

Hearing Loss Among Children

FACT: About 1-2 in every 1,000 U.S. children has a moderate to profound bilateral hearing loss (40 decibels or more in the better ear). For many of these children, the cause of the impairment is unknown.

The age of a child when a hearing loss is diagnosed is crucial to the development of the child's speech, language, cognitive, and psychosocial abilities. Treatment is most successful if the hearing loss is identified early—through newborn screening done during the first few months of life. Newborn hearing screening costs about \$30 per child and takes about 9 minutes to do. Costs are much higher if a hearing loss is not diagnosed until later in life. A recent study of the extra economic costs associated with hearing loss showed that the lifetime cost per person was about \$325,000 (in 2000 dollars).



We also know that one in every four children with a serious congenital hearing loss does not have his or her hearing loss diagnosed until age 3 years or older. One in every four children with hearing loss also was born weighing less than 2500 grams (about 5½ pounds), and about one in every three has one or more other developmental disabilities, such as cerebral palsy, mental retardation, or vision impairment.

At CDC, we have one of the few programs in the world that conducts active, ongoing monitoring of the number of children with hearing loss in a large, multiracial metropolitan area.

In 1991, CDC started the **Metropolitan Atlanta Developmental Disabilities Surveillance Program (MADDSP)** to monitor the number of 3- to 10-year-old children living in the metropolitan Atlanta area who have one or more of the following conditions: mental retardation, cerebral palsy, hearing loss, and vision impairment. CDC added autism spectrum disorders to the program in 1998.

MADDSP also provides opportunities for special studies through which CDC staff members can identify risk factors for these disabilities and determine whether steps taken to prevent disabilities have been effective.

Related CDC Activities

- Work done with federal and state agencies and other organizations to help states and territories develop and implement Early Hearing Detection and Intervention Programs for newborn hearing screening.
- The Children's Longitudinal Development Study, an ongoing study of risk factors for developmental disabilities among children identified through MADDSP.
- The Follow-up Study of Children with Developmental Disabilities, which examines current functioning and the presence of secondary conditions among young adults with hearing loss and other developmental disabilities.