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## Fusion of the ear bones

Fusion of the ear bones is an abnormal joining of the three bones of the middle ear. These are the incus, malleus, and stapes bones. Fusion or fixation of the bones leads to hearing loss because the bones are not moving and vibrating in reaction to sound waves.

Treatment options include hearing aids to amplify the sound and surgery to improve the middle ear conduction of sound.

Related topics include:

- Chronic ear infection
- Otosclerosis
- Middle ear malformations

## References

House JW, Cunningham CD. Otosclerosis. In: Flint PW, Francis HW, Haughey BH, et al, eds. *Cummings Otolaryngology: Head & Neck Surgery*. 7th ed. Philadelphia, PA: Elsevier; 2021:chap 146.

O'Handley JG, Tobin EJ, Shah AR. Otorhinolaryngology. In: Rakel RE, Rakel DP, eds. *Textbook of Family Medicine*. 9th ed. Philadelphia, PA: Elsevier; 2016:chap 18.

Prueter JC, Teasley RA, Backous DD. Clinical assessment and surgical treatment of conductive hearing loss. In: Flint PW, Francis HW, Haughey BH, et al, eds. *Cummings Otolaryngology: Head & Neck Surgery*. 7th ed. Philadelphia, PA: Elsevier; 2021:chap 145.

Rivero A, Yoshikawa N. Otosclerosis. In: Myers EN, Snyderman CH, eds. *Operative Otolaryngology Head and Neck Surgery*. 3rd ed. Philadelphia, PA: Elsevier; 2018:chap 133.

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