### Universal Newborn Hearing Screening and Early Intervention Programme



## Frequently asked questions that families might ask of screeners

**June 2015** 

The following questions and answers have been developed to support screeners to provide additional information to parents.

#### Why should I have my baby's hearing screened?

Hearing screening is strongly recommended by the Ministry of Health for all newborn babies. Finding a hearing loss early and providing appropriate support helps give a baby the best chance with language, learning and social development.

The screening programme aims to screen all babies by one month of age. About one or two babies out of every 1000 born will have a significant permanent hearing loss.

Newborn hearing screening is now routine for all babies in many countries.

Prior to newborn hearing screening, hearing loss was detected very late – on average it was three to four years before many hearing losses were confirmed.

### How common is it for parents to decline to have their baby's screening?

Hearing screening is safe and easy, and very few people decline to have their baby's hearing screened — less than one parent per 100 say no to hearing screening.

#### Is it safe? Is there any harm for baby?

There is no harm for your baby. The screening equipment plays a series of soft sounds into your baby's ear canal through a headphone that is held gently on baby's head, and then records a response from the hearing pathway.

#### Are you going to unsettle/wake my baby?

Many babies sleep through the screen. Sometimes they do wake and wriggle a little before settling down. If baby is unsettled we will stop the screen and may need to come back later when baby is settled to complete the test.

#### How does the hearing screening equipment work?

We use an aABR (automated auditory brainstem response) screening test.

The equipment plays a series of quiet, very fast 'chirp' sounds through a headphone. The sensors on the machine pick up your baby's response to these sounds and send it to the equipment for analysis. It tests the whole hearing pathway from the ear to the brain.

### If baby passes the screening test why do I have to monitor my baby's hearing?

We advise you to monitor baby's hearing because hearing status can change. A PASS result indicates that **at the time of the screen** your baby is able to hear normal speech.

It is still possible for a baby with a PASS result to develop hearing loss later on in childhood because of inherited conditions or other infections and illnesses (for example some types of meningitis) that can affect hearing.

What is important is that if you have any concerns about your child's hearing at any time, talk to your GP or Well Child nurse about it. Parents are best placed to know about their own baby's hearing.

### If my baby gets a PASS on the test could they still have a hearing loss?

The screening test is very sensitive but is not designed to pick up very mild problems. It is designed to detect problems that are considered at least moderate in degree and likely to affect baby's speech and language development.

Also, hearing loss can sometimes develop in childhood. It's important to talk to your GP or Well Child nurse if you have any concerns about your child's hearing at any time.

### What is the difference between screening and diagnosis?

A screening test sorts people into two groups — it tells you whether you have an increased chance or a low chance of having the condition being screened for.

In newborn hearing screening, babies who don't have a clear response on screening (a 'refer' screening result), become part of the group who are offered a diagnostic test from an audiologist, to determine whether they actually have a hearing loss — that is, to provide a definite answer.

### What is the risk that a baby has a hearing loss that is not detected by the screening equipment? (ie risk that the pass result is 'wrong')

The hearing screen is a very sensitive test (about 99% accurate) which means that it is extremely unlikely to miss a significant hearing loss, and if your baby has a clear response you can be reassured that he/she is hearing normal speech.

### How severe does the hearing loss need to be for this screening to detect it?

The screen is not designed to pick up slight hearing losses. The type of loss it will pick up is one where the baby is likely to need help with their hearing should a hearing loss be confirmed by diagnostic tests, that is a 'moderate' or more severe loss.

### What proportion of babies screened don't pass? How many babies 'fail' this screening?

Fewer than two babies out of every 100 screened are referred to audiology because they either don't get a pass result or the screen isn't able to be completed.

### My baby can hear because he/she jumps at noises, so do they really need screening/referral to audiology?

There are different types of hearing loss. Some babies who don't pass their hearing screen can hear louder noises, but can't hear quieter noises. This kind of hearing loss can still be enough to stop their speech and language developing properly, even though they seem to be able to hear.

This is why it is really important that babies have a further hearing test to check for hearing loss if they do not pass their hearing screen.

### What can be done to help a young baby who is found with serious hearing loss? What happens if my baby is deaf?

When a baby is diagnosed with a hearing loss, a team of health and education professionals — an audiologist, an adviser on deaf children, an ear, nose and throat specialist and sometimes a paediatrician and a speech and language therapist — develop a plan to assist the family.

Babies with a significant bilateral hearing loss are usually fitted with hearing aids. Children with a severe or profound loss may get a cochlear implant.

