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# Graying work force:

## Safety concerns of the aging employee

by Craig S. Philson

**E**very day in the United States, 5,000 people celebrate a 65th birthday. About 3,400 persons 65 years or older will die. Because of medical advances and the quality of life, the number of persons 65 years or older has steadily increased since 1900. The 65+ population in the United States is growing twice as fast as the general population. Men and women 80 years or older are currently the fastest growing group.<sup>1</sup> Safety professionals now and in the future will be challenged to address this growing work force, as the aging employee will be called upon to replace the shrinking youth work force in the future.

### The population shift

In 1900, two-thirds of men 65 or older were working.<sup>2</sup> This was primarily attributable to less industrialization, as well as lack of retirement benefits, pensions, and social security. Men and women in the early 1900's did not live much past 65; mortality rates were influenced by the medical industry, lack of safety in the home and work place, and the lack of health education. These mortality rates created what is called a "population pyramid." A population pyramid is created when there is a high rate of births with mortality prevailing to decrease the numbers of persons 65 or older. This

was common in the early 1900's and is still found today, mainly in Third World countries.<sup>3</sup>

The population today is what is called a constrictive type pyramid. This occurs when a smaller number of young age group cohorts occurs versus older age groups. This most recently occurred in the United States from 1960 through 1980 when the birth rate decreased after the baby boom.<sup>3</sup> As a result of decreased births and increased mortality, the population shifts to an older-dominant group, which in turn increases the age of the work force (see figure A).

In 1980, there were 70,195,000 people in the United States 45 years or older, with 25,708,000 of them 65 or older. By the year 2000, there will be 96,255,000 people 45 years or older, with 34,882,000 of them 65 years or older (see figure B). In the year 2005, baby boomers born in 1945 will begin to enlarge the 65+ group. The increase in the older population will no doubt create social, economic and labor concerns that must be addressed now by safety professionals.

### Effects of the population shift

With the creation of pensions, Social Security, and a strong economy, the labor force has allowed earlier retirement of individuals in the past.

Retirement of individuals at age 65 in the early 1900's would have meant only 5-10 years of retirement time. With medical advances and financial help through Social Security and company pensions, employees are able to retire and live another 20 years in retirement. Increased taxes, floundering Social Security funding, and skyrocketing costs of inflation will, in the future, most likely lead to individuals working longer and decreasing their leisure time.

In 1980, there were five persons of working age to each individual 65 or older. This ratio could shift as much as 3 to 1 by the year 2030. This shift could put Federal programs such as Social Security and Medicare in increased dire straits.<sup>1</sup> Older employees can be expected to stay in the work force longer to retain company benefits and supplement their incomes which may suffer in the future. By 2030, the group 65 and older could make up 17-22% of the population. Currently, this group accounts for 11% of the total population.<sup>1</sup>

Age discrimination claims are becoming the fastest growing category of charges filed with the Equal Employment Opportunity Commission. These claims increased almost 12% between 1984 and 1985, according to a report from the Senate Commission on Aging.<sup>4</sup> For the

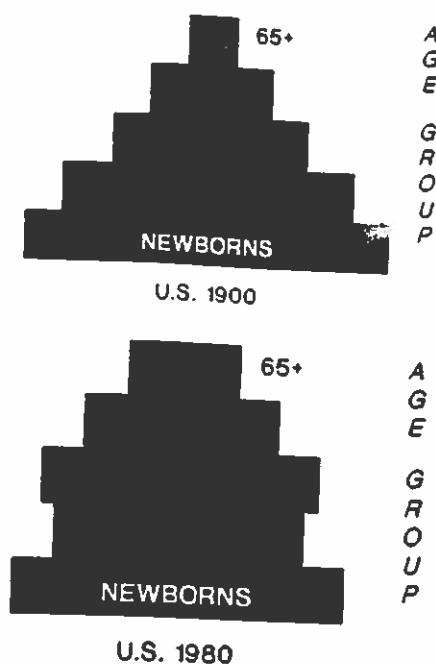


Figure A. Source: "Population—Patterns, Dynamics and Prospects"

