

ANNUAL REPORT

INDUSTRIAL HEALTH SECTION

1947

Plant Surveys

A total of seventy-seven surveys of health conditions was conducted in the plants of our Group policyholders by the members of our Industrial Hygiene Laboratory during the year 1947. This represents an increase of 92 percent over the number made in 1946. These surveys were all made at the request of our Group policyholders and were either complete surveys of plants never before visited, or were recheck surveys to enable the plant management to determine whether or not healthful conditions of employment were being maintained.

As in the past, the report of findings includes recommendations for controlling any hazardous conditions found in the plant and it has been our experience that management has always been rather diligent in following our recommendations in an effort to make their working places as healthful as possible. The number of employees insured by these seventy-seven plants amounts to approximately one hundred thousand. As these are all Group certificateholders, and very often Industrial policyholders as well, any improvement in plant health conditions will be reflected in our Group and Industrial claim experience.

The following are some representative plants surveyed:

Armstrong Cork Company

Brown Company (10 plants)

General Electric Company

(21 Divisions of the Schenectady Plant)

Mount Vernon, New York plant.

Elstra Foundry Company

Fort Wayne, Indiana plant

Johns Manville Company

(Recheck surveys of a number of plants)

PLAINTIFF'S
EXHIBIT

ML-4823

PLAINTIFF'S
EXHIBIT
MET-432

00559

Republic Steel Corporation
(Recent surveys of a number of plants and special studies on the toxicity of new compounds used)

Rochester Gas & Electric Company
(Recent survey and a study of atmospheric conditions in the City of Rochester which will extend over a period of about three years)

Phillips-Jones Corporation

Raybestos Division of Raybestos-Manhattan, Inc.

Laboratory Analyses

The samples collected in the plants and sent to the Home Office for analysis necessitated making 4,573 separate analyses. This number represents an increase of approximately 83 percent over the 1946 total.

Silica and asbestos determinations, including dust counts, accounted for approximately 75 percent; about 12 percent were for determinations of such metals as copper, lead, manganese, mercury, chromium and miscellaneous metals; 6 percent for acids such as nitric, hydrochloric, hydrofluoric, sulfuric, etc.; about 7 percent for solvents such as benzol, toluol, xylol, trichloroethylene, trinitro-toluol, etc.

Home Office Inspections

The Industrial Health Section and the Laboratory of Industrial Hygiene have continued to make periodic sanitary and industrial hygiene inspections of the Commissary Division. These inspections include methods of preservation of food refrigeration, food handling and disposal, dish washing, vermin control, and cleanliness generally.

Lighting and Ventilation Complaints

During the year, Dr. McConnell received forty-five complaints of poor lighting and ventilation conditions in different parts of the Home Office buildings. He made inspections and submitted recommendations for improvement.

Travel Credit

The amount of credit received from our Group policyholders during the year amounted to \$4069.03. This represents incidental expenses of travel and maintenance in the field incurred by our laboratory technicians while surveying the individual plants. In addition to this amount, the General Electric Company paid for laboratory fees. The Group contract with the General Electric Company does not include service, so it was necessary to take a toll in charge of \$300 for laboratory work, as well as for travel and maintenance. There is an additional amount of \$4059.62 outstanding which has been billed and not paid for by the policyholders. Therefore, \$4921.71 represents the amount of money returned to us by our policyholders in connection with their plant surveys and which is credited against our travel allowance.

Special Formulas

One thousand one hundred and twenty-five (1,125) formulas were received for information and assistance on industrial and general health subjects during the year. This is an increase of 67 percent over 1924. The majority were received by mail, but a number of representatives of Group policyholders came to the office for advice and assistance from all parts of the United States. Visiting physicians and representatives of industries also came from South America, Norway, Belgium, Great Britain, Switzerland and Czechoslovakia. Many of the requests were for information on the control of injurious substances used in the plants of our policyholders. Our advice on the value and cost of installing

medical departments and first aid rooms was requested frequently. The nature of the requests is very varied and the following are listed to give an idea of the ranges:

The Medical Director of an automobile manufacturing concern requested information on the possibility of lead poisoning produced by the application of molten solder to dented body stampings.

The Personnel Director of a firm in New York City requested the names of convalescent homes to which his secretary could go.

The Director of Safety of an asbestos manufacturing company in the East sent in a list of materials used in their Rubber Department. A number of employees in this department had developed dermatitis on the arms and forearms. He pointed out the substances in this mixture which could be the cause of the dermatitis and advised methods of control.

The Director of Personnel and Planning of a life insurance company in Hartford asked for information on the value of deodorants for use in ventilating large areas.

The President of a plumbing supply company in Pennsylvania requested information on the effect on health of fluorescent lighting.

The Treasurer of a large clothing manufacturer in New York City requested information on the toxicity of methylene chloride, acetone, and ethyl acetate.

The Personnel Director of a manufacturing company in Elizabeth, N. Jersey requested information on the benefits which might be expected from the use of glycol vapor or ultra violet rays for reducing cold contagion in office and factory areas. This is a subject which is receiving considerable attention at the present time. We have received hundreds of such requests.

