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THE FACTORS UPON WHICH ITS EFFICIENCY DEPENDS.

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Three things are necessary to efficient public health administration: The man, the power, and the starting point. Having these, and a willingness to work for better public health, both on the part of the administrator and the administrated, good results are bound to follow.

The watchword of the age is efficiency—the doing away with haphazard methods and the substitution therefor of the methods of precision. Nowhere has this change been more marked than in the technique of preventing and eradicating disease. This change has taken the form of efficiency in public health administration. One might almost say that it has assumed the dignity of a science. Certainly it is the art of applying the principles of epidemiology.

Efficiency consists in the accomplishment of a given task in the minimum of time and with the minimum of effort. To accomplish this, it is necessary that one know exactly what he wants to do and that he have the power with which to do it. The knowing what you want to do, in public health work, is practical epidemiology, a knowledge of which is possessed by a relatively small number. The power with which to do it is legal and financial. Both are necessary.

Efficient public health administration comprehends the practical application of the principles of epidemiology. This can be done only by persons who have a knowledge of that science. Such knowledge requires time and labor for its acquirement. In other words, the only person who can efficiently do epidemiological work is an epidemiologist.

Eternal vigilance is the price of freedom from disease. The epidemiologist must, therefore, devote all of his time to his official duties. In epidemiology no man can serve two masters. Therefore, public-health officials must be full-time officers. They must be adequately salaried. At the present time there are very few epidemiologists who receive a salary which is commensurate with the

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knowledge and labor which are required for the proper performance of their duties. Public health is a rather expensive necessity, and if the general public wants it, it will find that it can not get it from poorly prepared, underpaid men. The corner stone of efficient public-health administration is the well-qualified, full-time, well-paid health officer. In the end it will be found that the employment of properly trained public-health officials at adequate salaries is a measure of economy. The inefficient health officer wastes public funds in poorly directed efforts, and he does not accomplish results. The health officer who has been well trained knows what to do and when to do it, and he accomplishes things with the minimum of friction and expense. The States and municipalities of this country are beginning to realize that in order to have their public-health work properly administered they must employ men of proper qualifications for this purpose, and there is, therefore, a gradually growing demand for well-trained health officers. The larger educational institutions are endeavoring to meet this demand by offering courses leading to the diploma of public health. This is the first step toward efficient public-health administration.

Granted an efficient public-health administrator, he is powerless without legal backing. This legal backing is sanitary law. Of sanitary law there is no dearth. The statute books of the States of this country and the ordinance files of the municipalities are strewn with a hodgepodge of sanitary legislation which is illogical, without sound basis of fact, and impractical of administration. It is a direct and tangible evidence of inefficiency in public-health legislation. The spirit in which this legislation was enacted was good and was the result of a desire to remedy insanitary conditions. Unfortunately, a great mass of the sanitary law was enacted at a time when we did not have any very accurate knowledge regarding the factors in the dissemination of disease. Take, for example, the laws which have to do with the exhumation and transportation of the dead. In some of the States if the sanitary law were enforced it would be impossible to move the body of a person dead of yellow fever, no matter whether that person had been dead for 1 day or for 20 years. In some States the transportation of the bodies of persons dead of smallpox is absolutely forbidden. Recently, in order to carry the bones of a marine who died of smallpox 10 years ago from the Pacific to the Atlantic coast, it was necessary to carry them by water to New York via Panama in order that there might be no infraction of State laws. Instances of this kind could be multiplied indefinitely. We all know that dead bodies have very little to do with the dissemination of disease, yet we permit these laws to stand on the statute books.

Idle laws are worse than no laws at all. Their lack of enforcement is a menace to all laws which it is desired to enforce, and instead

of strengthening the hand of the administrator, they act as a deterrent to efficiency. One of the most useful things which could be done in furthering the cause of public health would be a revision of the sanitary law, and the repeal of laws which are impractical of administration, or which if administered would defeat the purpose for which they were enacted. It may be argued that this would be a tearing down rather than an upbuilding process, and that in repealing these defective laws nothing would be placed in their stead.

