

**Statement of**

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**on**

**Vehicle for Children**

**to the**

**Subcommittee on Consumer Affairs, Insurance and Automotive  
Safety of the Senate Commerce Committee**

**February 28, 2007**

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## Introduction

Consumers Union (CU)<sup>1</sup>, nonprofit publisher of Consumer Reports (CR), welcomes the opportunity to submit comments to members of the Senate Commerce Subcommittee on Consumer Affairs, Insurance and Automotive Safety. CU has been testing cars and reporting our findings to readers since the organization's founding in 1936. CU regularly testifies before Congress on issues ranging from automotive safety to health care to telecommunications and financial privacy.

The topic for discussion this morning, Vehicle Safety for Children, is a top legislative priority for Consumers Union. This Senate Commerce Committee has a proud history of enacting legislation that has provided critical protections for children and adults riding in passenger vehicles. It is not an exaggeration to say that had this Committee not acted on seat belts, air bags, child car seats, roof crush, rollover and many other auto safety issues, many thousands of people would either not be alive today or would have suffered grievous injury.

This hearing provides us with a welcome opportunity to share with members of this subcommittee concerns about the unfinished business of keeping children safe in and around cars. Our testimony focuses on four key areas of interest for us both in terms of our testing and our public policy work: blind zones, LATCH car-seat installation system, power window switches, and brake-shift interlock.

## The Problem of Backing Over Children

Every year, thousands of children are hurt or die because a driver backing up couldn't see them. Consumers Union has studied the problem and has found that all vehicles today have blind zones that prevent drivers from being able to see what is behind them. We also learned that some vehicles have far larger blind zones than others.

Several years ago, Consumer Reports began measuring blind zones for every car and truck we test at our Auto Test Division in Connecticut. (see CR's Best and Worst Blind zone chart in the Appendix) We put a 28" cone behind the vehicle that approximates the size of a 1-2 year- old child and asked a 5'8" male driver and a 5'1" inch female driver to use their rear view and side mirrors to attempt to see what is behind them as they back up. The results of our testing have been startling. While all vehicles have blind zones that are dangerous, some vehicles have blind areas as large as 69 feet, a sure recipe for disaster if a child is in back of that car or truck. Backovers are not "freak" accidents – they happen all too often and most important, are completely preventable.

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<sup>1</sup>Consumer Reports® is published by Consumers Union, an expert, independent nonprofit organization whose mission is to work for a fair, just, and safe marketplace for all consumers and to empower consumers to protect themselves. To achieve this mission, we test, inform, and protect. To maintain our independence and impartiality, Consumers Union accepts no outside advertising and no free test samples, and has no agenda other than the interests of consumers. Consumers Union supports itself through the sale of our information products and services, individual contributions, and a few noncommercial grants.

Currently, there are three sources of data on backing over incidents that provide insights into the dimensions of this problem<sup>2</sup>:

- According to a 2005 report from the Centers for Disease Control and Prevention (CDC), 7,475 children were treated in hospital emergency rooms after being struck or rolled over by a vehicle moving in reverse during the 2001-2003 period.
- KIDS AND CARS<sup>3</sup> own data – which is the only database that currently tracks nontraffic incidents – shows at least 550 fatal backover incidents occurred from 2000-2007, primarily involving children under the age of 5. Most of these incidents took place in residential driveways or parking lots. An injury or death occurred in 99% of cases documented in the database. Over 60% of backing up incidents involved a larger size vehicle. (truck, van, SUV). Tragically, in over 70% of these incidents, a parent or close relative was behind the wheel.
- NHTSA's recent report, "Vehicle Backover Avoidance Technology Study," [hereinafter Backover Report] released in November 2006, used 1998 death certificate data to estimate that there were 183 fatalities per year from backover incidents, and between 6,700 and 7,419 injuries.<sup>4</sup>

Young children are impulsive and unpredictable and they have little understanding of danger. They do not recognize boundaries such as property lines, sidewalks, driveways or parking spaces. Toddlers have established independent mobility between the ages of 12-23 months, and because of their relatively small size, they are often not easily visible to caregivers. Their concept of personal safety is also minimal. Backovers are often the predictable consequence of a child following a parent into the driveway without the parent's knowledge. That is the story parents tell us time again – they did not know the child had followed them out of the house.

The tragic consequences of a parent or caregiver not seeing a child and backing over that child are enormous. Dr. Greg Gulbransen, a pediatrician, is here today to describe

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<sup>2</sup> With the enactment of SAFETEA in 2005, NHTSA is now required to collect these data. Section 255 of that law directs the National Highway Traffic Safety Administration (NHTSA) to establish a method for collection of "nontraffic noncrash data" on "backovers, power window incidents, hyperthermia, fires and other related incidents."

