

Table 11. Fatal occupational injuries by primary and secondary source of injury, 1994

Source of injury ¹	Fatalities			
	Primary source ²		Secondary source ³	
	Number	Percent	Number	Percent
Total	6,588	100.0	6,588	100.0
Vehicles	2,782	42.2	996	15.1
Air vehicle	426	6.5	38	.6
Aircraft--powered fixed wing	312	4.7	32	.5
Jet	142	2.2	—	—
Propeller-driven aircraft	126	1.9	27	.4
Aircraft--powered rotary wing	67	1.0	—	—
Highway vehicle, motorized	1,769	26.9	775	11.8
Automobile	470	7.1	185	2.8
Bus	9	.1	5	.1
Truck	1,055	16.0	469	7.1
Delivery truck	43	.7	9	.1
Dump truck	93	1.4	33	.5
Pickup truck	212	3.2	84	1.3
Semitrailer, tractor trailer, trailer truck	447	6.8	221	3.4
Van--passenger or light delivery	103	1.6	28	.4
Highway vehicle, nonmotorized	15	.2	—	—
Animal or human powered vehicle	15	.2	—	—
Bicycle	11	.2	—	—
Offroad vehicle, nonindustrial	21	.3	—	—
All terrain vehicle (ATV)	9	.1	—	—
Golf cart, powered	4	.1	—	—
Plant and industrial powered vehicles, tractors	403	6.1	61	.9
Forklift	80	1.2	43	.7
Hand/rider forklift truck--motorized	4	.1	—	—
Platform lift truck--high or low lift	5	.1	—	—
Powered industrial carrier, except forklift	10	.2	—	—
Tractor	306	4.6	16	.2
Rail vehicle	40	.6	84	1.3
Water vehicle	91	1.4	25	.4
Barge	21	.3	4	.1
Canoe, kayak, rowboat, raft	5	.1	—	—
Motorboat	4	.1	—	—
Ships--other than sail powered	12	.2	8	.1
Tugboat, commercial fishing boat	38	.6	—	—
Structures and surfaces	713	10.8	697	10.6
Floors, walkways, ground surfaces	610	9.3	244	3.7
Floors	207	3.1	17	.3
Ground	228	3.5	159	2.4
Sidewalks, paths, outdoor walkways	36	.5	—	—
Street, road	21	.3	12	.2
Surfaces below ground level, n.e.c.	21	.3	22	.3
Ditches, channels, trenches, excavations	19	.3	16	.2
Parking lots	16	.2	—	—
Other structural elements	53	.8	148	2.2
Doors	10	.2	—	—
Fences, fence panels	—	—	10	.2
Gates	6	.1	4	.1
Roof	9	.1	81	1.2
Walls	19	.3	20	.3
Structures	41	.6	296	4.5
Bridges, dams, locks	10	.2	24	.4
Mines, caves, tunnels	—	—	11	.2
Scaffolds, staging	9	.1	71	1.1
Towers, poles	12	.2	59	.9
Other structures	6	.1	81	1.2
Guardrails, road dividers	—	—	61	.9
Machinery	497	7.5	204	3.1
Agricultural and garden machinery	100	1.5	14	.2
Harvesting and threshing machinery	24	.4	—	—
Balers	10	.2	—	—
Mowing machinery	38	.6	6	.1
Lawn mowers--riding	6	.1	—	—
Mowers, tractor	22	.3	—	—
Plowing, planting, and fertilizing machinery	11	.2	—	—
Spreading machinery--agricultural	4	.1	—	—
Construction, logging, and mining machinery	182	2.8	34	.5
Excavating machinery	56	.9	11	.2
Backhoes	21	.3	—	—
Bulldozers	24	.4	7	.1
Loaders	53	.8	4	.1
Bucket loaders	12	.2	—	—
End loaders	7	.1	—	—
Front end loaders	29	.4	4	.1
Logging and wood processing machinery--specialized	22	.3	8	.1
Forwarder/yarder, skidder	4	.1	—	—
Skidder--cable and grapple	8	.1	—	—

See footnotes at end of table.