In the great mass of sanitary legislation at present to be found on our statute books there is one notable omission. Few of the States have an efficient law for the collection of morbidity statistics. We have been marvelously illogical with regard to our vital statistics. We have collected data upon births, marriages, and deaths; none of which conditions is particularly dangerous to the public health, and have almost entirely lost sight of the sick man, who is the point from which most human diseases are disseminated. Once a person is dead, his dangerousness is lost, and so far as practical public-health work is concerned he is an almost negligible factor. It is the living carrier of disease which is dangerous. Morbidity reports, particularly of the communicable diseases, show the location of cases which constitute foci from which disease may be spread to the well. The collection of morbidity reports thus makes it possible to know where to take the proper precautions for the protection of persons who may be exposed to a given disease, and therefore acts as a prophylactic measure for the community at large. This has an intensely practical bearing, because it not only makes it possible to prevent the spread of disease, but also enables this to be done at the minimum expense and with the minimum of effort. This is efficiency in its highest phase. There is also a humanitarian aspect of the question. The knowledge of the occurrence of disease makes it possible to see that the sick receive proper treatment, not only from a preventive but also from a curative standpoint. Still another benefit accrues, particularly with regard to the diseases which are strictly environmental in character, as for example, industrial diseases. The knowledge, for example, of the occurrence of a large number of cases of lead poisoning in a given factory, points to the necessity for taking steps toward the protection of the health of the operatives there.

From the research aspect the collection of morbidity statistics is extremely important, because it enables careful study of the epidemiology of disease, and affords an opportunity of gaining increased information relative to its means of spread.

Morbidity statistics, from an administrative point of view, are of value to the local health officer in that they give him the knowledge upon which to undertake operations for the prevention of the spread of disease in his particular locality. The State health officer is able

to apply this knowledge in controlling the extension of disease from the infected locality to the State at large, and he finds that unless he has an accurate knowledge of the occurrence of disease within his jurisdiction, the most important functions of his office are seriously handicapped. The United States Government, in its work of preventing the interstate spread of disease, finds that morbidity information is absolutely essential. The question has even an international aspect, because one nation can not prevent the importation of disease from another without serious detriment to commerce unless it have precise information as to the international geographic distribution of sickness.

The collection of morbidity statistics requires first of all a proper legal backing. This means the enactment of a well-thought out law. A model measure of this kind was adopted by the Annual Conference of State Health Authorities, with the Surgeon General of the United States Public Health Service, at Minneapolis in 1913, and an attempt is being made to secure the passage of this law by the various State legislatures. The next thing which is necessary in collecting morbidity statistics is cooperation. This cooperation begins with the practicing physician. The law, of course, provides a penalty for infraction, but no penalty, no matter how severe, will make physicians report all their cases unless they earnestly desire to cooperate with the health officer in the prevention of the spread of disease. Every practicing physician of intelligence realizes that if he fails to do his duty in this regard he not only endangers the health of his patients and their families, but also that of the community at large. It is doubtful if any good doctor wants to assume the responsibility for neglecting to report his cases of communicable disease. Such an action would be in violation of the spirit of his ethical code and would reflect upon the integrity of his citizenship. He must cooperate with the health officer and the health officer must cooperate with him. This requires tact and a certain degree of charity. Above all, a spirit of cooperation is essential.

When physicians fail to report cases of communicable disease it is the result of ignorance, carelessness, or a desire to protect the interests of their patients. They would not be imbued by the latter desire if the general public were in thorough accord with the spirit of preventive medicine. It seems to the practical health administrator as though the most important single thing which should be taught in the campaign of public-health education which is now going on would be the necessity for making prompt and accurate morbidity reports. In this connection it may be pointed out that if the measures of quarantine, disinfection, and placarding are applied by the health officer with tact and charity much of the public opposition to reports of sickness would vanish.

Having the proper public-health administrator and legal backing, a third ingredient is necessary to efficient public-health administration. This is another form of power, that is, money. Public health can be bought at a price. Compared with the returns which it brings that price is not high. As a matter of fact, the dollar which is spent on public-health administration is an investment yielding a high rate of return to the public weal. This fact, simple as it seems to those of us who have studied the question closely, has not yet permeated the public mind, and sanitary appropriations are usually dealt out with a parsimonious and begrudging hand. The remedy for this condition of affairs is the education of our citizens to the point where they will appreciate the necessity for public-health work. We may lecture to them on the danger of disease, we may instruct them as to the means of its prevention, but we will never be able to bring them to a realization of the financial side of public-health administration until we are able to present an accurate credit sheet covering our work. It is necessary that the public-health administrator demonstrate in terms of dollars and cents that public health and public wealth are inseparable—that they are practically synonymous terms. The humanitarian aspect of the subject should not be forgotten, but it is of relatively small importance in a country in which the courts have fixed the value of human life at about \$5,000.

