An unbelted driver is likely to hit the steering wheel, while an unrestrained passenger in the front seat will hit the windshield and dashboard. Unbuckled rear seat passengers will collide with the front occupants or crush them between the seat and the dashboard.

At high speeds, a frontal collision can eject unbelted occupants through the windshield. You are three times more likely to be killed if you are ejected from the vehicle.

# Side impact collisions

Unlike the frontal collision, the vehicle provides little structure to absorb the energy in this type of a crash. Therefore, the side of the vehicle can buckle. All unrestrained objects and people then move to the side of the impact, and in the process, often hit one another with the full force of the collision.

# Rear collisions

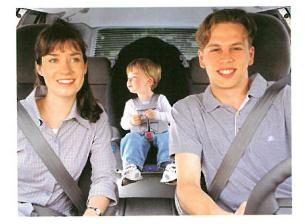
Upon impact in a rear collision, the vehicle occupants are thrust against the back of their seats.



Unrestrained occupants rebound towards the front of the vehicle, causing injuries in the same way that would occur in a frontal collision.

Seatbelts prevent ejection, and head restraints play a major

role to minimize neck injuries. If your vehicle is equipped with adjustable head restraints, make sure they are set to the proper height. The top of your head restraint should never be lower than the top of your head.



#### Rollovers

For someone not wearing a seatbelt, the rollover is the most dangerous of collisions.

A rollover can happen even at modest speeds. Vehicle occupants can often be ejected while the vehicle flips over and tosses them around. Many passengers suffer extensive injuries inside the vehicle before they are ejected.

## **Airbags**

Airbags are safety devices of proven value that supplement the protection provided by seatbelts. Airbags are not meant to replace seatbelts.

A number of car manufacturers now offer side-mounted airbags as standard or optional safety equipment for front seat passengers. Side airbags protect drivers and front seat adult passengers in certain side-impact collisions. Some manufacturers offer side-mounted airbags in the rear seat as standard or optional equipment.

Always wear your seatbelt because airbags do not stop you from being thrown out of a vehicle.

## Seatbelts and the law

In Saskatchewan, it is the law to wear your seatbelt when travelling in a vehicle. Drivers are also responsible to ensure that all passengers under age 16 are properly belted in.

If you are caught without a seatbelt or with an unbelted passenger under age 16, you face a \$175 fine.

Under SGI's Safe Driver Recognition program, you can also lose points on the safety rating scale if you fail to wear a seatbelt (-3 points) or have a passenger under age 16 without a seatbelt or child restraint (-3 points).

Seatbelt violations are included in the program because, as clearly shown in this brochure, failure to wear one increases your chance of serious injury or death.

If a seatbelt has saved your life and you would like to share your story, please call Traffic Safety Promotions at 1-844-TLK-2SGI (1-844-855-2744), ext. 6042.

For more information on seatbelt safety, please visit www.sgi.sk.ca.

Much of the content in this brochure was originally published in the "Occupant Restraints and the Human Collision" brochure by Transport Canada.

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# Seatbelts Save Lives

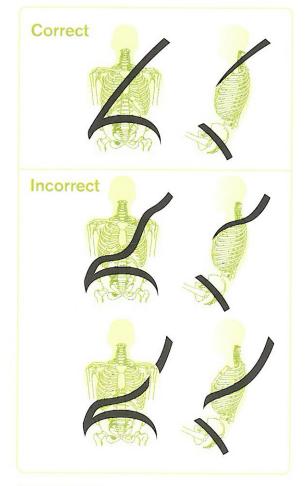


safety

#### The facts

- Each year in Saskatchewan almost 30,000 vehicle collisions injure close to 7,000 people and kill more than 120.
- You reduce your risk of death or serious injury by half, if you wear your seatbelt properly.
- The combination lap and shoulder belt is your personal emergency brake that reduces the risk of injury or death.
- Seatbelts work to hold you securely in place and distribute the force of an impact to the more solid areas of the body.
- Your lap belt helps prevent you from being thrown out of the vehicle. This allows your lower body to absorb much of the force of the collision.
- Your shoulder belt provides extra protection.
  It restrains the upper part of your body to prevent injuries to your head and face.
- Drivers wearing seatbelts are more likely to maintain control of their vehicle in a crash and minimize the chance of hitting something else.

It only takes about five seconds to buckle up, but some people still don't wear their seatbelts. This is more of a problem in rural areas of the province. Overall 96.8% of Saskatchewan people use their seatbelts; however, in rural regions only 90.4% wear their seatbelts.



## Proper use

A seatbelt is only effective if it is properly adjusted.

The lap portion of the seatbelt should be firmly adjusted as low as possible on your hips, not over your abdomen. The shoulder belt should pass over your shoulder and fit snugly over your chest.

A shoulder belt should never be worn under your arm. If you're in a crash, the pressure of the belt over your heart could cause serious or even fatal injuries.

## Pregnant women

The best way to protect an unborn child is to protect the mother.

Pregnant women should take special care to adjust their seatbelts. Sitting as upright as possible, the lap belt should be worn under your abdomen and as low over your hips as possible.

## Child restraints

SGI's Keep Them Safe brochure and content found at www.sgi.sk.ca describe the proper use of child safety seats. For a copy of the brochure, or if you have any questions about using child restraints, please call 1-844-TLK-2SGI (1-844-855-2744), ext. 6042.

## The collision

When a vehicle crashes, there are two types of collisions. The first is when the vehicle hits something, buckles and bends, then comes to a stop. The second, more dangerous collision, is the human collision. This occurs when unrestrained passengers are thrown around inside the vehicle. At 48 km/h, the force of a collision if you're unbelted is equal to a fall from a third floor window to the ground below.

The inside of your vehicle is like a protective box or cocoon, called the "life space." The life space is a safety system; it includes such things as airbags, padded dashboards, reinforced beams and doors, etc. These components are designed to meet safety standards and regulations developed by Transport Canada.

The life space is constructed to withstand the force of most impacts.

In most collisions, the passenger compartment stays intact; injuries and fatalities occur when unbelted occupants are thrown about inside or are ejected from the vehicle. In other words, the life space can only be safe if you are wearing a seatbelt.

There are three ways you can maximize serious injuries or your chances of being killed in a collision:

- your body hits something
- something hits you
- you are ejected from the vehicle



## Front collisions

During these crashes, the front end of the vehicle collapses, absorbing most of the crash energy. Meanwhile, unbuckled passengers, along with all loose objects, move towards the point of impact.