# Safety Data Update

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Research and Training









# National Work Zone Safety Information Clearinghouse: Work Zone Data

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### workzonesafety.org



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Work Zone Data

**Topics of Interest** 

**Training** 

**Work Zone Devices** 

Laws, Standards & Policies

**Public Awareness** 

About

Events

### What's New in the Clearinghouse

(Updated Monthly)



## Search

Search the National Work Zone Safety Information Clearinghouse

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Find by Category ~

**Advanced Find** 



Investigating the Contributing Factors to Crashes With and Without the Presence of Work Zone Workers Using Machine Learning Techniques

(9/23/2025)





# **Primary Data Sources**

- Fatal crash-related statistics:
   National Highway Traffic Safety Administration (NHTSA)

   Fatality Analysis Reporting System (FARS)
- Estimated injuries, injury crashes and total crashes:
   NHTSA Crash Report Sampling System (CRSS)
- Highway worker fatalities: Bureau of Labor Statistics (BLS) Census of Fatal Occupational Injuries (CFOI)





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Work Zone Data

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## **Work Zone Data**

#### **Work Zone Data**

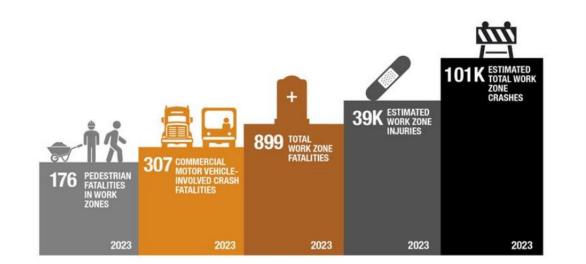
#### At a Glance

National & State Traffic Data
Work Zone Traffic Crash Trends and
Statistics
Worker Fatalities and Injuries at Road

Construction Sites

## At a Glance

Click on a graphic of interest to get more information.

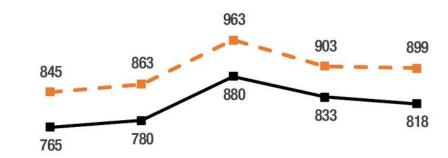




## At a Glance



#### **Work Zone Fatal Crashes and Fatalities**

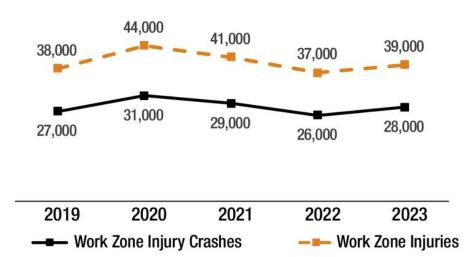




Source: NHTSA FARS



#### **Estimated Work Zone Injury Crashes and Injuries**

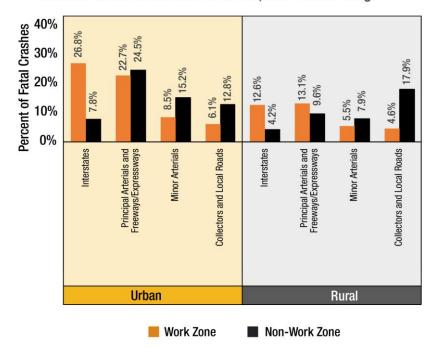


Source: NHTSA CRSS



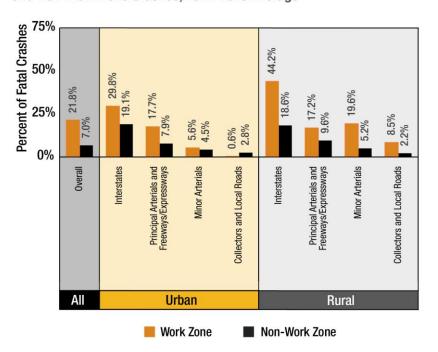
# Work Zone Traffic Crash Trends and Statistics (1/2)

Distribution of Fatal Work Zone and Non-Work Zone Crashes by Functional Classification and Land Use, 2021-2023 Average



Source: NHTSA FARS

Rear-End Collision Involvement in Fatal Work Zone and Non-Work Zone Crashes, 2021-2023 Average

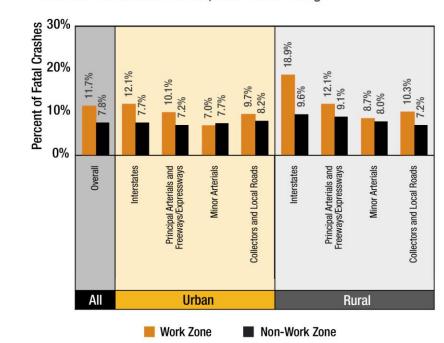


Source: NHTSA FARS



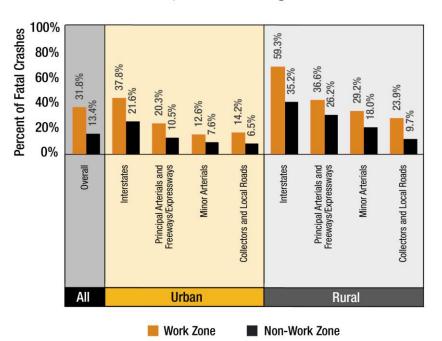
# Work Zone Traffic Crash Trends and Statistics (2/2)

