

CHECKLIST HEARING EVALUATION

Pediatric Audiology Evaluation (birth through two years of age)

In accordance with the Joint Committee on Infant Hearing (JCIH) 2019 Position Statement, pediatric diagnostic evaluation is completed before three months of age and immediately following a failed newborn hearing screening. Evaluation should not be delayed due to middle ear issues and ongoing treatment. The evaluation should consist of a standardized comprehensive test battery using a cross check principle to obtain ear-specific information for air and bone conduction stimuli and to determine the type and degree of hearing loss to guide the fitting of hearing aids.

In accordance with the Office of Special Education and Rehabilitative services (OSEP) Section 303.303 Referral Procedures, a child must be referred as soon as possible, but in no case more than seven days after the child has been identified.

Auditory Brainstem Response (ABR) (JCIH page 12) Gorga et al., 2006.		
☐ Ear specific results for <u>both</u> ears (even if one ear passed the screening)		
☐ Frequency specific toneburst stimuli to determine thresholds for air and bone conduction		
☐ High intensity stimulus at positive and negative polarity to rule out auditory neuropathy		
Measures of Middle Ear Function (JCIH page 14) Hunter et al., 2013.		
☐ Tympanometry (1000 Hz probe tone birth to nine months) or wide band reflectance		
☐ Acoustic reflex thresholds (1000 Hz probe-tone birth to six months)		
Otoacoustic Emissions (OAE) (JCIH page 14-15) Gorga et al., 2000.		
☐ Diagnostic OAE evaluation (distortion product or transient evoked testing)		
Behavioral Assessment (JCIH page 16) Widen, 2005; Norrix, 2015.		
*depending on developmental status		
☐ Visual Reinforcement Audiometry (VRA) for infants 6-24 months		
☐ Conditioned Play Audiometry for infants >24 months		
Perinatal Risk Factors (JCIH see page 19 for monitoring frequency and 29-31 for more information)		
☐ <u>Immediate</u> referral for caregiver concern (diagnostic evaluation)		
☐ A-ABR by 1 month if mother tests positive for Zika and infant with laboratory evidence of Zika		
\Box Follow-up Audiologic Evaluation (not screen) no later than <u>3 months</u> after occurrence of:		
 Extracorporeal membrane oxygenation (ECMO) 		
 In utero infection with cytomegalovirus (CMV) 		
 Culture positive infections associated with hearing loss 		
 Events associated with hearing loss (significant head trauma, chemotherapy) 		
\square Follow-up audiologic evaluation (not screen) by <u>9 months</u> if infant has:		
 A family history of early, progressive, or delayed onset permanent loss 		
 Spent more than 5 days in neonatal intensive care 		
 Hyperbilirubinemia with exchange transfusion 		
 Aminoglycoside administration for more than 5 days 		
 Asphyxia or Hypoxic Ischemic Encephalopathy 		
 Been exposed to in utero infections such as herpes, rubella, syphilis, and toxoplasmosis 		
 Craniofacial or temporal bone malformations, congenital microcephaly, hydrocephalus 		





PROMOTING EHDI PRACTICES

Referrals and Counseling

To ensure infants get the best care possible, there are several follow-up steps after an audiologic evaluation. These include reporting to state EHDI program, timely referrals, and effective, empathetic, unbiased communication with families.

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	Reporting
	 Report to your State Early Hearing Detection and Intervention program in accordance with the state specific guidelines
	Copies to Primary Care Provider with recommendations for medical and otologic evaluations
	Referrals
	Referral to the state Part C Early Intervention within 7 days with goal of 48 hours
	 Fitting of amplification to be completed within one month of confirmation of hearing loss (if parents choose)
	 Intervention and amplification if conductive hearing loss cannot be medically remediated by six months of age
	Parent to parent or family to family support Communication with families
	 In communication with families be sure to provide information in clear, simple language on: communication modes, methodologies, and technology in a comprehensive and non-biased fashion (e.g., listening and spoken language, signed language and combined approaches)
	 Amplification options (hearing aids, cochlear implants, visual and auditory assistive technologies)
	 Parent to parent or family to family support
	 Trained professional who is deaf or hard of hearing
	Be sure to allow time for:
	 Listening to families and answering their questions
	 Supporting family decision-making
	 Providing information about and referrals to family support
	 Encouraging families to advocate for their needs
	 Detailing the process (e.g., referral to early intervention)
	 Describing what will happen next (e.g., next appointment)
	 Explaining the hearing aid or cochlear implant process
	 Discussing visual language strategies and resources

For more information on recommendations regarding diagnostic audiologic evaluation see:

Gorga et al., 2000. http://www.ncbi.nlm.nih.gov/pubmed/11059701
Gorga et al. 2006. https://doi.org/10.1097/01.aud.0000194511.14740.9c
Hunter et al. 2013. https://doi.org/10.1097/AUD.0b013e31829d5158
de Lyra-Silva et al., 2015. https://doi.org/10.1016/j.ijporl.2015.06.039
Norrix, 2015. https://doi.org/10.1044/2015_AJA-14-0095
Widen, 2005 https://doi.org/10.1002/mrdd.10083



JCIH website

To quickly access the website link simply scan the QR code next to the link by opening your smart phone's camera. Without taking a picture the camera will recognize the code and take you to the link.

Other Resources:

American Speech-Language-Hearing Association. (2004). Guidelines for the Audiologic Assessment of Children From Birth to 5 Years of Age [Guidelines]. Available from http://www.asha.org/policy/GL2004-00002.htm.

National Center for Hearing Assessment and Management (2011). The NCHAM E-Book: A Resource Guide for Early Hearing Detection and Intervention (EHDI). https://www.infanthearing.org/ehdi-ebook/