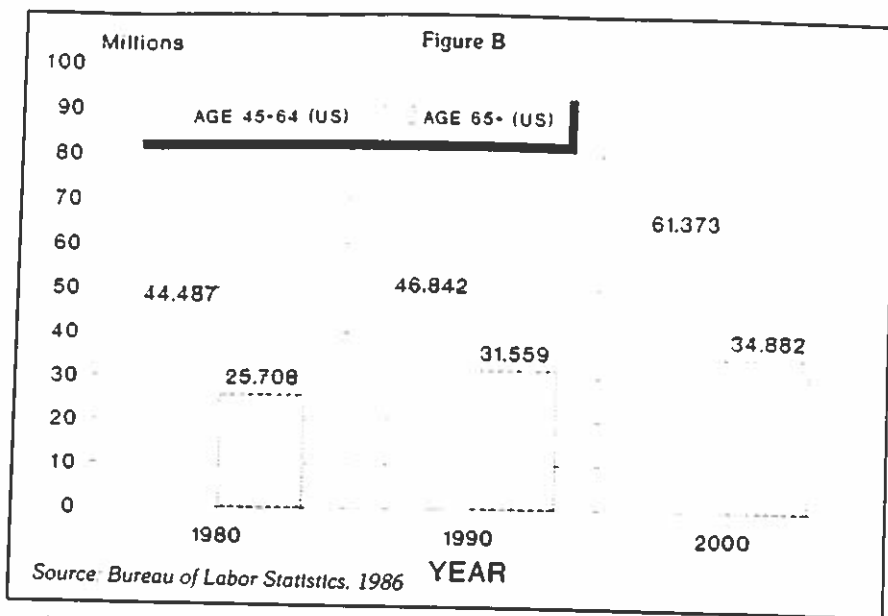
safety professional whose duties may also include human resources, this becomes a serious matter. If an older employee is terminated and replaced with a younger, less experienced employee, lawsuits involving the safety professional can flourish. Documentation must be made to distinguish this employee's release just as it would any other. If an older employee's reaction time, eyesight, or any other physical disabilities are creating exposures to the safety of that employee and others around, this must be dealt with and documented.

As a person becomes older, several important functions begin to deteriorate to some degree. Eyesight diminishes with reduced perception of depth and space. The posture of an older person changes. In some women, calcium deficiencies lead to osteoporosis, which is a decrease in bone mass.

An older person can expect to have a slower metabolism, hearing loss, slower reflexes and an impaired circulatory system. These items occur at different periods of time for different individuals. Each is significant to safety in the work force. In an accident situation, the effects of aging are an important factor in the severity of an injury as well as in the speed of recovery.

### Accidents and the older employee

According to the National Safety Council, accidental injuries are the



sixth most common cause of death in people over 65. In an eight-state study done by the Bureau of Labor Statistics, employees in the 65+ age group were found to die from disabling injuries at a rate ten times greater than those 64 years and under. (See figure C.) In the same study, employees 65 or older were found to have permanent disabling injuries at a rate 39% greater than those 64 and older. (See figure D.)

Hip fractures are a major source of injury and death for persons over 65 years of age. Hip fracture related death rates are more than eight times higher in persons 75 or older than in those between the ages 65 and 74. In the best conditions, the mean mortality associated with hip fracture in elderly persons is approximately 15% during the first year.

Many persons suffering from hip injuries require chronic care, whereas they were once independent and contributing to society. The annual costs stemming from hip fractures are estimated from 2.6 billion dollars.<sup>5</sup> Hip fractures are common due to the physical effects of aging mentioned earlier. Poor eyesight, calcium deficient bones, and a deteriorated sense of balance leads to falls.

A hidden problem related to falls in elderly employees can be attributed to medications. The older employee is often under various medications and often may increase a dosage without consulting a physician. Older employees often may mix medications, leading to physical problems affecting their vision, balance, or reflexes.

Accidents involving older employees can create unforeseen tragedy and complicate accident investigations for the safety professional. An elderly employee loses her balance and falls unwitnessed. To save embarrassment, she claims she slipped on a wet floor. This type of cover-up is not uncommon with any person with a disability. If the accidents are not investigated correctly, the safety professional may not catch the problem until it is too late.

Many companies give seemingly harmless jobs to older employees. This is good if a job safety analysis has been performed. When working with elderly employees, a job safety analysis must be performed with their abilities in mind.

An 83 year old employee is given a job as a gatekeeper. His function is to open and close a security gate. The employee notices a wasp nest and attempts to knock it down. In doing so, he slips and falls on a level surface and breaks his hip. Six months later, he dies.

Examples of accidents associated with the aging process are endless. What can be done by the safety professional?

### Proactive safety

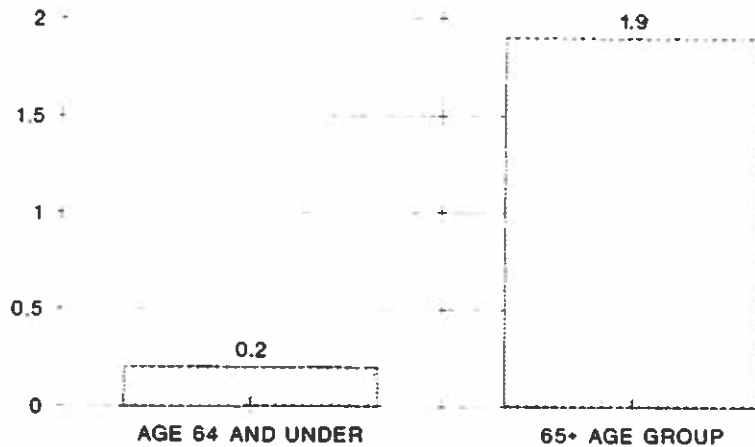
In the past, as technology increased, older and less educated adults tended to be dropped from employment. For the safety professional to have an edge on the growth rate of the older employee in the work force, this philosophy must be altered.

