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SMARTEN UP!

Is your job cramped by old fogy ways?
Output low? Bogged by many delays?
May not need to work harder,
But just try working *smarter!*

. . . . . .

Shake Off the Blahs!

EVER get the feeling that your department is in the doldrums? Do you get the idea that your operation is not progressing as it should—that production is not improving as you'd like?

Perhaps a thoughtful reappraisal of your management methods, held over from the techniques of decades ago, may reveal spots in your pattern that need refurbishing. You can find lots of valuable help in such an effort if you'll take advantage of the excellent talent all around you—your crew! If you have encouraged their cooperation and have inspired their wholehearted dedication to the job, they will have many excellent ideas for improvement.

As a break from such serious problems, why don't you try for a little fun—and profit—by finding a clever finishing line for the incomplete limerick above. Be sure to use a post card (no envelope), giving your name, address, firm name and position. You may win $10, or one of 15 $1 runner-up prizes. Remember: NO ENVELOPE!

Mail your card before August 20 to INDUSTRIAL SUPERVISOR, National Safety Council, 444 N. Michigan Ave., Chicago, IL 60611 U.S.A. Winners will receive prizes by mail and will be listed in our October issue. No other entries will be acknowledged. No duplicate prizes shall be awarded. In case of ties, early postmark will win. Decision of judges will be final.

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Courtesy NSC

April Limerick Winners

Winner of the $10 top prize in our April safety limerick contest was **Debbie Brehun,** secretary for the West Penn Power Co., Loyalhanna Division, in Latrobe, PA., who completed the verse in this manner:

If you're drowsy while driving, take ten,
And resume your safe trip only when
You're awake and alert,
So no one will get hurt.
We would all like to see you again!

Fifteen winners of $1 runner-up prizes were **A. V. Angove,** admin. asst., St. Louis Ship, St. Louis, MO; **Jose P. Bernardo,** supvr., social responsibility, Victorian Milling Co., Vicmico, Negros Occidental, Philippines; **W. E. Dreeszen,** info. & security mgr., Ames Laboratory, USERDA, Ames, IA; **Ron Tremblay,** bldg. inspector, City of Salinas, KS; **Nancy E. McLean,** recpt., General Refractories Co., Warren, OH; **M. R. Troupe,** Thiokol Corp., Huntsville, AL; **Kathryn E. Vauthrin,** clerk-typist, City Health Dept., San Antonio, TX; **Lee T. Saunders,** sr. saf. engr., Georgia Power Co., Macon, GA; **Jeanne Rutherford,** T/M, Burwood Products Co., Traverse City, MI; **Alan Brahm,** line supvr., Hallmark Cards, Overland Park, KS; **Barbara DeMars,** reports asst., Rochester Telephone Corp., Rochester, NY; **James T. Orrell,** jrnymn. meterman, Arkansas Power & Light Co., Hot Springs, AR; **Helen Miller,** admin. svc. clerk, Federal Aviation Administration, Reno, NV; **Joan M. Stadler,** area clk., Omaha Public Power District, Humboldt, NE, and **Bradley H. Rahn,** clk., Michigan Cons. Gas Co., Ann Arbor, MI.

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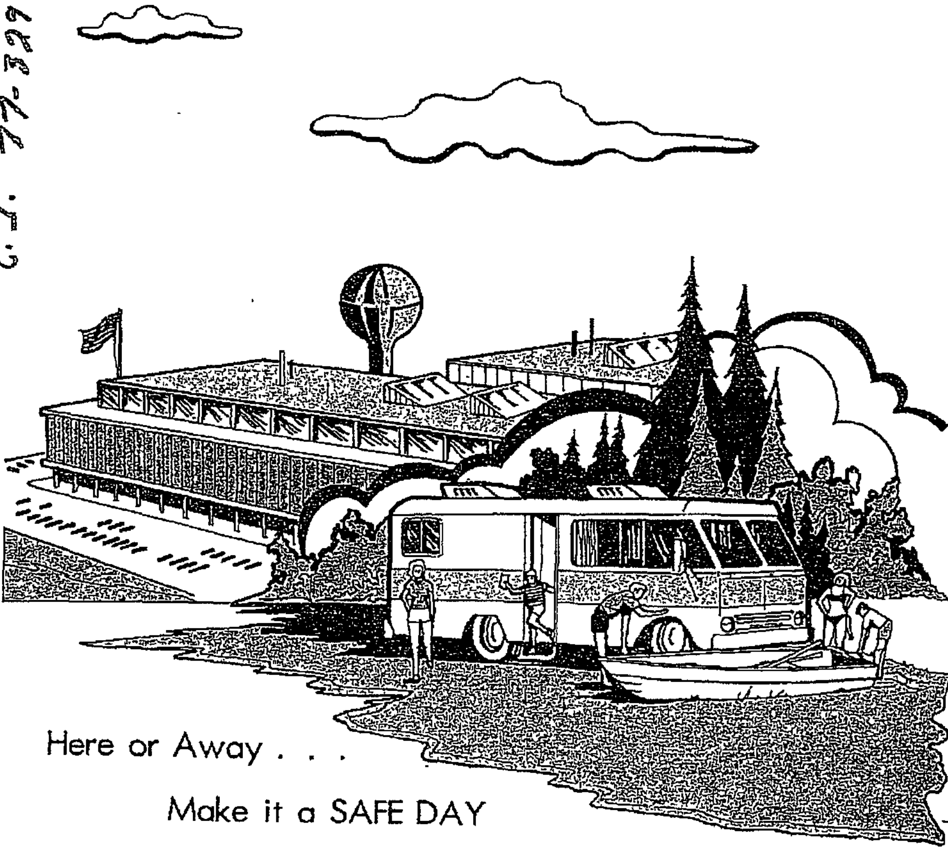
INDUSTRIAL Supervisor

