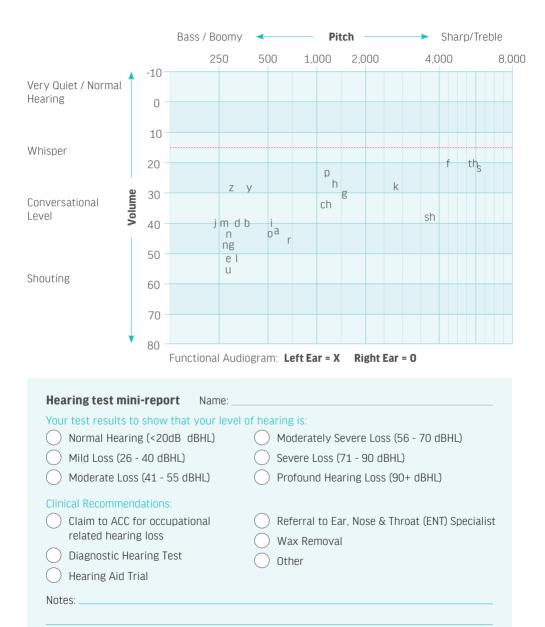
Your guide to better hearing



Understanding your hearing

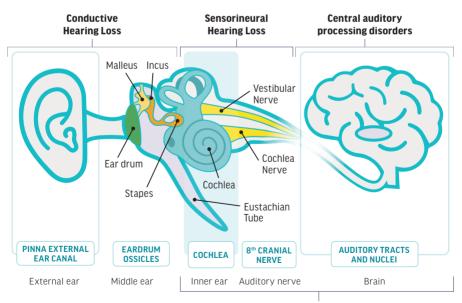


The type of **hearing loss** you have

Conductive Hearing Loss: This occurs when there is a problem with the ear canal, eardrum or middle ear which interferes with the passing of sound to the inner ear (organ of hearing = Cochlea). It can be caused by such things as too much earwax, ear infections, a punctured eardrum, a fluid build-up, or abnormal bone growth in the middle ear. It can be either temporary and treated with surgery/medication or permanent and managed with hearing aids.

Sensorineural Hearing Loss: Almost always a permanent hearing loss, Sensorineural Hearing Loss occurs when the hearing organ (Cochlea), and/or the auditory nerve is damaged or malfunctions so it is unable to accurately send information from the ear to the brain. It can be genetic or caused by the natural aging process, diseases, accidents, noise exposure or certain chemicals or medications. Successful treatment is usually through hearing aids.

Mixed Hearing Loss: This occurs when both Conductive Hearing Loss and Sensorineural Hearing Loss are present at the same time. The sensorineural component is permanent, while the conductive component can either be permanent or temporary. A Mixed Hearing Loss, for example, can occur when a person has a hearing loss due to age as well as an ear infection.



Sites of auditory degeneration with aging

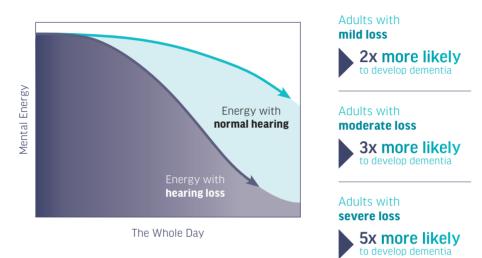
How hearing loss affects your **quality of life**

Impact on social situations

- Normal Hearing < 20dB dBHL: You are able to actively participate in group conversations in both quiet and noisy environments.
- Mild Loss 26 40 dBHL: You may become more tired when listening in difficult situations. Listening to soft speech or people from a distance becomes more difficult. Disagreements around hearing become more common with family and friends. The TV/radio will be creeping up in volume. Common comments: "If only my wife faced me when she talked", "If only my husband didn't mumble", "Children need to learn to speak more clearly".
 - Moderate Loss 41 55 dBHL: Social situations in noise become very difficult. Family and friends begin to show frustration when communicating with you. You ask for repeats frequently and often misunderstand what people are saying. You may stop enjoying social situations such as meetings, groups or parties. TV/radio is noticeably louder. * Others start to comment that you are speaking too loud.
- Moderately-Severe loss 56 70 dBHL: Family and friends struggle to communicate with you. You begin to actively avoid social situations. You may not enjoy watching TV or listening to music/radio. You are at higher risk of social isolation and depression. * You start shouting to hear yourself.
 - **Severe Loss 71 90 dBHL:** Communication is very difficult. You may not hear alarms or warning sounds. You may not hear knocking at the door or the phone ringing. You are at higher risk of social isolation, depression and cognitive decline.
 - **Profound Hearing Loss 90+ dBHL:** You cannot communicate without lip reading or sign language without a hearing aid.

