Losing Your Hearing

Causes and Symptoms

For the majority of people hearing loss is gradual and we don't notice the deterioration immediately.

AT A GLANCE

- Age, heredity, drugs, trauma, certain illnesses, and noise can all cause or contribute to hearing loss.
- Mishearing, asking for repeats, believing people are mumbling, difficulty hearing on the phone, needing to have the TV and radio turned up loudly, and pretending to have understood are symptoms of potential hearing loss.

TYPES OF HEARING LOSS

Conductive hearing loss – Affects the outer or middle ear and prevents sounds being transmitted efficiently through to the inner ear. It can be caused by a range of factors such as wax build up in the ear canal, perforated ear drums, fluid in the middle ear, or the tiny bones making up the ossicles (hammer, anvil and stirrup inside the middle ear) becoming damaged or defective. These issues can often be treated medically or surgically. Conductive hearing loss can also be helped with hearing aids.

Sensorineural hearing loss – A breakdown in the hair cells in the inner ear results in them being unable to convert sound waves into the nerve impulses that are recognised by the brain as sound. The nerve pathways in the auditory nerve can also get damaged. This type of hearing loss usually cannot be remedied surgically or medically. Hearing aids can be of benefit, but the amount of benefit will diminish as the degree of hearing loss increases. **Mixed hearing loss** – A combination of both of the above.

Auditory process hearing loss – Usually not associated with loss of loudness, as with hearing loss, but causes similar problems of understanding to those associated with hearing loss.

SYMPTOMS OF HEARING LOSS

People seem to be mumbling

You:

- Don't understand a word or something someone has just said, even if they are speaking quite loudly
- Mishear what people are saying
- Find it easier to understand people who speak directly to you, especially if they get your attention first
- May find women's and children's voices particularly hard to hear
- Notice you don't hear light or soft sounds as well, or at all.

Didn't get it the first time

You regularly ask people to repeat what they've said.

Pretending to understand

You pretend you've heard what has been said, shaking or nodding your head and/or making vague responses and just hoping for the best!

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Other people comment on your hearing difficulties

Often it's other people who notice your hearing loss first.

Turn it up

You turn the TV or radio up more loudly than others do. You may find that you still can't understand TV or radio even when it has been turned up.

On the phone

You find it difficult hearing on the phone and leave other family members to deal with calls.

Noise intolerance

You may find that you become less tolerant of surrounding noise levels, or that some sounds become annoying for you.



Tinnitus

You may note continuous or intermittent noises, either in one ear or both, or in your head, that are not associated with external events.

Social situations are hard

- It's hard to follow the conversation when in a group or at a restaurant.
- Background noise makes it hard to hear.

 You may start avoiding social situations and meetings because you can't hear what's going on.

Ear difference

You may find it easier to use one ear rather than the other, especially on the telephone.

WHAT CAUSES HEARING LOSS?

Age

While getting older does not mean hearing loss is inevitable, about a third of people aged 65 or more have a hearing loss that affects their daily lives. Scientists also believe many instances of hearing loss among older people have resulted from noise damage earlier in their lives.

Drugs

Alcohol, nicotine, antibiotics, carbon monoxide, some diuretics and analgesics are ototoxic drugs that can damage the inner ear or auditory brain processes. Exposure to solvents can aggravate the damaging effects of sound on the ears or damage the auditory brain processes.

Foetal Damage

Hearing can get damaged before birth if a pregnant woman drinks alcohol or uses other recreational drugs, smokes, has an illness like rubella or an accident that traumatises the foetus. These events can affect the foetal development of the delicate structures needed for hearing.

Heredity

There are genetic conditions that cause people to lose their hearing or to be born deaf. If one of your parents has a genetic hearing impairment or is deaf, you are more likely to develop the same condition as you get older. However, some types of genetic deafness are not associated with family history.

Illness

Illness such as meningitis or untreated ear infections can cause hearing loss.

Babies or children not showing an interest in sounds, or who are fretful, disruptive, not sleeping, who snore or breath through the mouth, or rub their ears or their face near their ear, should have their ears checked.



High sound levels

Exposure to sudden loud sound or extended exposure to noisy environments – work and/or leisure – or extended use of personal stereos can all damage your hearing.



Trauma

Ruptured ear drums from objects being poked into an ear, sports and other head injuries, and occasionally changes to air pressure when flying or diving can cause hearing loss.

NOISE -INDUCED HEARING LOSS

The more a person is exposed to high sound levels, the greater the potential for hearing loss.

The frequency or pitch of sound heard is determined by the rate at which the sound waves occur, normally measured in "cycles per second" or "Hertz". A young person with normal hearing can hear a wide range of frequencies from about 20Hz to 20,000Hz.





The degree of noise induced hearing damage is related to the intensity of sound waves in the ear and the duration of the exposure. Sound intensity is measured in decibels (dB).

Examples

65 decibels - Hearing with comfort - eg urban noise away from roads.

85 decibels - Some hearing damage can occur after eight hours – eg the noise in a busy street.

100 decibels - Hearing damage can occur after 15 minutes – eg grinding metal, noisy lawn mowers.

115 decibels - Hearing damage can occur after 30 seconds – eg a power saw or chainsaw.



Tips to avoid noise induced hearing loss

- Wear the correct grade of ear muffs when using noisy equipment.
- Wear earplugs when going somewhere noisy, such as bars & clubs or concerts.
 Use "musician's" earplugs so as not to degrade the sound quality.

If using an MP3 player:

- Stick to the 60/60 rule only listen for sixty minutes at a time, at no more than 60% of the maximum volume
- Monitor your listening time
- Avoid "bud" headphones that sit in the ears

 they can cause more noise damage than headphones that sit over the ears.

If listening to MP3 players in noisy places such as city streets, on the bus or train be aware you may play the volume higher to compensate for the background nose, and this extra volume can be dangerous. If you do plan to listen in these situations, use noise-cancelling headphones.



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Want to know more detail? Go to www.hearing.org.nz

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