The value of cooperative effort can not be overestimated. Among people who do not earnestly desire health it is well-nigh impossible, without the use of force, to bring about sanitary reforms. The general public, particularly in America, is wonderfully good natured, and will undergo, without complaint, almost any inconvenience if it can be demonstrated that it is necessary. We have been carrying on a campaign of public education for years, and it is beginning to bear fruit. It is too much to expect that the sanitary administrator will ever arrive at a point where he has all the money and cooperation he could wish for, but if the signs of the times are aright, and if we will but carry on our work with intelligence and common sense, we will find that the citizenship of this country will willingly lend its assistance. Three things are necessary to efficient public health administration: The man—the well-trained, well-remunerated, full-time health officer; the power—the intelligent, uniform, accurate law, and the adequate appropriation; the knowledge of the location and prevalence of disease, in order that it may be controlled by the cooperative effort of the general public, the medical profession, and the public health administrator.

TRACHOMA IN STEEL MILL WORKERS.

AN INVESTIGATION OF THE ORIGIN AND PREVALENCE OF THE DISEASE AMONG THE EMPLOYEES OF THE YOUNGSTOWN SHEET & TUBE CO., YOUNGSTOWN, OHIO.

By J. W. SCHERESCHEWSKY, Surgeon, United States Public Health Service.

Introduction.

The Youngstown Sheet & Tube Co. is a corporation operating extensive steel works in East Youngstown, situated in the suburbs of Youngstown, Ohio. East Youngstown is a separate community, having its own local government and about 8,000 inhabitants, of whom some 60 or 70 per cent work in the company's mills.

It had been noticed for some time that there were a number of cases of trachoma among the employees of the Youngstown Sheet & Tube Co. The presence of the disease was discovered when such employees applied for treatment at the plant emergency hospital because they thought they were suffering from foreign bodies in their eyes.

The occurrence of trachoma among the factory personnel was reported by the company to the secretary of the State board of health, who in turn requested the Surgeon General of the Public Health Service to investigate the prevalence and origin of the disease.

The writer was detailed to perform this investigation, the results of which are set forth in the following pages.

Scope of the Investigation.

A preliminary conference was had with Dr. E. F. McCampbell, the secretary of the Ohio State Board of Health, at Columbus, Ohio. Through him it was learned that when the Youngstown Sheet & Tube Co. reported to the State board of health the presence of trachoma among their employees a medical officer was sent by the State board of health, who saw about 25 cases of trachoma in employees of the company, the diagnosis having been made by Dr. Hartzell, an oculist of Youngstown. These men had been dropped from the rolls of the company, and some of them were being treated at Dr. Hartzell's office.

At the time when the presence of the disease was discovered at the plant the community had become considerably excited over the danger. The cases were collected and segregated in the town jail. Later, however, they were discharged, and what had become of the patients could not be learned, though some of them had been returned to work by the company.

It was therefore determined to examine the eyes of as many as practicable of the factory personnel, in order to establish the rate of trachoma prevalence, and then to make an inspection of the sanitary conditions of East Youngstown (previously stated to be bad by Dr.

McCampbell), in order to see to what extent the disease was prevalent in that community, outside of the mills, as well as to note the general sanitary conditions and the existing opportunities for the spread of trachoma in schools and lodging houses.

The writer here desires to acknowledge the cordial cooperation of the Youngstown Sheet & Tube Co. in conducting this investigation, every facility having been extended for examining the mill operatives and assistance rendered in other ways.

Examination of the Employees of the Youngstown Sheet & Tube Co.

Number of employees.—When the mills are running full the company employs about 8,500 hands. At present, however, only about 80 per cent of the full force are at work, so that the number on the pay rolls at the time of investigation was somewhat in excess of 6,000.

Nationality of employees.—According to figures furnished by Mr. D. W. McClure, of the company's employment bureau, representatives of 20 different races and nationalities are employed at the works. The following table (Table 1) sets forth the percentage of each nationality or race at a recent time when the company was employing 7,518 persons. I am informed, however, that the percentages given are approximately correct for the present force.