Impact on cognitive alertness

When listening is compromised by hearing loss, you have to work harder to understand what is being said. Your brain does the "listening" and has to work harder to compensate for your ears when they cannot "hear" due to a hearing loss. This extra work your brain does leads to fatigue. A person with even a mild hearing loss will experience greater fatigue than a person with normal hearing or who wears a hearing aid.



Impact on listening environments

	TV/Radio	Quiet 1:1	Phone	Soft/ distance speech	1:1 noise	Cafe	Restaurant	Parties
Normal hearing	~ ~~	~~~	~ ~ /	~ ~~	~ ~~	~ ~~	~~	~
Mild loss	~~~	~ ~ /	$\checkmark\checkmark\checkmark$	~~	~	~~	✓	
Moderate loss	~~	~	~	~	✓	~		
Moderate severe loss	~	~	✓					
Severe & profound loss	~	~						

Hearing is crucial for your general health and well-being

Hearing loss may signal other important health issues, so taking care of your health is taking care of your overall health.



Binaural benefits: listening with **both ears** full time

One or two?

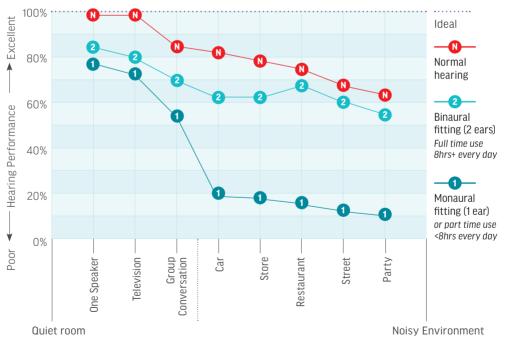
If you have hearing loss in both ears, you will get the most benefit by wearing two hearing aids. The benefits of listening with two ears include:

Localisation: Improved ability to know which direction a sound comes from.

Listening to speech: You will hear and understand speech more clearly with two hearing aids.

Binaural technology: Today, hearing aids share information to improve signal processing and noise management. Two smart hearing aids will outperform one hearing aid.

Listening in noise: Improved hearing in noise by 40-50%. People who wear a hearing aid in each ear can perform almost the same as people with normal hearing.



For a hearing aid wearer to perform almost the same as a normal hearing person they need to have been wearing two hearing aids all day, every day.

What is **Tinnitus** and how is it caused?

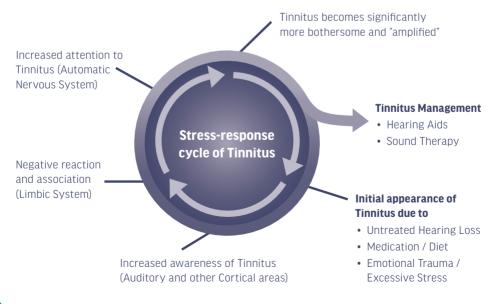
Tinnitus is the medical term for 'internal sounds' in the ears or head. It can have any sound quality but is most often reported as a constant ringing/buzzing sound (cicadas, whistles, etc.). While virtually everyone can hear tinnitus when placed in an extremely quiet environment, there is usually enough environmental sound that the tinnitus cannot be heard.

Most people with noticeable tinnitus often have an underlying hearing loss which is associated with the tinnitus. Tinnitus can also be aggravated by medications, diet, bite/jaw problems and emotional stress/trauma.

Why is it annoying?

The normal functioning brain has filters designed to suppress tinnitus noise. These filters prevent the tinnitus from reaching the 'awareness centre' of the brain so it is not noticed. Additionally, in people with good hearing, there is usually enough environmental (background) sound to mask out the tinnitus stopping it from being heard.

In brains with reduced filters and a hearing loss, the tinnitus noise is not suppressed, and therefore reaches the brain's centre of awareness - resulting in the tinnitus being clearly heard. When the brain registers the tinnitus, it often focusses on it, which inadvertently amplifies it. At this point, the Limbic System (the part of the brain that controls emotions) is activated and makes the tinnitus very annoying and difficult to then ignore.



