



# Don't let the wheels come off

## What you need to know about wheel separation incidents

The issue of wheel separation has come to the fore on Ontario roads once again, and transportation firms are responding through education sessions and hazard reviews.

Last year, as of November, there were 105 wheel-off incidents on Ontario roads. These statistics were gathered by the Ontario Provincial Police, municipal police forces, and the Ministry of Transportation. However, it is likely that many more such incidents were not reported.

This is not the first time that wheels coming off trucks has been on the minds of the trucking industry as well as of the public. The 1990s saw a sharp increase in wheel separation incidents, several of which caused serious injuries and fatalities. As a result, the government introduced higher fines for this offence, which led to a significant reduction in the number of wheel-offs.

In recent months, however, the issue has begun to resurface. Last September, a woman was killed by a wheel that had fallen off a dump truck in Mississauga. In November, another woman was killed near London when a wheel came off a transport truck. And in January, a set of tandem tires came off a truck on Highway 400, north of Toronto, and killed a man driving an SUV. The Quebec-based company that owned the truck was charged with wheel separation involving a commercial vehicle and the driver was charged with criminal negligence.

Tragic incidents such as these have led Transportation Minister Steven Del Duca to request that the trucking industry do more to tackle this issue.

### What the law says

Commercial drivers must comply with the regulations under Ontario's *Highway Traffic Act*. These regulations are enforced by police officers and Ministry of Transportation enforcement officers.

By law, a commercial motor vehicle or trailer must be inspected daily before it is driven (O.Reg. 199/07, s.6). This daily pre-trip inspection must include things such as load security and mechanical fitness of the vehicle. A schedule of every system and component that must be inspected can be found in the Commercial Motor Vehicle Inspections regulation (199/07).

Other measures that have been introduced to prevent wheel-offs are:

- An absolute liability law for wheel separations
- Specialized training for technicians who work with wheel installations
- More on-road inspections by specially trained police and enforcement officers
- Fines for wheel separations ranging from \$2,000 to \$50,000.

### What you can do

Wheels come off for a number of reasons such as axle problems, hub separations, and fastening failures. When a wheel separation occurs, the inspection and maintenance procedures should be reviewed in detail to find the root cause of the problem.

Even if there is a near miss, such as when a mechanical problem causes a wheel to almost come off, the cause should be investigated. Finding out if there is a weakness in the maintenance and safety review process can prevent future wheel separations.

As best practice, conduct regular risk assessments and inspections to discover what the hazards are, what is being done to reduce the hazard, what the consequences might be if it happens, and what could have been done differently to prevent it from happening.



A wheel coming off a vehicle can be disastrous for the operator or for anyone nearby. A set of dual wheels with a brake drum can weigh more than 300 kg (660 lb). That weight, combined with the speed at which the wheels may be travelling, can cause severe damage to other vehicles and objects, as well as serious or fatal injuries to people in other vehicles.

A preventive maintenance plan can prevent that type of equipment failure before it happens. It will also increase productivity, limit downtime, extend the life of vehicles and equipment, and protect the safety of workers. Visit [ihsa.ca/magazine](http://ihsa.ca/magazine) to download the article "The power of preventive maintenance" in Volume 14, Issue 1, of *IHSA.ca Magazine*. It contains a checklist that you can use to set up a preventive maintenance plan for your company.

## What's being done

This topic is an important one in the transportation industry. In recent months, several of Ontario's Fleet Safety Councils have invited speakers to their meetings to discuss the topic. At this year's Fleet Safety Education Conference on September 30, Sgt. Scott Parker of the Ontario Provincial Police, Highway Safety Division, and Dave McDonald of Dave McDonald Bridgestone Commercial Solutions, will be discussing this issue.

The session will provide valuable insight into wheel-off incidents, common myths about wheel installation, and the root causes of wheel-offs. It will review the causes of past wheel-off situations, the preventive measures that can be taken, and technical information about the best maintenance practices.

To learn more about this presentation and the conference, visit [fleetsafetycouncil.com](http://fleetsafetycouncil.com)



## VEHICLE INSPECTION REPORT

Company/Carrier	
Address	
Vehicle Licence #	
From	
To	

This report must remain with the vehicle.  
When complete, keep on file for at least six months.

This Vehicle Inspection Report applies to commercial motor vehicles that fall under Schedule I Daily Inspection of Trucks, Tractors, and Trailers as set out by the Commercial Motor Vehicle Inspections Regulation (199/07) under the Highway Traffic Act.

A daily inspection of a commercial motor vehicle or trailer must include an inspection of every system and component listed in Schedule I.

The daily inspection is valid for 24 hours and must be adequate to determine whether there is a major or minor defect as set out in Schedule I.

Major defects must be reported immediately. The vehicle cannot be operated with a major defect. The vehicle can be operated with a minor defect if it is entered on the report.

If the driver of the vehicle is not the person who conducted the daily inspection, the driver must sign the inspection report before driving the vehicle or drawing the trailer.

This report can also be used to inspect elevated work platforms, cranes, and hoisting devices as required by the Construction Projects Regulation (213/03) under the Occupational Health and Safety Act.

## How IHSA can help

IHSA has several products that can help companies with commercial vehicles fulfill the legal requirements for daily pre-trip inspections. They include a *Pre-Trip Inspection for Truck Sticker (S106)*, *Did You Circle Your Vehicle Sticker (S029)*, and a *Vehicle Inspection Report form (RF028)*. Visit [ihsa.ca/Products](http://ihsa.ca/Products) to order these products.