TABLE 1.—*Distribution of nationalities of employees—The Youngstown Sheet & Tube Co.*

Nationality.	Per cent.	Nationality.	Per cent.
Americans.....	28.5	Scandinavians.....	1.1
Slovaks.....	18.3	Irish.....	1.0
Croatians.....	10.4	Lithuanians.....	.8
Roumanians.....	10.2	Welsh.....	.6
Poles.....	8.0	Scotch.....	.5
Magyars.....	6.6	Negroes.....	.5
Italians.....	5.8	Bulgarians.....	.5
Russians.....	3.2	Servians.....	.3
Germans.....	1.8	Greeks.....	.3
English.....	1.5	French.....	.1

From the above table it will be seen that 28.5 per cent of the employees are Americans, while 71.5 per cent belong to various foreign nationalities. Of these the Slovaks, Croatians, Roumanians, and Poles form 63 per cent of the alien representation.

Prevalence of trachoma among the employees.—Five thousand nine hundred and sixty-two employees of the Youngstown Sheet & Tube Co. were examined, the actual number on the pay rolls January 1, 1914, according to figures furnished by Mr. H. W. Kerr, the chief paymaster, being 6,372. Thus about 95 per cent of the employees were examined, the remainder, or 410, being, for the most part, office employees, employees unwilling to be examined, or employees on continuous night duty who were not accessible for examination.

As a result of the examination, 76 cases of trachoma were found, a rate of prevalence of 1.3 per cent. In addition to these, 19 cases of suspicious conjunctivitis were observed. These were in individuals presenting inflammatory eye symptoms of recent origin, suggestive of the onset of trachoma, but it was impossible to make a positive diagnosis at the time of examination.

Racial distribution of trachoma cases.—The racial distribution of the cases of trachoma and the rate of prevalence by races is shown in the following table (Table 2):

TABLE 2.—*Racial distribution of trachoma, and prevalence by race. The Youngstown Sheet & Tube Co.*

Race.	Approximate number of persons examined.	Number of cases of trachoma.	Rate of prevalence.
			<i>Per cent.</i>
Americans.....	1,700	4	0.23
Croatians and Servians.....	700	22	3.0
Italians.....	350	3	.9
Lithuanians.....	50	1	2.0
Magyars.....	500	15	3.0
Poles.....	550	2	.4
Roumanians.....	700	22	3.0
Slovaks.....	1,200	7	.7
	5,750	76	.....

The difference in the total given above and the total examined (5,962) was made up of individuals of other races, none of whom presented cases of trachoma. The table also shows that the incidence was about the same in the Roumanians, Croatians, and Magyars—that is, 3 per cent—followed in order by Lithuanians with 2 per cent, Italians with 0.9 per cent, Slovaks with 0.7 per cent, Poles with 0.4 per cent, and, finally, Americans with 0.23 per cent. Eighty per cent of the cases of trachoma found were in the representatives of three races—Roumanians, Croatians, and Magyars—who form only about 28 per cent of the total number of persons examined.

Severity and duration of the infection.—Referring now to the severity and duration of the infection at the time of the examination, an analysis of the clinical notes gives the following results:

	Number of cases.	Per cent.
Mild cases.....	33	43.4
Cases of moderate severity.....	30	40.0
Severe cases.....	12	15.7
No longer active.....	1	1.3

In regard to duration an analysis of the notes gives the following findings:

	Number of cases.	Per cent.
Duration less than 6 months, including acute cases.....	32	43
Duration 6 to 12 months.....	21	28
Cases (1 year or more).....	22	30
Duration uncertain.....	1	1.3

It should be understood, of course, that the figures given as to the duration of the disease are mere approximations based upon the appearance of the ocular conjunctiva and the statements of the affected individuals. Still, it is thought that the observations are sufficiently reliable to justify the inference that the disease has, for sometime past, been slowly increasing among the factory personnel, in view of the circumstances that in some 42 per cent of the cases the infection was recent, certainly less than six and in a number of instances less than three months in duration. The inference as to the gradual increase of the disorder is still further strengthened by the occurrence of the cases of "suspicious" conjunctivitis previously mentioned.

Length of residence of trachoma cases in the United States.—In view of the fact that it is possible, because of the incubation period of trachoma (7–10 days), for an alien to land at New York without significant symptoms of eye disease, only to develop them a day or two after landing, some pains were taken to ascertain the length of time the individuals with trachoma had been in the United States.