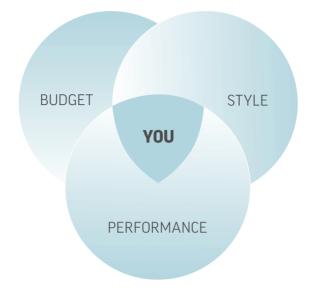
How we'll help you manage Tinnitus

Your Audiology South team have the skills and training to assess and manage Tinnitus. We will work with your GP to find out the root causes of your Tinnitus and make a management plan that fits you.

The key to helping you manage your Tinnitus will be in breaking the stress-response cycle:

- 1 Good quality, correctly fitted hearing aids will help your hearing so your brain doesn't focus on the Tinnitus, like a normal hearing brain.
- 2 Sound therapy will help you to "tune out" your Tinnitus. This therapy uses external sounds (static or music, for example) to partially mask the Tinnitus signal. Eventually your brain may be able to tune out the sound of the Tinnitus automatically.
- 3 Specialised support and counselling (based on Cognitive Behavioural Therapy) to keep you on track.

Choosing the right hearing aid



Your hearing experts at Audiology South are trained to support and guide your decision on the best hearing devices and options for you. In general, there are three factors to consider when selecting the optimal hearing device for you.

Performance

The performance of a hearing aid in various situations is often linked to the level of technology. Higher technology levels perform better in more difficult listening situations. Using accessories or apps can also enhance the enjoyment of using hearing aids.

Style

Hearing aids come in a variety of styles and sizes. Some are more appropriate for particular types of activities and hearing losses, while others have a greater range of features. It is best to chose a hearing aid that you will be comfortable managing and wearing all day, every day, for the next 6 years - and possibly beyond!

Budget

There is a hearing aid to suit your budget, with prices ranging from affordable basic models right through to premium technology levels.

Styles of hearing instruments

Behind The Ear

RIE Receiver-In-Ear

Adva	Advantages				
✓	Discrete				
✓	Light weight				
✓	Can be altered to fit a decline in hearing				
✓	Rechargeable option				



BTE Behind The Ear - Thin Tube



) **BTE** Behind The Ear - Ear Mould



12

Inside The Ear



ITE In The Ear

Advantages







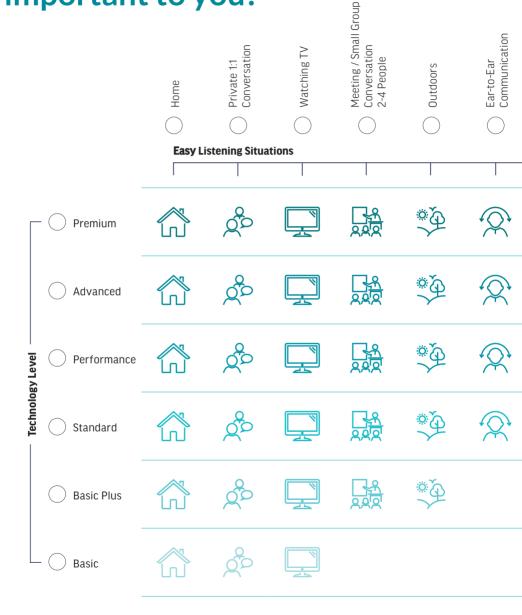
CIC / iiC Completely In Canal and Invisible In The Canal

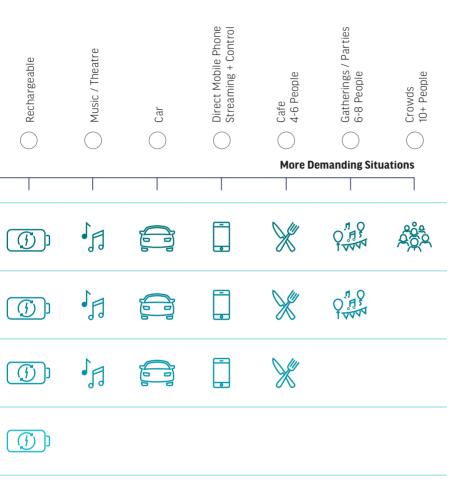


Lyric (see page 20)

