



Technical Assistance Bulletin

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Division of Early Intervention and Special Education Services

Birth-4	X	Birth-5	Age 3-5	Age 3-21	Birth-21
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Early Intervention Services for Children Who Are Deaf or Hard-of-Hearing and Their Families

THE IMPORTANCE OF STARTING EARLY

The time from birth to school entry is a critical window for development of language and communication skills. These skills lay the foundation for cognitive and social development, school readiness, and success throughout life. Given that the vast majority of children who are Deaf or hard-of-hearing are born to hearing parents who may have very little or no knowledge of American Sign Language (ASL) or other language development strategies for English or another native language, it is critical that local Infants and Toddlers Programs (LITPs) have strong support systems in place for these families.

If children who are Deaf or hard-of-hearing enter school without language or with language delays, it can impact them for the rest of their lives. Recognizing that children who are Deaf or hard-of-hearing are at risk for developmental delay, especially in the area of language, Maryland’s Universal Hearing Screening Program mandates hearing testing of all babies born in the State (Md. Code Ann., Health Gen. §13-602). Maryland’s Early Hearing Detection and Intervention (EHDI) program is committed to the Joint Committee on Infant Hearing’s “1-3-6” goals: all newborns should be screened by one month of age, all children who refer on the screening should receive definitive diagnostic testing by three months, and all babies who are Deaf or hard-of-hearing should be enrolled in early intervention services by six months. A recent study showed that children who met these guidelines showed significantly greater vocabulary development in the preschool years than those who were later to receive identification or intervention (Yoshinaga-Itano et al., 2017). By identifying children who are Deaf or hard-of-hearing when they are infants, it is possible to provide these young children and their families with the interventions and supports they need to develop to their full potential and start school ready to learn. Early identification and appropriate intervention that provides children with access to language during this critical period of development is essential to preventing language delay and later academic struggles.

The **Maryland Infants and Toddlers Program (MITP)** provides a statewide, community-based interagency system of comprehensive early intervention services to eligible infants and toddlers, from birth until the beginning of the school year following a child’s fourth

birthday, and their families (Md. Code Ann., Educ. §8-416). The MITP is committed to starting early because research shows that the age at which a child begins high-quality interventions and supports is the greatest predictor for closing the gap in development between children who are Deaf or hard-of-hearing and their typically developing peers. In fact, early intervention services result in better language outcomes regardless of hearing status or even communication approach (Yoshinaga-Itano, 2003).

EARLY INTERVENTION SERVICES

Children who have been identified as Deaf or hard-of-hearing are eligible for early intervention services because they have a “diagnosed condition that puts them at high-probability for developmental delay” (COMAR 13A.13.01.03B(12)(c)), especially in the area of language, which potentially affects the quality of social relationships, participation/engagement in activities, and independence. Eligibility for early intervention services based on diagnosis includes infants and toddlers with all types and degrees of hearing loss, including unilateral and/or conductive loss.

A primary focus of early intervention services should typically be on immediate language access and development. Every eligible child and family has a jointly developed Individualized Family Service Plan (IFSP) that leads the team in providing appropriate early intervention services. The plan is based on the child’s present levels of functional development in all areas and an assessment of family’s resources, priorities, and concerns in order to develop measurable child and family outcomes and determine the services to be provided (COMAR 13A.13.01.08). Early intervention services for all eligible children, including those who are Deaf or hard-of-hearing, are based on and address individual child strengths/needs and family resources, priorities, and concerns to build a family’s capacity in supporting their child’s active participation in home, school, and community activities. Therefore, early intervention services under Part C of the Individuals with Disabilities Education Act (IDEA) may target both child and family needs (i.e., sign language training for parents).

All families in early intervention are assigned a service coordinator as identified on the IFSP. Additionally, there may be other early intervention services providers supporting the individualized needs of the child and family. The IFSP team should include professionals who have expertise in supporting families to ensure access to language and language development and access for children who are Deaf or hard-of-hearing in order to ensure kindergarten readiness with age-appropriate language development. All IFSP team members play a role in supporting the child and family to meet the jointly developed IFSP outcomes.