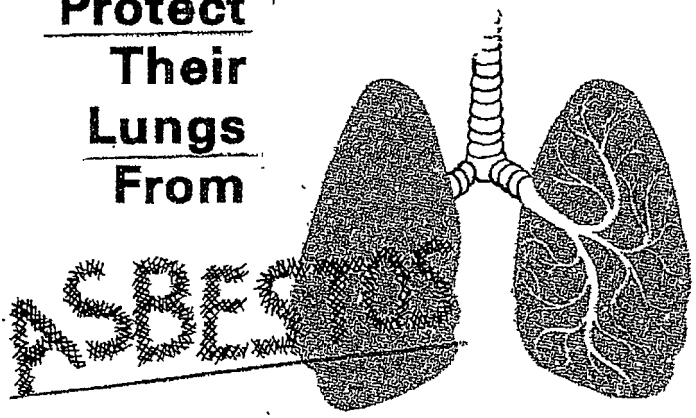
JULY 1977



Here or Away . . .

Make it a SAFE DAY

Protect Their Lungs From ASBESTOS



By Jean Spencer Felton, M.D.
Medical Director
Long Beach Naval Shipyard

LONG considered safe and protecting, asbestos is now viewed as a material extremely hazardous to the worker. Although known for centuries, and having served as an important substance in our economy for nearly a century, medical science has learned in recent decades of the harmful effects of this valuable industrial commodity.

Asbestos has had well over 3,000 useful applications, some of which have been seen in building siding, brake linings, insulation, safety curtains, filter cloths, bench tops, and spackling compounds.

Considerable quantities, in appropriate mixtures, have been sprayed into plenum spaces and onto ceilings as a fire protectant in modern construction.

Serious exposure has been encountered among occupants of these structures, among workers at the time of demolition of buildings, and among personnel involved in the ripout of insulation or ceiling covers in dormitories, schools, ships, and public office housing.

Chemically, asbestos is a crystalline, hydrated mineral silicate made up of fibers of high tensile strength and various lengths which are flexible and long lasting, with the unique characteristics of fire and heat resistance. Its worth lies in its ability to cut energy loss, to mini-

mize heat stress of workers in hot workrooms, and to protect personnel from thermal burns.

Mined primarily in Canada, the United States, Russia, and Africa, it goes under a variety of names, depending upon type, such as amosite, crocidolite, chrysotile, and tremolite, among others.

Observers in ancient Greece and Rome described a sickness of the lungs of slaves whose work was the weaving of asbestos into cloth. But it was only in this century that research pinpointed the real dangers to humans and identified the diseases connected with its use.

Scarred Lung Tissue

The primary condition resulting from work with asbestos and the inhalation of its fibers is *asbestosis*, a scarring of the lung tissue. This change may follow brief exposure or may not appear until many years after first work contact.

The first sign seen in x-rays of the chest usually is a thickening of the pleura, the thin, smooth, well-lubricated lining of the chest cavity.

When the fibers cause changes in the lungs, these alterations are seen most frequently in the lowest parts of the lungs. The scarring that results is called fibrosis and it lessens the ability of oxygen to pass from the air inhaled into the lungs to the circulating blood. After many years, there is a gradually increasing shortness of breath, even with mild exertion. Smoking hastens the development and severity of asbestosis.

A second illness that follows the breathing in of asbestos fibers is cancer of the lung, a possibility definitely increased by smoking. The third disorder is a rare tumor, called mesothelioma, a cancer which develops in the lining of either the chest cavity or the abdomen. While identified years ago as a malignant growth, it was only after going back into medical records that it was found related to the inhalation of asbestos fibers. Usually, it follows exposure to the crocidolite variety rather than to the others used in industry.

Lastly, cancer of the digestive tract, stomach, rectum, or colon has been found to occur more frequently in asbestos workers than in other persons of the same age and sex, but who are in different occupations.

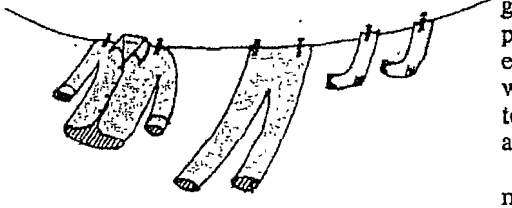
A time connection between exposure to asbestos dust and disease onset has been roughly established as follows: Asbestosis, 10 - 20 years; Lung Cancer, 15 - 25 years; Mesothelioma, 20 - 45 years.