Table 11. Fatal occupational injuries by primary and secondary source of injury, 1994 — Continued

Source of injury ¹	Fatalities			
	Primary source ²		Secondary source ³	
	Number	Percent	Number	Percent
Mining and drilling machinery	12	.2	4	.1
Road grading and surfacing machinery	27	.4	—	—
Graders, levellers, planers, scrapers	16	.2	—	—
Steam rollers, road pavers	7	.1	—	—
Heating, cooling, and cleaning machinery and appliances	21	.3	15	.2
Cooling and humidifying machinery and appliances	9	.1	4	.1
Heating and cooking machinery and appliances	8	.1	9	.1
Washers, dryers, and cleaning machinery and appliances	4	.1	—	—
Material handling (cranes, conveyers, jacks)	108	1.6	109	1.7
Conveyors--powered	33	.5	8	.1
Cranes	32	.5	40	.6
Cranes--mobile, truck, rail mounted	11	.2	6	.1
Cranes--overhead	4	.1	6	.1
Overhead hoists	7	.1	9	.1
Elevators	23	.3	23	.3
Bucket or basket hoist--truck mounted	—	—	7	.1
Manlifts	—	—	7	.1
Jacks	—	—	22	.3
Metal, woodworking, and special material machinery	31	.5	16	.2
Special process machinery	29	.4	8	.1
Food and beverage processing machinery--specialized	6	.1	—	—
Textile, apparel, leather production machinery	6	.1	—	—
Miscellaneous machinery	19	.3	7	.1
Parts and materials	440	6.7	206	3.1
Building materials--solid elements	120	1.8	37	.6
Bricks, blocks, structural stone	15	.2	4	.1
Pipes, ducts, tubing	38	.6	9	.1
Structural metal materials	43	.7	17	.3
Bars, rods, reinforcing bar (rebar)	4	.1	—	—
Plates, metal panels	5	.1	—	—
Wood, lumber	19	.3	4	.1
Other building materials--solid elements	4	.1	—	—
Fasteners, connectors, ropes, ties	42	.6	14	.2
Ropes, ties	34	.5	11	.2
Chains, n.e.c.	4	.1	4	.1
Rope, twine, string	16	.2	—	—
Hoisting accessories	6	.1	—	—
Machine, tool, and electrical parts	224	3.4	119	1.8
Electric parts	208	3.2	115	1.7
Electrical wiring	61	.9	17	.3
Power lines, transformers, convertors	100	1.5	85	1.3
Switchboards, switches, fuses	7	.1	—	—
Metal materials--nonstructural	20	.3	—	—
Molten or hot metals, slag	6	.1	—	—
Tars, sealants, caulking, insulating material	—	—	4	.1
Vehicle and mobile equipment parts	22	.3	27	.4
Tires, inner tubes, wheels	9	.1	9	.1
Wheels, tire rims	4	.1	—	—
Engine parts and accessories	4	.1	—	—
Trailers	6	.1	17	.3
Persons, plants, animals, and minerals	306	4.6	1,332	20.2
Animals and animal products	41	.6	26	.4
Insects, arachnids	9	.1	—	—
Mammals, except humans	30	.5	23	.3
Cattle	14	.2	6	.1
Horses	13	.2	7	.1
Food products--fresh or processed	23	.3	—	—
Nonmetallic minerals, except fuel	56	.9	21	.3
Dirt, earth	30	.5	8	.1
Rocks, crushed stone	12	.2	7	.1
Sand, gravel	8	.1	—	—
Person--other than injured or ill worker	21	.3	1,036	15.7
Co-worker, former co-worker or injured worker	—	—	56	.9
Relative of injured worker	—	—	30	.5
Plants, trees, vegetation--not processed	159	2.4	144	2.2
Cash grain crops	4	.1	—	—
Trees, logs	150	2.3	140	2.1
Chemicals and chemical products	181	2.7	85	1.3
Alkalies	5	.1	—	—
Aromatics and hydrocarbon derivatives, except halogenated	8	.1	7	.1
Halogens and halogen compounds	6	.1	—	—
Agricultural chemicals and other pesticides	7	.1	—	—
Chemical products--general	46	.7	19	.3
Drugs, alcohol, medicines	35	.5	—	—
Explosives, blasting agents, n.e.c.	6	.1	12	.2
Coal, natural gas, petroleum fuels and products	15	.2	42	.6
Natural gas	—	—	7	.1