It appears that four had been in this country less than one year, 15 from one to two years, two from two to three years, six from three to four years, nine from four to five years, and the remainder, or 40, five years and longer.

Of the four who had been less than one year in the United States, one had landed four months, one six months, one eight months, and one 10 months previously. All of these were recent cases of trachoma with the exception of the first, which presented the scars of old trachoma. The ocular conjunctiva, however, was smooth and the disorder had been apparently cured for years.

It seems probable, with but few exceptions, that the disease was contracted subsequent to landing in the United States, and in the great majority of instances during the time of the employment of these individuals by the Youngstown Co.

Distribution of trachoma cases by departments in the Youngstown Sheet & Tube Co.—Turning now to the distribution of the cases in

the various departments of the company, we find the following results (Table 3):

TABLE 3.

Department.	Number of employees.	Number of cases of trachoma.	Per cent.
Blast furnace.....	315	4	1.3
Bessemer plant.....	730	8	1.1
Electrical.....	150	1	.66
Mechanical.....	500	2	.4
Open-hearth plant.....	150	1	.66
Rod and wire mill.....	1,100	7	.63
Sheet mill.....	850	11	1.3
Tube mill.....	1,600	30	1.9
Yard and construction.....	400	7	1.7

It is seen from the above table that trachoma is most prevalent in the tube mill and in the yard and construction gangs. This does not seem to be due to any special conditions in these departments favoring the spread of trachoma, but to the fact that these departments employ the greatest percentage of Roumanians, Croatians, and Magyars, who, as already shown, present the highest incidence of the disease.

Dissemination of trachoma in the mills.—It is not thought that the disease has been spread to any very great extent by conditions in the mills. The special conditions favoring the spread of trachoma in workshops are close physical contacts and the use of the common towel and hand basin.

In regard to the first condition the degree of physical contact among steel workers is not very close. The floor space in steel plants is usually taken up by equipment of various kinds, the cubic feet of space per employee being very great. In none of the shops did the employees seem to be brought into prolonged or close physical contact with each other.

In regard to the use of washing facilities in common at the mills, it is not probable that here the dissemination of trachoma is more than occasionally effected in this way. In common with most steel plants, there are practically no washing facilities provided for the employees by the Youngstown Sheet & Tube Co. with the exception of the office force. In their case, paper towels are provided, which are destroyed after being used once.

The workmen either go home without washing, wash up in buckets they provide themselves, or in the troughs where tongs and similar tools are cooled off after being used in handling hot metal. While, of course, the use of such buckets by several individuals in common might readily transmit trachoma, it was observed that only the more skilled workmen seemed to make a practice of washing up after work, while the majority of the foreign element, who are, for the most part,

unskilled laborers, postponed washing until they reached their lodging houses. The amount of trachoma observed in skilled workmen—nearly all American, Scotch, Irish, and English—was not significant. Therefore, it seemed probable from the relative absence of the disease among the more highly paid skilled contingent who do wash up before leaving, that the disease has not been extensively transmitted by the use of common towels and washing utensils at this plant.

In addition to the conditions just discussed there is still a way in which some cases of trachoma may have been acquired at the plant, and that is through the practice which exists among the workmen of removing foreign bodies from each others eyes. While the regulations of the company require all workmen with foreign bodies in their eyes to go for relief to the emergency hospital maintained by the company, in practice, whenever the foreign particle consists merely of dust or cinder, the workmen frequently have recourse to each other for assistance. In this way it is possible for a trachomatous individual, using his presumably infected fingers or handkerchief for the purpose, to infect the eyes of a fellow workman or, conversely, a trachomatous subject, believing, from the ocular sensations caused by the disease that he has a foreign body in his eye, similarly to infect the fingers or handkerchief of the workman who undertakes to remove it. Such possibilities for the transmission of trachoma are, of course, rather far-fetched. They would not deserve consideration were it not for the great frequency with which foreign bodies get into the eyes in steel plants.

On the whole the impression was gained that the conditions favoring the spread of trachoma could not prevail in the steel plant to the same extent as in the workmen's homes and lodging houses; therefore attention was directed to the sanitary conditions in East Youngstown and their relation to the dissemination of the disease.

