

Hearing loss – types, degree, and configuration

Hearing loss – a growing health challenge¹:

► By 2050 nearly **2.5 billion** people are projected to have hearing loss and at least **700 million** will require hearing rehabilitation.

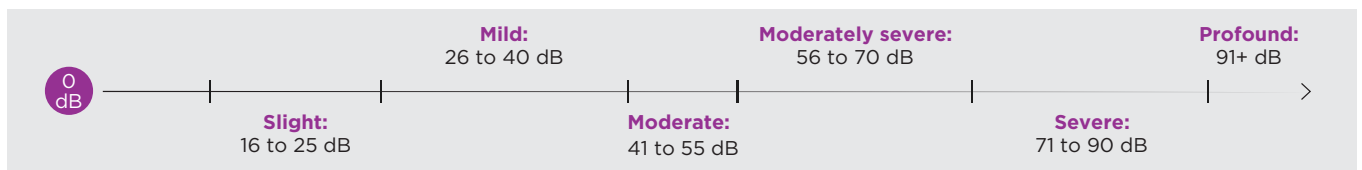
► Over **1 billion** young adults are at risk of permanent, avoidable hearing loss due to unsafe listening practices.



Types of hearing loss

Sensorineural hearing loss (SNHL):	Conductive hearing loss:	Mixed hearing loss:
• Most common type of hearing loss • Happens after inner ear damage - Causes include: • Ageing • Noise exposure • Ototoxic medications • Genetics • Head trauma	• Sound cannot get through the outer or middle ear - Causes include: • Earwax buildup • Infections • Malformation of the ear canal • Tumors/growths in the middle ear	• A combination of both sensorineural and conductive hearing loss - Causes include: • anything that causes conductive or sensorineural hearing loss

Degree of hearing loss²



Configuration of hearing loss³

- **High-frequency versus low-frequency:** Either high-pitched or low-pitched sounds are being heard better.
- **Bilateral versus unilateral:** Bilateral means hearing loss in both ears, unilateral means hearing loss in one ear.
- **Symmetrical versus asymmetrical:** Symmetrical means the severity and shape of hearing loss are the same in each ear. Asymmetrical means each ear has a different severity and shape.
- **Progressive versus sudden hearing loss:** Progressive means that hearing loss becomes worse over time. Sudden means hearing loss that happens quickly. The patient should see your doctor right away if you have a sudden hearing loss.
- **Fluctuating versus stable hearing loss:** Fluctuating means hearing loss that changes over time. It sometimes gets better, sometimes gets worse. Stable means that the hearing loss has stayed the same.

When unaddressed, hearing loss impacts many aspects of life, including communication and speech, cognition⁴, comorbidities (e.g. diabetes⁵, heart diseases⁶), social isolation⁷, and increased risk of unemployment⁸.

Regular hearing screening ensures early detection of hearing loss and related ear diseases. Medical and surgical treatment can cure most ear diseases, potentially correcting conductive hearing loss. When SNHL is present, which is not reversible through medical treatments or surgery, hearing aids and accompanying rehabilitative therapies can help those affected regain their quality of life.



¹World Health Organization. Deafness and hearing loss. Retrieved from <https://www.who.int/news-room/fact-sheets/detail/deafness-and-hearing-loss> ²Clark, J. G. (1981). Uses and abuses of hearing loss classification. *Asha*, 23, 493-500. ³American Speech-Language-Hearing Association (ASHA). Configuration of Hearing Loss. Retrieved from <https://www.asha.org/public/hearing/configuration-of-hearing-loss/> ⁴Lin, F. R. (2011). Hearing loss and cognition among older adults in the United States. *Journals of Gerontology Series A: Biomedical Sciences and Medical Sciences*, 66(10), 1131-1136. ⁵Gupta, S., Eavey, R. D., Wang, M., Curhan, S. G., & Curhan, G. C. (2019). Type 2 diabetes and the risk of incident hearing loss. *Diabetologia*, 62(2), 281-285. ⁶Tan, Hsien Ern & Lan, Nick S. R. & Knuiman, Matthew & Divitini, Mark & Swanepoel, DeWet & Hunter, Michael & Brennan-Jones, Christopher & Hung, Joe & Eikelboom, Robert & Maria, Peter. (2017). Associations between cardiovascular disease and its risk factors with hearing loss-A cross-sectional analysis. *Clinical Otolaryngology*. 43. 10.1111/coa.12936. ⁷Kramer, S. E., Kapteyn, T. S., Kuik, D. J., & Deeg, D. J. (2002). The association of hearing impairment and chronic diseases with psychosocial health status in older age. *Journal of aging and health*, 14(1), 122-137. ⁸Jung, D., & Bhattacharyya, N. (2012). Association of hearing loss with decreased employment and income among adults in the United States. *Annals of Otolaryngology, Rhinology & Laryngology*, 121(12), 771-775.