

WELCOME TO YOUR BEST HEARING

Congratulations! By downloading this booklet, you will gain more insight into options and solutions for treatment of hearing loss. If you or a loved one are experiencing some degree of hearing difficulty — as do 40 million Americans — you likely have many questions. Knowing where to start can be confusing.

The purpose of this booklet is to help answer many of the commonly asked questions from individuals with symptoms of hearing loss, such as:

- How can I tell if I truly have a hearing loss?
- How is hearing loss treated?
- When is the right time to purchase hearing aid technology?
- How much should I spend on hearing aid technology, if recommended?

After reading this booklet, our hope is that you or your loved one will feel comfortable and confident to seek out Blue Sky Hearing for a hearing evaluation.



SYMPTOMS OF HEARING LOSS

While hearing loss is known as the "invisible impairment", there are many noticeable symptoms that warrant attention from an audiologist. The most common symptoms include:

- Complaints of muffled hearing or people mumbling
- Hearing speech but not understanding clearly
- Need for greater volume when listening to radio or TV
- Difficulty understanding speech in restaurants and groups



Coping Mechanisms Used for Hearing Loss

It is very common for individuals who are beginning to experience hearing loss to not reach out for help. The "coping mechanisms" used to overcome hearing loss typically include behaviors such as lip-reading or piecing together parts of conversations to gather rough context. Additionally, individuals may cup a hand behind their ear(s), sit or stand on a certain side of someone in conversation to hear out of the ear with better hearing, or choose to be seated in quiet parts of restaurants. In the latter stages of hearing loss, individuals will often find the use of these mechanisms to be too strenuous to attempt as they no longer provide help.

It is important to <u>seek help</u> at the first sign of hearing loss symptoms.

CAUSES OF HEARING LOSS

There are many different causes for hearing loss that extend beyond aging. Exposure to loud sounds, hereditary factors, injuries to the head or ear, infections and certain medications can all play a role in hearing loss.

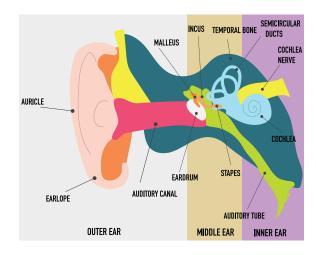




HOW WE **HEAR**

There are three general parts to the ear: the outer ear, middle ear and inner ear. Each of these parts has a critical role in capturing and processing sounds.

The outer ear gathers sound and sends it to the ear drum. The ear drum vibrates and sends the sound into the middle ear. In the middle ear, the three smallest bones of the body transfer the sound to the inner ear. The inner ear contains the cochlea, the



organ of hearing. The cochlea contains thousands of "hair cells" that when vibrated, trigger an electrical impulse that our auditory nerve sends to the brain for processing. The brain is the final stage to hearing and it's where we make sense of all the sound vibrations our ears pick up.

TYPES OF HEARING LOSS

There are three types of hearing loss: conductive, sensorineural and mixed. Conductive hearing loss is caused by a blockage in the outer or middle ear. This blockage usually results in sounds being softer and can often be treated. Things like too much earwax or fluid in the middle ear space can cause a conductive hearing loss.

Sensorineural hearing loss (SNHL) is a result of damage to the inner ear or auditory nerve and reduces the amount of sound that is received and sent to the brain. Exposure to loud sound, certain medications, and aging are common causes of sensorineural hearing loss.



<u>Mixed hearing loss</u> is any combination of conductive and sensorineural hearing loss.



EFFECTS OF UNTREATED HEARING LOSS

Untreated hearing loss can negatively impact physical, mental and social well-being. New research is showing links between the effects of untreated hearing loss and accelerating conditions such as Alzheimer's disease, depression and deprived brain function.

Hearing Loss and Brain Function

While the ear picks up and transmits the sounds around us, it is the brain that processes the signals and gives them meaning. If our brain is not receiving input, it can lose some of its capacity to properly recognize sounds later on.

The presence of hearing loss reduces the amount of sound to the brain over time. This reduced access to sound can cause the brain to "forget" what to do with the sound. Studies published by Veterans Affairs (VA) in the early 1990s showed that individuals fit with only one hearing aid had a decreased ability to understand speech in the ear without the hearing instrument.

Hearing Loss and Alzheimer's Development

Although we need more research to understand the role of hearing loss and dementia, more studies are showing strong connections between the two. A study conducted at the University of Washington's Department of Medicine found that 83% of Alzheimer's patients had a hearing loss. Once the patients were fit with hearing aids, 33% were classified with less severe dementia.