Adv	antages	
~	100% invisible, clear & natural sound	
~	24/7 uninterupted, hassle free hearing	
~	No battery changing required	

What situations are **important to you?**





A range of hearing aids to suit your lifestyle

	Basic/Basic Plus	Standard	Performance
Features	 6 channels for tuning 2 listening programs Basic functioning microphones Limited noise reduction Limited or no connectivity Basic automatic features only Budget focussed 	 6 - 10 channels for tuning 2 - 3 listening programs Directional microphones Noise reduction Some connectivity Semi-automatic Rechargeable[†] 	 10 - 20 tuning channels 3 - 4 listening programmes Adaptive directional microphones Moderate noise reduction capabilities Wireless connectivity Fully automatic Rechargeable[†]
Suited to	 A quiet lifestyle Around the home One to one communication in quieter surroundings Price conscious 	 A quiet lifestyle Around the home Small groups TV / radio 	 A quiet to active lifestyle Family gatherings Some social settings with limited levels of background noise TV and movies Cafes
Price Guide*	Level 1 \$1,200 One aid \$1,900 Two aids Level 2 \$1,700 One aid \$2,900 Two aids	Level 3 \$2,200 One aid \$3,900 Two aids	Level 4 \$2,825 One aid \$5,150 Two aids

Starter (\$495"): Entry level hearing aids to get any hearing loss started on the journey to better hearing. Client must be eligible for the Ministry of Health subsidy.

Lyric hearing aids available on a monthly subscription basis. Ask your Audiologist about suitability and pricing.



Advanced	Premium
 16 - 20 channels for accurate tuning 4 or more listening programmes (including music) Analysis of the sound environment Automatic program and volume changes More focused and adaptive Flexible and adaptive noise control options Wireless connectivity Rechargeable[†] 	 20 or more channels for precise tuning Advanced analysis of the sound environment Highly effective automatic program and volume changes Highly adaptive and focused directional microphones Best range of flexible and adaptive noise control settings Wireless connectivity Rechargeable[†]
 An active lifestyle Some work or club meetings Larger family gatherings, clubs and community groups etc Communication in difficult listening environments with background noise 	 A busy lifestyle Regular work or community meetings Large family gatherings Communication in noisy social environments (bars, cafes and restaurants) Technology conscious
Level 5 \$3,700 One aid \$6,900 Two aids	Level 6 \$4,800 One aid \$9,100 Two aids 6 years free in clinic service appointment

*Prices listed are a guide and maybe subject to change[†]. Rechargeable options also available with additional surcharge. Prices are inclusive of GST and the standard government hearing aid subsidy of \$511.11 per ear/aid. Your Audiologist will discuss your eligibility for government subsidies or other funding as applicable (e.g. ACC).

Wireless accessories to boost the performance of your hearing aids

Accessories can be added to enhance the performance of your hearing aids, even if you purchased your hearing aids several years ago.

Challenge		Solution		
 Listening from a distance Listening in meetings and lectures Very noisy situations Hearing when in the car 	Лано	Remote Mic Significantly improves speech signal when in noise and delivers exceptional speech understanding. Extends hearing by up to 25m. Can be used as a table microphone and enables streaming of audio from PC or music players.		
Dexterity and control issues		Remote Control Adjust volume and mute hearing aids. Can also change programs or switch between TV, radio, computer and other devices.		
		Smart App Fine-tune hearing aid settings directly from your Smartphone, tablet or Smart device. Create favourite programs, find lost hearing aids, control your accessories. etc.		



Challenge	Solution
• Using a cell phone	 Phone Clip Stream phone conversations and stereo sound from your Bluetooth enabled phone directly to your hearing instruments. Direct streaming to iPhone or iPad (available in certain makes and models).
Watching TV	TV Streamer Stream sound from TV, computer, stereo or other audio devices directly to hearing instruments.
Tinnitus assistance	Tinnitus Relief App Tinnitus apps combine adjustable sounds to soothe Tinnitus with guided relaxation exercises.



Download today

Many apps are now available to help those with hearing loss and Tinnitus. Download suitable apps from your favourite hearing aid brand from the Apple App store or Google Play.

Lyric – an alternative to traditional, daily wear hearing aids

What is Lyric Hearing?

