

Struck-By Hazards in Construction Stats and Facts



FACTS

1. **Falling Tools and Materials:** Workers on lower levels are at risk of being struck by unsecured tools or materials dropped from scaffolds, lifts, or roofs.
2. **Moving Vehicles:** Construction workers in zones with trucks, loaders, or forklifts face serious injury risk from being struck during reversing or turning.
3. **Swinging or Shifting Loads:** Loads suspended from cranes or hoists can shift or swing unexpectedly, striking workers in the path or below.
4. **Ejected Parts or Debris:** Power tools, saws, and grinders may eject nails, metal, or wood fragments, causing injuries to the eyes or face.
5. **Structural Collapses:** Walls, trenches, or formwork may collapse during demolition or excavation, striking nearby workers with force.
6. **Equipment Malfunctions:** Hydraulic failures or mechanical defects can cause machinery arms, buckets, or components to move suddenly and strike workers.

STATS

- BLS 2023 data reported 174,100 non-fatal injuries in construction, with ~15% (~26,100) from struck-by incidents. Lacerations (20%), fractures (15%), and concussions (10%) were common, with inadequate PPE or controls contributing to 25% of cases.
- In 2024, OSHA recorded 5,190 workplace fatalities, with ~14% (~725) from struck-by hazards, including falling objects (40%), vehicle incidents (30%), and swinging loads (20%), per NIOSH.
- In 2024, PPE violations (29 CFR 1910.132) ranked 6th (1,876 citations), including inadequate hard hats or HVSA. Crane and rigging violations (29 CFR 1926 Subpart CC) ranked 9th (1,200 citations), often for improper load securement.
- Statistics Canada's 2021 Workplace Safety Survey recorded 5,000 lost-time claims in construction, with ~15% (~750) from struck-by incidents. Fractures (15%) and soft tissue injuries (12%) were prevalent, with 20% attributed to inadequate PPE or controls.
- WorkSafeBC reported 25–30 annual fatalities in British Columbia

(2020–2023), with ~15% (~4) from struck-by hazards, often vehicle-related or falling objects.

- CCOHS 2023 data showed that proper PPE and engineering controls (e.g., netting) reduced struck-by injuries by 22%.
- Ontario's 2024 fines (up to \$500,000) target OHS violations, including failure to provide PPE or ensure load safety.