Sanitary conditions in East Youngstown.—Owing to the fact that the great majority of the alien employees are either single, or that their families are still in Europe, they live from motives of economy and convenience in lodging houses in East Youngstown. An inspection of this town and the lodging houses made it plain that sanitary conditions there were most unsatisfactory. The conditions in lodging houses were such as not only greatly to facilitate the spread of trachoma, or, for that matter, of any communicable disease, but to cause one to wonder why the disease is not more prevalent than it is.

East Youngstown is situated upon a slope on the banks of the Mahoning River, in close proximity to the plant of the Youngstown Sheet & Tube Co. Many of its streets are practically ungraded and sidewalks are, for the most part, absent. Though a line of sewer has been laid, almost without exception all the houses are still unconnected.

There is no system of garbage collection, garbage being dumped in the rear of houses where it is apt to remain until disintegrated by the elements. A water company, the Mahoning Water Co., exists in the vicinity. It has laid pipes in the town, but only a few houses are supplied. The great bulk of the water is derived from shallow driven wells, each house having its pump. Because of the absence of a water-carriage sewerage system, and a public water supply, the outdoor privies were practically the only means of excreta disposal. These were for the most part of the insanitary type and, in the majority of instances, in foul condition.

Owing to the slope of the land upon which the town is built, extensive opportunity exists for surface contamination, the contents of privies and the washings from garbage heaps draining abundantly toward wells on lower levels. As a consequence, many of the wells are exposed to pollution.

By reason of the tendency of workmen of the same race to lodge in the same section of town, the lodging houses exhibited many instances of extreme overcrowding. Thus, in one case, there were 23 lodgers in a four-room house, and it was by no means uncommon to find a single room occupied by from 8 to 12 workers. The lodgers, for the most part, slept two in a bed.

In some of the lodging houses, where the men work on both "day and night turns," the occupation of the beds is almost continuous, the night men taking, during the day, the places of those sleeping at night in the beds.

The beds themselves were usually old and in filthy condition, destitute of bed linen, the covers consisting of old bedquilts. The washing facilities consisted of buckets, or hand basins, which were used in common by all the occupants of a room. The houses themselves were for the most part built close together, so that the rooms were dark. Very few of the rooms were susceptible of thorough ventilation. Indeed, but little advantage would have been taken of such a provision, as all windows were found carefully closed and the temperature was still further raised by small stoves.

It is plain from the foregoing that the conditions in the lodging houses are very favorable for the propagation of trachoma.

The sanitary authority of East Youngstown consists of a local health officer—a layman who has had no training in sanitation, very little knowledge of the functions of a health officer, and no funds for performing any sanitary work.

Examination of the East Youngstown schools.—It was thought that an examination of the school children would give a very fair idea of the extent to which trachoma was disseminated among the non-occupied population of East Youngstown. Through the courtesy of Mr. C. W. Ricksecker, the superintendent of schools of Coitsville Township, an opportunity was afforded for making such examination.

The schools of East Youngstown are four in number, as follows: The old Gordon Avenue School, the new Gordon Avenue School, the Stop 7 School, and the Fairview School. All the pupils (652 in number) in these schools, together with the teachers, were examined with the result of finding 10 cases of trachoma—a rate of prevalence of 1.53 per cent.

The following table (Table 4) gives the name of the school, the number of pupils of either sex, and the sex and number of cases of trachoma found:

TABLE 4.—*Trachoma in East Youngstown school children, by school and sex.*

Name of school.	Number of boys.	Number of girls.	Total.	Cases of trachoma—boys.	Cases of trachoma—girls.	Total cases, trachoma.
Old Gordon Avenue.....	64	42	106	1	0	1
New Gordon Avenue.....	151	119	270	3	5	8
Stop 7.....	44	28	72	0	1	1
Fairview.....	116	88	204	0	0	0
Total.....	375	277	652	4	6	10

It is seen from this table that the greatest number of cases of trachoma existed at the New Gordon Avenue school. This school with 270 pupils, or about 41 per cent of the entire number examined, showed 8 cases of trachoma, 80 per cent of the total cases of the disease found among the East Youngstown scholars.

This school is situated in that district of the town having the greatest number of lodging houses. There were no cases found at the Fairview School, which is located at the extremity of the town nearest Youngstown. This portion of East Youngstown presents better sanitary conditions than the remainder. The houses are better and less closely spaced. The proportion of Americans is also higher.

