

Clinical Policy: Bone-Anchored Hearing Aid

Reference Number: LA.CP.MP.93

Date of Last Revision: 8/22/2023

[Coding Implications](#)

[Revision Log](#)

See [Important Reminder](#) at the end of this policy for important regulatory and legal information.

Description

Bone-anchored hearing aids (BAHAs) are an alternative to conventional hearing aids when physical or medical complications prevent adequate functional improvement in hearing. Sound quality of BAHAs is superior to traditional air-conduction hearing aids, and pain/discomfort is largely diminished with BAHAs.²¹

Policy/Criteria

I. It is the policy of Louisiana Healthcare Connections that ~~bone-anchored hearing aids~~ (BAHAs) are **medically necessary** for members/enrollees with all the following indications:

- A. *Implantable device* for age \geq ~~five~~ years; or *head band device* for age $<$ ~~five~~ years or ~~for members~~ medically unable to have an implant;
- B. Unilateral ~~or~~ bilateral conductive and/or mixed hearing loss (i.e., conductive and sensorineural hearing loss) or unilateral sensorineural hearing loss (~~i.e.~~, sensorineural deafness in one ear and normal hearing in the other ear);
- C. Pure tone average bone conduction threshold (measured at 0.5, 1, 2, and 3kHz) \leq 70 dBHL (decibels hearing level) and an unaided speech discrimination score not worse than 60%;
- D. For bilateral BAHA, there is a mean maximum difference <10 dB (~~decibels~~) between the right bone conduction threshold and left bone conduction threshold;
- ~~E.~~ For unilateral deafness, the hearing ear should have a bone conduction threshold of ~~E.~~ \leq 20dB;
- F. One of the following indications:
 1. Congenital or surgically induced malformations of the ear canal such that it does not exist or cannot accommodate a standard air-conduction hearing aid~~;~~
 2. Chronic infection or dermatitis of the middle or outer ear that is exacerbated by a standard air-conduction hearing aid~~;~~
 3. Allergic reactions to standard air-conduction hearing aids~~;~~
 4. Unilateral deafness occurred after removal of an acoustic neuroma~~;~~ from trauma, from a viral or vascular insult, or from idiopathic causes;
 5. Tumors of the external canal and/or tympanic cavity~~;~~
 6. Air-conduction hearing aid ineffective due to large conductive hearing loss (inadequate gain, uncomfortable occlusion, and feedback effects).

~~II. BAHAs for any other indication are considered not medically necessary because effectiveness has not been established.~~

~~III.~~ II. It is the policy of Louisiana Healthcare Connections that **replacement** of ~~a BAHA (bone-anchored hearing aids (BAHAs))~~ and/or ~~its~~ external components (external sound processor) 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;

- B. A change in condition makes the existing unit(s) inadequate for the hearing-related activities of daily living, and improvement is expected with a replacement unit(s);
- C. The current sound processor is at least five years old.

IV.III. It is the policy of Louisiana Healthcare Connections that *replacement or upgrade* of an existing, properly functioning bone-anchored hearing aid (BAHA) and/or its external components (external sound processor) is considered **not medically necessary** when requested only for convenience or to simply upgrade to a newer technology before the timeframe noted in section III.

Background

~~Hearing loss affects up to 20% of the population in the United States, and approximately 738,000 people in the U.S. experience severe to profound hearing loss with 8% being under 18 years of age.¹ Although the reliability and effectiveness of hearing aids have improved over time, there are still limitations to conventional air conduction hearing aids. There are an estimated 48 million adults and 1.7 million school-aged children in the United States with some type of hearing loss. Hearing loss can be classified as sensorineural (inner ear), conductive (external and middle ear), or mixed, and may be present in one or both ears.⁹~~

Physical and medical complications such as chronic ear infections and canal deformities can make it difficult to impossible for some to wear hearing aids. ~~Poorly fitting ear molds can lead to bothersome feedback and inadequate functional gain. Implantable hearing devices can improve reliability and functional gain over the standard air-conduction hearing aids when some of these issues exist.~~

Compared to bone conduction hearing aids held against the skull with a headband, implantable bone conduction hearing aids have advantages such as better tolerability and improved sound quality.⁸⁷ The bone-anchored hearing aid (BAHA) is the most widely used implantable bone-anchored prosthetic hearing aid device.⁸⁷ BAHAs are indicated for people with conductive hearing loss, mixed hearing loss, or single sided profound sensorineural hearing loss to achieve improved auditory acuity by transmitting the sound directly through the bone into the inner ear. ~~There are three devices currently available for use and the~~The appropriate device is selected based upon the patient's hearing level.

A BAHA consists of a titanium implant surgically inserted into the skull attached to an abutment of which a small portion protrudes through the skin and forms a snap attachment point for a removable bone conduction hearing aid or processor.⁸⁷ The BAHA is implanted unilaterally or bilaterally, and children are usually around six years old before an implantable BAHA is feasible due to the need for 3three to 4four mm of bone to ensure osseointegration.⁷⁶ The processor is adjusted to the patient's level of hearing, much like in a traditional hearing aid fitting. ~~When complications occur, the majority of them are related to skin issues around the implant. Proper skin care and hygiene at the surgical and abutment sites are essential to maintain good skin integrity.~~

Coding Implications

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NOTE: Coverage is subject to each requested code's inclusion on the corresponding LDH fee schedule. Non-covered codes are denoted (*) and are reviewed for Medical Necessity for members under 21 years of age on a per case basis.