#### How many babies are born each year with a hearing loss?

About one to two babies out of every 1000 will have a significant permanent hearing loss from birth.

#### What causes deafness?

Often it is hard to find the cause of hearing loss. When your baby is found to have a hearing loss you will be asked questions by the medical specialist and tests may be carried out to try and determine what the cause of your baby's hearing loss is.

Genetic causes of hearing loss are most common.

#### Who runs the screening programme and how is it evaluated?

The National Screening Unit of the Ministry of Health is jointly responsible for newborn hearing screening with the Ministry of Education. The National Screening Unit are also responsible for breast screening, cervical screening, newborn metabolic screening (heel prick test) and antenatal screening for Down syndrome and other conditions.

Locally your DHB runs newborn hearing screening and reports to the National Screening Unit. The National Screening Unit website has more information — <a href="https://www.nsu.govt.nz">www.nsu.govt.nz</a>

All aspects of the programme are continually monitored. For example:

- data from the screen is routinely checked by a programme coordinator against National Screening Unit protocol
- screeners have to pass an annual competency assessment
- the performance of the programme and each DHB is monitored against a set of indicators and monitoring reports are published on the National Screening Unit website
- services for the programme in each DHB are audited by the National Screening Unit.

### My baby has passed the hearing screen, so when will my baby's ears next be checked?

The next routine hearing screening is at the B4 School Check at about four years old.

It's important that you talk to your GP or Well Child nurse about any concerns you have about your child's speech and language development milestones or hearing at any time. Well Child checks throughout the early years cover language development and provide a good opportunity to think about your child's hearing, speech and language, and to discuss concerns. It is important that you take your baby for these checks, as unclear speech or a delay in speech and language development can sometimes be caused by hearing loss.

Parents are best placed to know about their own baby's hearing.

# My baby passed the hearing screen but the doctor/midwife has referred them for hearing surveillance – what is that and why was my baby referred?

It is good that your baby has passed the hearing screen. However some babies have a higher risk of developing a hearing loss.

If your baby is at higher risk for later hearing loss, it does not mean that your baby will have a hearing loss, just that they are more likely than other babies to develop a hearing loss. Close follow-up means it is possible to pick up any hearing loss that may develop.

A referral will be sent by the screening programme to the local audiology department who will schedule an appointment for your baby. If you have any questions while you are waiting for your appointment, please call your screening programme – here are the details. If you have any concerns about your baby please see your GP, Well Child provider or Lead Maternity Carer (LMC).

#### What does the line on the hearing screen test indicate?

The line on the graph shows the response of your baby's ear to the sounds during the test. It is counting the times it can measure a strong response in relation to the number of sounds during the test.

When the line reaches 100% (the green strip on the top) then a 'true response' has happened and that your baby's ear can hear the soft sounds from the headphone.

50% on the graph does not mean 50% hearing. It means that we can only see a response sometimes, but not enough to say that it is definitely there.

The measurements and the line on the graph can be affected by sounds or noises within the room. It can also be affected if your baby is not settled or asleep at the time of the test. Sometimes we have to wait until your baby is settled or there are no noises in the room. This sometimes means we have to come back to test your baby's ears or take longer during the test.

#### Is the gel safe on my baby's skin?

Yes, it is medical gel that will not harm baby's skin.

# Some people in my family have hearing loss – my baby passed the screen but when their brother/sister was tested they got another appointment for a test. Will my baby get this?

The test result shows that your baby passed the hearing screen today. We now understand more about hearing loss in families where there is a history of this. Although hearing loss may develop in other family members this does not usually develop in early childhood. Therefore we do not necessarily need to retest your baby like their brother/sister. However if you have any concerns about your baby's hearing at any time you can contact your GP or Well Child nurse and arrange for baby to be tested.

### There are people in my family that are deaf. The test shows my baby is okay today but can he/she be tested again?

Information from our own and much larger screening programmes overseas has given us more information about where we should follow up babies who may be more at risk of developing a hearing loss.

We no longer refer babies with a family history of hearing loss through the screening programme. The next routine hearing test your child will have will be at the B4 School Check, at four years old. However it is important that you let your family doctor or Well Child nurse know about your strong family history of hearing loss or if you are concerned, and that you monitor your baby's hearing and language development.

This is a brochure about hearing milestones for babies. It will help you understand hearing and speech and language development. Keep this and if you have any concerns about baby's hearing at any stage you can talk to your own doctor or Well Child nurse, who can arrange for baby to be tested.