<sup>3</sup> KIDS AND CARS is a nonprofit safety organization based in Kansas whose founder and president, Janette Fennell, has maintained a database of statistics on backover and other nontraffic incidents since 1999. The government has never gathered these data. Nontraffic, noncrash incidents occur when a car is either parked or backing up or moving forward slowly and not driving on the roadways or thoroughfares. KIDS AND CARS data indicate that backover incidents have grown each year as the popularity of longer, higher vehicles like SUVs, pickup trucks and to a lesser extent, minivans has grown. (NHTSA disputes that the numbers are growing, while acknowledging it doesn't have good data to prove or disprove that assertion. Vehicle Backover Avoidance Technology Study, p. 13. )

<sup>4</sup> NHTSA's report notes the agency's problem in sizing up the dimensions of the problem: "The magnitude of the backover problem has been estimated based on available data. Much of the difficulty in determining an exact count of backover crashes is due to the fact that NHTSA databases mainly cover traffic crashes, which excludes backover crashes that occur outside of the traffic-way (e.g., on private property). In response to Sections 2012 and 10305 of SAFETEA-LU, NHTSA is currently in the process of exploring alternate ways of developing a system to improve the collection of non-traffic vehicle-related incidents. Information on the development is contained in the section on "Plans to improve data collection in the United States" of this report." Page 13, NHTSA Backover Study.

from personal experience the tragic result of his inability to see his little son Cameron as Dr. Gulbransen backed his car into his own driveway.

CU is committed not only to educating parents to the dangers of blind zones through our publication, *Consumer Reports*, but to working for the enactment of legislation that will require that all cars to meet a rearward visibility standard. CU believes that if technology exists to prevent these terrible incidents and the cost is reasonable, such technology should be standard equipment for all vehicles. This is provision in the Kids and Cars Safety Act( S. 1948, 109<sup>th</sup> Congress) pertaining to backover prevention:

b) Rearward Visibility- Not later than 18 months after the date of enactment of this Act, the Secretary shall issue regulations, applicable to all passenger motor vehicles, requiring a rearward visibility performance standard that will provide drivers with a means for detecting the presence of a person or object behind the vehicle in order to prevent backing incidents involving death and injury especially to small children and disabled persons.

Does the technology exist? Yes, technology exists to allow drivers to see behind them as they back up and has been used for years. The legislation we are supporting, the Cameron Gulbransen Kids and Cars Safety Act of 2007, doesn't require a particular technology – it simply calls for a rearward visibility performance standard which the automakers can meet using any technology that satisfies the standard.

*Consumer Reports* has tested both rear bumper sensors that beep when they detect an object in the vehicle path and rear view cameras. CR found cameras to be the most effective for preventing a collision with an object or person behind the vehicle. Automakers are experimenting with new technologies all the time, including sensor systems that will actually park the car.

Is the cost reasonable? NHTSA estimates the cost of cameras, the most effective technology in current use for seeing what is behind the vehicle, to be approximately \$325. If the vehicle already has a monitor for a navigation system, or other purpose, the cost is substantially lower. Put that cost into perspective. A car DVD system costs \$1,295 -2,097, a moon or sun roof costs \$700-1,595, seat warmers cost \$645-895. These are all options that many auto buyers are actively seek out when buying a new car. Surely the cost of this technology is worth the price if it saves a child's life.

Backovers can happen in any vehicle because all vehicles have blind zones - the area behind a vehicle you can't see from the driver's seat. The danger tends to increase with larger vehicles. As CU's Auto Test Site Director David Champion has noted the longer and higher the vehicle, the more difficult it is to see a child or something on the ground behind.

*Consumer Reports* also advises our readers that "it's always best to look carefully behind the vehicle before you get in and again before you put the car in gear and back up. Remember to back up slowly, and pay attention to your mirrors."

Consumers Union joins with other safety groups – including KIDS AND CARS, Advocates for Highway and Auto Safety, Public Citizen, US PIRG, the American Academy of Pediatrics, in urging Senators to support legislation to require a rearward visibility standard in all vehicles. That measure is included in a bill that is co-sponsored by Senators Hillary Clinton and John Sununu, S. 1948 in last year's Congress and will be introduced on February 27, 2007 during the 110<sup>th</sup> Congress.

We also endorse KIDS AND CARS' recommendations to keep children safe as well.

These recommendations include:

- \* Walk around and behind a vehicle prior to moving it.
- \* Know where your kids are. Make children move away from your vehicle to a place where they are in full view before moving the car and know that another adult is properly supervising children before moving your vehicle.
- \* Teach children that "parked" vehicles might move. Let them know that they can see the vehicle; but the driver might not be able to see them.
- \* Consider installing cross view mirrors, audible collision detectors, rear view video camera and/or some type of back up detection device.
- \* Measure the size of your blind zone (area) behind the vehicles you drive. A 5-foot-1-inch driver in a pickup truck can have a rear blind spot of 7 feet wide by 50 feet long.
- \* Be aware that steep inclines and large SUV's, vans and trucks add to the difficulty of seeing behind a vehicle.
- \* Hold children's hand when leaving the vehicle.
- \* Teach your children to never play in, around or behind a vehicle.
- \* Keep toys and other sports equipment off the driveway.
- \* Never leave children alone in or around cars; not even for a minute.
- \* Keep vehicles locked at all times; even in the garage or driveway.
- \* Keys should never be left within reach of children.
- \* Always make sure all child passengers have left the car after it is parked.
- \* Be especially careful about keeping children safe in and around cars during busy times, schedule changes and periods of crisis or holidays.