Helping families to understand their child’s hearing status¹ and how it may potentially affect all areas of a child’s development is an essential component of early intervention

¹ *Hearing status means “the state of an individual’s ability to perceive sound, based on audiological assessment” (COMAR 10.11.02.03).*

services, as this knowledge may help families develop informed priorities. For most children, a primary focus will be the development of age-appropriate language skills, which impact social relationships, the use of knowledge and skills, and the use of appropriate behaviors to meet needs. Some children who are Deaf or hard-of-hearing have other medical and/or developmental needs that may also require intervention to support the child's full participation in home, school, and community activities. As with any child, thorough and ongoing discussions of the family's observations, concerns, and priorities and regular review of development in all areas is essential for infants and toddlers who are Deaf or hard-of-hearing.

SUPPORTING LANGUAGE ACCESS AND DEVELOPMENT

Children who are Deaf or hard-of-hearing have the ability to develop language and meet milestones similar to their hearing peers if accessible language models and input are available. It is important for LITP professionals to help parents of young and newly-identified children to understand how language naturally develops in children and the impact of hearing status on that development. If children are not immersed in a language they can readily access, they are at risk to fall behind in many areas of development. Immediate access to language allows the development of positive relationships, builds the cognitive foundations for language processing, and supports development in all areas. Early intervention program professionals play a critical role in helping families understand the crucial importance of language access, including the potential developmental risks to children who do not have access to language for extended periods and the neurodevelopmental benefits of early exposure to complete, complex language models. Families need support to learn ways to support their children's development.

Receiving a diagnosis that confirms that their child is Deaf or hard-of-hearing can be overwhelming for families, especially those who do not have a family history or other experience with individuals who are Deaf or hard-of-hearing. Families may feel confused about their child's hearing status, how it impacts language and communication, and what their options are for service delivery. Families of newly identified children may feel overwhelmed by the amount of information and advice they receive from medical professionals, advocates, other families, and others. Early intervention service providers should help families process this information and determine how it applies to their child and family and should also provide resources to help families learn more about topics and options that are of interest to them.

STRATEGIES FOR ACCESSING LANGUAGE

Families need objective information and nonjudgmental support as they determine how their children will best access language, whether visually, auditorily, or both. The role of professionals is to provide families with information and support them in nurturing their child's development of language and ensure that the family has the resources to provide immediate language access and development. In collaboration with families, service providers should also regularly review the child's progress through formal and informal means to enable families to evaluate and adjust their approaches, as appropriate.

Visual Access

For children whose hearing status means that they cannot readily understand speech through auditory listening, visual access to language can provide a foundation of language learning and prevent the negative effects of language deprivation. Establishing communication through visual language helps strengthen relationships within the family and supports the child's cognitive and social development. Families unfamiliar with people who are Deaf or hard-of-hearing may inaccurately equate "language" with "speech" and may benefit from information that clarifies the difference between the two.

- **American Sign Language:** Like any language, American Sign Language (ASL) is a visual and tactile language with a complete vocabulary, syntax, and history. ASL is the native language of many Deaf people as well as many children who are hearing that have Deaf parents. Exposure to and immersion in ASL in infancy establishes the infant's brain's ability to process language patterns within the required developmental timeframes and allows ready communication within the family. Children learn ASL in the same way they learn spoken languages – through responsive interactions with fluent language models. Initial language development in ASL can provide the foundation for development of English skills through access to spoken language and/or reading and writing.
- **Cued Speech:** Cued Speech is a system of handshapes and positions that, when combined with the mouth movements of speech, visually represent the phonemes of spoken language. As such, it is not a language per se but a modality providing access to a spoken language such as English. Cueing enables a child to learn language phonetically without hearing it (although many cued speech users use hearing aids or cochlear implants and do hear speech sounds, as well).
- **Signed English Systems:** "Signed English" is a term for a variety of invented systems that are not themselves languages but are designed to represent English visually through the use of sign vocabulary (primarily signs borrowed from ASL, some with modifications) combined with invented signs for English grammatical morphemes (-s for plurals, -ing, etc.) that are not used in ASL, which has its own distinct grammar. These systems are usually used in combination with spoken English.

