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Fatal Occupational Injuries – 2016

Major Findings

- There were 171 fatal work-related injuries in 2016. This is a 0.58 percent decrease from 2015's count of 172 fatal work-related injuries.
- The majority of decedents worked for wages or salary (75.4 percent), were male (91.8 percent), and were white and non-Hispanic (71.3 percent).
- The industry sectors per the North American Industry Classification System, 2012 edition, with the greatest percentage of injury-related fatalities in 2015 were:
 - Transportation and warehousing (20.5 percent)
 - Construction (17.0 percent)
 - Agriculture, forestry, fishing and hunting (9.9 percent)
 - Wholesale trade (6.4 percent)
 - Retail Trade (6.4 percent)
- The detailed occupations per the Standard Occupational Classification Manual, 2010 edition, with the greatest percentage of injury-related fatalities within their assigned industries were:
 - Transportation and material handling (51 total fatal injuries): motor vehicle operators accounted for 25.1 percent of worker related deaths.
 - Construction and extraction occupations (31 total fatal injuries): construction laborers accounted for 12.9 percent of work related deaths.
 - Management occupations (19 total fatal injuries): farmers, ranchers, and other agricultural managers accounted for 8.2 percent of work related deaths.
 - Installation, maintenance, and repair occupations (14 total fatal injuries): vehicle and mobile equipment mechanics, installers, and repairers accounted for 4.7 percent of work related deaths.
 - Sales and related occupations (12 total fatal injuries): supervisors of sales workers accounted for 4.1 percent of work related deaths.
 - Protective service occupations (8 total fatal injuries) other protective service workers accounted for 2.9 percent of work related deaths.

- For all industries these events or exposure resulted in the most fatalities:
 - Transportation (31.6 percent)
 - Falls, slips, trips (21.6 percent)
 - Violence and other injuries by persons or animals (20.5 percent)
 - Contact with objects and equipment (16.4 percent)
 - Exposure to harmful substances or environments (8.2 percent)
 - Fires and explosions (1.8 percent)

Introduction

The Illinois Department of Public Health, Division of Epidemiologic Studies conducts the Census of Fatal Occupational Injuries (CFOI) with partial support from the U.S. Department of Labor, Bureau of Labor Statistics (BLS). This partnership has been in existence since 1993. The purpose of the Illinois CFOI is to monitor, verify, and record all instances of workplace fatalities. Upon receipt of fatality data, CFOI staff work to verify fatalities and collect additional information on fatality circumstances and demographics of the decedent. This report presents data collected through the Illinois CFOI program for calendar year 2016.

Methods

The Illinois CFOI obtains data elements from a variety of public and confidential source documents. These documents include, but are not limited to, coroner and medical examiner reports, death certificates, National Transportation Safety Board reports, news media articles and reports, Mine Safety and Health Administration reports, Occupational Safety and Health Administration (OSHA) reports, police reports, and workers' compensation reports.

For verification purposes, a minimum of two source documents are required for each fatality case. CFOI staffers match source documents with cases using the decedent's name, place of employment, date and approximate time of death, or any other combination of identifying elements that can help differentiate existing cases from new ones. For some cases, the second source document is a questionnaire completed by the decedent's employer or another informant. In instances where two source documents are unavailable, BLS and state employees review cases to determine if the data is sufficiently reliable for inclusion. If a fatality does not

meet BLS' criteria, the cases are marked out-of-score and the data will not appear in either the national aggregate data or this report.

For injury-related fatalities to be included, cases must meet the following criteria: the incident must have occurred in Illinois, the death must have occurred during calendar year 2016, and the injury must be work-related according to the BLS guidelines. The injury must have occurred either: on the employer's premises while the person was there to work, or off the employer's premises and the person was there to work or the event/exposure were related to the person's work or employee status. 'Work' is defined by the BLS guidelines as 'duties, activities, or tasks that produce a product or result; that are done in exchange for money, goods, services, profit or benefit; and that are legal activities in the United States.

Results

The following data tables present some of the data collected during the 2016 CFOI cycle. Columns and rows may not add up to 100 percent, as not all included cases may be publishable. Cases that lack publicly accessed source documents and have three or less total cases associated with the subcategory are not published out of respect for the deceased's privacy. Cells with double dash marks (--) are empty, due to unpublishable data or because there was no data reported.