While, therefore, the rate of prevalence of the disease among the East Youngstown school children is not very high, being about 1½ per cent, the disease is, nevertheless, present, and some action on the part of the local authorities is needed in order to prevent its further dissemination.

Conclusions.

1. The origin of the prevalence of trachoma among the employees of the Youngstown Sheet & Tube Co. is readily accounted for by the presence among them of chronic cases of the disease, some of which are even now in a state of acute exacerbation.

2. The crowded insanitary condition of the lodging houses, where a large proportion of the employees live, amply accounts for the spread of the disease.

3. The presence of recent cases of trachomatous infection shows that under existing conditions the disease is gradually being spread.

Unless measures are now undertaken for its control the prediction seems justified that the disease will gradually gain such headway as perhaps to prevail in epidemic form.

4. It seems evident that so long as the present insanitary conditions obtain in East Youngstown the control of trachoma will be difficult or impossible unless measures to this end go hand in hand with betterment in the local sanitary conditions.

5. The present machinery for the control of the situation is unsatisfactory. The local health officer of East Youngstown is a layman, without the knowledge or training in sanitation to enable him to cope with the situation.

The town itself lacks completely the fundamentals for sanitation, namely, a public water supply, water carriage sewerage system, system of garbage collection and disposal, physical supervision of school children, proper grading of streets, and provision for the disposal of the surface washings and storm waters, even the numbering of houses, so that the location of cases of communicable diseases can be recorded. There are also no local dispensaries or hospitals, except the emergency hospital of the Youngstown Sheet & Tube Co., which is located in the plant.

Recommendations.

In view of the fact that some 80 per cent of the taxes of East Youngstown are paid by the Youngstown Sheet & Tube Co., and that 60 to 70 per cent of their personnel, including nearly all the foreign element, live in East Youngstown, it would seem as though the Youngstown company is more directly interested in the sanitary conditions in East Youngstown than anyone else.

The efficiency of its employees is affected, not only by their environment when at work but also by that of their homes. It is evident that when workmen are exposed to insanitary surroundings during their period of rest, not only do they incur the danger of contracting communicable diseases but their ability to recuperate from their previous labor is adversely affected by the prevailing unhealthful conditions.

Any effective treatment of the situation must necessarily include specific measures to be adopted at the mills and also the betterment of the sanitary conditions in East Youngstown if permanent results are to be secured.

The recommendations made, therefore, related to two separate ends; first, the treatment of the situation at the mills and, second, the sanitation of East Youngstown.

Besides calling the attention of the company to the usual means for preventing trachoma, such as avoiding the use of the common towel and hand basin and the use of the same bed by two or more

individuals, the following special recommendations were made for the company to put into effect at once:

1. No time should be lost in securing a competent physician on full time, at an adequate compensation, who should perform the following duties:

(a) Make a complete mental and physical examination of persons applying for employment with the company.

(b) Give competent treatment to any individuals found to be afflicted with trachoma or other communicable diseases.

(c) If the necessary arrangements could be made this physician could also be the health officer for East Youngstown and supervise its sanitary condition.

2. A competent graduate trained nurse should be secured who would be able to administer treatment to trachoma cases under this physician's direction.

3. All individuals named in a list furnished the company who are suffering from trachoma, and with respect to whom the notation "acute," "recent," or "severe" was made, should be segregated, preferably in some building controlled by the company, and there furnished competent medical treatment until such time as the infectiousness of the disease has been removed. They could then be allowed to return to work conditionally upon their reporting daily to the hospital for inspection and treatment.

4. All persons suffering from trachoma, including those segregated in the manner just referred to, should, upon their return to work, be required to report for inspection and treatment twice daily at the hospital. It was suggested, in order to secure easy compliance with this recommendation, that these persons secure their time cards at the hospital and the fact of their having there reported, on going in and out, be attested by a special stamp kept at the hospital.

5. In order to prevent the development of subsequent cases, foremen, or those in charge of gangs, should be required to submit semi-weekly reports as to the appearance of the eyes of men under their control. Such reports should not be perfunctory, but should state affirmatively or negatively whether they have observed any cases of reddened or sore eyes in any of the men under their charge. Whenever the eyes of any workmen appear red or sore such workmen should be sent at once to the hospital for examination.

