the risks associated with surgical intervention and is very costly.[2]

Coding Implications

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CPT®* Codes	Description
69949	Unlisted procedure, inner ear

HCPCS Codes	Description
L8615	Headset/headpiece for use with cochlear implant device, replacement
L8616	Microphone for use with cochlear implant device, replacement
L8617	Transmitting coil for use with cochlear implant device, replacement
L8618	Transmitter cable for use with cochlear implant device, replacement
L6819	Cochlear implant, external speech processor and controller, integrated system, replacement
L8621	Zinc air battery for use with cochlear implant device and auditory osseointegrated sound processors, replacement
L8622	Alkaline battery for use with cochlear implant device, any size, replacement

HCPCS Codes	Description
L8623	Lithium ion battery for use with cochlear implant device speech processor, other than ear level, replacement
L8624	Lithium ion battery for use with cochlear implant device speech-processor, ear level replacement, each
L8627	Cochlear implant, external speech processor, component, replacement
L8628	Cochlear implant, external controller component, replacement
L8629	Transmitting coil and cable, integrated, for use with cochlear implant device, replacement

ICD-10-CM Diagnosis Codes that Support Coverage Criteria

ICD-10-CM Code	Description
H90.3	Sensorineural hearing loss, bilateral
H90.41	Sensorineural hearing loss, unilateral, right ear, with unrestricted hearing on the contralateral side
H90.42	Sensorineural hearing loss, unilateral, left ear, with unrestricted hearing on the contralateral side
H90.5	Unspecified sensorineural hearing loss
Q85.00	Neurofibromatosis, unspecified
Q85.02	Neurofibromatosis, type 2
Z96.21	Cochlear implant status

Reviews, Revisions, and Approvals	Revision Date	Approval Date
Converted corporate to local policy.	08/15/2020	
Annual review. Coding reviewed, added codes L8621 and L8622. Replaced all instance of "member" with "member/enrollee." Changed "review date" in the header to "date of last revision" and "date" in the revision log header to "revision date." Sent for specialist review. Removed "or" in I.A. and I.B. Background updated with no impact to criteria. References reviewed and updated.	9/22	

References

1. American Academy of Audiology. American Academy of Audiology Clinical Practice Guidelines: Pediatric amplification. ~~June 2013. https://www.audiology.org/sites/default/files/publications/PediatricAmplificationGuidelines.pdf~~https://audiology-web.s3.amazonaws.com/migrated/PediatricAmplificationGuidelines.pdf_539975b3e7e9f1.74471798.pdf Published June 2013. Accessed June 3, 2022.
2. ~~American Academy of Audiology Position Statement. Cochlear implants in children. 1995. Accessed at: http://www.audiology.org/publications-resources/document-library/cochlear-implants-children~~
3. ~~U.S. Food and Drug Administration. Medical Devices, Cochlear Implant. 200. U.S. Food and Drug Administration. Accessed 06/24/2020 at:~~

~~http://www.fda.gov/MedicalDevices/ProductsandMedicalProcedures/ImplantsandProsthetics/CochlearImplants/default.htm~~

2. ~~Fedoseev VI, Mileshina NA, Bakhshinyan VV, et al.~~ United States Food and Drug Administration. Cochlear implants. http://www.fda.gov/MedicalDevices/ProductsandMedicalProcedures/ImplantsandProsthetics/CochlearImplants/default.htm. Published February 3, 2022. Accessed June 3, 2022.
~~4.~~3. Ribári O, Répássy G, Küstel M. Reoperations after cochlear implantation. ~~Vestn Otorinolaringol. 2016;81(6):9-12. Accessed 06/24/2020.~~ *Acta Otolaryngol*. 2000;120(2):160-163. doi:10.1080/000164800750000829
~~5.~~4. North HJD, Lloyd SKW. Hearing ~~Rehabilitation~~rehabilitation in ~~Neurofibromatosis Type~~neurofibromatosis type 2.~~-~~ *Adv Otorhinolaryngol*. 2018;81:93-104. doi:10.1159/000485526.
~~6.~~5. ~~The Joint Committee on Infant Hearing.~~ Year 2019 position statement: Principles and ~~Guidelines~~guidelines for early hearing detection and intervention programs. *J Early* ~~Hearing Detection and Intervention Programs. The Journal of Early Hearing Detection and Intervention.~~ *Hear Detect Interv*. 2019; 4(2):~~-~~1-44. ~~https://www.audiology.org/sites/default/files/publications/resources/2019_JointCommiteeInfantHearing_Principles_Guidelines4EarlyHearingDetectionInterventionProgrs.pdf~~
6. Local coverage article: billing and coding: external components for cochlear implants (A53708). Centers for Medicare and Medicaid Services Web site. http://www.cms.hhs.gov/mcd/search.asp. Published October 1, 2015 (revised November 7, 2019). Accessed June 3, 2022.
7. Blevins NH. Presbycusis. UpToDate. www.uptodate.com. Updated April 18, 2022. Accessed June 3, 2022.

Important Reminder

This clinical policy has been developed by appropriately experienced and licensed health care professionals based on a review and consideration of currently available generally accepted standards of medical practice; peer-reviewed medical literature; government agency/program approval status; evidence-based guidelines and positions of leading national health professional organizations; views of physicians practicing in relevant clinical areas affected by this clinical policy; and other available clinical information. LHCC makes no representations and accepts no liability with respect to the content of any external information used or relied upon in developing this clinical policy. This clinical policy is consistent with standards of medical practice current at the time that this clinical policy was approved.

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