Georgia-Pacific

intracompany memo

to	Mr. L. K. Ryder	location	Stamford	AUG 26 1974
from	R. L. McCallister	location	Portland	
subject	AKRON, NEW YORK - ASBESTOS EXPOSURE	date	August 23, 1974	

Ken mentioned to me upon his return from the east coast that you were not completely sure what was expected of you in connection with the asbestos problem at the Akron Board Plant.

First of all, we have had vital capacity and x-rays studies done by a local physician and you have the results of those studies. The first step you should take is to consult with that physician, review the findings and pin-point those individuals who have a present problem or an evident potential problem. Once having done that, solicit from the physician, his recommendations as to what steps should be taken to properly protect those individuals he considers as in eminent danger of aggravating an already existing condition.

Secondly, review with Akron management, the information they have with respect to the extent of the exposure, what steps have been taken to protect the employees, and to reduce the risk of disease to an acceptable level.

Thirdly, although this should be done first, and probably prior to the time you visit the Akron Plant, consult with some asbestos processors of whom you may have knowledge, to review with them their criteria to reduce the risk.

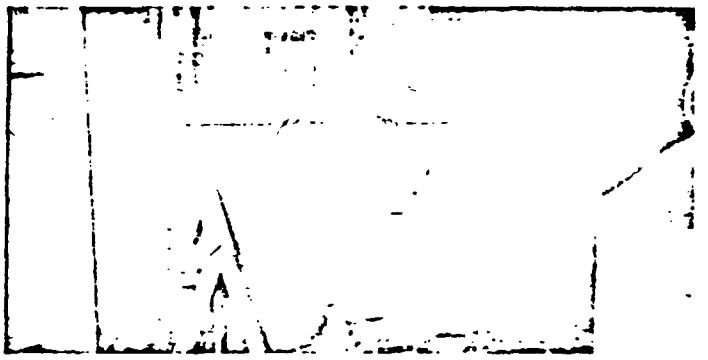
I have attached for your review, two articles taken from the California Safety News, "Asbestos Poses Health Hazard", and "Director H. Edward White Visits Asbestos Mine/Mill". The first article mentioned provides information of a type that probably is available from the New York Accident Prevention Regulatory Agencies and you might inquire of them regarding this problem.

Should you have any questions regarding this matter, kindly give me a call.

R. L. M.

RLM:mg
Enc.

ASBESTOS POSES HEALTH HAZARD



Worker using the industrial vacuum cleaning system.

Richard McGuire
Department of Health

Asbestos is a generic term that applies to a number of naturally occurring, hydrated mineral silicates incombustible in air and separable into fibers. The most widely used in industry is chrysotile (hydrous magnesium silicate) which accounts for 95% of world production. Other common types are amosite and crocidolite.

Under high magnification asbestos fibers resemble fine polished wire or strands of silk. When inhaled, these fibers can produce several debilitating illnesses that develop over a long period of time. Asbestos exposure may lead to asbestosis, to carcinoma of the lungs and digestive tract, and to mesothelioma.

Since the recognition of asbestosis 70 years ago, the disease has been widely studied the world over. Asbestosis, a pneumoconioses—lung disease caused by dust inhalation—develops around asbestos fibers trapped in the lower bronchioles of the lungs. Scar tissue that forms around the fibers spreads throughout the lungs and pulls it out of shape. The working space for air exchange is reduced; breathing becomes difficult and, in advanced stages, can be disabling. The strain on the heart caused by the lack of oxygen may cause heart failure.

Recent studies indicate that asbestos also may be a potent cancer-producing (carcinogenic) substance. Although most cancers linked to asbestos develop in the lower portion of the lungs where the concentration of the fibers is the heaviest, cancer may also develop in the gastrointestinal tract. The peril of lung cancer due to the combination of asbestos exposure and smoking is especially severe.

In addition, mesothelioma, a rare and rapidly fatal cancer that attacks the membrane lining of the chest cavity, lung, or abdominal cavity, is associated almost exclusively with asbestos exposure.

For these asbestos-related diseases, there is no known treatment; however, if problems are diagnosed early, exposure levels can be reduced and complications treated.

Almost one million tons per year of asbestos are used in the U.S. Approximately 70% of the asbestos is used in the construction industries. Much of the asbestos used in the construction industry is firmly bonded; i.e., the asbestos is "locked in" such products as floor tiles, asbestos cements, and roofing felts and shingles. The remainder, about 50,000 tons, is in powder form, present in insulation materials, asbestos cement powders, and acoustical products. As expected, these products generate more airborne fibers than the firmly bonded products. The automotive and textile industries are the major nonconstruction users of asbestos products. These industries utilize asbestos in friction material, such as brake and clutch linings and fire-resistant material like protective clothing and curtains for schools.

Workers in many occupations encounter serious asbestos exposures. Among the establishments most likely to have asbestos risks are those manufacturing or handling asbestos-containing products. In addition, secondary exposures occur to nearby workers when airborne asbestos fibers are generated.

In developing the standard to protect the worker, the criteria is to reduce the risk of disease to an acceptable level. The danger varies depending upon the intensity of asbestos dust, fiber characteristics, individual susceptibility, presence of other pollutants, and the dose response. To achieve these needs, the following standard has been promulgated:

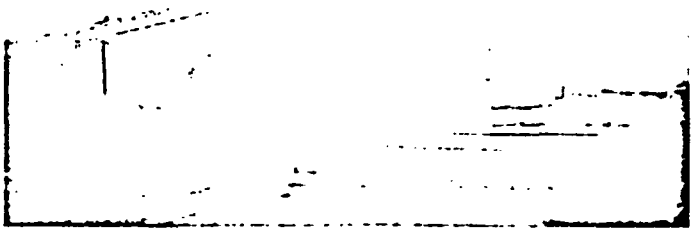
> The time-weighted average concentration levels for the 8-hour workday shall not exceed 5 asbestos fibers, longer than 5 micrometers, per cubic centimeter of air. The ceiling or short-time concentration to which employees are exposed shall not exceed 10 fibers per cubic centimeter. The standard further describes the steps to be taken for protection against asbestos dust.

