tion of these fibers under the microscope is not always possible, especially when the fibers are short and fine. Several samples obtained with the Owens jet apparatus were examined with a petrographic microscope in order to estimate the proportion of asbestos and cotton fibers, but no satisfactory technique could be developed for this purpose."

Table 4 on page 23 demonstrates that very few fibers were encountered in the samples collected. One to eight per cent were observed in crushing, twisting, carding, and picking operations, while 12 per cent in one plant, 26 per cent in another were present in weaving operations. A biological phenomenon might have relevance here; there is frequently a differential retention which varies with the concentration of the inhaled material. Thus, if many fibers were inhaled and only a certain per cent retained, there is no insurance that with a small number of fibers inhaled only a small per cent will be similarly retained — it may be very much more.

At the time of the study, correlation was made with disease and dust counts observed, with exposure presumed to have taken place 5 to 15 years before. In two of the three plants there had been no major change and presumably the dust counts were unchanged from the onset of exposure. However, in one plant exposure was probably higher at the time of the examination because of plant expansion than when men were being exposed. Page 32 states "Hence, it may be assumed that the exposures of all occupations in plant B following carding were probably higher during the study than prior to expansion." About 15 months before this study was begun, approximately 150 workers in these asbestos textile factories were replaced by workers with little or no previous asbestos exposure (page 46). Although an effort was made to examine as many as possible of these former workers, a majority could not be examined. Partly as a result of these personnel changes, the group of employees examined in this study had an unusually low average age. There was an abnormally large percentage of workers with less than five years' employment in the asbestos textile industry and an abnormally small percentage of persons who had worked 10 years or more in this industry. On page 47 we read "The average age of white male industrial workers is less in the asbestos textile factories studied than it is in 14 other industries in which the Public Health Service has made similar studies." The book *Silicosis and Asbestosis* by Lanza[1] states on page 173 "In some roentgenograms of asbestos factory workers seen with Dr. Lanza, we noted that there was a direct progression into a terminal diffuse fibrosis without any nodular predominance. This terminal state seemed to have been reached in about 20 years on the average." On page 186 we find "Merewether and Price state that, with continued exposure to high concentration dust, fibrosis may be fully developed in from seven to nine years, and that death may result in about 13 years. With less concentration, fibrosis may not be fully developed for 15, 20, or 25 years." Yet,

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