Overall Trends

In 2016, there were 171 fatal occupational injuries reported, which is a decrease of 0.58 percent over the 172 work-related fatalities collected in the 2015 CFOI (Figure 1).

Demographics

When documenting fatal occupational injuries, the Illinois CFOI collects data on the demographics of the decedent and the circumstances of the incident. Of the 171 injury-related fatalities in 2016, 129 (75.4 percent) occurred among wage/salary workers, and 42 (24.6 percent) occurred among the self-employed (Table 1).

Men made up a significantly larger section of the fatally injured, with 157 (91.8 percent) injuries compared to the 14 (8.2 percent) fatal injuries sustained by women. (Table 1) People in the 55 to 64 years age group had the highest occurrence of fatal injuries (28.1 percent). The next

highest were those 45 to 54 years old (20.5 percent), and 35 to 44 years old (19.3 percent). (Table 1). The majority of reported fatalities involved white, non-Hispanic workers (71.3 percent) and Hispanic or Latino workers were the second-highest reported fatalities (15.8 percent). (Table 1).

Incident Data

The industry sector (per NAICS codes 2012) that incurred the most injury-related fatalities with 35 (20.5 percent of the total) was Transportation and warehousing; followed by Construction with 29 (17.0 percent of the total); Agriculture, forestry, fishing and hunting with 17 (9.9 percent of the total); and Wholesale trade with 11 (6.4 percent of the total) (Table 2).

The major group occupations (per SOC classification 2010) suffering the most injury-related fatalities were Transportation and material handlers accounting for 51 fatalities (29.8 percent of the total), followed by Construction and extraction occupations 31 fatalities (18.1 percent of the total). Management occupations were next with 19 fatalities (11.1 percent of the total). Installation, maintenance, and repair occupations had 14 fatalities (8.2 percent of the total), and Sales and related occupations with 12 fatalities (7.0 percent of the total) (Table 3).

The event or exposure causing the injury-related fatality is another important aspect in describing work-related fatalities. Transportation incidents continues to cause the most injury-related occupational fatalities in 2016 with 54 fatalities or 31.6 percent of all fatalities. Falls, slips, and trips are the second most prevalent type of incident causing 37 fatalities or 21.6 percent of all fatalities. Violence and other injuries by persons or animals 35 fatalities or 20.5 percent of all fatalities, and Contact with objects and equipment 28 fatalities or 16.4 percent of all fatalities were third and fourth in injury-related fatalities (Table 4).

When cross tabulating the event or exposure that caused the injury-related fatality with the industry sector in which the fatality occurred, certain industries are more susceptible to certain events. Within industry sectors, transportation incidents were the leading cause of fatalities for Public Administration (100.0 percent); Transportation and warehousing (57.1 percent); Trade, transportation, and utilities (43.1 percent); and Wholesale trade (36.4 percent); Manufacturing (11.1 percent). Violent acts and assaults were the leading event for fatalities in Accommodation and food services (71.4 percent); Leisure and hospitality (63.6 percent); Retail

trade (45.5 percent); and Professional and technical services (25.0 percent). Falls, slips, and trips were the leading event for fatalities in Construction (31.0 percent). Contact with objects and equipment were the leading event for fatalities in Manufacturing (55.5 percent); and Administrative and waste services (40.0 percent) (Table 5).

