



Canadian
Hard of Hearing
Association
NEWFOUNDLAND & LABRADOR

CHHA-NL POSITION PAPER

Universal Newborn Hearing Screening Program (UNHSP) in Newfoundland and Labrador

Introduction:

Approximately 4 in 1,000 Canadian babies are born with some degree of hearing loss or will develop early progressive childhood hearing loss (Ontario Ministry of Children and Youth Services, 2007). The incidence of Permanent Childhood Hearing Impairment (PCHI) exceeds other conditions, such as congenital hypothyroidism, phenylketonuria and other diseases affecting metabolism, all of which are conditions for which newborns routinely undergo screening (Canadian Pediatric Society, 2011).

The incidence of hearing loss in children varies with a number of different factors including, but not limited to, low birth weight, prolonged stays in a neonatal intensive care unit, prematurity, anoxia and inner ear malformations. Furthermore, many genetic syndromes include hearing loss and hearing loss from genetic causes can be present at birth or develop later in childhood.

The detection of hearing loss in children without risk factors is often missed for an extended period during the early development of the child. Missing the diagnosis of hearing loss can often have deleterious effects on a child. Studies have linked untreated hearing loss in children to deficits in psychological, educational, speech and language development.

It is widely agreed among hearing health professionals that access to auditory stimuli during the first six months of life is critical for the development of speech and language in children. Timely intervention strategies and treatment for hearing loss, such as amplification, speech and language therapy and appropriate family counselling on the effects of hearing loss by a trained professional, have been shown to reduce or eliminate the gaps in a hard of hearing child's language skills. A well planned and designed **Universal Newborn Hearing Screening Program (UNHSP)** can help identify hearing loss and the need for treatment and intervention in a timely and effective manner, essentially allowing for improved outcomes in children with hearing loss.

Background:

According to the Canadian Pediatric Society (2011) Ontario and British Columbia are the only provinces in Canada with fully funded UNHSPs. In March of 2014, Speech and Audiology Canada released a report card (updated in January 2016), developed to provide an indication of the status of universal newborn hearing screening programs in Canada. The majority of the provinces and territories, including Newfoundland and Labrador, received an insufficient grade for their respective programs.

The report card indicated a number of areas in which the province of Newfoundland and Labrador needs to improve in all areas in order to have an effective program and these include the following: universal coverage, clearly delineated standards throughout the province, as well as in the tracking of births and outcomes. Following the results of their report card Speech and Audiology Canada has concluded that “it is time for action from Canada's federal and provincial/territorial governments to commit to excellence in early hearing detection and intervention.”

CHHA-NL Position on Universal Newborn Hearing Screening Program (UNHSP):

It is the position of CHHA-NL that the Government of Newfoundland and Labrador should adopt and introduce a formal policy for a Universal Newborn Hearing Screening Program (UNHSP) in Newfoundland and Labrador and, if diagnosed with hearing loss, will receive an appropriate hearing loss intervention program at the earliest possible date as determined by their audiologist.

It is further recommended that the components of the education and awareness strategy should include, but not necessarily be limited to:

1. Evaluation of Current Programs

To evaluate the current newborn hearing screening status in the province of Newfoundland and Labrador and to provide training and equipment so that all birthing hospitals have access to a UNHSP, to ensure that all children with a permanent bilateral or unilateral sensory or conductive hearing loss will be identified, diagnosed and provided with appropriate treatment.

2. Standardization of Program

To ensure the UNHSP is standardized across all birthing hospitals in Newfoundland and Labrador, including appropriate follow-up, documentation and tracking of patient outcomes.

3. Funding from Government

That the government provide appropriate funding for equipment and training as needed. It should be noted here that CHHA-NL, with support from other groups, has purchased most of the screening and diagnostic equipment currently in use at a cost of \$100,000.00 plus.

4. Working Group/Committee

A working group should be formed, including members of CHHA-NL, to help evaluate and carry out the implementation and standardization of a UNHSP in Newfoundland and Labrador.

Rationale for Position:

The ranking of insufficient on the Speech and Audiology Canada UNHSP report card is evidence that the UNHSP program in Newfoundland and Labrador needs significant work. With three babies in 1000 being born with congenital hearing impairment, early detection is certainly merited. Unidentified or late identified Permanent Childhood Hearing Impairment (PCHI), can lead to a wide array of harms in the development of a newborn. Hyde (2005) suggests that families, themselves, are unable to identify the manifestation of hearing impairment during the first year of a child's life. This puts the child at increased risk for impaired language development as well as other possible impairments associated with PCHI.

Furthermore, the early identification of hearing loss may contribute to the diagnosis of certain other syndromes or pathologic conditions. Hyde also notes that it is important that the screening program be universal as opposed to targeted. He suggests that only 50% to 60% of infants with PCHI manifest any of the current risk factors. Therefore, a hearing screening program targeted towards this population would certainly risk missing the identification of a significant portion of newborns with PCHI. Hyde suggests the sensitivity of targeted screening is only 50% at best.

The U.S. Preventative Services Task Force proposes a number of possible benefits of UNHSP. It has been suggested that the proper implementation of a UNHSP can reduce the age of intervention by 6 to 9 months and therefore possibly lead to better long term language outcomes for children with hearing loss. Furthermore, parents may benefit psychologically from avoiding the possible regret of receiving a delayed diagnosis of their child. At the moment there is a wide range of rapid, objective, low-cost screening tests which can be implemented to evaluate the hearing status of a newborn. These include Otoacoustic Emissions (OAEs) and automated ABR (AABR). The screening criteria for these instruments can be set by the clinician. Depending on the result of the screening (pass or fail), the diagnostic pathway for the child can be determined.

Conclusion:

CHHA-NL supports the development, maintenance and standardization across birthing hospitals in NL of a UNHSP that would help meet the goal of confirming hearing loss by three months of age and the provision of appropriate treatment by six months of age. This can be achieved by the establishment of a well thought out, structured and truly universal UNHSP throughout the province.

APPROVAL AND COPYRIGHT INFORMATION

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Association Contact Information:

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General Information about CHHA-NL

The Canadian Hard of Hearing Association Newfoundland and Labrador (CHHA-NL) is a non-profit, charitable organization committed to advocacy, awareness, prevention and the provision of programs and services that promote a better quality of life for hard of hearing and late-deafened people of all ages and their families in Newfoundland and Labrador.

CHHA-NL was founded in 1984 under the name of the Newfoundland Hearing Association (NHA). In 1994, the NHA became the Canadian Hard of Hearing Association-Newfoundland Chapter (CHHA-NC) when it became part of the Canadian Hard of Hearing Association (CHHA). In 2002, when the province changed its official name to Newfoundland and Labrador, the association changed accordingly to its current name of the Canadian Hard of Hearing Association-Newfoundland and Labrador (CHHA-NL).

The association is run by and for hard of hearing people of the province. Its operations are guided and conducted through the efforts of a Board of Directors, seven full-time staff, and volunteers. While it has a paid membership of all ages, the association provides a diversified program of support services to its members and the public at large.

To obtain additional information about the association, or to request a copy of the association's Annual Report, including information related to the ongoing operations of the association (financial, fundraising, strategic plans, types and delivery of programs and services), please contact the Executive Director, Leon Mills, at (709) 753-3224 (voice), by fax (709) 753-5640, by cell (709) 689-8239 or by e-mail at lmills@chha-nl.ca.