NSAA Catastrophic Injury Fact Sheet

Skier/Snowboarder Catastrophic Injuries

- There were 31 catastrophic incidents reported at U.S. ski areas during the 2018/19 winter operating season.
- The majority of catastrophic incidents resulted from collisions with the snow surface, other skiers or stationary objects.
- Males represent approximately 90 percent of 2018/19 skier/snowboarder catastrophic incidents.
- Skiers/snowboarders have less than 1 in a million chance of receiving a catastrophic injury from snowsports-related trauma.

Overview

The National Ski Areas Association (NSAA) reports that there were 31 catastrophic injuries during the 2018/19 season, a decrease of six incidents over the 2017/18 season. This number is still below the ski industry’s 10-year average of 46 catastrophic injuries occurring at ski areas in the United States. The majority of those catastrophic injuries were suffered by male skiers under the age of 30 on intermediate terrain. Collisions with other guests and stationary objects continues to be the primary cause of catastrophic injury. Approximately 80 percent of skiers/snowboarders who received catastrophic injuries were reportedly wearing a helmet.

Methodology & Terms

NSAA collects fatality and catastrophic injury data from all U.S. ski areas annually at the end of the winter operating season. NSAA compiles this data to provide information to the media and the public that accurately reflects the inherent risks to skiing and snowboarding guests at U.S. ski areas. The data reflects all incidents of catastrophic injury that occur within a ski area’s operating boundary; catastrophic injuries which occur in the backcountry are not included in these statistics because they do not reflect the true risk of catastrophic injury at ski areas for the regular skiing public.
Only catastrophic injuries that occur during normal operating hours at ski areas are reported by NSAA; after-hours catastrophic injuries that occur while the ski area is closed are not included in this data. NSAA also does not include catastrophic injuries that are related to a pre-existing medical condition (such as a heart attack or stroke). This data also does not include catastrophic injuries suffered by ski area employees while working, unless the injury is akin to one that could occur with a guest. An industrial catastrophic injury (e.g. a fall from a chairlift tower) would not be included because that type of incident does not reflect the risk of injury to the public.

NSAA does not report catastrophic injury by individual state because of the wide variability of the data. Some states have one or two catastrophic injuries per season or fewer, making this variability even more pronounced. Many individual state ski associations compile and release their statewide catastrophic injury data separately from NSAA.

**Catastrophic injury**: This category includes injuries with significant neurological trauma, major head injuries, spinal cord injuries resulting in full or partial paralysis, and injuries resulting in the loss of a limb. Eliminated from this statistic are health-related catastrophic injuries (e.g. heart attack resulting in a fall). These incidents are reported to NSAA at the end of each winter operating season annually.

**Skier visit**: A skier/snowboarder visit represents one person visiting a ski area for all or any part of a day or night. This includes those visiting on full- and half-day, night, complimentary, adult, or child tickets; season passes; and all other lift access types.

**Historical context**

The 31 reported catastrophic injuries for 2018/19 is a decrease of six from the 2017/18 season. The 2018/19 number remains lower than the 10-year average of 46 catastrophic injuries per season. Based on 59.3 million skier visits during the 2018/19 season, the catastrophic injury rate equates to 0.52 catastrophic injuries per one million skier/snowboarder visits (less than one catastrophic injury per one million skier visits). This remains lower than the 10-year average of 0.83 catastrophic injuries per one million skier visits.

**Factors**

Gender continues to be a significant factor in ski or snowboard-related catastrophic injuries. Of the catastrophic injuries reported in 2018/19, 28 were male and three were female. By equipment type, most of those catastrophically injured were skiers compared to snowboarders (21 skiers and 10 snowboarders). Nationally, an average of 74 percent of snowsports participants are skiers and 26 percent are snowboarders.

At the time of these incidents, 25 of the 31 people who suffered catastrophic injuries were wearing helmets, while six of those injured were not wearing helmets. Approximately 85 percent of all skiers and snowboarders wore helmets during the 2018/19 ski season, according to a separate annual helmet usage study conducted by NSAA.

**NSAA’s take on ski/snowboard catastrophic injuries**
“Guest safety is a primary value for NSAA and its member resorts,” said NSAA President Kelly Pawlak. “On the slopes today, the chance of suffering a catastrophic injury is low, especially when you are aware of your surroundings and ski or ride in control.”

“Catastrophic injuries are life-altering and tragic. NSAA is committed to helping to reduce the number of catastrophic incidents by continuing to provide educational programming to both ski areas and the public to mitigate risk on the slopes.”

Pawlak emphasized that safety remains a top priority for ski areas. That, coupled with personal responsibility of those who recreate at ski areas, are major factors in decreasing the number of ski or snowboard-related catastrophic injuries.

**NSAA Safety Programming**

**Ride Another Day**
In the 2017/18 season, NSAA launched a safety initiative called [Ride Another Day](http://www.nsaa.org/safety-programs/collisions/). This initiative is designed to educate skiers and snowboarders about the risks of reckless skiing, speed, and collisions.

Spearheading this program are Kelli and Chauncy Johnson whose daughter, Elise, was killed in a tragic 2010 collision at a ski area. Kelli was severely injured in the incident, and the rider who collided with Elise also died. The Johnson family partnered with NSAA to help tell Elise’s story and to educate others about the dangers of high-speed collisions and reckless skiing. To learn more, visit [http://www.nsaa.org/safety-programs/collisions/](http://www.nsaa.org/safety-programs/collisions/).

**Other safety programming**
Ski areas across the country observe [National Safety Month](http://www.nsaa.org/safety-programs/collisions/) in January, which is dedicated to education for both guest and employee safety. Many ski areas have developed comprehensive guest safety education programs and actively promote the seven points of the [Responsibility Code](http://www.nsaa.org/safety-programs/collisions/), as well as the tenets of the [Smart Style](http://www.nsaa.org/safety-programs/collisions/) freestyle terrain safety initiative promoted by NSAA.

Other NSAA safety initiatives include [Lids On Kids](http://www.nsaa.org/safety-programs/collisions/), a program committed to educating parents and children on the importance and proper use of snowsports helmets. [Kids on Lifts](http://www.nsaa.org/safety-programs/collisions/) emphasizes safe lift loading, riding and unloading practices.
## 10-Year Catastrophic Injury Rate per Million Skier/Snowboarder Visits

<table>
<thead>
<tr>
<th>SEASON</th>
<th>CATASTROPHIC INJURIES</th>
<th>SKIER DAYS (in millions)</th>
<th>RATE (per one million skier visits)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2018-19</td>
<td>31</td>
<td>59.3</td>
<td>0.52</td>
</tr>
<tr>
<td>2017-18</td>
<td>37</td>
<td>53.3</td>
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<tr>
<td>2016-17</td>
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<tr>
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<tr>
<td><strong>10-year Average</strong></td>
<td><strong>46</strong></td>
<td><strong>55.8</strong></td>
<td><strong>0.83</strong></td>
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</tbody>
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The National Ski Areas Association (NSAA) is a trade association representing the interests of ski area operators and industry suppliers. Formed in 1962, NSAA designs and supports ski industry initiatives and programs, including growth, safety and sustainability, from its Lakewood, Colo., headquarters. Learn more about NSAA’s mission and programs at [NSAA.org](http://NSAA.org).