### LATCH Car-Seat Installation System

Consumers Union has long been concerned about the safety of child passengers in cars. We know that when families with children are in the market for a car, child safety is one of their top priorities. We also know that parents and caregivers have struggled for years to install car seats securely enough to ensure that their children will be safe in the event of a crash. For many parents, getting a secure fit remains a challenge.

Lower Anchors and Tethers for Children (LATCH), an installation system created to help standardize the way child restraints are attached to vehicles without using a seat belt, has been in operation since the NHTSA-promulgated regulation (Federal Motor Vehicle Safety Standard 225) became fully effective on September 1, 2002. All child restraints and most new vehicles manufactured as of that date were required to include hardware

components designed to simplify child safety seat installation and to reduce the continuing high incidence of misuse and incorrect installation of child safety seats.

CR also noted in the article attached herein that “The [LATCH] system doesn't work equally well in all vehicles. In many cars, the new attachment points are obscured or difficult to reach, so it's not easy to use them even with some of the newest child seats. In other models, the LATCH anchors are positioned too far out from the vehicle's seat, making it difficult to secure the child seat tightly against the rear seat's back cushion. Try your child seat in the vehicle before you buy.”

In 2005 NHTSA conducted a survey to collect information about the types of restraint systems being used to keep children safe while riding in passenger vehicles. In particular, NHTSA was interested in whether drivers were using LATCH to secure their child safety seats to the vehicle, and if so, were these seats properly installed. This is what they found, which we thought was quite instructive:

- 55 percent of child safety seats, located in a seating position equipped with an upper anchor were attached to the vehicle using an upper tether. 45 percent of parents and caregivers, however, are still not using the upper tethers.
- 13 percent of the time child safety seat was placed in a seat position in the vehicle not equipped with lower anchors - the seat belt was used to secure the child safety seat to the vehicle – of course, since we're all taught to put kids in the middle seat.
- Among the 87 percent who do place the child safety seat at a position equipped with lower anchors, 60 percent use the lower attachments to secure the child safety seat to the vehicle.
- 81 percent of upper tether users and 74 percent of lower attachments users said upper tether and/or lower attachments were easy to use.
- 75 percent preferred lower attachments over seat belts of those with experience using both lower attachments and seat belts.
- 61 percent of upper tether non-users and 55 percent of lower attachments non-users cited their lack of knowledge – not knowing what they were, that they were available in the vehicle, the importance of using them, or how to properly use them - as the reason for not using them.

On February 8, 2007, NHTSA held a meeting to give the public an opportunity to discuss their experiences using LATCH. Consumers Union tests over 80 vehicles each year. We ask our engineers to fit car seats – infant, toddler and booster seats - into a wide variety of cars and light trucks, using both the LATCH system and seatbelts and comparing the ease of use and other factors between cars and car seats. We report the results to our readers, raising concerns about LATCH systems that are particularly difficult to use or belts that could be better designed. Consumers Union's Jennifer Stockburger, an automotive engineer and mother of young children, made a presentation at the February meeting in Washington, DC and that power point presentation is attached.

## LATCH Ease of Use

### Items that Potentially Discourage LATCH use from Consumer Reports New Vehicle Tests

Jennifer Stockburger  
Sr. Automotive Test Engineer  
Consumer Reports Auto Test Center

February 8, 2007



## LATCH Areas of Concern:

- Infant Seat / Seatbelt incompatibility
- Top tether accessibility
- Clearance – both lower and upper anchors
- LATCH restrictions on other seats

In addition to more common issues of:

- Lack of lower anchors in center seats.
- Lower anchors hard to see / find.



### Infant Seats offer the best benefits for LATCH use:

Infant seat and seatbelt incompatibility eliminated with LATCH use

- Infant base tilt with 3-point belts
- More common as 3-point belts extend to center rear seats.
- Inability to secure infant seat bases with belt anchors or buckles forward of seatback.

2007 Subaru Forester

2007 Honda Accord



Cite improved installation as well as ease-of-use in future education on LATCH in particular for rear facing infant seat bases!



### Improve top tether access and visibility

- Some top tether anchors not visible in normal seat orientations.
- Top tethers more difficult to route under improved head restraints designs.
- Temptation is to eliminate use of top tether.
- Both lower and upper anchors are obscured in many cases.

