

Eco-Safe Means People-Safe Sustainability Initiatives & Worker Risk Stats and Facts

FACTS

- **Unfamiliar Green Materials:** New “eco-friendly” chemicals or materials may introduce unknown exposure risks if hazard information is incomplete or misunderstood.
- **Alternative Energy Hazards:** Renewable systems like solar and wind introduce electrical, fall, and mechanical hazards during installation and maintenance.
- **Battery Storage Risks:** Lithium-ion and other energy storage systems can create fire, explosion, and toxic exposure hazards if damaged or improperly handled.
- **Process Changes Without Training:** Sustainability initiatives often change workflows, and inadequate training increases the risk of misuse and incidents.
- **Waste Handling and Recycling Exposure:** Handling recyclable or hazardous waste can expose workers to biological, chemical, and sharp-object hazards.
- **Increased Manual Tasks:** Some sustainability practices increase sorting, handling, or repetitive work, raising the risk of strains and injuries.

STATS

- In the United States, overexertion and bodily reaction account for approximately 31% of all workplace injuries, including tasks linked to recycling and manual handling in sustainability operations (BLS, 2022–2023).
- U.S. data shows that falls, slips, and trips make up about 27% of workplace injuries, a key risk during solar panel installation and maintenance work (BLS, 2022–2023).
- In Canada, musculoskeletal injuries represent nearly 40% of

lost-time claims, often associated with manual sorting and handling in waste and recycling sectors (AWCBC, 2021–2023).

- U.S. reports indicate that contact with objects and equipment accounts for around 23% of workplace injuries, including those involving new or unfamiliar machinery (BLS, 2022–2023).
- In Canada, exposure to hazardous substances contributes to approximately 10–15% of occupational illness claims, including risks in recycling and material processing environments (AWCBC, recent years).
- U.S. data highlights that fires and explosions—often linked to battery systems—represent a smaller but high-severity portion of incidents, accounting for roughly 3% of workplace fatalities (BLS, 2022–2023).