Lyric is the only 100% invisible extended wear hearing aid that is worn 24 hours a day, seven days a week, for up to several months at a time. Unlike many other hearing aids, Lyric is positioned completely inside the ear canal, and it uses the ear's anatomy to provide natural sound quality. Studies have found that Lyric has been preferred by 86% of people who wore traditional hearing aids.

What are the outstanding characteristics of Lyric?

Completely invisible

- Lyric is placed deep in the ear canal and is completely invisible.
- Only the Lyric user will know why he/she is hearing better.

Effortless hearing, 24/7

• Lyric can be worn during daily activities, such as exercising, showering, talking on the phone and sleeping.

• There are no batteries to change, no daily maintenance is needed, and no daily insertion or removal is required.

Unique deep canal placement

- Lyric is placed deep in the ear canal and delivers exceptional sound quality in both quiet and noisy environments.
- Lyric uses the anatomy of the ear and the ear canal for a natural perception of sound.

How does Lyric work?

Lyric is comfortably placed in the ear canal by a Lyric Specialist at Audiology South during a routine clinic visit. No surgery or anesthesia is required. Once placed, Lyric is 100% invisible, is designed to be worn continuously for months at a time, and uses the ear's anatomy to deliver exceptional sound quality. Lyric will be programmed for the clients' specific hearing needs, and the wearer can adjust the volume of the device as needed.

Contact your local clinic to book a time to see if Lyric is the right solution for your hearing needs.



Real size

What to expect from hearing aids

Getting used to hearing aids

It's normal to feel tired or irritated in the first few days of wearing your new hearing aids because your brain is working hard to process new information. It's a good idea to start off by wearing your new hearing aids in a quiet environment; that way you can get used to how quiet situations sound. Remember, the more you wear your hearing aids, the better your long-term outcome.

Background and environmental sounds

You will hear sounds that you have not heard for a long time and familiar sounds will be different (such as your own voice and music). It takes time to adjust to these sounds. The more you wear your hearing aids, the faster your brain will adapt.

Wearing hearing aids full time

After wearing your hearing aids during all waking hours for several weeks, you'll find that you could perform almost the same as someone with normal hearing in certain listening environments.

Looking after your hearing aids

Hearing aids are sophisticated mini-computers that live on and in your ears. You need to take special care of them in order to get the full six years life expectancy. It is important to keep them clean and dry by doing regular maintenance (such as changing wax filters), keeping them in a dehumidifying container and following the instructions from the hearing experts at Audiology South.

Annual check-ups

We recommend that you have your hearing assessed and your hearing aids optimised every 12 months. Your Audiology South team will clean and check that your hearing aids are functioning correctly, and give you advice on any additional maintenance that is required.

Hearing aids and earwax

We recommend that you have the wax from your ears regularly removed to improve the performance and reduce maintenance or damage to your hearing aids.

Audiology South Hearing Solutio

Funding **options**

Ministry of Health (MoH) - Subsidy

All New Zealand citizens and permanent residents aged 16 years and over are entitled to a Government subsidy of \$1,022.22 towards a pair of hearing aids, or up to \$511.11 towards a single hearing aid, every six years.

You may be able to access additional funding from the MOH (Enable) if you have a:

- a) severe hearing loss since birth;
- b) dual disabilities such as physical or intellectual;
- c) Community Services Cardholder and are working/volunteering 30hrs per week, caring for a dependant or in full time study or seeking paid employment.

We recommend that you discuss the eligibility criteria with your Audiologist. Be sure to ask us for a free brochure from the MOH about their subsidy schemes.

ACC

To be eligible for ACC funding, you need:

- a) a minimum hearing loss that meets ACC's criteria, and;
- b) a significant history of work-related noise experience within New Zealand.

If your claim is accepted, ACC will contribute towards the cost of your hearing aids, appointments, batteries and repairs. To start this process, have a free hearing check at Audiology South to discuss your eligibility.

Veteran Affairs

New Zealand Veterans may be eligible for funding for hearing aids and assistive devices if their hearing loss was a result of military service. To start this process, contact us at Audiology South and we will put you in touch with Veterans' Affairs.

Work & Income New Zealand Ioan

WINZ may provide a loan for hearing aids that you pay back via reductions in your WINZ payments over a set period of time. You'll need to obtain a quote from us for your hearing aids, and make an appointment with your local WINZ office.