2007 Toyota RAV4

2007 Nissan Quest



### Improve top tether access and visibility (cont.):

### Improve Lower and Upper Anchor Clearance

- Not enough to move lower anchors forward in seat bite.
- Hard to locate lower anchors imbedded into seatback foam.
- Very difficult to attach and detach lower latch hooks and semi-rigid triggers against surrounding cushions. Particularly when cushion foam is "firm".

2007 Nissan Quest

2007 Ford Edge



2007 Lexus ES350



- Top tether anchors placed to close to fabric or surrounding housing,
- Awkward connection from normal hook direction (See Quest below).
- Some require twist of tether strap to hook.

2007 Mitsubishi Outlander – lower anchor difficult to access within fabric surround



2007 Nissan Quest – Must twist hook below anchor to hook correctly. From top tendency is to twist tether strap to hook

**Restrictions that LATCH places on other seating positions:**

- LATCH installations restrict or prevent use of other seating positions.
- Overlapping LATCH anchors enter adjacent seats.
- Manuals restrict use of other seating positions with LATCH installed seats.

2007 Chevrolet Equinox      2007 Honda Accord

**Restrictions that LATCH places on other seating positions (cont.):**

**Configurations for Use of Two Child Seats**

- A. One child seat using LATCH
- B. One child seat using LATCH
- C. One child seat using LATCH



**Configurations for Use of Three Child Seats**

- A. One child seat using LATCH
- B. One child seat using LATCH
- C. One child seat using LATCH

2007 Saturn Aura



2 LATCH installations either prohibit or don't recommend occupant in 3<sup>rd</sup> seating position.

No restriction for other seating locations for angle LATCH installation or 3 seatbelt installations

**Future Ease-of-Use Considerations:**

- \* **Top Tether Accessibility –**
  - Consider visibility (in normal seat orientations)
  - Clearance – Can hooks be attached in correct orientation?
  - Routing – How is routing effected by head restraints or other components?
- \* **Lower Anchor Accessibility –**
  - Visibility
  - Clearance from surrounding cushions and fabric.
- \* **LATCH restrictions on other seats –**
  - Overlap of anchors into other seats.
  - Restrictions on occupants in other seats.

## LATCH EFFECTIVENESS

CU's concerns about the ease of use and operation of LATCH is discussed below in the August 2005 issue of CR, accompanied by photos:

### THE REALITY OF LATCH

**CHEVROLET AVALANCHE** Where do you put the child seat while securing the tether? The Avalanche illustrates the potential challenge in securing a low tether anchor.



Unfortunately, there are factors that can make installation of LATCH-equipped seats difficult or, in some cases, impossible.

Typically, the safest spot to install a child seat is in the center position of the rear seat. That positions the child farthest from danger in an impact. Unfortunately, most vehicles don't equip their vehicles with lower anchors in the center seats. Chrysler Group and General Motors are good at providing three sets of attachments in their larger vehicles, and Ford owner's manuals often allow for child seats to be positioned in the middle using the inner anchors from the left and right side LATCH anchors.

Access to the lower anchors varies from vehicle to vehicle; the best anchors allow the seat to quickly click or be hooked into place, while others make it awkward to attach and/or detach. Some vehicles have very firm seat cushions, making it difficult to fit your hand in to find and access the anchor. Other vehicles have soft cushions, but the anchor is recessed so far back that it's difficult to reach. Optimally located lower anchors provide enough space for an adult hand to easily access them.

Getting to the top tethers can also be a difficult and frustrating process. Many vehicles have well-positioned anchors that are readily accessible; parents can simply run the top tether under the head restraint and clip it into the top tether anchor. Never run the tether over a removable or adjustable head restraint because the soft material in the head restraint can compress and create slack in the tether strap. It is better to remove or raise the restraint and run the tether over the seatback.

Of all vehicle types, sedans generally have tether anchors that are easiest to reach, located on the rear deck behind the seats, typically set inside a small, covered recess. Wagons, SUVs, and hatchbacks with good tether anchors have them positioned midway up the back of the seats, sometimes with plastic covers that snap in place when they aren't being used. Ideal setups provide one top tether anchor for each seat location, so the straps are anchored straight back without twisting.

But many wagons and hatchbacks also have less-friendly tether anchor locations. Some place the anchors at the base of the seat where it folds. These can be a full arm's-length

away, making them already difficult to reach. To access this anchor from within the cabin, it may be necessary to tilt the seatback forward--a challenging maneuver if a large child seat is already on the vehicle's seat. Other models place the tether anchors beneath carpet or covers in the cargo floor.

Hatchbacks and wagons also often have a cargo cover that protects luggage from the sun or the prying eyes of thieves. But the space between the cargo cover and the seatback is often very narrow, making it impossible to fit the tether strap through. The cover must be removed to access and install the tether strap, which is just another annoyance to deal with and adds to the potential for parents or caregivers to opt out of a crucial step.

