

Autoimmune Inner Ear Disease

Autoimmune activity occurs when a person's immune system attacks body cells rather than fights infection in the body. Autoimmune attacks in the inner ear result in progressive hearing loss.

The most popular theory as to the cause of autoimmune inner ear disease is that cells meant to fight disease and foreign materials accidentally damage the inner ear because they mistake inner ear cells to be a virus, bacteria or other harmful substance that is present in the body at the time.¹

Researchers also are exploring the possibility that the disease has a genetic origin.

Hearing loss resulting from an autoimmune disorder is rare, representing less than 1 percent of all cases of hearing or balance problems. However, it can be associated with a variety of autoimmune diseases, including lupus, scleroderma and rheumatoid arthritis.¹

Researchers also are beginning to think that Ménière's disease may be an autoimmune disorder.²

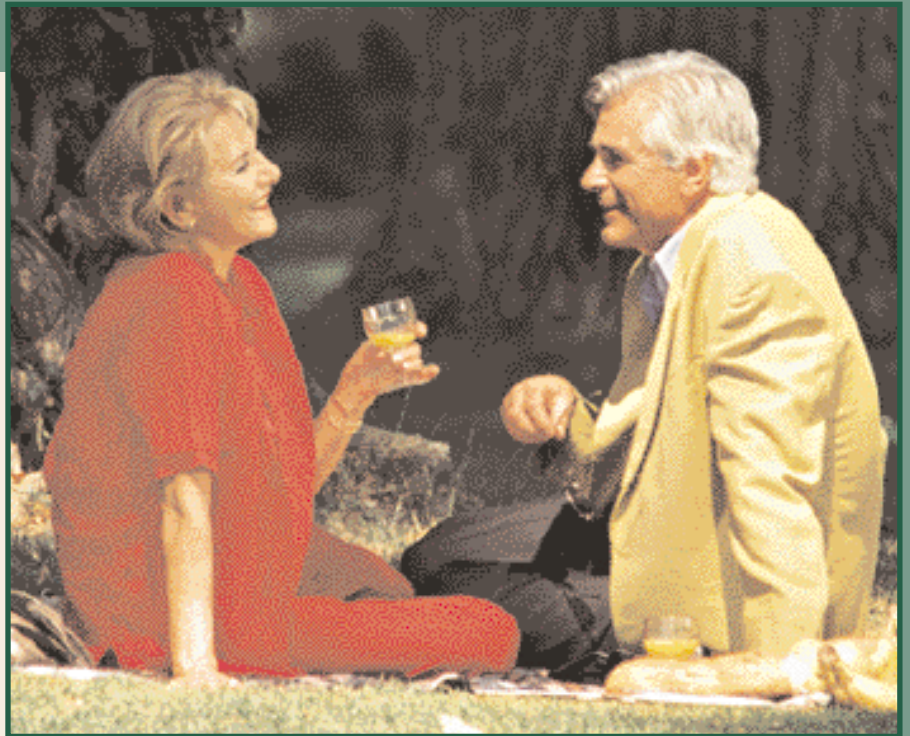
When a person has autoimmune inner ear disease, hearing ability fluctuates and then worsens in a progressive manner. Problems with balance, dizziness and tinnitus (ringing in the ears) also may occur. The disease may affect one or both ears. Nearly 80 percent of patients experience hearing loss in both ears.²

Of all patients diagnosed with autoimmune inner ear disease, 65 percent are women.²

When autoimmune inner ear disease is suspected, diagnosis is not considered until hearing worsens dramatically in the better ear.² When this occurs, medical professionals review the patient's family history and results of hearing and balance tests. In addition, blood tests and a physical are conducted.

Consultation by a team of professionals helps to rule out other hearing loss caused by problems elsewhere in the body. This team may be comprised of audiologists, otolaryngologists, ophthalmologists, neurologists and rheumatologists.³

Patients who are diagnosed with autoimmune inner ear disease and are severely affected may be helped with hearing aids.³



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For More Information

American Academy of Otolaryngology-Head and Neck Surgeons
www.aaohns.org

American Autoimmune Related Diseases Association
www.aarda.org

House Ear Institute
www.hei.org

National Institute on Deafness and Other Communication Disorders
www.nidcd.org

A common treatment approach is the use of steroids, which often helps to stabilize or improve the patient's health status. Over the long run, however, chemotherapy-type medication may be utilized.^{1,3}

Plasmapheresis, a process that cleans the blood of unwanted substances, also may be helpful in treating symptoms of the disease.¹

References

1. Northwestern University, Center for Sensory and Communication Disorders. Autoimmune inner ear disease, accessed via www.cscd.nwu.edu/public/ears/autoimmune.html
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3. Baylor College of Medicine, Grand Round Archives. Autoimmune inner ear disease, accessed via www.bcm.tmc.edu/oto/grand/4893.html

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