

# 10659: Non-Fatal Work-Related Injuries from Motor Vehicle Crashes

Monday, June 3, 2019
10:30 AM - 11:00 AM

• Raleigh Convention Center - 306B

## **BACKGROUND:**

Motor vehicle crashes are the leading cause of work-related fatalities. Less is known about work-related motor vehicle crashes resulting in non-fatal injuries.

#### **METHODS:**

Michigan law requires the investigating police officer for all motor vehicle crashes/collisions complete a UD-10 Traffic Crash Report (UD-10) and forward it to the Michigan State Police (MSP). The MSP Traffic Crash Reporting System (TCRS) database contains the data from the UD-10 reports. Work-related collisions involving fatalities or injuries were identified from the TCRS by selecting crashes where the primary vehicle use code was: commercial/business, farm, government, school/education, in pursuit/on emergency, utility, road construction and military vehicles, as well as vehicles with a hazardous material placard displayed at the time of the crash. The work-related crash definition was further refined upon review of police narratives of potential work-related fatal collisions, resulting in additional criteria based on driver vs. passenger, time of day and time of year. Work-related non-fatal crash injuries were classified as definite or possible.

### **RESULTS:**

In 2017, there were 314,921 crashes in Michigan: 937 (0.3%) were fatal, 57,263 (18.2%) involved injuries and 256,721 (81.5%) were property damage only. Three percent of fatal crashes and 4.4% of injury crashes were work-related; 2,514 work-related injury crashes involved 2,567 vehicles and 2,663 injured workers. Fifty-eight percent (1,498) of vehicles involved in crashes were passenger cars/SUVs, followed by 530 (20.7%) trucks/busses and 304 (11.8%) pickup trucks. Most crashes occurred in the summer (688; 27.4%), in the daylight (1,878; 74.7%), in clear weather (1,437; 57.2%) and with dry road conditions (1,735; 69.0%). The injured were predominately men (72.6%). Mean and median age was 42. 12.4% were young workers <25 and 23.1% were ≥55 years old. Two hundred and six (7.7%) workers sustained serious injuries. The most common crash types were Rear End (718; 28.6%), Single Motor Vehicle (596; 23.7%) and Angle (576; 22.9%). Information on drug and alcohol test results was largely missing (<5% of crashes). Additional analyses by the definite and possible work-related classification, severity of the injury and association between the various factors will be presented.

#### **CONCLUSIONS:**

UD-10 crash reports are used by federal, state, and local traffic safety entities to identify high traffic crash areas in the state, develop solutions, and support the development and evaluation of highway and vehicle safety countermeasures. We will use the work-related motor vehicle injury crash data in a similar manner to plan intervention efforts to prevent work-related crashes.

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