Finance facilities

Audiology South have several finance options to assist you with purchasing hearing aids, including partnering with Q Mastercard which offers interest free payment terms. Talk to your local team at Audiology South to find out which finance option may be best suited for your needs.

Private Health Insurance or Household Contents Insurance

Some health insurance policies cover the cost of diagnostic hearing tests. Household and contents insurance may cover your hearing aids if they are lost or damaged. Check your policy or contact your insurance provider. If you've lost or damaged your hearing aids, please contact Audiology South first to help streamline your claim.



Protecting your hearing from noise

If you're a farmer, builder or work in industry, you'll work with machinery that can significantly damage your hearing.

While you may not be able to change the amount of noise in your workplace, it's important that you use the correct level of protection for your hearing.

Even if loud noise is from something you enjoy as a leisure activity such as DIY (using circular saws, sanders and hammers), gardening (lawnmowers and hedge trimmers) or attending live loud musical performances – protection for your hearing is vital.

Choosing the right hearing protection

The three main types of hearing protection are ear plugs, semi-insert ear plugs and ear muffs.

There are many options within these groups that you can choose. Ear plugs, for example, range from the mass-produced disposable variety to tailor-made options that can be used multiple times.

Of course, every situation is different, and what is acceptable in a factory may not be practical in another setting. Hygiene, comfort and fit all play a part.

At Audiology South we can provide expert advice on the right solution for you and your environment.

Customising hearing protection for you

Our team of experts can provide a comprehensive range of Hearing Protection Devices from a range of manufacturers at prices to suit.

We specialise in identifying the right device for you and then customising this to fit your ear canal. This ensures day-long wearing comfort and a tailored level of hearing protection that's right for you.

- Sleep plugs
- Musician plugs
- Swim plugs
- Solid plugs
- Electronic shooter plugs



Why Audiology South

Locally owned for unbiased advice

We're not part of a corporate group. Each of our clinics is locally owned and operated. As we are not tied to a specific hearing supplier, we can offer you a full range of hearing devices, so you can be sure you're getting the solution that's right for you.

We're local for your convenience

We've got the southern part of the South Island covered with our main clinics in Invercargill, Dunedin, Queenstown, Winton, Gore, Mosgiel, Ōamaru, Balclutha and Wānaka, with a weekly service in Te Anau.

Your friendly team of expert clinicians

Our leading team of audiologists with years of industry experience, have the knowledge and skills, to ensure you get the very best outcome for your hearing. They are backed by a helpful, friendly customer care team.

Because we live and work in your community and own our group of clinics, you can be sure of consistent, quality care and continuity of service.



Family Centred Care

Putting the client, their family and support network at the centre of treatment process is key to our approach when working with clients. We actively encourage significant others to participate in client appointments to ensure the very best hearing outcomes.

Hearing aids that suit your budget

We're committed to providing you with the best and most affordable hearing healthcare. We have an extensive range of hearing aid solutions, starting from \$495 a pair.

Helping the community

We believe everyone has the right to good hearing. That's why we work with a number of people who are financially disadvantaged, and provide them with the gift of hearing for free, each year.

We're active supporters of Hearing Dogs NZ providing listening dogs for hearing impaired New Zealanders. We also support other charity initiatives fronted by The National Foundation for the Deaf, the NZ Audiological Society and the Master of Audiology University Programmes.

Free hearing aid trial

We appreciate that selecting a hearing aid is a big decision. That's why we can provide you with a free, no-obligation trial for your peace of mind.

DUNEDIN

Ground Floor 227 Moray Place **03 471 5866**

MOSGIEL 127B Gordon Road 03 474 1947

INVERCARGILL

33 Arena Ave 03 214 1378

QUEENSTOWN

Unit 11A, Ground Floor Aurum House, Terrace Junction 1088 - 1092 Frankton Road **03 927 4680**

WĀNAKA

Unit 27, 5 Northlake Drive Northlake **03 445 4848**

WINTON 235 Great North Road

03 280 5549

GORE

17 Mersey Street 03 280 2676

TE ANAU

Fiordland Medical Practi ce 25 Luxmore Drive 0800 498 498

ŌAMARU

157 Thames Street 03 433 0482

BALCLUTHA

56 Clyde Street 03 418 2608



0800 498 498 audiologysouth.co.nz