**TOYOTA RAV4 Even SUVs marketed to families can present challenges to child-safety-seat installation, especially when attaching the lower tether anchor. Be sure to try installing a seat before buying a vehicle.**



CU's Recommendations for Improving LATCH Usability & Effectiveness:

- LATCH anchors should be required in center rear seats
- Improve top tether access and visibility
- Improve lower and upper anchor clearance so they can be reached easily
- Ensure that routing for top tethers isn't impaired by head restraints or other vehicle components
- Ensure top tethers on the seats are lengthy enough (CR found they were sometimes too short to reach the tether anchor in the vehicle)

### **POWER WINDOW HAZARDS**

NHTSA estimated in a 1997 study that 499 people each year visit emergency rooms due to power window injuries, almost 1/3 of those under the age of 6, another nearly 1/3 between the age of 6 and 15. Since 1971<sup>5</sup>, at least 59 children have been strangled to death and thousands more children and adults injured by power windows.<sup>6</sup>

<sup>5</sup> Feb 1, 1971, Federal Motor Vehicle Safety Standard 118, regulating power windows, was adopted by NHTSA setting minimal safety standards.

<sup>6</sup> The number of power windows has increased dramatically over the past three decades. In 1973, only 1.9 million new vehicles in North America had power windows. By 1994 that number was 68.1% for passenger cars and 55.3% for light trucks.

When the Senate Commerce Committee enacted SAFETEA-LU in 2005, it included a critically important provision to prevent young children from accidentally closing power windows on their necks, causing strangulation. Section 258 of SAFETEA-LU<sup>7</sup> called for the elimination of hazardous armful rocker switches, requiring the safer pull-up or pull-out switches; NHTSA then published rules requiring safer switches on all new passenger vehicles manufactured after October 1, 2008.<sup>8</sup> We have been pleased to see that Model Year 2007 vehicles, with only a few exceptions, now employ the safer switches. There remains some unfinished business, however.

While getting rid of dangerous switches is a big leap forward, and should prevent most of the accidental strangulations by children who are leaning on a switch with their heads in the window path, nonfatal injuries are still a major safety hazard. Injuries inflicted by power windows have a very long history – and power windows have enormous force: they will literally slice a cucumber or green pepper in two. The injuries that occur when another person inadvertently closes the power window on a child's fingers or hand or arm are often gruesome.

And yet there is an easy fix for this hazard – auto reverse or anti-trap technology that is commonly used in Europe should also be the standard here. Like garage or elevator door sensors that open the door if they detect an obstruction, this technology sends a window down if it meets with an obstacle in its path. Such technology would have saved the many lives of children strangled by power windows or are missing fingers or pieces of fingers that were amputated by a power window.

None of this information will come as a surprise to NHTSA - or the auto industry. Consumers Union has copies of hundreds of reports sent over the past 4 decades to both the automakers and NHTSA with heartbreaking stories of small children with amputated fingers or broken arms and worst of all, strangulations of children because another child or adult didn't realize she or he was in the path of the window. The history of the government's failure to require safe power window designs – and the industry's failure to address the hazard - when the technology is readily available and the cost is modest, is difficult to understand.

At least 80% of the European car market has vehicles with anti trap windows – they have become custom there. An effective anti -trap voluntary standard was adopted by the European parliament and the Council of the European Union in February of 2000,<sup>9</sup> Since that time, no power window fatalities have been recorded in any vehicle meeting European standards – and so, though voluntary, nearly every European automakers has adopted this technology.<sup>10</sup>

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<sup>7</sup> [www.consumersunion.org/pub/1205%20Alliance%20rebuttal.pdf](http://www.consumersunion.org/pub/1205%20Alliance%20rebuttal.pdf)

<sup>8</sup> NPR story on the new requirement. <http://216.35.221.77/templates/story/story.php?storyId=3915926>

<sup>9</sup> See Petition, Center for Auto Safety, Filed with NHTSA August 19, 2003, page 2. [www.autosafety.org](http://www.autosafety.org)

<sup>10</sup> Id.

By contrast, only 15-20% of US vehicles have this technology. The same models of cars equipped with auto reverse power windows in Europe do not have that technology in their US version, even as an option – the Ford Focus is one example. The estimated cost of making all windows “anti trap” is, according to NHTSA, \$8-12 per window for a grand total of less than \$50.00 per car.<sup>11</sup>

Legislation introduced by Senators Clinton and Sununu, the Cameron Gulbransen Kids and Cars Safety Act of 2007 (S. 1948, 109<sup>th</sup> Congress) addresses the hazard by requiring auto reverse or “anti trap” technology in all cars by a specific date:

(a) Power Window Safety- Not later than 18 months after the date of enactment of this Act, the Secretary of Transportation (referred to in this Act as the ‘Secretary’) shall issue regulations, applicable to all passenger motor vehicles, to ensure that power windows and panels automatically reverse direction when they detect an obstruction to prevent children from being trapped, injured, or killed.

