

Brain Injury: The Facts, Faces and Future

EXECUTIVE SUMMARY



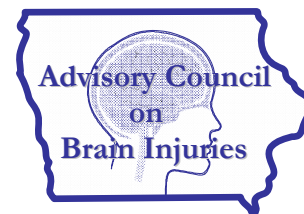
Partners in prevention and service:



Iowa Department of Public Health
Promoting and Protecting the Health of Iowans



**The Brain Injury
Association of Iowa**



Brain Injury: The Facts

Traumatic Brain Injury (TBI) impacts the lives of thousands of lowans every year. TBI has been described as the “Silent Epidemic” because so often the scars are not visible to others. The affects of brain injury are cognitive, emotional, and social and can result in physical disability. In addition to the overwhelming challenges individuals with brain injury experience, families also face many difficulties in dealing with their loved one’s injury and in navigating a service delivery system that can be confusing and frustrating.

The **most debilitating outcome of injury is TBI**, which is characterized by:

- irreversibility of its damages
- long-term effects on quality of life marred by physical impairment, memory troubles, emotional difficulties and/or learning disabilities
- limited daily activities necessitating external help (typically placing a heavy burden on families)
- high health care costs with increased hospital stays and repetitive outpatient visits

Incidence Rates

On average, there are **1,150 unintentional deaths** per year in Iowa; nearly **500** of those are from TBI. In 2004, 37% of unintentional deaths were due to motor vehicle accidents (MTV) occurring across all age ranges; and 30% were due to falls, most frequently involving persons over 65 years of age.

From 2003 to 2005, there were, on average, **2,610 hospitalizations** per year for TBI with an increasing rate of 88.9 per 100,000 (2003) up to 91.5 per 100,000 (2005). The ER visits’ rates were more than double that of the hospitalizations, increasing steadily from 190.4 per 100,000 (2003) to 223.6 per 100,000 (2005).

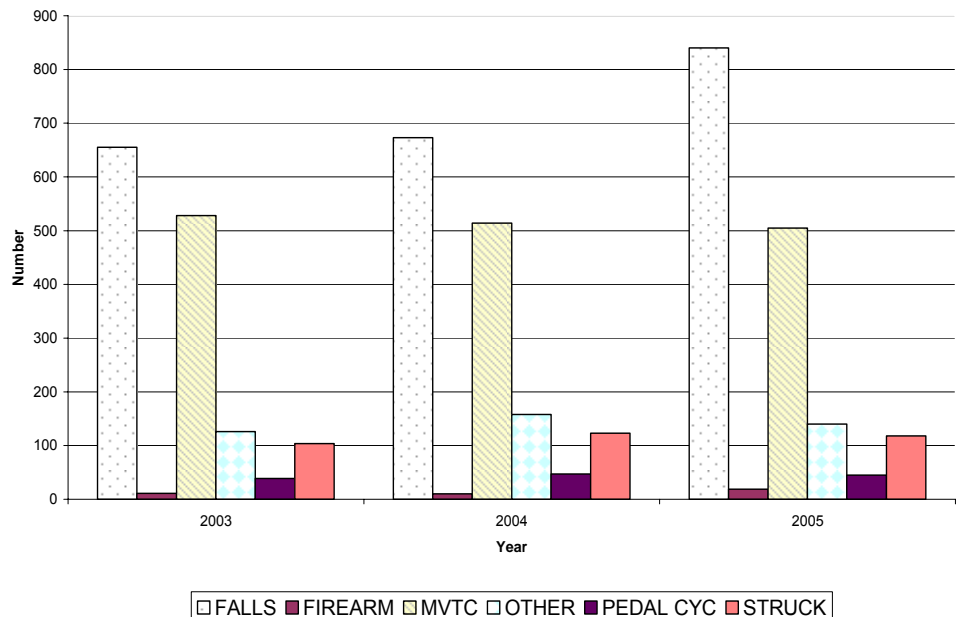
TBI Causes

Falls were the leading causes of TBI ER visits (41%) and hospitalizations (48%), followed by **motor vehicle crash** TBI ER visits (22%) and hospitalizations (29%).

Victims of falls over the **age of 65** were more likely to be hospitalized (65%) compared to youths under 25, who made up 45% of the ER visits. Youths were more likely to be victims of motor vehicle accidents. Individuals 25 years of age and under made up the majority (52%) of TBI ER visits and nearly 40% of TBI hospitalizations.

