

Hearing Aids

Hearing aids are sophisticated micro-computers that are programmed to match your hearing. They amplify sound for your existing hearing but do not restore your natural hearing.

AT A GLANCE

- Hearing aids come in different shapes, sizes, technology and cost
- Your hearing care professional will advise you about the best options for your hearing loss, needs and budget.

WHAT IS A HEARING AID?

Hearing aids enhance your ability to hear sounds.

All hearing aids have the same basic parts.

1. A microphone
2. An amplifier
3. A loudspeaker which broadcasts the amplified sound into the ear canal.

They are powered by small specialist batteries.

Other technology in various models of hearing aids includes:

- T-Switch (or telecoil) - links the hearing aid to the telecoil in telephones, and to a loop system in certain public buildings
- Bluetooth - allows the hearing aid to communicate wirelessly with other Bluetooth-enabled technology such as mobile phones, home phones, MP3 players, televisions and computers.

WHAT SORTS OF HEARING AIDS ARE THERE?

Hearing aids can sit behind the ear, in the ear or completely in the canal.

Behind the ear (BTE)

The hearing aid shell with the electronics inside sits behind the ear. The shell can come in many different shapes, colours and sizes. A tube and an ear mould or a small mushroom-shaped "open fitting" direct the sound into the ear canal.



Behind the ear



In the ear



In the canal

In the ear (ITE)

The hearing aid with the electronics inside sits in the outer ear. The aid can take up the whole of the outer ear or just part of it and is moulded to match the shape of the individual ear. Part of the hearing aid goes into the ear canal to channel the sound.

Completely in the canal (CIC)

A small hearing aid case with all the components inside sits mostly in the middle part of the ear canal using the ear's design and ability to collect sound to improve hearing. The aid is custom-build for the individual ear. They are not suitable for people with severe hearing loss who require more powerful aids.

THE RIGHT HEARING AID FOR YOU

A hearing care professional will use their expertise to advise the right hearing aid for individual hearing loss and circumstances.

The main things to think about are:

- Degree of hearing loss
- Individual ear anatomy
- Two or one? If hearing loss is in both ears two hearing aids are best, providing a better sense of where sound is coming from while the overall comfort and sound quality is usually better
- Communication needs: The sorts of situations and places where better hearing is needed
- Sound quality
- Handling: The smaller the aid, the smaller the controls and batteries which can be difficult to manipulate
- Cosmetics: Hearing aids come in different sizes, colours and design to match your hair, skin tone or preference
- Connection needs: The need to connect to other devices such as mobile phone, home phone, TV

- Your expectations: How much enhancement of your hearing you can realistically expect
- Your budget.



TIPS WHEN YOU FIRST GET YOUR HEARING AIDS

Getting used to a hearing aid requires realistic expectations and a period of acclimatisation.

Your hearing will have deteriorated well before hearing aids are fitted and you will have got used to not hearing many sounds and background noises without realising it. When a hearing aid is first fitted, the auditory nerve and brain can get a bit of a shock. It can take six to eight weeks to adjust to the amplified input of sound and learn to screen out background noise and other sounds.

A hearing aid is just that, an aid. Even the most high-tech hearing aids don't fully restore what the natural ear used to be able to do

Acclimatisation

Before leaving the audiologist make sure you thoroughly understand

- The controls
- How to remove and insert the aids
- How to change the battery

Try wearing the hearing aids for an hour at a time perhaps twice a day in the quiet of home.

After 2-3 days extend the wearing time but keep to a relatively quiet environment. When ready, try wearing them in other situations.

If the aids have been adjusted but you need more help, visit your local Hearing Association or arrange to see a hearing therapist in your area for support and information.

HEARING AID CARE

Keep them clean

Dust, grit, skin and wax can build up on hearing aids. Keeping them clean and dry avoids any blockages or risk of dirt getting inside the hearing aids which can result in malfunction and costly repairs.

Once a day - Clean the aid and ear mould with a soft tissue or medical wipe

Once a week - Give the aids, especially the mould of BTE aids a more thorough cleaning

- Do not poke into the amplifier aperture as this can cause damage
- Do not put the hearing aid into water or detergent (the moulds of the BTE hearing aids can be removed and washed but must be dried thoroughly before being re-attached to the aid)
- Never use alcohol, solvents or other cleaning liquids on the aid itself.

Most Hearing Associations offer a hearing aid cleaning service for those who do not feel confident about cleaning their aids themselves.

Keep them dry

Drying hearing aids regularly protects against corrosion and lengthens their life.

Airing cupboard

Put the aids in it overnight with the battery door open.

Drying beaker and capsules - Silica gel capsules absorb moisture. The capsules need to be replaced about every six to eight weeks.

Drying machine – Your audiologist or your local Hearing Association may have a drying machine to take the hearing aids to be cleaned and dried. Do this every six to eight weeks. Check to see whether there is a charge.

Drying appliances – These are available for use in the home. Dry your aids in the machine two or three times a week.

HEARING AID DON'TS

Don't

- Drop hearing aids
- Put them where pets or children can get hold of them
- Apply hair products and perfume AFTER the hearing aids are put on
- Keep or use them near water, shower, sauna, swimming or at the hairdresser. If you must wear them in steamy environments such as a commercial kitchen, waterproof covers are available
- Keep them near excessive heat like heaters, fires, microwaves, hairdryers, sunny windowsills, heat lamps
- Fiddle, poke or pry them open.

TROUBLE-SHOOTING TIPS

- Hard to get in or out? Audiology gels can make insertion easier. Get some extra advice/training on the best technique to use.

- Split, dry, perished or broken tubing can be replaced easily by a hearing care professional or a local Hearing Association
- Battery problems? Broken battery doors should be able to be fixed as long as the hinge is still intact. Jammed batteries can be removed by a hearing care professional or a local Hearing Association.
- Aid not working at all?
 - Try fresh batteries
 - With a BTE aid check the tube and see if any moisture is blocking it. This can usually be cleared with an air puffer
 - Check the setting isn't switched to T (telecoil) or O (off)
 - With an in-the-ear or canal aid check and replace the wax guard.
- Disposal - don't throw them in the rubbish. Local hearing associations or your city council may be able to collect them for safe disposal.

SQUEALING AND WHISTLING (FEEDBACK)

Hearing aid squealing is caused by feedback - the microphone is picking up sound from its speaker. The wearer might not hear feedback, but others can hear the high-pitched whistle. The feedback is usually caused by something simple and it can, and should, be fixed.

Causes

- Wax blocking some part of the speaker or in your ear canal, causing the aid not to fit properly
- Ensure the aid or mould is fitting properly. Weight loss or gain can change the shape of the ear canal
- Ensure the aid is inserted properly
- It will squeal when a hand is placed over it or sometimes when you put a telephone receiver to your ear with the hearing aid in
- The volume may be turned up too high – turn it down a little until the squealing stops. If there isn't enough volume to hear, go back to the audiologist to have the aid adjusted
- Feedback from a BTE hearing aid may indicate that the tubing needs replacing.

BATTERY CARE

- Replace batteries when necessary
- Take out the battery if the hearing aid is not used for lengthy periods
- Turn off the aid at night and open the battery door
- To activate zinc/air batteries leave the new battery for a minute or two after taking the tab off and before putting it in the hearing aid
- Store unused batteries in a cool, dry spot
- Never recharge non-rechargeable batteries as they may explode



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

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