#### Previous NHTSA Proposals on Power Windows

In 1969 the government proposed auto reverse technology for all power windows - the automotive industry unanimously opposed this measure and it was dropped.<sup>12</sup> The resulting standard imposed minimal performance requirements for power operated windows. Again in 1996 NHTSA proposed a rulemaking to remedy the hazards from power windows but took no further action.

We urge members of this Subcommittee on Consumer Protection, Insurance and Automotive Safety to support the Cameron Gulbransen Kids and Cars Safety Act of 2007, which will require auto reverse or anti-trap technology and address once and for all the hazards to children and others from power windows

### **BRAKE SHIFT INTERLOCK**

#### Introduction:

Technology to prevent vehicles from inadvertently being put into gear by children or anyone else when the vehicle is in the “Park” position is known as Brake Transmission Shift Interlock or BTSI. It is an essential safety technology that requires depressing the brake pedal to move the gear shift out of park. Since children typically cannot reach the brake pedal, if BTSI is in place, they cannot place the car into gear by themselves.

One of the witnesses at today’s hearing, Packy Campbell from New Hampshire, lost his 21 month old son Ian when Ian’s brother set his father’s truck into motion and Ian was unable to move out of the way when the truck suddenly started rolling in reverse. This is not an isolated circumstance. KIDS AND CARS estimates that over 100 children have

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<sup>11</sup> Id.

<sup>12</sup> Id

died since 1998 by placing a vehicle into motion. The government does not track these statistics because they typically do not occur on public roadways and have not been officially part of the government database.<sup>13</sup>

S. 1948, introduced in October of 2005 as the Cameron Gulbransen Kids and Cars Safety Act, included a provision calling for brake shift interlock in all vehicles within 18 months after enactment.<sup>14</sup> The provision is below:

NHTSA announced on August 17, 2006 that the Alliance of Automobile Manufacturers and the Association of International Automobile Manufacturers were entering into a voluntary agreement to ensure that all vehicles sold in the U.S. with automatic transmissions will be equipped with "brake transmission system interlocks" to prevent children from moving the shift mechanisms out of park.<sup>15</sup> Automakers included in this agreement have agreed to comply by September 1, 2010.<sup>16</sup>

According to NHTSA, approximately **80%** of MY2006 motor vehicles are equipped with an automatic transmission control system designed in accordance with the requirements of this agreement. More than **98%** of MY2009 motor vehicles to be produced are forecasted to be equipped with an automatic transmission control system designed in accordance with this agreement.

While Consumers Union appreciates that automakers embrace the importance of having BTSI on all vehicles, CU believes that voluntary agreements are insufficient to ensure cross-the-board compliance with an important safety standard. Voluntary agreements are just that, voluntary, and they don't bind the whole industry the way a mandatory safety standard does. Indeed, a handful of automakers, are not bound by the agreement because they are not members of the associations that were signatories to the agreement, though they may well chose to comply.

Below is the list of automakers that are part of the voluntary agreement.

### **Participating Automakers:**

Aston Martin  
BMW Group

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<sup>13</sup> Section 255 of SAFETEA, enacted by Congress in 2005, now requires that the government begin keeping track of injuries and deaths involving automobiles even if they do not occur on public roadways.

<sup>14</sup> S. 1948, 109<sup>th</sup> Congress, pertinent section: (c) Preventing Vehicles From Rolling Away- Not later than 18 months after the date of enactment of this Act, the Secretary shall issue regulations, applicable to all passenger motor vehicles, requiring the vehicle service brake to be engaged in all key positions and while the key is out of the ignition, before starting the engine or engaging the transmission in order to prevent accidents resulting from vehicles accidentally or unintentionally rolling away.

<sup>15</sup> See this site for information on BTSI.

<http://dms.dot.gov/search/searchResultsSimple.cfm?numberValue=25669&searchType=docket>

<sup>16</sup> The agreement says that "any vehicle under 10,000 pounds produced for the United States market, with an automatic transmission that includes a 'Park' position shall have a system that requires that the *service brake* be depressed before the transmission can be shifted out of 'Park'.

Ford Motor Company  
Hyundai Motor  
Maserati  
Nissan  
Suzuki  
DaimlerChrysler Corporation  
General Motors  
Isuzu Motors  
Mazda  
E P o r s c h e  
Toyota  
Ferrari  
Honda  
Kia Motors  
Mitsubishi Motors  
Subaru  
Volkswagen Group

The bill introduced on February 27, 2007 codifies the voluntary agreement and makes it law, thus bringing all auto manufacturers under the requirement to implement BTSI, but maintaining the same generous timelines for compliance.