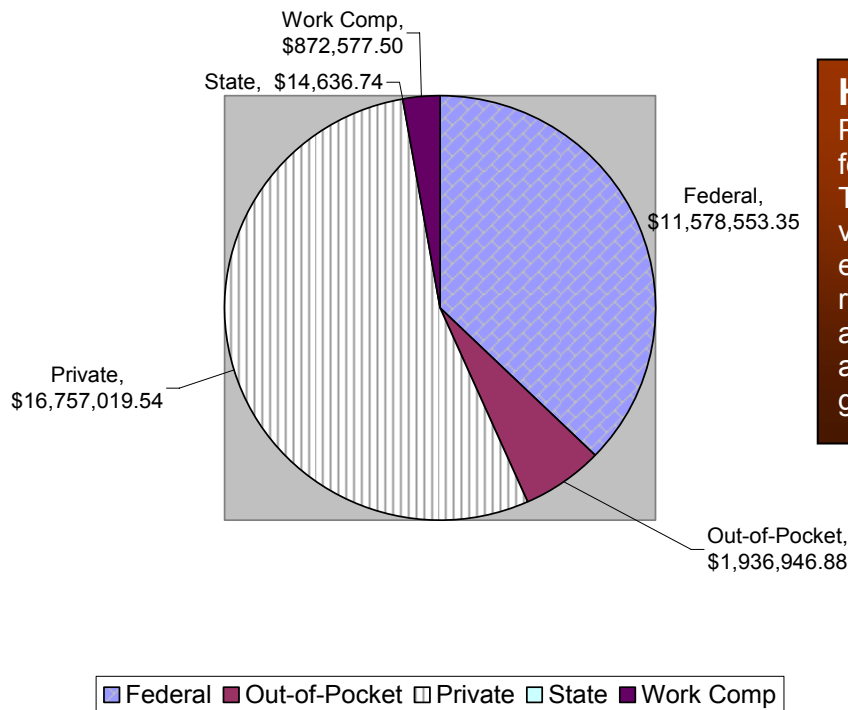
Brain injuries from being struck by or against an object, including assaults, was the third leading cause of ER visits (26%) and hospitalizations (7%). TBIs caused from being struck by an outside object most affected younger individuals; 83% of those who visited the ER due to this cause were under 35 years of age.

TBI related Causes of Hospitalizations from 2003 to 2005 in Iowa



Brain Injury: The Facts

2003 Total Hospital Charges and Sources of Payment



Health Care Charges

Private payers were charged the most for both ER visits and hospitalizations. The charges were highest for motor vehicle accidents. This can be explained by the difference in reimbursement rates between private and public payers and the difference in average lengths of stay, which are greater for motor vehicle accidents.

Outcomes of TBI-Related Hospitalizations

Cause	Home	Transfer	Long term Care	Deceased	Rehabilitation	Other
MTV	75%	9%	4%	6%	5%	2%
Firearm	24%	5%	0%	67%	5%	0%
Falls	58%	9%	21%	9%	2%	1%
Struck	90%	4%	3%	0%	1%	2%
Other	76%	9%	5%	5%	2%	3%

This report presents data about TBI hospitalizations and ER visits between 2003 and 2005. The data were obtained from the statewide inpatient and outpatient database provided to the Iowa Department of Public Health by the Iowa Hospital Association. The full report is available from the Iowa Department of Public Health, Bureau of Disability & Violence Prevention.

Brain Injury: The Future

Vision

Iowa will have a comprehensive, coordinated and seamless service system for persons with brain injury that:

- Provides easy access to information and resources
- Collaborates and partners with all stakeholders in the system to reduce barriers and improve services and supports
- Creates and maintains a comprehensive base of needs assessment and service delivery data
- Actively and consistently pursues needed funding and legislative change
- Respects the individuality and dignity of the survivor and their family
- Continuously improves the outcomes for individuals and their families for living, learning and working



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Brain Injury: The Future

Individual and Family Care Access

Goals

- Create and enhance ways for families and individuals with brain injury to gain access to information about needs and resources.
- Identify ways to serve sub-populations needing specialized services.
- Coordinate services and training for individuals with brain injury and their families.

Annually

- Improve use of the Iowa Brain Injury Resource Network (IBIRN) helpline by promoting the helpline to IBIRN sites, support groups, individuals with brain injury and their families.
- IDPH will continue to apply for federal grants to expand the IBIRN and fund additional initiatives.
- Assess family needs regarding education and training at least yearly.

Year 1

- Implement an outreach plan to individuals with brain injuries that experience substance abuse problems and/or mental health issues.
- Create appropriate family advocacy training resources for families choosing to use support groups and those who prefer home based models.
- Develop and implement outreach plans for juvenile detention facilities, shelter care facilities, Iowa Department of Corrections, community correction facilities, and juvenile court officers.
- Address prevention and outreach strategies to help reduce the number of fall-related brain injuries in the state of Iowa.
- Enhance the Iowa Family Support Network (IFSN) to connect families to a peer-to-peer network.

