

Cerebral Palsy

Symptoms or Behaviors

•Hypertonia or Spasticity:

Increased stiffness. Happens when the motor cortex and spinal cord are affected. Occurs in 60% of CP cases. Scoliosis is common with this characteristic. Hypotonia: Muscle weakness. Most infants with CP initially have hypotonia when born, especially in the neck and trunk. When the floppiness/weakness continues through the first year without spasticity or athetoid movement, the diagnosis of generalized hypotonia is given. Students with hypotonia often stand on the inside of their feet causing the ankles and legs to rotate inward and the toes to claw. Foot deformities can occur without the proper positioning -AFO-Ankle Foot Orthotics.

•Athetosis or Athetoid or Dyskinetic: Involuntary movements are present, especially in the arms, hands, and face. Happens when extrapyramidal tract of the nervous system is affected. Paying attention in the classroom can be especially hard for students with this characteristic as their own body movements distract them.

•Choreoathetoid: Characterized by wormlike

athetoid movements.
•Ataxia: Characterized by an inability to achieve coordination in balancing and hand use. It is the predominant characteristic in 5-10% of CP cases. Occurs when the cerebellum is injured.

•Mixed: Most often CP is described as including more than one of the above characteristics. In such cases, it can be described as "mixed".

About the Disorder

Cerebral Palsy is a general term most widely defined as "a disorder of movement and posture due to a defect or lesion of the immature brain." A more detailed definition that is being pushed for international acceptance states "a group of disorders of the development of movement and posture, causing activity limitation, that are attributed to non-progressive disturbances that occurred in the developing fetal or infant brain. The motor disorders of cerebral palsy are often accompanied by disturbances of sensation, cognition, communication, perception, and/or behavior, and/or by a seizure disorder."

Words to Describe Severity:

Severe: Total dependence in meeting physical needs; poor head control; perceptual and/or sensory integrative deficits prevent achievement of age-appropriate motor skills.

Moderate: Some independence in meeting physical needs; functional head control; perceptual and/or sensory integrative deficits interfere with achievement of age-appropriate motor skills.

Mild: Independent in meeting physical needs; potential to improve quality of motor and/or perceptual skills with therapy intervention; and potential for regression of motor skills without proper intervention.



Educational Considerations

- •Students with moderate involvement usually require the most intensive therapy in an attempt to raise their level of independence. Students with severe involvement require school staff to be trained in positioning techniques to help prevent deformities and sores from developing.
- •Students may need occupational therapy, physical therapy, speech therapy, and adaptive physical education (DAPE). Multiple services may often take students out of the classroom. Scheduling therapies around academic instruction should be attempted.
- •Auditory learning is often an area of strength, as visual perception difficulties are common. Physically managing school materials may also be difficult, necessitating modifications to materials and equipment in the school environment. Assistive technology such as text to speech/scan and read software is often an appropriate accommodation, especially in the upper grade levels.
- •Visual motor difficulties are common, so copying from the board can be difficult, along with other related drawing activities, and will require modifications.
- •Identifying mobility options at a young age is crucial for students, allowing them to learn about their environment through physical exploration.
- •Students may have an increased or decreased need for calories, depending on their metabolism and activity level.
- •CP is not progressive, but if it isn't properly managed with devices and therapy, a student's physical status can worsen.

Resources

United Cerebral Palsy, 800-872-5827 www.ucp.org

National Center on Birth Defects and Developmental Disabilities (NCBDD) www.cdc.gov/ncbddd/dd/ddcp.html

National Institute of Neurological Disorders and Stroke, 800-352-9424 www.ninds.nih.gov/

Hill, Jennifer Leigh, Meeting the Needs of Students with Special Physical and Health Care Needs. Prentice Hall.

