Any event that causes damage to brain tissues is considered a brain injury. There are two general categories of brain injury: congenital (before or during birth) and acquired (injury after birth). Damage can occur suddenly (as in trauma or stroke), or more gradually (as in diseases). Damage can result from a traumatic brain injury (TBI), stroke, brain tumor, lack of oxygen to the brain (anoxia or hypoxia), degenerative diseases, encephalopathy, or other causes.

In a stroke, the damage is often localized to a specific area, whereas in anoxia/hypoxia, encephalopathy, degenerative diseases or a TBI, damage is much more widespread which means the symptoms will be more severe and more complex.

The brain is the "executive" of the body, with ultimate control over all functions, including speaking, thinking, moving, swallowing, and breathing. It receives messages, interprets them, and then initiates and monitors responses. Brain injuries are as individual as the people who are injured. The short and long-term effects of a brain injury vary widely depending on the cause, location of the injury, and severity. Understanding a person's personality and cognitive abilities before the injury is vital towards understanding any changes that may have occurred after the injury.

Physical, cognitive, perceptual/sensory and behavioral/emotional changes are common. Even if the symptoms are mild or atypical, every brain injury is a serious medical condition that requires prompt attention and diagnosis. That diagnosis can be complex, as numerous other conditions (such as depression, epilepsy, and post traumatic stress disorder) can have similar symptoms. For a more complete list, please see " Common Symptoms ."

The term "traumatic brain injury" (TBI) refers to an injury to the brain that results from a blow to the head (such as in a motor vehicle accident or a fall); it can also be from a penetrating injury such as a gunshot wound. The injury may occur at the site of impact, on the opposite side as the brain rebounds against the skull, or diffusely throughout the brain as a result of twisting and turning on its axis. Injury may occur at the time of impact or it may develop afterwards as a result of swelling and bleeding within the brain.

Physical changes which occur from brain injury, such as weakness and visual changes, are much more visible and therefore more recognized than changes in cognition or behavior. What that often means is that a person who does NOT have overt physical signs of injury may NOT

seek help from a doctor or hospital initially; or if he/she does, the hospital stay is often relatively short and may not include any rehabilitation or therapy. Many routine assessments done in the emergency room (CT scan, MRI) will not show any evidence of brain injury - but that does NOT mean there IS no injury!

Cognitive problems may not initially be recognized. However, as a person returns to normal activities these problems may impact how that person functions in daily life. It is not uncommon for a person to attempt to return to work after the initial injuries have healed, only to find he/she is unable to concentrate, remember, self-organize, and complete tasks as easily as before the injury. If the brain injury is not properly diagnosed and treated by professionals trained in brain injury rehabilitation, the person may not be able to return to normal activities.

Sometimes the difficulty is misdiagnosed as psychiatric or even "laziness". The importance of early and proper assessment and treatment by members of a rehabilitation team - physiatrist (M.D. who specializes in rehab medicine), neuropsychologist, physical therapist, occupational therapist, speech therapist, and other team members - is vital to helping survivors of brain injury return to their place in the community. Without this help, it is easy to see how these problems can lead to job loss, changes in relationships, and depression.

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