Older employees whose skills have now become obsolete, must be retrained so that they fit in the work

Figure C

## WORK FATALITY RATE ALL AGES -vs- 65+ AGE GROUP

# FATALITIES PER 100 DISABILING INJURIES



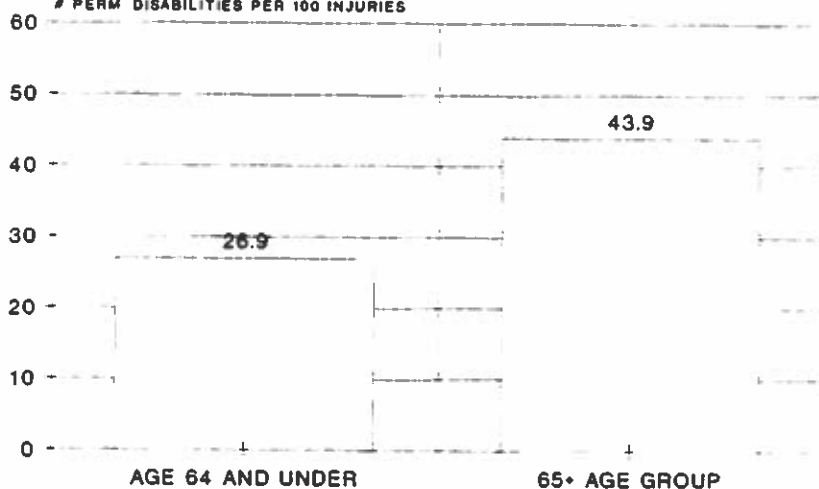
1986: EIGHT STATE SURVEY

Source: Bureau of Labor Statistics, 1986

Figure D

## PERMANENT DISABILITY RATE ALL AGES -vs- 65+ AGE GROUP

# PERM DISABILITIES PER 100 INJURIES



1986: EIGHT STATE SURVEY

Source: Bureau of Labor Statistics, 1986

force safely and productively. The need for improved training of older workers is vital. With a reduced younger work force, industry is going to be forced to keep or employ older workers who would have considered early retirement or merely been replaced with a younger worker.

There are positives and negatives to the training of the older employee. In most cases, the person training will be younger. This may cause barriers, both social and educational,

which must be overcome with the supervision of the safety professional. The older employee, even though trained, may rely on old ways and past experiences that can have a negative outcome. The best use of older employees—with their knowledge and experience—is to have them train the younger employees whenever possible.

The aging process diminishes the skills that a once younger employee had in his job function. The 35 year old machinist may find his job more

difficult to perform at age 65 or 70. An often overlooked function of the safety professional is the retraining of employees and the re-evaluation of their job tasks. An older employee's skills may have diminished enough that he must change job functions, or merely be retrained to perform them in a more satisfactory manner. Task/skill assessment will be important in dealing with the older employee.

During the 70's and all through the 80's, America has been "getting in shape." The health consciousness of the United States and industry help create the older work force. The fitness craze is turning into habit and is being adopted by larger corporations. Wellness programs are used by companies to reduce their accident rates and to improve the health of their employees. The adoption of wellness programs by mid-sized and small companies will be a trend, hopefully, as well. This type program can help reduce the long-term injuries associated with older

### Job safety analysis should be performed with the age . . . of the employee in mind.

employees. Any accident occurring to an older employee is potentially permanent and totally disabling. These claims add up to huge losses when you consider the additional medical attention necessary for older persons as well as the time taken to recuperate.

Job safety analysis should be performed with the age and physical restrictions of the employee in mind. Ergonomically designed work stations will be important in the future. Mechanizing as many job functions as possible and adoption of robotics will lessen the amount of older employees in the work force to some extent. The older employee's activities should be limited with younger employees doing the more physical tasks.

It will be important for companies and their safety professionals to network with local medical specialists to help them determine any physical ailments that may impair an older employee in the work place.

## Conclusion

The future holds an important role for the older employee. As the baby boomers of the 40's and 50's reach their retirement years, the need for their services may be greater than ever. It is important that the safety profession become proactive rather than reactive to the problems generated. By setting the groundwork for solving future problems now, we will be laying the foundation for our own future. ☺

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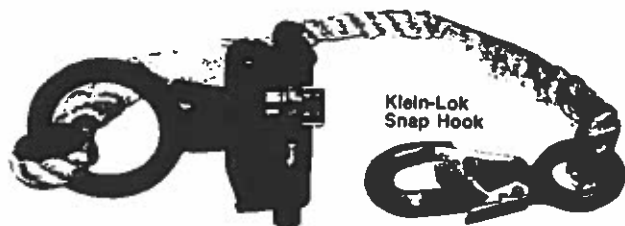
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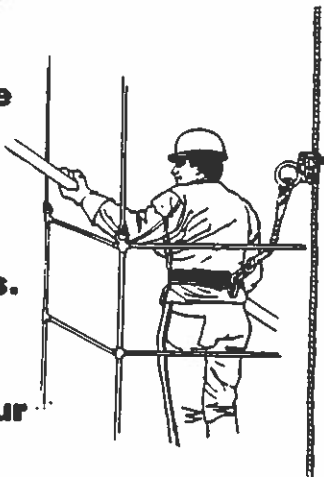
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