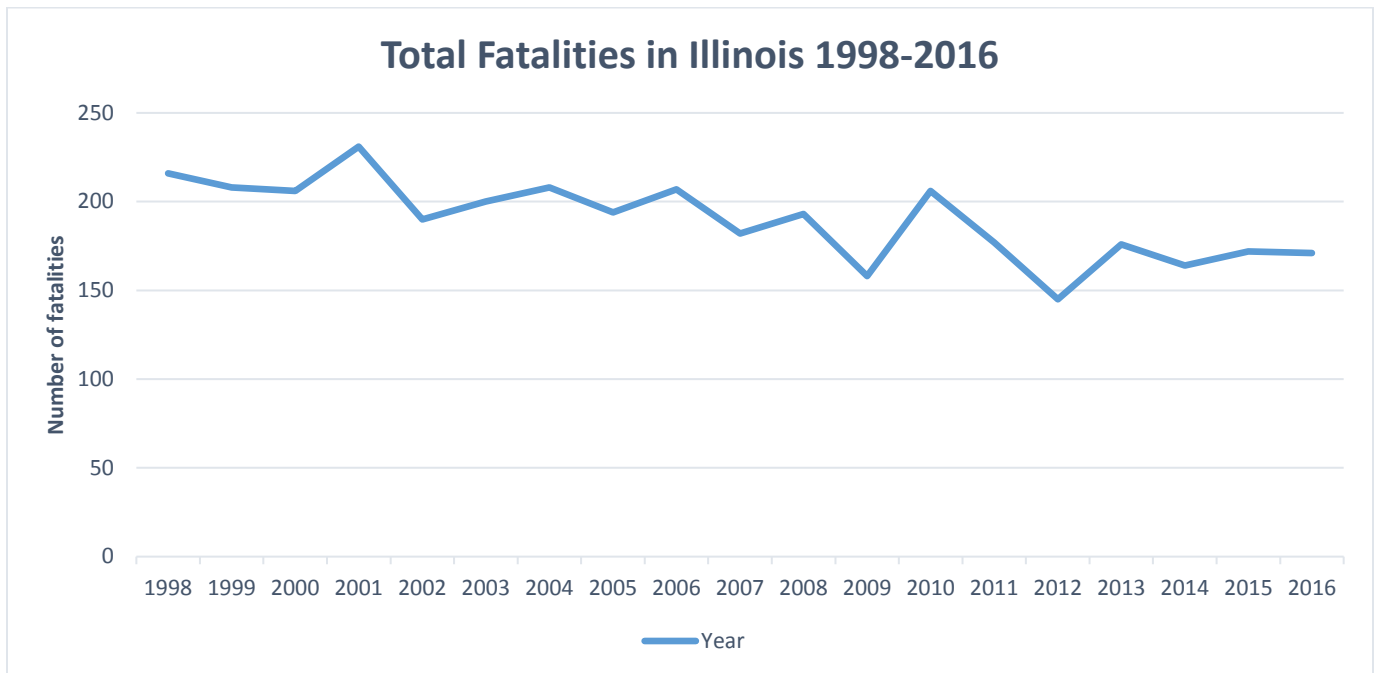
| Table 1. Distribution of Fatal Occupational Injuries by Selected Socio-Demographic Characteristics, Private and Public Ownership, Illinois, 2016 | | |
|---|-----------------------------|--------------------|
| | Number of Fatalities | Percentages |
| Totals | 171 | 100.0 |
| Employment Status | | |
| Wage and salary workers | 129 | 75.4 |
| Self-employed ¹ | 42 | 24.6 |
| Gender | | |
| Male | 157 | 91.8 |
| Women | 14 | 8.2 |
| Age | | |
| <20 | 1 | 0.6 |
| 20-24 | 8 | 4.7 |
| 25-34 | 25 | 14.6 |
| 35-44 | 33 | 19.3 |
| 45-54 | 35 | 20.5 |
| 55-64 | 48 | 28.1 |
| 65 years and older | 21 | 12.3 |
| Race | | |
| White (non-Hispanic) | 122 | 71.3 |
| Black | 19 | 11.1 |
| Hispanic or Latino | 27 | 15.8 |
| Other | 3 | 1.8 |

Source: U.S. Department of Labor, Bureau of Labor Statistics, Census of Fatal Occupational Injuries, in cooperation with the Illinois Department of Public Health.

¹Includes paid and unpaid family workers and may include owners of incorporated businesses or members of partnerships.