An official of a large woolen company in Passaic, New Jersey wanted information on the date of the start of the Fall hay fever season in New Orleans.

A request was received from one of the executives of an electric corporation of Batavia, New York for information on the results of the studies made by Dr. Kempter in the rice-fruit diet treatment for hypertension.

A nurse in a large textile manufacturing company in Chicago requested information on anthrax.

The Medical Director of a chemical company with headquarters in New York came to the office for information on a number of their occupational disease claim cases.

The Medical Director of an industrial concern in Oslo, Norway wrote for the methods of cold prevention in industry, as well as health education among employees.

A chemical company in Niagara Falls, N. Y. requested information on mercury poisoning and precautions in handling mercury.

Another chemical company in New Jersey requested information on the installation of a medical department for two of their subsidiary companies.

The Medical Director of one of our Group policyholders came to the office to discuss a number of occupational disease suits filed by former employees who have worked on the atomic bomb project. Typical of the diseases alleged to have been contracted by these employees are cancer, tuberculosis, and dermatitis, as well as various harmful irradiation effects.

A large nationally known chemical corporation requested information on studies of dust fall and determinations of dust counts and particle size distribution of dusts.

During April, due to the publicity given to the necessity of inoculating employees for smallpox, approximately thirty companies in New York City requested our assistance in vaccinating their employees.

A glass company in Minneapolis, Minnesota has sent information on the prevention of health hazards in radium dial painting processes. This company was planning to install a building for this work and was anxious to know how to forestall any hazards.

The Medical Director of a large electric company was given information regarding the toxicity of furfural and trichlorobenzene.

Dr. McCormell read and interpreted during the year a large number of X-rays of the chests of employees of our Group policyholders. Some of these were for series of films taken yearly over a period of years.

All requests for health advice as a result of our Radio Broadcasts are referred to the Industrial Health Section for reply. These people not only ask specific questions on the disease or condition discussed over the radio, but also on any disease with which they believe they are suffering.

Literature

Four thousand eight hundred and eighty-three (4,883) copies of our booklets were sent out during the year upon request. This is an increase of 32 percent over 1946.

Publications

The booklet "Protection of Workers Exposed to Chromium and Its Compounds" was completely revised during 1947 and was sent to those interested.

"Industrial Hygiene and Safety" has undergone a complete retitling and is now called "Metropolitan Services in Industrial Health and Safety". The services available to our Group policyholders are discussed in detail. These include the services of our Laboratory of Industrial Hygiene, consultation service, nursing and statistical services.

The leaflet "Prevention of Oil Pimples" was partially revised during the year.

Dr. McConnell prepared a chapter on Industrial Diseases for a new publication to be known as "The Book of Science" which is being published by the publishers of "The Book of Knowledge".

Committees

During the year, members of the section were asked to serve on the following committees. These are in addition to the number of existing committees.

Dr. McConnell was appointed by the Secretary of War to act as Consultant to the Surgeon General in matters pertaining to Occupational Health and Industrial Hygiene.

Dr. McConnell was asked to serve again on the Committee on Atmospheric Comfort of the Industrial Hygiene Section of the American Public Health Association.

Dr. Lanza was asked to serve on the Committee on Medical Care for Faculty and Employees of the National Conference on Health in Colleges.

Dr. Lanza was asked to serve on the Medical Advisory Board of the United Mine Workers of America.

Dr. Lanza - Sub-committee on Silica of the American Standards Association (Chairman).

Dr. Lanza - Committee on Industrial Cancer of the New York State Department of Labor.

Dr. Lanza - Consultant in Industrial Health for the Physical Medicine Rehabilitation Service of the Veterans Administration.

Mr. Fernald was asked to serve on the Committee on Metallic Poisons of the Industrial Hygiene Section of the American Public Health Association.

On June 3, 1947, New York University inaugurated an Institute of Industrial and Social Medicine as a unit of its New York University-Bellevue Medical Center. The full program of the Institute includes the following broad headings: (1) the specialized training of experts in industrial medicine; (2) expansion of present training methods in the problems of industrial health; (3) research in industrial toxicology; (4) research in industrial physiology and psychology; (5) research in tropical medicine; (6) research in social medicine; (7) statistical research; (8) a model program of comprehensive medical care and prevention; and (9) rehabilitation of industry's disabled and handicapped and getting sick workers from bed to job faster. Beginning on January 1, 1948, Dr. Lanza will devote half time to this project and on January 1, 1949, he will devote his full time.

Field Trips

In addition to field visits for the purpose of conducting plant surveys, the staff made thirty-seven field trips to the offices of Group policyholders in the United States and Canada; to government departments and other health organizations for consultation and conferences.

While Dr. McConnell was in Canada in May, he secured for Dr. J. F. Coleman of the Group Actuarial Division additional information on the Johnson's Company, Ltd. and the Bell Asbestos Mines at Thetford. He reviewed a large number of X-rays of men working in the mines and made a study of type and class of employee, general living conditions, percentage of French-Canadians, etc. in order to determine whether the asbestos industry was responsible for the high incidence of tuberculosis. It was found that while the incidence of tuberculosis is high, the cause was due to lack of provision for proper isolation and care of early cases.