Year 2

- Create a rural outreach effort to rural hospitals, primary care physicians and other rural service providers to make them aware of existing brain injury information and resources.
- Deliver brain injury information on-line, by phone, in-person, and/or in writing, in languages that Iowans speak, including but not limited to, Spanish, Bosnian, Vietnamese, Swahili.
- Increase distribution of IBIRN information and materials beyond existing sites to domestic violence shelters.
- Enhance existing listing of brain injury services in the Iowa Compass and 2-1-1 databases.
- Convene a task force to identify needs and develop solutions to address brain injury related issues in children and families, focusing on: 1) children, ages 0 to 5; 2) sibling support of children with brain injuries; 3) child care issues for children with brain injuries; and, 4) transition to adult services.

Year 3

- Increase the inclusion of adults with brain injuries in employment programs and services by partnering with the Iowa Vocational Rehabilitation Services, Department for the Blind, and the Department of Veterans Affairs.
- Increase the brain injury outreach base by providing training and information resources to hospital chaplains and other religious denomination leaders.
- Develop relational strategies that help individuals with brain injuries and their families understand their injuries and pursue available resources.
- Identify needs and feasibility of training brain injury support group members to enhance peer support.

Brain Injury: The Future

Service and Support Availability

Goals

- Assure competency-based training for providers with emphasis on respect for and self-determination of the individual consumer.
- Create technological solutions to address training to meet service delivery needs.
- Expand solutions to address changing demographics of Iowa.
- Remove or reduce barriers created by the service system eligibility requirements.

Annually

- The Brain Injury Association of Iowa (BIA-IA) and the IDPH will provide brain injury trainings as needs are identified or requests are received.
- Identify and streamline resource and service delivery systems through statewide coordination.

Year 1

- Increase awareness of, and access to the American Academy for the Certification of Brain Injury Specialists (AACBIS) certifiable core, intermediate and advanced curriculum of brain injury training for adult and children providers in Iowa.
- To provide a more seamless brain injury service delivery system, create and expand linkages with governmental and private entities.
- Create a task force, including representatives from the Department of Veterans Affairs and other Veterans organizations, to identify issues and concerns of Iowans with brain injuries and their families.

Year 2

- Renew and strengthen the Area Education Agency (AEA) Brain Injury Resource Team (BIRT) component through Iowa Department of Education.
- Core and intermediate brain injury training will be provided through technological means to at least 10 percent of recipients by 2009.
- Create, enhance and utilize virtual systems of information delivery and training for rural providers and individuals with brain injury and their families, utilizing the Iowa Communication Network (ICN), Tele-Health, Polycom, Internet, community colleges and/or state and private universities.

Year 3

- Improve the success of identified school-age children with brain injuries in educational settings by tailoring the student's curriculum and environment.
- By 2010, core and intermediate brain injury training will be provided through technological means to at least 20 percent of recipients.
- The BIA-IA will promote utilization of on-line information systems that identify the most common eligibility requirements and resources for individuals with brain injuries and their families.

Brain Injury: The Future

Service System Enhancements

Goals

- Develop a statewide information base that best utilizes all data sources.
- Use collected data to fully capture and articulate brain injury needs in Iowa.
- Seek partnerships and collaboration.
- Promote brain injury awareness and prevention through public marketing campaigns.

Annually

- Integrate data into all relevant brain injury planning processes (i.e., assessment to evaluation) to assure effectiveness and efficiency.
- Pursue a data-driven legislative agenda.
- Create a data access system that provides real-time data in a timely manner to requestors.
- Iowa's brain injury constituency will become involved with and/or maintain involvement in current and future redesign efforts.
- Participate in coalitions to effect change in the health care system and in safety standards both at state and federal levels.

Year 1

- Create a data warehouse that collects, analyzes and disseminates brain injury data.
- Partner with state and regional stakeholders in creating new programs and services, locating funding, and coordinating existing efforts.
- Establish benchmarks, outcomes and indicators to measure and evaluate the brain injury service system in Iowa.

Year 2

- Seek private and corporate funding for new initiatives.
- Assess current awareness activities throughout the state.
- Develop a strategic marketing campaign with input from key stakeholders, using proven and effective strategies.

Year 3

- Develop incentives and advocacy for sources to participate in brain injury data collection.
- Use available funding, and pursue additional funding as needed in order to support public awareness and prevention objectives.
- Expand the Brain and Spinal Cord Registry to include all acquired brain injuries.



my mom fell in her bathtub
my brother was in a fight
my friend hit a roadside bomb in Iraq
my daughter wasn't wearing a helmet
my neighbor was playing football
...and our lives were changed forever



For more information

Iowa Department of Public Health

515-281-7689

www.idph.state.ia.us/bh/brain_injury.asp