TABLES AND FIGURES

Figure 1. Number of Fatal Occupational Injuries, Illinois, 1998-2016



Source: U.S. Department of Labor, Bureau of Labor Statistics, Census of Fatal Occupational Injuries, in cooperation with the Illinois Department of Public Health.

| Table 2. Distribution of Fatal Occupational Injuries by Industry¹, Illinois, 2016 | | |
|---|-----------------------------|-------------------|
| | Number of Fatalities | Percentage |
| Total | 171 | 100.0 |
| Transportation and warehousing | 35 | 20.5 |
| Truck transportation | 27 | 15.8 |
| Construction | 29 | 17.0 |
| Specialty trade contractors | 21 | 12.3 |
| Heavy and civil engineering | 5 | 2.9 |
| Construction of buildings | 3 | 1.8 |
| Agriculture, Forestry, fishing, and hunting | 17 | 9.9 |
| Crop production | 14 | 8.2 |
| Wholesale trade | 11 | 6.4 |
| Merchant wholesalers, non-durable goods | 6 | 3.5 |
| Merchant wholesalers, durable goods | 5 | 2.9 |
| Retail trade | 11 | 6.4 |
| Gasoline Stations | 2 | 1.2 |
| Other services, except public administration | 11 | 6.4 |
| Repair and maintenance | 6 | 3.5 |
| Administrative and waste services | 10 | 5.8 |
| Administrative and support services | 8 | 4.7 |
| Manufacturing | 9 | 5.3 |
| Primary metal manufacturing | 2 | 1.2 |
| Accommodations and food services | 7 | 4.1 |
| Food services and drinking places | 6 | 3.5 |
| Professional and technical services | 4 | 2.3 |
| Health care and social assistance | 4 | 2.3 |
| Arts, entertainment, and recreation | 4 | 2.3 |
| Public Administration | 3 | 1.8 |
| Real estate and rental and leasing | 3 | 1.8 |

Source: U.S. Department of Labor, Bureau of Labor Statistics, Census of Fatal Occupational Injuries, in cooperation with the Illinois Department of Public Health

¹North American Industry Classification System, 2012 edition.

Table 3. Distribution of Fatal Occupational Injuries by Occupation¹, Illinois, 2016

| | Number of Fatalities | Percentages |
|---|-----------------------------|--------------------|
| Totals | 171 | 100.0 |
| Transportation and material handlers occupations | 51 | 29.8 |
| Motor vehicle operators | 43 | 25.1 |
| Material moving workers | 8 | 4.7 |
| Construction and extraction occupations | 31 | 18.1 |
| Construction laborers | 22 | 12.9 |
| Management occupations | 19 | 11.1 |
| Farmers, ranchers, and other agricultural managers | 14 | 8.2 |
| Food service managers | 2 | 1.2 |
| Installation, maintenance, and repair occupations | 14 | 8.2 |
| Vehicle and mobile equipment mechanics, installers, and repairers | 8 | 4.7 |
| Other installation, maintenance, and repair occupations | 6 | 3.5 |
| Sales and related occupations | 12 | 7.0 |
| Supervisors of sales workers | 7 | 4.1 |
| Protective service occupations | 8 | 4.7 |
| Other protective service workers | 5 | 2.9 |
| Law enforcement workers | 3 | 1.8 |
| Production occupations | 6 | 3.5 |
| Metal workers and plastic workers | 3 | 1.8 |
| Building and grounds cleaning and maintenance occupations | 6 | 3.5 |
| Grounds maintenance workers | 3 | 1.8 |
| Personal care and service occupations | 5 | 2.9 |
| Animal care and service worker | 2 | 1.2 |
| Farming, fishing, and forestry occupations | 4 | 2.3 |
| Agriculture workers | 3 | 1.8 |
| Art, design, entertainment, sports, and media occupations | 3 | 1.8 |
| Healthcare practitioners and technical occupations | 3 | 1.8 |

Source: U.S. Department of Labor, Bureau of Labor Statistics, Census of Fatal Occupational Injuries, in cooperation with the Illinois Department of Public Health.