This is the bill's language on BTSI:

*PREVENTING VEHICLES FROM ROLLING AWAY.—*

*1) IN GENERAL.—Not later than 24 months after the date of the enactment of this Act, the Secretary shall issue regulations to require light motor vehicles that are equipped with an automatic transmission that includes a “park” position to have a system that requires the service brake to be de1 C:\TEMP\K10A1C~1.XML HOLCPC pressed before the transmission can be shifted out of “park”. This system shall function in any starting system key position in which the transmission can be shifted out of “park”.*

*(2) APPLICABILITY.—The regulation issued under paragraph (1) shall apply to light motor vehicles manufactured on or after September 1, 2010.*

The following is a list of Model Year 2007 vehicles that **ARE NOT** equipped with **Brake Transmission Shift Interlock (BTSI)** technology as reported to NHTSA by the vehicle manufacturers.

**Audi:** A4/S4, A4/S4 Avant, A4/S4 Cabriolet

**BMW:** X3, Z4

**Buick:** Rendezvous

**Cadillac:** CTS

**Chevrolet:** Equinox, Express 1500, Express 15-Passenger Van, Silverado Classic

**Ford:** E-150, E-350 15-Passenger Van, Freestar, Ranger

**GMC:** Savana, Savana 15-Passenger Van, Sierra Classic

**Honda:** S2000

**Hummer:** H2

**Isuzu:** Ascender 7

**Jeep:** Liberty, Patriot  
**Mazda:** B-Series  
**Mercury:** Monterey  
**Pontiac:** Torrent  
**Saturn:** Ion, VUE  
**Volkswagen:** New Beetle

### Conclusion

Consumer advocates working on product safety believe that if a product hazard can be fixed for a reasonable cost, it should be done. This is especially true with hazards to children. We don't believe in playing the blame game – blaming parents for being careless or not conscientious when a product harms or kill their children is counterproductive and cruel. If we had played the blame game with safety caps on medicines or poisons, on garage doors or cigarette lighters, all of which have been redesigned for a reasonable cost with children's safety in mind - we would have many more children lost to injury or death.

Whenever we can, we should fix safety hazards for everyone, but especially when they put our children at risk. We think this bill – which addresses the hazards of backover, power windows and brake shift interlock, provides members of Congress with a unique opportunity to fix hazards to children at a reasonable cost.

We urge members of the Senate Commerce, Science and Transportation Committee to support the Cameron Gulbransen Kids and Cars Safety Act and thank you for your time and consideration of these vitally important issues.



## FOR IMMEDIATE RELEASE

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### **CONSUMER REPORTS RELEASES NEW VEHICLE BLIND ZONE DATA, LISTING 2006 JEEP COMMANDER LIMITED AS WORST OVERALL**

#### **CR cautions: the area behind your vehicle can be a danger zone for youngsters**

YONKERS, NY — *Consumer Reports'* latest examination of vehicle blind zones—the area behind a car or truck that's hidden from the driver's view—shows that the 2006 Jeep Commander Limited ranks as the worst vehicle overall.

*Consumer Reports* measured the blind zone behind the Commander at 44 feet for a driver who is five feet, eight inches tall and a stunning 69 feet for a shorter driver (five feet, one inch tall) with all three rows of seats raised. The Commander's blind zone is considerably larger than that for other midsized and large sport-utility vehicles (SUVs).

Until now, the vehicle with the worst blind zone in *Consumer Reports'* tests was the 2002 Chevrolet Avalanche 1500, a pickup truck, which had a blind zone of 29 feet for a five-foot, eight-inch driver and 51 feet for a five-foot, one-inch driver. But the redesigned, 2007 Chevrolet Avalanche LT has no blind zone when equipped with the optional rearview camera. Without the camera, the vehicle had a 31-foot blind zone for a five-foot, eight-inch driver and 50 feet for a short driver. The Commander also offers an optional rearview camera, which *CR's* test vehicle lacked. This camera can significantly reduce or eliminate the blind zone.

To help consumers understand how large some blind zones are, *Consumer Reports* has been measuring the blind zones on vehicles that it tests and rates since 2003. *CR's* database now covers about 200 vehicles from model years 2002 through 2007. To measure the blind zones, a 28-inch traffic cone was positioned behind the vehicle at the point where the driver could just see the top. This cone simulates the height of a small child.

"*Consumer Reports* findings illustrate that the danger of vehicle blind zones correlates with the use of large SUVs, minivans and pickups trucks as common family vehicles. Consumers must be cognizant of this danger—and the value of rearview cameras—when going out to purchase a new vehicle," said Don Mays, senior director for product safety and consumer science at *Consumer Reports*.

KIDS AND CARS, the safety group, estimates that more than 100 children were killed by vehicles whose drivers simply could not see them in the blind zone behind the vehicle. According to the Centers for Disease Control and Prevention in Atlanta, nearly 7,500 children were treated in United States hospital emergency rooms between 2001 and 2003 for backover injuries. Many of these incidents could have been prevented if

drivers had a way to see or detect what is behind them while backing up. Every vehicle has blind zones.