One must remember that there is this latent period, or time delay, before changes develop. Implied in this fact is the great need for prevention.

Several measures can be taken to eliminate the disease changes. Wherever possible, asbestos should be eliminated from the work process. In a few situations only, no satisfactory substitute has been found that can resist a high level of heat. Fibrous glass has replaced asbestos in many uses, and research is going on now to determine the safety of this material.

Particularly during ripout procedures, the insulation being removed should be wetted down so that no fibers will be free to be inhaled. All removed material must be placed in plastic bags, labelled,

and sealed for removal to safe disposal areas for burial. Exhaust ventilation in the form of sucker lines and collectors must be used. Under no circumstances should streams of air be used to blow the dust away.



Protective clothing must be worn. Disposable coveralls are available. If work clothes are used, they must be laundered by the employer, and under no circumstances should they be worn home, because the garments can contaminate one's residence and create a hazard for other members of the family. Cases of disease have been reported in adults who, as children, were exposed to their parents' dusty work clothing.

Most important is the use of respiratory protection in the form of self-contained air supply units, air-supplied masks or hoods, or less valuable, as disposable face respirators. All areas where asbestos fiber is present in the air must be identified by signs.

The Williams-Steiger Occupational Safety and Health Act of 1970 called for health standards to be issued by the Secretary of Labor, and the Asbestos Standard was the first promulgated. Medical requirements are built into the standard, which call for periodic physical examinations, including chest x-rays and lung function studies. Also provided are the levels of fibers allowed in workroom air and the kinds of environmental measurement to be utilized by industrial hygienists. Records of sampling, examinations, and related activities are mandatory.

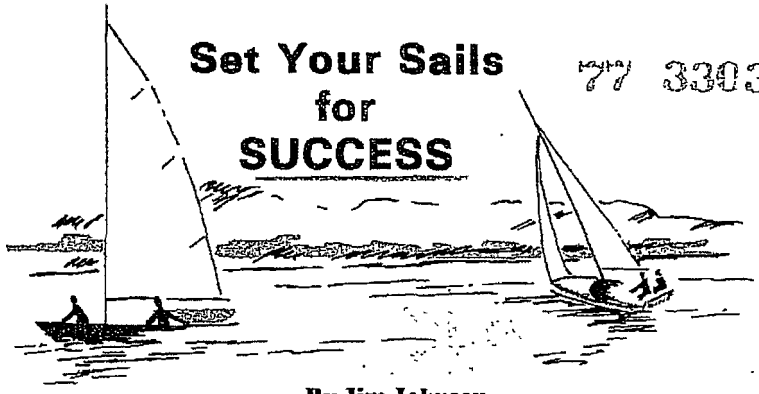
In no other area of human conservation does the supervisor have greater responsibility than in the prevention of asbestos-related diseases. He or she must be familiar with the health hazards of the asbestos fiber and the asbestos content, if any, of the work materials.

The supervisor must ask for engineering controls when they are indicated—must seek alternative work substances if they are available—must ascertain that wet methods are utilized for dust control, and must educate all employees in the safe work practices required for asbestos handling. Further, it is necessary to determine not only that respiratory protection is available but *is used*.

The supervisor is responsible also for determining that employees keep appointments for medical examinations, and that they know of what is found following both environmental and clinical monitoring. If disease is suspected in old timers, the supervisor must arrange for their examination, and if retirement is the answer to job-caused disability, should know the steps needed for filing a work injury claim and the applications required for the particular retirement systems involved.

In short, the supervisor must be thoroughly familiar with asbestos and enforce the use of all precautions. He or she should not be guilty of sacrificing workers to the ravages of the work disease of "White Lung" and its extremely serious complications.

Set Your Sails for SUCCESS



By Jim Johnson
Director of Personnel
Houston Belt & Terminal Railway Company
Houston, Texas

IS your attitude showing? Maybe you've heard someone ask the question in jest; but seriously now, just how important *is* your attitude?

Did you know that your inner attitude affects your appearance, your health, the way you conduct your business—and even causes similar attitudes or adverse reactions among your family, friends and co-workers?

The term "ill feelings" toward someone or something is appropriately named. It is a sick attitude, one that does more physical harm to oneself than it does to the object of inner wrath.

And it is even more damaging when it is vented upon one's working environment: the occupation, the industry, or the supervision and fellow employees.

Taking the "healthy" attitude is so much better. People are easier to work with, the job is more tolerable, if not enjoyable, because of the sense of accomplishment it offers; and as the quality of your work improves, so does the "health" of your company and industry.

Success is the product of people thinking together, in a team effort, that success is their common goal. Each and every employee, from the chief executive on down, has as much at stake in the company as anyone else. If he fails, the company fails. If the company fails, all are out of livelihood.

There can be no failure where *success* is the attitude, and every employee relates the company's success to his own.

Take an interest in your company's affairs and place in the community. Don't perpetuate rumors about the company or its employees.

Take as much interest in your company as a stockholder would, because your fortunes are as directly related to the company's well-being as his are.

And take your good attitude home with you. Spread it around your family and community. Say positive things rather than griping about your work. Where would you—or they—be without it?

Think about it!!