¹Standard Occupational Classification Manual, 2010 edition.

| Table 4. Distribution of Fatal Occupational Injuries by Event or Exposure¹, Illinois, 2016 | | |
|--|-----------------------------|--------------------|
| | Number of Fatalities | Percentages |
| Totals | 171 | 100.0 |
| Transportation incidents | 54 | 31.6 |
| Roadway incidents involving motorized land vehicle | 37 | 21.6 |
| Pedestrian vehicular incident | 9 | 5.3 |
| Non-roadway incident involving motorized land vehicles | 6 | 3.5 |
| Falls, slips, trips | 37 | 21.6 |
| Falls to lower level | 24 | 14.0 |
| Falls on same level | 11 | 6.4 |
| Violence and other injuries by persons or animals | 35 | 20.5 |
| Homicides | 22 | 12.9 |
| Suicides | 10 | 5.8 |
| Contact with objects and equipment | 28 | 16.4 |
| Struck by object or equipment | 22 | 12.9 |
| Caught in or compressed by equipment or objects | 4 | 2.3 |
| Exposure to harmful substances or environments | 14 | 8.2 |
| Exposure to other harmful substances | 10 | 5.8 |
| Exposure to electricity | 3 | 1.8 |
| Fires and explosions | 3 | 1.8 |

Source: U.S. Department of Labor, Bureau of Labor Statistics, Census of Fatal Occupational Injuries, in cooperation with the Illinois Department of Public Health.

¹Based on the BLS Occupational Injury and Illness Classification System (OIICS) 2.01 implemented for 2011 data forward.

Table 5. Fatal occupational Injuries by Industry and Event or Exposure, Private Ownership, Illinois, 2016

| Industry | Event or Exposure | | | | | | | | | | | | | |
|---|-------------------|---------|----------------|---------|---|---------|------------------------------------|---------|---------------------|---------|--|---------|----------------------|---------|
| | Total Fatalities | | Transportation | | Violence and other injuries by persons or animals | | Contact with objects and equipment | | Falls, slips, trips | | Exposure to harmful substances or environments | | Fires and Explosions | |
| | Number | Percent | Number | Percent | Number | Percent | Number | Percent | Number | Percent | Number | Percent | Number | Percent |
| Agriculture, forestry, fishing, hunting | 17 | 9.9 | 6 | 35.3 | -- | -- | 4 | 23.5 | 3 | 17.6 | -- | -- | -- | -- |
| Construction | 29 | 17.0 | 6 | 20.7 | 4 | 13.8 | 4 | 13.8 | 9 | 31.0 | 6 | 20.7 | -- | -- |
| Manufacturing | 9 | 5.3 | 1 | 11.1 | -- | -- | 5 | 55.5 | 3 | 33.3 | -- | -- | -- | -- |
| Trade, transportation, and utilities | 58 | 33.9 | 25 | 43.1 | 10 | 17.2 | 6 | 10.3 | 11 | 19.0 | 4 | 7.0 | 2 | 3.4 |
| Wholesale trade | 11 | 6.4 | 4 | 36.4 | -- | -- | 3 | 27.3 | 3 | 27.3 | -- | -- | -- | -- |
| Retail trade | 11 | 6.4 | 1 | 9.1 | 5 | 45.5 | -- | -- | 4 | 36.4 | -- | -- | 1 | 9.1 |
| Transportation and warehousing | 35 | 20.5 | 20 | 57.1 | 4 | 11.4 | 3 | 8.6 | 4 | 11.4 | 4 | 11.4 | -- | -- |
| Accommodations and food services | 7 | 4.1 | -- | -- | 5 | 71.4 | -- | -- | -- | -- | -- | -- | -- | -- |
| Professional and technical services | 4 | 2.3 | -- | -- | 1 | 25.0 | -- | -- | -- | -- | -- | -- | -- | -- |
| Administrative and waste services | 10 | 5.8 | 2 | 20.0 | 2 | 20.0 | 4 | 40.0 | -- | -- | -- | -- | -- | -- |
| Leisure and hospitality | 11 | 6.4 | 3 | 27.3 | 7 | 63.6 | -- | -- | -- | -- | -- | -- | -- | -- |
| Other services, except public administration | 11 | 6.4 | -- | -- | 4 | 36.4 | 1 | 9.1 | 4 | 36.4 | -- | -- | -- | -- |
| Public Administration | 3 | 1.8 | 3 | 100.0 | -- | -- | - | - | - | - | - | - | - | -- |

Source: U.S. Department of Labor, Bureau of Labor Statistics, Census of Fatal Occupational Injuries, in cooperation with the Illinois Department of Public Health.
 Note: Numbers and percentages may not add to totals due to exclusions of categories that do not meet publication criteria.