Meetings Attended

Dr. Lanza

Dr. Lanza attended fourteen meetings during the year and made addresses at several of them. Among the more important were a talk to the new Institute of Occupational Medicine and Hygiene at Yale University; a talk on Industrial Medicine to the Morgagni Society of Brooklyn. He also gave a talk on Heart Disease and showed our film on Heart Disease at the Rotary Club at Peoria, Ill.

The following are among a number of the other meetings he attended:

Medical Advisory Committee of the Health and Welfare Fund
of the United Mine Workers Association.

The Legal Committee Meeting of the Industrial Hygiene
Foundation.

Meeting of the Board of Trustees at the Saranac Laboratory.

Meeting of the Special Committee on Industrial Medicine of the New York County Medical Society.

A Meeting of the National Conference Board to discuss union funds.

Dr. McConnell

Dr. McConnell attended several meetings during the year as follows:

Annual Meeting of the Industrial Hygiene Foundation of Pittsburgh.

Symposium on Beryllium Poisoning and Shaver's Disease at Saranac Laboratory for the Study of Tuberculosis at Saranac Lake, New York.

Annual Meeting of the American Public Health Association.

Annual Meeting of the American Medical Association.

Annual Meeting of the Home Office Life Underwriters Association.

Annual Meeting of the Greater New York Safety Council (attended by all members of the Laboratory Staff as well).

Attended a meeting of the Pennsylvania Industrial Health Association at Williamsport, Pennsylvania, and gave a paper on "How a Plant Medical Service Can Help Industry".

Mr. Fehnel

Mr. Fehnel attended the following meetings:

Symposium on Beryllium Poisoning and Shaver's Disease at Saranac Laboratory for the Study of Tuberculosis at Saranac Lake, New York.

Annual Meeting of the Industrial Hygiene Foundation of Pittsburgh.

Annual Meeting of the American Public Health Association.

Annual Meeting of the Greater New York Safety Council.

Mr. Ferry of the Laboratory Staff visited the Plant of the Ciba Pharmaceutical Company at Summit, New Jersey and gave a talk for a group of employees

and supervisors of the Chemical Manufacturing Section. The subject of his talk was "Safe Handling of Chemicals and Solvents". Particular emphasis was placed on materials most widely used in the plant and on hazardous conditions or poor operating practices which were noticed at the time Mr. Ferry conducted the survey of this plant.

Mr. Ferry also attended the Industrial Hygiene Foundation meeting at Pittsburgh.

Testimonials

There are attached a number of letters testifying to the value of these services.

A number of our Group policyholders, whose plants have been surveyed in the past year, have spent considerable money to make improvements in the working conditions in their plants with respect to control of hazardous fumes and dust.

One plant is now in the process of being resurveyed to determine the efficiency of these control methods. Another company has already spent \$25,000 and is contemplating further expenditures to carry out our recommendations. After their control program has been completed, we shall resurvey the plant to see if exhaust equipment is effective.

During the course of a survey, we discovered that a Group policyholder was experimenting with a new soldering flux and planning to use it extensively throughout the plant. Analysis showed the material to be principally aniline phosphate which was decomposed by heat to form aniline or diphenylamine. The management was warned of the great danger involved in exposure to aniline and

it was recommended that the new flux be used only with suitable local exhaust ventilation.

In the City of Cleveland the labor union requested Mr. Dymor, the Head of the Industrial Hygiene Division of Cleveland, to conduct a survey in steel mills to determine if the addition of sodium fluoride to molten steel created a hazardous condition for the workmen. We conducted a joint survey with the Division of Industrial Hygiene of Cleveland. Since that time, the United States Public Health Service has been requested to make a more extensive study. The Industrial Hygiene Section of the Metropolitan will be working in cooperation with the Public Health Service on this study.

Tristethylene Glycol Study

This study of treating the air in certain areas of the new building with tristethylene glycol as a method of air sterilization continued during 1947 and will continue during most of 1948. ✓

Fluorescent Lighting Study

An experimental fluorescent lighting installation on the fourteenth floor of Unit No. 1 was recommended by the Lighting Committee of which Dr. McConnell is Chairman. This experimental test area will be observed for several months for defects and complaints. If the installation proves adequate, recommendations will be made for similar installations on other floors of this building. ✓

SUMMARY OF WORK OF INDUSTRIAL HEALTH SECTION

DURING THE YEAR 1947

	<u>1947</u>	<u>1946</u>
Surveys conducted by Industrial Hygiene Laboratory.....	77	40
Analyses made in Laboratory	4,573	2,494
Home Office Inspections	45	62
Travel Credit	\$4069.03	
Outstanding Credit	4053.68	
Credit for Laboratory Work	<u>800.00</u>	
	\$4922.71	\$2405.26
Special inquiries handled by mail or conference	1,125	675
Literature sent	4,623	3,664
Publications completely revised	2	2
Publications partially revised	1	1
Publications written for outside organizations	1	1
Field visits in addition to plant surveys	37	36
Meetings attended by staff	22	61

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