Side and rearview mirrors are insufficient to combat them. *Consumer Reports* tests show that, in general, the longer and higher the vehicle, the bigger the blind zone is likely to be.

There are no federal government requirements for backup warning sensors or rearview cameras on any passenger vehicle sold in the United States

“Unfortunately, the few vehicles that now come with this technology are higher-end models, and most devices are available as an extra-cost option—often requiring the purchase of other equipment like an expensive navigation system,” said Sally Greenberg, senior product safety counsel for Consumers Union in Washington, D.C. “We believe that backup technologies, such as rearview cameras are essential, and should be a requirement by federal law. Their cost is small compared to the cost of a child’s life. And once this technology becomes standard equipment in vehicles, systems will become more economical for manufacturers to produce.”

“Without these devices, parents and families will continue to suffer the terrible tragedy of accidentally backing over a child,” Greenberg said. “That is why it is critical that Congress pass the Cameron Gulbransen Kids and Cars Safety Act of 2007—to require a rearward visibility standard that will provide drivers with a means of detecting a child behind the vehicle.”

Consumers who wish to improve the safety of their current vehicle can add an aftermarket rearview camera. *Consumer Reports* tests have shown that most work well. Such cameras typically cost several hundred dollars and are best installed by a professional.

To learn more about the vehicle blind zones, and see measurements for models tested by *Consumer Reports*, visit [www.ConsumerReports.org](http://www.ConsumerReports.org).

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**OCTOBER 2006**

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## Consumer Reports Tested Best & Worst Rear Blind Zones

Vehicle Class:	Driver Height:	Best:	Worst:	Average:
<b>Small Sedans</b>	5' 8"	2006 Subaru Impreza 2.5i (6')	2003 Suzuki Aerio GS (23')	12'
	5' 1"	2006 Subaru Impreza 2.5i (11')	2003 Suzuki Aerio GS (49')	24'
<b>Midsized Sedans</b>	5' 8"	2006 Hyundai Sonata GLS (9')	2005 Cadillac STS (21') 2004 Ford Taurus SES (21') 2005 Mitsubishi Galant GTS (21')	13'
	5' 1"	2004 Acura TSX (12')	2006 Mercury Milan (35')	22'
<b>Large Sedans</b>	5' 8"	2003 Lexus LS430 (9')	2004 Audi A8L (20')	12'
	5' 1"	2003 Lexus LS430 (16')	2006 Cadillac DTS (30')	22'
<b>Wagons &amp; Hatchbacks</b>	5' 8"	2004 Chevrolet Aveo LS (5')	2005 Chevrolet Malibu LS Maxx (17')	10'
	5' 1"	2004 Chevrolet Aveo LS (10')	2005 Chevrolet Malibu LS Maxx (23')	16'
<b>Small SUVs - Four Door</b>	5' 8"	2006 Subaru Forester 2.5X (9')	2003 Honda Element EX (18') 2006 Toyota RAV4 Base (18')	13'
	5' 1"	2006 Subaru Forester 2.5X (12')	2003 Honda Element EX (35')	21'
<b>Midsized SUVs</b>	5' 8"	2004 Volkswagen Touareg (11')	2006 Jeep Commander Ltd. (44')	18'
	5' 1"	2005 Nissan Pathfinder LE (18')	2006 Jeep Commander Ltd. (69')	29'
<b>Large SUVs</b>	5' 8"	2002 Toyota Sequoia Ltd. (14')	2004 Dodge Durango Ltd. (19')	17'
	5' 1"	2004 Dodge Durango Ltd. (24') 2004 Nissan Armada LE (24')	2007 Chevrolet Tahoe (38')	27'
<b>Minivans</b>	5' 8"	2005 Dodge Grand Caravan SXT (12')	2005 Saturn Relay FWD (19')	15'
	5' 1"	2004 Ford Freestar SEL (16')	2005 Toyota Sienna XLE (28')	26'
<b>Pickups</b>	5' 8"	2005 Nissan Frontier LE (16')	2004 Ford F-150 XLT (34')	23'
	5' 1"	2005 Dodge Dakota SLT (24')	2007 Chevrolet Avalanche (50')	35'
<b>Coupes</b>	5' 8"	2003 Hyundai Tiburon GT (10')	2005 Chevrolet Cobalt SS (23')	15'
	5' 1"	2004 Mazda RX-8 (19')	2005 Chevrolet Cobalt SS (32')	23'
		2006 Honda Civic Si (19')		

In this chart *Consumer Reports* identifies the length, in feet, of the blind zone for each listed vehicle. The distance noted is how far behind the vehicle a 28-inch traffic cone had to be before the person, sitting in the driver's seat, could see the cone's top by looking through the rear window. Distances are provided for vehicles that are currently sold with no major changes from the vehicle *CR* tested. This chart does not include tests performed on vehicles using rear view camera systems, either standard or optional.

August 2006