Exposure is to be controlled via:

1. Engineering methods to prevent the escape and spread of floating dust, such as isolation of dust-producing operations and exhaust ventilation systems.
2. Improved work practice; for example, wetting down asbestos before handling to prevent airborne fibers.
3. Caution signs and labeling—all products containing asbestos fibers not permanently bonded or contained must be labeled appropriately.
4. Use of personal protective equipment, such as respirators when engineering controls are not feasible.
5. Housekeeping; i.e., vacuuming garments and workplaces rather than dry-sweeping or blowing with compressed air.
6. Medical surveillance to show whether employees are receiving adequate protection from the dangers of asbestos. Surveillance includes regular physical checkups, careful record keeping for employees working with asbestos and medical evaluation as to when dangerous signs appear.

Thus, the proposed occupational standard complements the ambient workplace exposures with reasonable control procedures that will insure protection for the worker.

Director H. Edward White Visits Asbestos Mine/Mill



Mill building with a covered feed conveyor in foreground.

H. Edward White, Director of the Department of Industrial Relations and Andrew Brozik, Safety Engineer with the Division of Industrial Safety, visited the Pacific Asbestos mine and mill near Copperopolis, California to observe safety conditions. It is the largest combination mill/mine asbestos producer in the United States. Because there are many safety problems involved with asbestos (it is among the top six toxic inhalants on the NIOSH list), Director White wanted to make an on-the-spot survey of possible hazardous conditions in California's asbestos industry.

Director White and Mr. Brozik were greeted by President of Pacific Asbestos, Robert Littlejohn. Prime guide during the day was Mr. Eric Loeb, Director of the Environmental Department of the company.

The mine is about 14 years old and may have a life of another 10 years. There are some 220 employees on the job in both the mill and the mine. The mine is located a short distance from the mill and general offices. It is an open pit mine. The method of mining is a multi-benching system which provides safe ground control.

Serpentine, a rock containing asbestos fiber, is drilled, blasted, loaded into trucks, and hauled to a crushing and screening plant (preparation plant). The material is then conveyed to the mill by several conveyor belts. The asbestos is processed through horizontal and vertical kilns, screens, and sifters. Vibrating screens separate the fiber from the rock. An air suction hood picks up the light fiber. The heavier rock drops below.

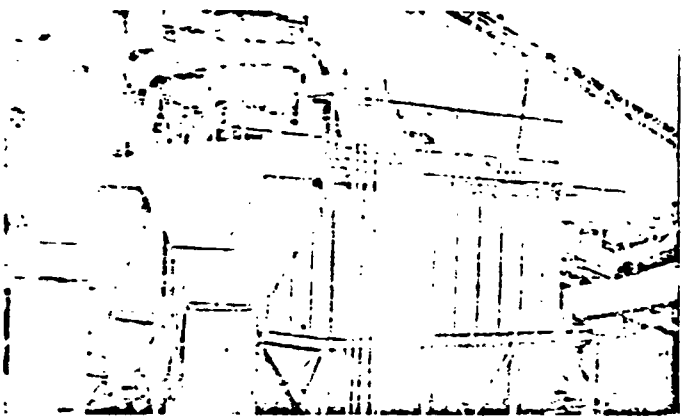
Asbestos fiber is graded 1 through 7 for quality. Number 1 fiber is the longest and best. Number 7 is the shortest and lowest in quality. Number 7 asbestos fiber costs about $40 a ton. Number 1 approaches $200. Price is essentially set by the Canadian asbestos operation which produces 95% of the free world asbestos. Canadian operations are centered in Quebec, Canada.

Director White noted that attention is given to environmental health and safety practices in the mill. Control of asbestos dust is essential to good health and there is dust control equipment throughout the seven story mill. Employees are required to wear approved respiratory equipment when they are occasionally exposed to asbestos fibers exceeding the threshold limit value. In the laboratory where testing of the asbestos is done, a large exhaust hood is under construction to protect the workers from fiber exposure.

Director White was told that, interestingly enough, the areas that would seem to be the most hazardous from the dust point of view seldom are. For instance, where they bag the compressed asbestos there was evidence of much fiber on the floor but not in the breathing zones of the workers.

Periodically, tests are conducted of dust content. Certain employees are chosen to wear a unit which sucks in air samples for later analysis under the microscope.

Blasting occurs two or three times a week. Pacific Asbestos alerts the surrounding countryside of pending blasts. Balloons are sent aloft to check the wind direction. Director White observed a blast from the rim of the mine.



New bag houses installed for in-plant dust control as well as air pollution control.

The blast area is prepared by drilling a number of vertical holes approximately 30 feet deep. These holes are loaded with ammonium nitrate blasting agent and a booster for ignition by electricity. The wires are shorted until ready for blasting to avoid accidental discharge through static electricity or stray currents. When the area is ready for the shot, two blasts of the siren occur and this is the signal that in five minutes the shot will go off. After the explosion, the superintendent goes into the area to be certain all went well. He then returns to the control booth and sounds the all clear siren.

During the tour Director White discussed the function of the Division of Industrial Safety with individual employees and with small groups of workers. The benefits of the tour were twofold. The Director gained a better understanding of asbestos mining and milling. His personal appearance at a mining operation, the first any director has ever made, reflected good will to the operators. Director White and Mr. Brozik felt that more than ever, the operators would be concerned with employee safety.