

Loud Noise Can Hurt Hearing & Increase Risk of Injury



It's clear that exposure to loud noise on the job can hurt workers' hearing. But a recent study by Canadian researchers found that very loud noise on the job can cause workers to miss hazard warnings and thus put them at increased risk of suffering other kinds of workplace injuries.

In the study, which was published in the journal *Injury Prevention* in March 2014, the researchers looked at records for 46,550 male workers over nearly 20 years and found that 1,670 had been hospitalized for work-related injuries within five years of being given hearing tests. They compared the number of injuries to workers' levels of hearing loss as indicated by the tests and their exposure to loud noises in the workplace.

Results:

- For every decibel of hearing loss, the risk of hospitalization due to work-related injury increased by 1%.
- Workers exposed to noise levels above 100 decibels had 2.4 times the risk of being hospitalized for work-related injuries compared to workers not exposed to loud noise.
- For workers who had severe hearing loss and worked in an environment where noise exposure is overly intense, the risk of being hospitalized with a work-related injury was 3.6 times that of workers with neither factor.

Serge-Andre Girard, a researcher with the National Public Health Institute of Qu bec who led the study, said 'Noise induced hearing loss is a public health issue. In the USA, up to 30 million workers are exposed to noise and in Qu bec, this number is estimated to be 400,000.'

Girard said that exposure to high noise levels increases:

- Fatigue

- Decreases the ability to concentrate
- Impairs the quality of communication between workers.

As a result, both noise and noise-induced hearing loss could be involved in the occurrence of accidents, he added.

Bottom line: You should make every effort to control noise levels in the workplace, not only to preserve workers' hearing but also to improve overall workplace safety.

Use engineering controls to eliminate or reduce the level of noise generated. For example, you can replace noisy equipment and machinery with quieter models, isolate noisy equipment in separate rooms or install sound-absorbent materials, dampers, mufflers, silencers or barriers.

If you can't eliminate or reduce the noise levels, consider implementing a system of visual safety signals rather than alarms and other audio signals. For example, use flashing lights or hand signals.

If your workplace could expose workers to excessive noise, the OHS Insider can help you protect them with:

- Information on complying with hearing conservation program requirements
- An Annual Hearing Conservation Program Review Form to use when reviewing your program each year
- Spot the Safety Violation: Protection from Invisible Safety Hazards.