



Underground Mining Facts - 2003

1. Data from the Mine Safety and Health Administration (MSHA) indicate that a total of 44,015 **employees** worked in underground mining locations in 2003, corresponding to 44,778 full-time equivalent (FTE) workers.¹
 - Ninety percent of underground employees (n = 39,735) were mine operator employees.
 - Contractors comprised 10% of all underground mining employees (n = 4,280) and comprised only 5.8% of all underground FTEs.
 - The majority of underground employees worked for coal operators (73.0%; n = 32,130).²
2. In 2003, 16 occupational mining **fatalities** occurred in underground work locations. The underground work location fatality rate was 35.7 per 100,000 FTE workers.
 - Of the underground fatalities, 11 occurred in coal operator mines, 4 among coal contractors, and 1 in a stone operator mine.
 - Coal contractors had the highest fatality rate (212.8 per 100,000 FTE employees), followed by stone operator employees (54.1) and coal operator employees (32.0).
3. Within underground work locations, 2,818 **nonfatal lost-time injuries** resulting in 193,983 lost work days were reported to MSHA in 2003.³ The nonfatal lost-time injury rate was 6.3 per 100 FTEs.
 - The median number of days lost due to injury in underground work locations was 30 compared to 17 in surface work locations.
 - Coal contractors had the highest underground injury rate (9.9 per 100 FTE workers) among all mining sectors followed by coal operator employees (6.8 per 100 FTE workers). Coal contractors and operators also reported the greatest median number of lost work days (33 and 32, respectively).
 - The highest percentage of nonfatal lost-time injuries was due to handling materials (33.1%; n = 932), followed by slips or falls (17.7%; n = 499) and accidents due to machinery (17.1%; n = 482).
 - Sprains and strains accounted for the largest percentage of nature of injury (47.2%; n = 1,331).
 - Among employees working in underground locations, the back was the most frequently reported part of body injured (21.0%; n = 592).⁴ Back injuries accounted for nearly 25% of all work days lost due to injury (n = 47,019).
 - Underground employees with the MSHA job title of "laborer/utility man/bull gang" had the most injuries (n = 759; 26.9%).
4. In 2003, 257 cases of **occupational illnesses** were reported to MSHA among employees in underground work locations.⁵
 - Joint, tendon, or muscle inflammation or irritation accounted for 47.9% (n = 123) of reported occupational illnesses in underground work locations.
 - Eighty-three cases of black lung (coal workers' pneumoconiosis) were reported to MSHA by employees in underground work locations. This accounted for 32.3% of all occupational illnesses among underground employees.
 - There were 39 cases of hearing loss or impairment reported to MSHA (or 15.2% of all occupational illnesses reported) by employees working in underground locations.

¹ Computed using reported employee hours (2,000 hours = 1 FTE).

² Mining sectors: coal operators, metal operators, nonmetal operators, stone operators, sand and gravel operators, coal contractors, and noncoal contractors.

³ Includes actual days away from work and/or days of restricted work activity. For permanently disabling injuries only, statutory days charged by MSHA were used if they exceeded the total lost workdays.

⁴ MSHA only reports the most severely injured part of body for accidents involving injury to multiple body parts.

⁵ Because of the complexity of attributing disease causation to the workplace, occupational illnesses may be underreported.



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