



## Introduction

This Data Sheet provides a category breakdown for causes of spinal cord injury (SCI) that occurred between 2010 and 2019. During that timeframe, there were 7,151 (N) persons enrolled in the National Spinal Cord Injury Database. This represents roughly 6% of new SCI cases in the United States during that time.

*Vehicular accidents accounted for 2,738 (38.29%) of spinal cord injuries, which ranks 1<sup>st</sup> in causes of spinal cord injury.*

## Vehicular Crushes

25.46%	N=1821	Auto (includes cars, jeeps, trucks, dune buggies, and buses)
6.89%	N=493	Motorcycle (includes 2-wheeled, motorized vehicles)
3.23%	N=231	Bicycles (includes bicycles, tricycles and unicycles)
1.55%	N=111	All-Terrain (includes both 3-wheeled and 4-wheeled)
0.24%	N=17	Aircraft (includes fixed-wing and rotating-wing)
0.24%	N=17	Snowmobile
0.13%	N=9	Boat
0.55%	N=39	Other vehicular, unclassified (included tractor, bulldozer, go-cart, steamroller, train, road grader and forklift)

*Falls accounted for 2,240 (31.32%) of spinal cord injuries, which ranks 2<sup>nd</sup> in causes of spinal cord injury*

## Falls

6.40%	N=458	Fall on same level (includes slipping, tripping and stumbling)
5.29%	N=378	Fall on and from stairs and steps
4.03%	N=288	Fall from, out of, or through building or structure
3.40%	N=243	Other slipping, tripping, stumbling and falls (includes fall from or off toilet, fall in or into shower or empty bathtub, and fall on same level due to stepping on an object)
2.18%	N=156	Fall on and from ladder
1.93%	N=138	Fall from one level to another
1.40%	N=100	Fall from tree
0.76%	N=54	Fall from bed
0.70%	N=50	Fall due to ice and snow
0.66%	N=47	Fall on and from scaffolding
0.62%	N=44	Non-Recreational fall, jump or diving into water
0.41%	N=29	Fall from chair
0.32%	N=23	Intentional self-harm by jumping from a high place
0.28%	N=20	Fall from other furniture other than chair or bed
0.41%	N=29	Other (includes fall from cliff, fall on and from playground equipment, fall on same level due to collision with another person, fall from non-moving wheelchair, and fall while being carried/supported by other person)
1.64%	N=117	Unspecified falls
0.92%	N=66	Unknown type of falls

*Acts of violence accounted for 990 (13.84%) of spinal cord injuries, which ranks 3<sup>rd</sup> in causes of spinal cord injury.*

## Violence

12.53%	N=896	Gunshot wounds
0.92%	N=66	Person-to-Person (includes assault with a blunt object and falls as a result of being pushed)
0.39%	N=28	Other penetrating wounds (includes explosion, stabbing and impalement)

*Sports & recreational activities accounted for 605 (8.46%) of spinal cord injuries, which ranks 4<sup>th</sup> in causes of spinal cord injury.*

## Sports and Recreation

3.48%	N=249	Diving
1.01%	N=72	Snow skiing
0.62%	N=44	Winter sports (includes sled, snow tube, toboggan, ice hockey, and snow-boarding)
0.59%	N=42	Surfing (includes body surfing)
0.38%	N=27	Horseback riding
0.32%	N=23	Air sports (includes parachuting, hang gliding and para-sailing)
0.25%	N=18	Trampoline
0.24%	N=17	Football
0.15%	N=11	Wrestling
0.13%	N=9	Gymnastics (includes all gymnastic activities other than trampoline)
0.13%	N=9	Field sports (includes field hockey, lacrosse, soccer, and rugby)
0.08%	N=6	Skateboarding
0.07%	N=5	Water skiing
0.07%	N=5	Baseball/Softball
0.06%	N=4	Rodeo (includes bronco/bull riding)
0.06%	N=4	Basketball and Volleyball
0.00%	N=0	Track and field (includes pole vault, high jump, etc.)
0.84%	N=60	Unclassified (includes auto racing, glider kite, slide, swimming, bungee jumping, scuba diving, rollerblading, jet-skiing, cheerleading, etc.)

*578 (8.08%) of spinal cord injuries were a result of other causes.*

## Other

4.43%	N=317	Medical/ Surgical complication
1.92%	N=137	Hit by falling/ flying object
1.09%	N=78	Pedestrian
0.64%	N=46	Other unclassified (includes lightning, kicked by an animal, machinery accidents)

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## About the National Spinal Cord Injury Statistical Center and Database

The National Spinal Cord Injury Statistical Center (NSCISC) is located at the UAB Department of Physical Medicine and Rehabilitation. NSCISC supports and directs the collection, management and analysis of National SCI Database, which is the world's largest and longest SCI research database.

The National SCI Database has been in existence since 1973. Since then, 29 federally funded SCI Model Systems have contributed data to the National SCI Database. There are currently 14 SCI Model Systems contributing data, with an additional 5 subcontract Centers collecting Form II (follow-up) data. For a complete list, go to <http://www.msctc.org/sci/model-system-centers>.

As of March 2020, the database contained information on 34,504 persons who sustained traumatic spinal cord injuries. To assure comparability of data acquired by personnel in various centers, rigid scientific criteria have been established for the collection, management and analysis of information entered into the database. Additional quality control procedures are also in place to further enhance the reliability and validity of the database.

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