SPEECH AND LANGUAGE PROBLEMS, 1999

Speech and language disorders refer to problems in communication and related areas such as oral motor function. These delays and disorders range from simple sound substitutions to the inability to understand or use language or use the oral-motor mechanism for functional speech and feeding. Some causes of speech and language disorders include hearing loss, neurological disorders, brain injury, mental retardation, drug abuse, physical impairments such as cleft lip or palate, and vocal abuse or misuse. Frequently, however, the cause is unknown.

More than one million of the students served in the public schools' special education programs in the 2000-2001 school year were categorized as having a speech or language impairment. This estimate does not include children who have speech/language problems secondary to other conditions such as deafness. Language disorders may be related to other disabilities such as mental retardation, autism, or cerebral palsy. It is estimated that communication disorders (including speech, language, and hearing disorders) affect one of every 10 people in the United States.

A child's communication is considered delayed when the child is noticeably behind his or her peers in the acquisition of speech and/or language skills. Sometimes a child will have greater receptive (understanding) than expressive (speaking) language skills, but this is not always the case.

Speech disorders refer to difficulties producing speech sounds or problems with voice quality. They might be characterized by an interruption in the flow or rhythm of speech, such as stuttering, which is called dysfluency. Speech disorders may be problems with the way sounds are formed, called articulation or phonological disorders, or they may be difficulties with the pitch, volume or quality of the voice. There may be a combination of several problems. People with speech disorders have trouble using some speech sounds, which can also be a symptom of a delay. They may say "see" when they mean "ski" or they may have trouble using other sounds like "1" or "r." Listeners may have trouble understanding what someone with a speech disorder is trying to say. People with voice disorders may have trouble with the way their voices sound.

A language disorder is an impairment in the ability to understand and/or use words in context, both verbally and nonverbally. Some characteristics of language disorders include improper use of words and their meanings, inability to express ideas, inappropriate grammatical patterns, reduced vocabulary and inability to follow directions. One or a combination of these characteristics may occur in children who are affected by language learning disabilities or developmental language delay. Children may hear or see a word but not be able to understand its meaning. They may have trouble getting others to understand what they are trying to communicate.

- National Dissemination Center for Children with Disabilities (NICHCY)

Childhood Communication Disorders FAQ

What Is Meant by "Communication Disorders"?

The term communication disorders encompasses a wide variety of problems in language, speech, and hearing. Speech and language impairments include articulation problems, voice disorders, fluency problems (such as stuttering), aphasia (difficulty in using words, usually as a result of a brain injury), and delays in speech and/or language. Speech and language delays may be due to many factors, including environmental factors or hearing loss.

Hearing impairments include partial hearing and deafness. Deafness may be defined as a loss sufficient to make auditory communication difficult or impossible without amplification. There are four types of hearing loss. Conductive hearing losses are caused by diseases or obstructions in the outer or middle ear and can usually be helped with a hearing aid. Sensorineural losses result from damage to the sensory hair cells of the inner ear or the nerves that supply it and may not respond to the use of a hearing aid. Mixed hearing losses are those in which the problem occurs both in the outer or middle ear and in the inner ear. A central hearing loss results from damage to the nerves or brain.

Many communication disorders result from other conditions such as learning disabilities, cerebral palsy, mental retardation, or cleft lip or cleft palate. What Are Some Characteristics of Children with Communication Disorders?

A child with speech or language delays may present a variety of characteristics including the inability to follow directions, slow and incomprehensible speech, and pronounced difficulties in syntax and articulation. Syntax refers to the order of words in a sentence, and articulation refers to the manner in which sounds are formed. Articulation disorders are characterized by the substitution of one sound for another or the omission or distortion of certain sounds.

Stuttering or dysfluency is a disorder of speech flow that most often appears between the ages of 3 and 4 years and may progress from a sporadic to a chronic problem. Stuttering may spontaneously disappear by early adolescence, but speech and language therapy should be considered.

Typical voice disorders include hoarseness, breathiness, or sudden breaks in loudness or pitch. Voice disorders are frequently combined with other speech problems to form a complex communication disorder.

A child with a possible hearing problem may appear to strain to hear, ask to have questions repeated before giving the right answer, demonstrate speech inaccuracies (especially dropping the beginnings and endings of words), or exhibit confusion during discussion. Detection and diagnosis of hearing impairment have become very sophisticated. It is possible to detect the presence of hearing loss and evaluate its severity in a newborn child.

Students who speak dialects different from standard English may have communication problems that represent either language differences or, in more severe instances, language disorders.

How Many Children Have Communication Disorders?

The overall estimate for speech and language disorders is widely agreed to be 5% of school-aged children. This figure includes voice disorders (3%) and stuttering (1%). The incidence of elementary school children who exhibit delayed phonological (articulation) development is 2% to 3%, although the percentage decreases steadily with age.

Estimates of hearing impairments vary considerably, with one widely accepted figure of 5% representing the portion of school-aged children with hearing levels outside the normal range. Of this number, 10% to 20% require some type of special education. Approximately one-third of students who are deaf attend residential schools. Two-thirds attend day programs in schools for students who are deaf or day classes located in regular schools. The remainder are mainstreamed into regular school programs.

What Are the Educational Implications of Communication Disorders?

Many speech problems are developmental rather than physiological, and as such they respond to remedial instruction. Language experiences are central to a young child's development. In the past, children with communication disorders were routinely removed from the regular class for individual speech and language therapy. This is still the case in severe instances, but the trend is toward keeping the child in the mainstream as much as possible. In order to accomplish this goal, teamwork among the teacher, speech and language therapist, audiologist, and parents is essential. Speech improvement and correction are blended into the regular classroom curriculum and the child's natural environment.

Amplification may be extremely valuable for the child with a hearing impairment. Students whose hearing is not completely restored by hearing aids or other means of amplification have unique communication needs. Children who are deaf are not automatically exposed to the enormous amounts of language stimulation experienced by hearing children in their early years. For deaf children, early, consistent, and conscious use of visible communication modes such as sign language, finger spelling, and cued speech and/or amplification and aural/oral training can help reduce this language delay. Some educators advocate a strict oral approach in which the child is required to use as much speech as possible, while others favor the use of sign language and finger spelling combined with speech, an approach known as total communication. There is increasing consensus that whatever system works best for the individual should be used.

Many children with hearing impairments can be served in the regular classroom with support services. In addition to amplification, instructional aids such as captioned films and high interest/low vocabulary reading materials are helpful. For most children with hearing impairments, language acquisition and development are significantly delayed, sometimes leading to an erroneously low estimate of intelligence.

Students whose physical problems are so severe that they interfere with or completely inhibit communication can frequently take advantage of technological advances that allow the individual to make his or her needs and wants known, perhaps for the first time.