See footnotes at end of table.

Table 11. Fatal occupational injuries by primary and secondary source of injury, 1994 — Continued

Source of injury ¹	Fatalities			
	Primary source ²		Secondary source ³	
	Number	Percent	Number	Percent
Petroleum fuels, distillates, products, unspecified	9	.1	28	.4
Gasoline, diesel fuel, jet fuel	—	—	22	.3
Propane	—	—	4	.1
Other chemicals	86	1.3	15	.2
Ammonia and ammonium compounds	6	.1	—	—
Cyanide and cyanide compounds, n.e.c.	6	.1	—	—
Oxygen and oxygen compounds, n.e.c.	51	.8	—	—
Carbon monoxide	44	.7	—	—
Sewer gas, mine gas, methane	11	.2	—	—
Sulfur and sulfur compounds	7	.1	—	—
Tools, instruments, and equipment	136	2.1	155	2.4
Handtools--nonpowered	96	1.5	7	.1
Cutting handtools	69	1.0	—	—
Knives	54	.8	—	—
Striking and nailing handtools	11	.2	—	—
Handtools--powered	15	.2	27	.4
Cutting handtools	5	.1	6	.1
Welding and heating handtools	5	.1	13	.2
Handtools--power not determined	4	.1	—	—
Ladders	8	.1	82	1.2
Ladders--fixed	—	—	4	.1
Ladders--movable	6	.1	41	.6
Extension ladders	—	—	6	.1
Step ladders	—	—	10	.2
Containers	83	1.3	52	.8
Containers-nonpressurized	36	.5	34	.5
Bags, sacks, totes	4	.1	—	—
Boxes, crates, cartons	4	.1	—	—
Tanks, bins, vats	22	.3	26	.4
Containers-pressurized	17	.3	7	.1
Containers-variable restraint	24	.4	9	.1
Bundles, bales	19	.3	7	.1
Reels, rolls	5	.1	—	—
Skids, pallets	5	.1	—	—
Other	1,450	22.0	272	4.1
Ammunition	1,062	16.1	—	—
Bullets	996	15.1	—	—
Atmospheric and environmental conditions	183	2.8	119	1.8
Fire, flame, smoke	127	1.9	22	.3
Temperature extreme	35	.5	—	—
Steam, vapors, liquids	98	1.5	106	1.6
Scrap, waste, debris	10	.2	—	—
Not reported	—	—	2,589	39.3

¹ Based on the 1992 BLS Occupational and Illness Classification Structures.

² The primary source of injury identifies the object, substance, or exposure that directly produced or inflicted the injury. For transportation incidents, the source identifies the vehicle in which the deceased was an occupant.

³ The secondary source of injury, if any, identifies the object, substance, or person that generated the source of injury or that contributed to the event or exposure. For vehicle collisions, the deceased's vehicle is the primary source and the other object (truck, road, divider, etc.) is the secondary source. For most homicides, the "bullet" is the

primary source and the "perpetrator" is the secondary source. Secondary source was coded for 3,999 cases.

NOTE: Totals for major categories may include subcategories not shown separately. Percentages may not add to totals because of rounding.

Dashes indicate no data reported or data that do not meet publication criteria.

SOURCE: Bureau of Labor Statistics, U.S. Department of Labor, in cooperation with State and Federal agencies, Census of Fatal Occupational Injuries, 1994.