CPT®* Codes	Description
69710*	Implantation or replacement of electromagnetic bone conduction hearing device in temporal bone
69711*	Removal or repair of electromagnetic bone conduction hearing device in temporal bone ^[WK1]
69714	Implantation, osseointegrated implant, temporal bone,skull; with percutaneous attachment to external speech processor/ cochlear stimulator; without mastoidectomy
69716	-Implantation, osseointegrated implant, skull; with magnetic transcutaneous attachment to external speech processor, <u>within the mastoid and/or resulting in removal of less than 100 sq mm surface area of bone deep to the outer cranial cortex</u>
69717	Replacement (including removal of existing device), osseointegrated implant, temporal—bone,skull; with percutaneous attachment to external speech processor/ cochlear stimulator; without mastoidectomy
69719	Revision or replacement <u>Replacement</u> (including removal of existing device), osseointegrated implant, skull; with magnetic transcutaneous attachment to external speech processor, <u>within the mastoid and/or involving a bony defect less than 100 sq mm surface area of bone deep to the outer cranial cortex</u>
69726	Removal, <u>entire</u> osseointegrated implant, skull; with percutaneous attachment to external speech processor
69727	Removal, <u>entire</u> osseointegrated implant, skull; with magnetic transcutaneous attachment to external speech processor, <u>within the mastoid and/or involving a bony defect less than 100 sq mm surface area of bone deep to the outer cranial cortex</u>
<u>69728</u>	<u>Removal, entire osseointegrated implant, skull; with magnetic transcutaneous attachment to external speech processor, outside the mastoid and involving a bony defect greater than or equal to 100 sq mm surface area of bone deep to the outer cranial cortex</u>
<u>69729</u>	<u>Implantation, osseointegrated implant, skull; with magnetic transcutaneous attachment to external speech processor, outside of the mastoid and resulting in removal of greater than or equal to 100 sq mm surface area of bone deep to the outer cranial cortex</u>

CPT® Codes	Description
<u>69730</u>	<u>Replacement (including removal of existing device), osseointegrated implant, skull; with magnetic transcutaneous attachment to external speech processor, outside the mastoid and involving a bony defect greater than or equal to 100 sq mm surface area of bone deep to the outer cranial cortex</u>

HCPSC Code	Description
<u>L8690*</u>	Auditory osseointegrated device, includes all internal and external components
<u>L8691*</u>	Auditory osseointegrated device, external sound processor, excludes transducer/actuator, replacement only, each
<u>L8692*</u>	Auditory osseointegrated device, external sound processor, used without osseointegration, body worn, includes headband or other means of external attachment
<u>L8693*</u>	Auditory osseointegrated device abutment, any length, replacement only
<u>L8694*</u>	Auditory osseointegrated device, transducer/actuator, replacement only, each

ICD-10-CM Diagnosis Codes

ICD-10-CM Code	Description
<u>H60.00-H62.8X9</u>	<u>Diseases of external ear</u>
<u>H65.20-H65.23</u>	<u>Chronic serous otitis media</u>
<u>H65.30-H65.33</u>	<u>Chronic mucoid otitis media</u>
<u>H65.411-H65.499</u>	<u>Other chronic non-suppurative otitis media</u>
<u>H71.00-H71.93</u>	<u>Cholesteatoma of middle ear</u>
<u>H800.00-H80.93</u>	<u>Otosclerosis</u>
<u>H90.0-H90.8</u>	<u>Conductive and sensorineural hearing loss</u>
<u>H91.01-H91.93</u>	<u>Other and unspecified hearing loss</u>
<u>Q16.0-Q16.9</u>	<u>Congenital malformation of ear causing impairment of hearing</u>

Reviews, Revisions, and Approvals	Revision Date	Approval Date
Converted corporate to local policy.	08/15/2020	
Annual review. Reworded I.B. with no clinical significance. Revised I.E from “threshold of 20dB” to “threshold of \leq 20dB.” In I.F.4., added idiopathic causes to the list of causes of unilateral deafness. Revised description of HCPSC L8691 and added L8694. Changed “review date” in the header to “date of last revision” and “date” in the revision log header to “revision date.” Replaced “member” with “member/enrollee.” References reviewed, updated, and reformatted. Added “and may not support medical necessity” in coding implications <u>implications</u> . Reviewed by specialist.	2/22	4/10/22
Annual Review. Description updated with no impact on criteria. Criteria I. updated to include abbreviation of BAHA. Criteria III.C.	8/22	

Reviews, Revisions, and Approvals	Revision Date	Approval Date
wording updated for clarity. Background updated with no impact on criteria. References reviewed and updated. Removed deleted codes 69715 and 69718. Added new codes 69716, 69719, 69726, and 69727.		
<u>Annual review. Removed Criteria II. stating "BAHAs for any other indication are considered not medically necessary." Updated background with no clinical significance. Added new CPT codes 69728, 69729, and 69730 and removed ICD-10 codes from policy. References reviewed and updated. Reviewed by external specialist.</u>	<u>07/6/23</u>	

References

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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

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Bone-Anchored Hearing Aid



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