Auditory Access

Some children who are hard-of-hearing access spoken language through auditory listening, generally through the use of hearing aids. Other children do not receive adequate access to spoken language through hearing aids but may receive cochlear implants with the goal of obtaining access to spoken language. ITP professionals should help families understand their individual child's hearing status, the potential impact of any additional challenges the child may have, and the benefits and limitations of amplification options in order to make informed decisions about their child's ability to access spoken language. Because the process of obtaining and activating cochlear implants typically takes 12–18 months, families should be provided with information about the potential benefits of using a visual approach to support language development during this period. As families explore their options for amplification in consultation with medical professionals, early intervention professionals can be a valuable additional source of objective information and resources.

While choices about amplification, communication, services, and programs are related and may influence each other, families should be reminded that one choice does not necessarily determine others. Each family has a unique combination of supports and services to meet their individualized needs. Families who choose to pursue amplification for their children should be made aware of the **Maryland Hearing Aid and Language and Communication Video Loan Bank**. Hearing aids can be loaned to families for up to a year (with possible extensions) while they are seeking insurance coverage or other options for obtaining permanent personal amplification. The Loan Bank's services are also appropriate for families exploring whether or not their children will benefit from the use of hearing aids (including children in cochlear implant candidacy). For additional information, including the application to be completed by the referring audiologist and the child's family, see: <https://marylandlearninglinks.org/the-maryland-hearing-aid-and-language-and-communication-video-loan-bank>.

Accessing Spoken Language

- **Listening with Amplification:** Children who access spoken language through auditory listening with hearing aids or cochlear implants may receive intervention and therapy to help them learn to attend to sound, to match sound with meaning, and to understand and use words. Some children may receive “aural habilitation” or other therapy services in a medical setting, such as a cochlear implant clinic at a hospital.
- **Sign-Supported Speech:** Some families focus primarily on language access through auditory means but use some signs for key vocabulary or concepts to support their child's understanding. This “total communication” approach varies from individual to individual and may evolve over time. For example, some families may sign key vocabulary when their children are very young and then fade the signs as their child's spoken language develops. Other families may use more signs as their skills develop. Again, the specific approach to language development should be based on a family's priorities for their child.

Bilingual Development

All children in Maryland are expected to develop proficiency in reading and writing English in school in order to be college, career, and community ready. Some children who are Deaf or hard-of-hearing learn English primarily through accessing it directly through spoken language, while others use their language base in ASL to learn English through print and/or other means. Whatever languages and strategies families use with their young children, literacy development can and should begin in early childhood. Families of newly identified children benefit from information on the potential of their child who is Deaf or hard-of-hearing to develop bilingual skills. Families who want their children to develop fluency in two or more languages (e.g., ASL and English (whether through print or print and speech); English and Russian; ASL, English, and Spanish; etc.) should receive support from early intervention professionals to accomplish this.

Families should consider how they will ensure their child has access to models in all the target languages, how and when to use each language, etc. Resources for developing

English through reading and writing for children who primarily use ASL should be provided to those families.

SUPPORTING FAMILIES TO SUPPORT LANGUAGE DEVELOPMENT

A primary role of early intervention services is to support families in their role as their child's primary caregivers and teachers. While services are individualized to meet a family's priorities and self-identified needs, effective services for children who are Deaf or hard-of-hearing and their families share certain characteristics, regardless of the child's hearing status or the family's language and communication strategies, including:

- Strengths-based approaches that start from the presumption that children and families have many abilities and assets to achieve their own goals;
- Coaching models in which the primary role of the early intervention service provider is to help families develop and implement strategies to support their children's language and overall development;
- Routines-based intervention that focuses on helping families and other caregivers embed support for the child's development into ongoing everyday activities (e.g., meal times, bath time, playing in the park) and settings (e.g., child care, family members' homes, community activities) that are selected by and important to the family;
- Skill development for families that allows them to meet their goals for their children. For families who seek to learn a language (ASL) or communication modality (such as Cued Speech) in order to use it with their children, the LITP should ensure the family has access to classes, community organizations, online resources, tutors/mentors, and other support to develop their skills and enable them to provide effective language modeling to their children. If the family chooses to incorporate auditory listening and speech, they may want to learn strategies related to teaching children to attend to, discriminate, and produce sounds, as well as skills to maintain and maximize amplification; and
- Culturally- and linguistically-responsive approaches that respect and celebrate families' cultures. This includes supporting the development of the family's home language(s), if the family so chooses, and meeting the needs of culturally Deaf families who use ASL and/or other sign languages.