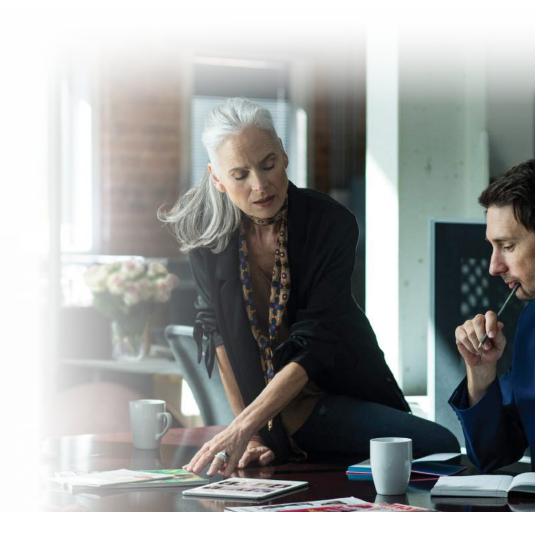
The Fischer Center for Alzheimer's Research reports many of the symptoms of Alzheimer's can be indirectly caused by hearing loss. As a result, there are strong advocates for requiring a hearing evaluation prior to an Alzheimer's diagnosis.



Hearing Loss and Depression

In 1999, the National Council on Aging (NCOA) published results from a large scale study showing individuals with hearing loss who did not use hearing aids were almost **twice as likely to experience depression** than those who were treating their hearing loss. The researchers concluded that depression stems from the social isolation that often accompanies hearing loss.

The NCOA study supports that using hearing instruments reduces the likelihood of depression, sadness, anxiety or paranoia. When mild depression is exhibited — characterized by withdrawal, mood changes and short temper — a hearing screening is recommended as part of an evaluation.





WHEN SHOULD I CONSIDER TREATMENT AND HEARING AIDS?

Short answer: the moment of diagnosis and recommendation. The options can vary from assistive listening devices for use in the home to hearing aid technology. If given a recommendation for a hearing aid, it should be seen as a proactive step towards healthy brain function and social stability. It can help you reconnect with the conversations and sounds that give your life joy.



'One-size-fits-all' rarely works in healthcare, especially when treating hearing loss. Your situations, experience and symptoms will be unique and the recommendations should reflect that.

WHICH HEARING AID IS RIGHT FOR ME?

When hearing aids are recommended by your audiologist, the ultimate goal is to fit you with the best hearing aid technology for your unique needs. Size, style, and fit are important components to your recommendation and are made based on your

listening goals and the results from your hearing evaluation. This ensures the correct hearing aid technology and features are recommended to meet your unique hearing needs.





WHAT FEATURES SHOULD I LOOK FOR IN HEARING AIDS?

Like all things in the tech world, we keep advancing and hearing aids are no exception. When considering features in hearing aids, think about your listening experiences and environments. Features like background noise suppression, telephone compatibility and water-resistance can be more or less important based on your needs and goals.

Background noise management uses advanced noise reduction and directional microphones. This combination of features helps make your listening



experiences more comfortable in social settings such as loud restaurants, meeting rooms or gatherings.



Telephone compatibility includes actual hardware and/ or settings to allow the hearing aids and phone to work together. In fact, with wireless streaming technologies, smartphones can now be connected to your hearing aids directly. Telephone use when wearing a hearing aid is now getting more and more hassle-free.

Water-resistant casing on your hearing aids is useful for everyone but is especially helpful for the active wearer or those who live in humid climates. This special coating is resistant to moisture, sweat, and oils, such as sunscreen.





HOW MUCH SHOULD I SPEND

ON HEARING AID TECHNOLOGY?

Consider your hearing aid technology an investment in better hearing and reconnecting to everyday listening situations, not just a consumer electronic purchase. Base your decision on how much to spend on the benefits of achieving better hearing through the various technology and features.

Not everyone needs expensive hearing aids. Your audiologist will help you explore the features from lite to pro technology levels to identify what you

need. Recommendations are based on the hearing examination and your daily listening needs.

Although hearing aids are getting smaller, the computational demands from the features are highly sophisticated. Research and development for hearing aid technology continues to provide more comfortable and effortless hearing.



TAKE THE **NEXT STEP** TOWARD **BETTER HEARING!**

Signs	of Hearing Loss
Answer these questions to see if you should get your hearing tested:	
OY ON	Do people seem to mumble or talk in a softer voice than they used to?
OY ON	When in a busy restaurant, is it hard for you to follow the discussion?
OY ON	Do you feel the need to turn up the volume on the TV or radio so much that it is too loud for others?
\bigcirc Y \bigcirc N	Do you often need to ask others to repeat themselves?
OY ON	Has someone close to you pointed out that you may have a hearing problem?
How did you do? If you answered "YES" to one or more of these questions, it's time to get your hearing checked.	

Bring this questionnaire with you when you come in for your evaluation!

As with most healthcare symptoms, the sooner you get treatment, the better. So take action. Call Blue Sky Hearing today to schedule your hearing evaluation at **(510) 540-9000**.

We look forward to helping you on your journey to better hearing.

www.BlueSkyHearing.com