Driver Distraction Involvement in Fatal Work Zone and Non-Work Zone Crashes, 2021-2023 Average



Source: NHTSA FARS

Commercial Motor Vehicle Involvement in Fatal Work Zone and Non-Work Zone Crashes, 2021-2023 Average



Source: NHTSA FARS



## National & State Traffic Data



**National Data** 

Year	Total Fatal Crashes	Total Fatalities	Truck- Involved Fatal Crashes	Truck- Involved Fatalities	Bus-Involved Fatal Crashes	Bus-Involved Fatalities	"At Work" Pedestrian Fatalities	Other Pedestrian- Involved Fatalities
2023	818	899	252	300	6	7	40	136
2022	833	903	246	280	6	6	36	104
2021	880	963	292	322	3	4	36	129
2020	780	863	207	243	4	4	50	107
2019	765	845	249	290	3	3	37	94
2018	673	757	206	231	9	12	36	86
2017	720	809	221	270	6	9	36	94
2016	688	782	193	229	3	15	38	75
2015	658	718	174	193	3	4	27	80

Source: NHTSA FARS



## Worker Fatalities & Injuries at Road Construction Sites

**Fatal Highway Worker Injuries at Road Construction Sites** 

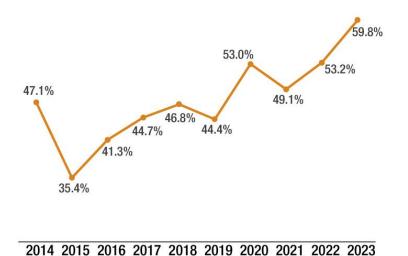


- Fatal Worker Injuries at Road Construction Sites

 Percent of All Fatal Worker Injuries Nationally that Occur at Road Construction Sites

Source: BLS CFOI

"Percent of Fatal Highway Worker Injuries Involving Workers on Foot Being Struck by a Vehicle



Source: BLS CFOL



# CPWR: Road Construction Data and Available Resources

Amber Trueblood, DrPH

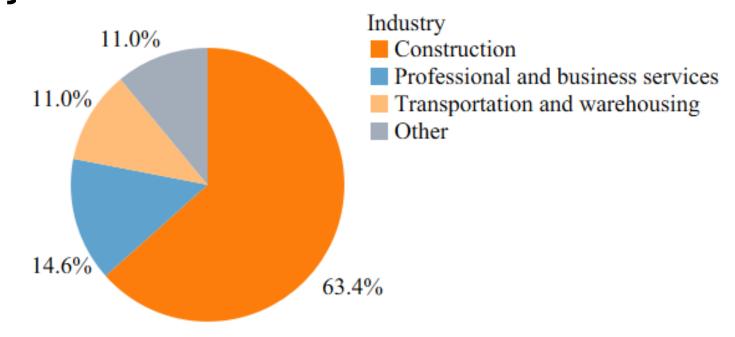
Data Center Director

**CPWR- The Center for Construction Research and Training** 





# Fatal Occupational Injuries at Road Construction Sites, by Industry (2023)







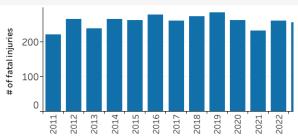


#### **Transportation Injuries**

Year Injury Type All Fatal

#### Number and Rate of Injuries, by Year

From 2011 to 2023, there were an average of 259 fatal injuries annually, with a total of 3.4K fatal injuries.



#### Number of Injuries, by Subsector

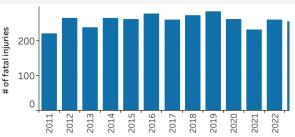
Construction of Buildings (NAICS 236)

Heavy and Civil Engineering (NAICS 237)

■ Specialty Trade Contractors (NAICS 238)

During this period the total number of fatal injuries in each of the major construction subsectors were,

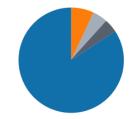
- Construction of Buildings (NAICS 236): 381
- Heavy and Civil Engineering (NAICS 237): 1.4K
- Specialty Trade Contractors (NAICS 238): 1.5K



#### All Injuries, by Vehicle Source

During this time period, the vehicle source responsible for the most fatal injuries was,

- Roadway vehicles--motorized: 2.9K
- Off-road and industrial vehicles--powered
- Industrial vehicles, material hauling and transport -- powered
- Other vehicles
- Roadway vehicles--motorized



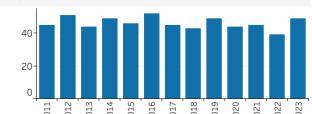
#### Construction Work Zone Incidents

#### Incident Type

At-Work Construction Work Zo.

From 2011 to 2023,



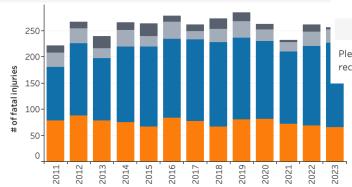


there were 601 at-work construction work zone fatalities.