FACILITATING FAMILY-TO-FAMILY SUPPORT AND EXPOSURE TO ADULTS WHO ARE DEAF OR HARD-OF HEARING

Many families value the opportunity to interact with others who also have children who are Deaf or hard-of-hearing. These interactions can help families understand their options for supporting their child's development and preventing language deprivation and delay. Meeting older children who are Deaf or hard-of-hearing can provide reassurance about their children's potential and future development. Early intervention professionals can create opportunities for families to meet through their programs when appropriate. Many families also benefit from connecting with others via social media. Opportunities to interact with adults who are Deaf or hard-of-hearing may also be valuable to families as they learn about Deafness and develop goals and plans for their child and family.

MEETING THE NEEDS OF FAMILIES WHO ARE DEAF/HARD OF HEARING

Parents and caregivers who are themselves Deaf or hard-of-hearing (or have extended family members who are) may have different needs and priorities in early intervention than families with little or no experience of Deafness. Respecting the priorities, strengths, and resources of these families, while also addressing any concerns and needs they have around their child's development, helps ensure their child's future success. Some families who are Deaf or hard-of-hearing may opt out of early intervention services or choose only classroom-based programs for developmental opportunities for their children. Some will pursue amplification and/or services to promote spoken language development, while others will not.

When hearing children whose parents/caregivers are Deaf or hard-of-hearing are referred to the early intervention system, cultural and linguistic responsiveness is also required. If the family's home language is ASL or another signed language, this should be considered when assessing the child to determine the presence of a delay or disability (COMAR 13A.13.01.05A(4)). If the child is determined to be eligible for early intervention services, the services should be fully accessible to all family members and should support bilingual development in ASL and English if that is the family's goal. Local Infants and Toddler Programs, local school systems, and other local government agencies and non-profit organizations may utilize the Maryland State Contract for Visual Communication Services (<http://dbm.maryland.gov/proc-contracts/Pages/statewide-contracts/VCSContractHome.aspx>) to procure interpreting, transcription, and other services to ensure accessibility of meetings, home visits, etc. Families may also benefit from information and referrals to accessible community resources on promoting language growth and child development.

SERVICES OFFERED BY THE MARYLAND SCHOOL FOR THE DEAF

The Maryland School for the Deaf (MSD at www.msdc.edu) offers early intervention services for families of children who are Deaf or hard-of-hearing across the State. MSD staff have expertise in supporting the language development of young children who are Deaf or hard-of-hearing. Families may receive early intervention services from MSD, the LITP, or both, depending on their needs and priorities. The local lead agency is required to notify the parents or guardians of each child who is Deaf or hard-of-hearing of the availability of the education programs offered by the Maryland School for the Deaf (COMAR 13A.13.02.08) and to indicate on the IFSP that the information was shared. The local lead agency should also invite MSD, in writing, to attend/participate in the initial IFSP meeting unless the family refuses permission for them to do so. It is critical to share service delivery approaches so that families can implement language access and development for their child.

As with all children, the LITP is responsible for developing the IFSP, based on IFSP team decisions, and providing service coordination. Many families receive services from both MSD and through other LITP providers to fully meet their needs. MSD services can also be included on an Extended IFSP. If a family elects to receive services from MSD, the MSD staff working with the child should participate in ongoing IFSP meetings. Families who do not

initially elect to receive services from MSD should be reminded of the option at subsequent IFSP reviews and the service coordinator can invite MSD to subsequent meetings.

MSD services reflect the school's bilingual/bicultural philosophy, with a strong focus on development and instruction in American Sign Language and written English. Children may receive instruction and related services to promote listening and spoken language skills, individually and/or in small groups, as determined by their IFSP or Individualized Education Program (IEP). Family education and support activities, including sign language classes for parents and other family members, are also available.

Classes for infants (two mornings/week), toddlers (up to 5 half-days/week), and three-year-olds, including children on the extended IFSP option (up to 5 full days/week) are offered on both the Columbia and Frederick campuses of MSD. In-home services to provide family coaching on strategies to support language development and ASL instruction for parents/caregivers who desire it are also provided. Families can choose home-based services, the classroom program, or both. The frequency of home visits is determined by family needs and priorities and is generally one to three visits per month.

When a child transitions to an IEP at or after age three, the family may choose to develop an IEP through the local school system or to apply to MSD. If the child enrolls at MSD, MSD develops the IEP in consultation with the LSS. The LSS provides transportation (if indicated on the IEP); all other educational and related services are provided by MSD. Every LSS is required to inform families of children who are Deaf or hard-of-hearing about the availability of services from MSD and to indicate on the IEP that this information was provided (Md. Code Ann., Educ. §8-3A-05). All families of children who are Deaf or hard-of-hearing should be informed of all their options at the time of transition to preschool services, regardless of where the child and family received early intervention services.

FREQUENTLY ASKED QUESTIONS

- 1. Does a Deaf or hard-of-hearing child have to be demonstrating developmental delay to receive early intervention services?** No. All children with a confirmed hearing status that may impact speech or language development are eligible for early intervention services due to having a diagnosed condition that is likely to cause developmental delay. Early intervention services should be initiated as soon as the diagnosis is confirmed in order to maximize the child's opportunity and prevent or minimize any delays.
- 2. What kinds of early intervention services might a child who is Deaf or hard-of-hearing receive?** For all eligible children, early intervention services are designed by the IFSP team to enable the child and family to meet the outcomes that the family identifies as important to them. The nature, frequency, and intensity of services are determined by the IFSP based on the family's priorities, strengths, and needs, NOT the child's diagnosis. Therefore, there is not a defined set of services for a child who is Deaf or hard-of-hearing. No service is required or excluded as a result of the diagnosis or reason for eligibility.

Services for a child and their family may include, but are not limited to:

- Specialized instruction, often focused on coaching parents and other caregivers in strategies to support language development through activities embedded in the family' routines and natural environment
- ASL classes and mentors for the child and family members
- Audiological services to determine the child's hearing status, help the family understand how the hearing status may impact development, and support the family in making and implementing decisions about amplification
- Participation in group settings where the child has access to Deaf or hard-of-hearing peers and adults as language, communication, and cultural models and partners
- Family training in American Sign Language and/or communication modalities and strategies to support access to language and language development in ASL, English, and/or other languages used by the family
- Consultation or direct services to the child or family to address other developmental or medical concerns or outcomes important to the family (e.g., gross motor skills, including crawling and walking, vision issues, feeding needs, etc.)

3. How can families learn ASL, cued speech, and/or strategies to support their child's auditory access to spoken language?

Possible resources include:

- Individual instruction and modeling provided by a LITP service provider during visits with the family in the home or other natural environments
- Individual instruction and modeling provided by MSD staff as part of home visit services
- In-person group classes taught by the LITP and/or LSS
- In-person group classes taught at MSD as part of the family education parent support program
- In person group classes at a community agency, local college, or other setting appropriate to the family's needs and interests
- Recorded materials (such as DVDs, etc.) provided to the family by the LITP, borrowed by the family from the Maryland Hearing Aid and Language and Communication Video Loan Bank (<https://marylandlearninglinks.org/the-maryland-hearing-aid-and-language-and-communication-video-loan-bank>), or obtained from other sources
- Online learning resources

4. What is the cost to families for these services? All early intervention services by local Infants and Toddlers Programs and the Maryland School for the Deaf are free of charge to families.

5. Where can families go to learn more and connect with other families of children who are Deaf or hard-of-hearing? Resources for connecting with other families may be found through the LITP, MSD, and a variety of organizations and on-line groups.

Early Intervention providers should familiarize themselves with resources in their communities to share with interested families.

References

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For more information, call 410-767-0249

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