#### Number of Injuries, by Event/Exposure

From 2011 to 2023, the event/exposure with the highest number of fatal injuries was,

- Roadway incidents involving motorized land vehicles: 1.9K
- Other vehicle incident
- Nonroadway incidents involving motorized land vehicles
- Roadway incidents involving motorized land vehicles Pedestrian incidents involving motorized land vehicles



#### **Chart Footnotes**

Please see the sections below the dashboard for information on the data, definitions, chart notes, recommended citation, and a downloadable data file. Questions or concerns: datacenter@cpwr.com.

Last updated: 08/27/2025





# Construction Work Zone Trends (FARS)

**514** Fatal Construction Work Zone Crashes

12.9K Injury Only
Construction Work
Zone Crashes

568 fatalities in construction work zones

49 at-work fatalities





## **CPWR WZ Data Resources**

- CPWR–The Center for Construction Research and Training. (2025). Transportation Injuries [dashboard]. <a href="https://cpwr.com/research/data-center/the-construction-chart-book/interactive-7th/injuries-illnesses-health/">https://cpwr.com/research/data-center/the-construction-chart-book/interactive-7th/injuries-illnesses-health/</a>.
- Harris, W., Trueblood, A. B., Brooks, R. D., & Brown, S. (2022). Fatal and nonfatal transportation injuries in the construction industry, 2011-2020. <a href="https://www.cpwr.com/wp-content/uploads/DataBulletin-September2022.pdf">https://www.cpwr.com/wp-content/uploads/DataBulletin-September2022.pdf</a>.
- Trueblood, A., Fosbroke, D., Papariello, R. et al. (2024, April 10). Using Internal Traffic Control Plans to Prevent Construction Workers Injuries and Fatalities in Work Zones. <a href="https://blogs.cdc.gov/niosh-science-blog/2024/04/10/struck-by-2024/">https://blogs.cdc.gov/niosh-science-blog/2024/04/10/struck-by-2024/</a>.



## **CPWR WZ Other Resources**

#### Work Zone Safety Resources

- NIOSH Science blog: <u>Using Internal Traffic Control Plans to Prevent Construction Worker Injuries</u> and Fatalities in Work Zones
- Toolbox Talks:
  - Work Zone Safety: Vehicle Operators (English, Spanish)
- o Work Zone Safety: Working Around Vehicles (English, Spanish)
- o Equipment: Falling Objects (English, Spanish)
- Traffic Safety (English, Spanish)

#### Infographics:

- o STAY ALERT IN WORK ZONES! (English PDF & JPEG, Spanish JPEG)
- OPERATORS! 4 Steps for Work Zone Safety (English PDF & JPEG, Spanish JPEG)
- CONTRACTORS! Work Zone Safety Starts with Your Internal Traffic Control Plan (English <u>PDF</u> & <u>JPEG</u>, Spanish <u>JPEG</u>)
- Head Protection (English <u>PDF</u> & <u>JPEG</u>)
- o In 1 Strike You Could Be Out (English PDF & JPEG)

#### Webinars:

- Developing and Enforcing Internal Traffic Control Plans:
   Play Recording Spanish Audio Download Presentation
- o Preventing Struck-by Incidents in Roadway Work Zones: Recording & PDF of Slides
- Preventing Struck-By Incidents: Learning by Experience: Recording & PDF of Slides
- Prevención de Incidentes por Atropellos: Zonas de Trabajo, Equipos Pesados e Impacto de Objetos: ver video & descargar presentación
- Roadway Safety Alliance <u>Internal Traffic Control Plans</u>



## Work Zone Safety: Working Around Vehicles

Workers are at risk of being struck by vehicles and other mobile equipment on construction sites. According to OSHA, "Transportation incidents and workers struck by vehicles or mobile equipment account for the highest number of fatal work injuries."

#### Ryan's Story

Ryan was moving materials from one part of the work zone to another. He was walking across the route used by construction vehicles. Just as he was crossing, a large truck turned a comer and began heading towards Ryan. Ryan was in the driver's blind spot and was almost hit.

- \* What caused this incident?
- : X How could this have been prevented?
- Have you ever been struck by a truck or other large piece of equipment, or do you know someone who has? If so, what happened?

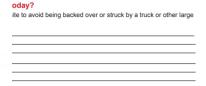
#### Remember Th

When working around construction vehicles and other mobile equipment:

Stay alert.

- Make eye contact with operator, flagger or spotte before walking in front of or behind a vehicle or other mobile equipment.
- Do not stand in shadows or areas where the driver may not see you.
- Obey signs. Do not stray into traffic or truck delivery lanes.
- Do not stand or walk in front of or behind equipment unless the operator signals that it is safe. Avoid standing or walking in the operator's blind snot
- Listen for and pay attention to horns and back-up alarms.
- Wear appropriate high-visibility clothing such as vests. Flaggers should check the label to make sure the clothing is performance class 2 or 3. Other workers should wear high-visibility clothing that is class 1 2 or 3.
- : > Look out for other workers.













# Work Zone Management Thank you for attending today. Questions?

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