The following recommendations as to the improvement of the sanitary conditions of East Youngstown were made, their realization to constitute part of the future policy of the company, as an equivalent for the large taxes paid by the corporation:

1. The provision of an adequate and pure water supply.
2. The installation of a water-carriage sewer system.
3. The abolition of insanitary privies.

4. The installation of catch basins and sewers for disposal of storm waters.
5. The installation of a system of garbage collection and disposal, with ordinances as to the use of sanitary garbage cans with tight-fitting covers.
6. Restriction of overcrowding in lodging houses and regulation of their sanitary condition by a system of licensing and inspection.
7. Numbering of houses and grading of streets.
8. Physical supervision of the children in the schools.
9. The appointment of a properly qualified physician as health officer.
10. Establishment of a hospital and dispensary in East Youngstown.

[NOTE.—It is gratifying to learn from a letter received from Mr. Woltz, the director of safety of the Youngstown Sheet & Tube Co., that the recommendations in regard to the treatment of trachoma cases have already been carried into effect.]

PREVALENCE OF DISEASE.

No health department, State or local, can effectively prevent or control disease without knowledge of when, where, and under what conditions cases are occurring.

IN CERTAIN STATES AND CITIES.

SMALLPOX.

Indiana—Evansville.

Surg. Oakley, of the Public Health Service, reported by telegraph that during the week ended February 28, 1914, 13 cases of smallpox had been notified in Evansville, Ind.

Maryland—Ellicott City.

The State Department of Health of Maryland reported by telegraph February 27, 1914, that 1 case of smallpox had been notified at Ellicott City, R. F. D., Howard County, Md.

New York—Niagara Falls.

Acting Asst. Surg. Bingham, of the Public Health Service, reported by telegraph that during the week ended February 28, 1914, 6 cases of smallpox had been notified in Niagara Falls, N. Y.

Texas—Port Arthur.

Acting Asst. Surg. Winter, of the Public Health Service, reported by telegraph that during the period from January 1 to March 3, 1914, 25 cases of smallpox had been notified in Port Arthur, Tex.

New York Report for January, 1914.

Places.	Number of new cases reported during month.	Deaths.	Vaccination history of cases.			
			Number vaccinated within 7 years preceding attack.	Number last vaccinated more than 7 years preceding attack.	Number never successfully vaccinated.	Vaccination history not obtained or uncertain.
New York:						
Chautauqua County.....	63		2	6	55	
Erie County.....	20				20	
Franklin County.....	2		1		1	
Hamilton County.....	1				1	
Herkimer County.....	9				9	
Niagara County.....	227		18	12	207	
Total.....	322		11	18	293	

14 of these were vaccinated during January.

SMALLPOX—Continued.
Miscellaneous State Reports.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
North Dakota (Jan. 1-31):			Utah (Jan. 1-31):		
Counties—			Counties—		
Billings.....	99		Box Elder.....	8	
Bowman.....	3		Cache.....	14	
Cavalier.....	2		Carbon.....	1	
Cass.....	1		Davis.....	3	
Grand Forks.....	7		Juab.....	8	
Kidder.....	7		Millard.....	3	
Lamoure.....	1		Morgan.....	4	
Pierce.....	25		Salt Lake.....	66	
Rolette.....	23		Sevier.....	6	
Stutsman.....	16		Utah.....	1	
Walsh.....	2		Wasatch.....	5	
Ward.....	2		Weber.....	37	
Wells.....	2		Total.....	156	
Total.....	190		Vermont (Jan. 1-31)¹		
Oregon (Jan. 1-31):			Virginia:		
Counties—			Counties—		
Clackamas.....	4		Alexandria.....	2	
Columbia.....	1		Amherst.....	3	
Harney.....	1		Appomattox.....	5	
Hood River.....	3		Bedford.....	21	
Marion.....	1		Brunswick.....	2	
Multnomah.....	53		Buchanan.....	3	
Polk.....	1		Buckingham.....	50	
Umatilla.....	11		Campbell.....	30	
Wasco.....	6		Dinwiddie.....	193	1
Yamhill.....	8		Fairfax.....	5	
Total.....	89		Franklin.....	11	
South Dakota (Jan. 1-31):			Giles.....	1	
Counties—			Greenville.....	4	
Aurora.....	1		Halifax.....	8	
Bon Homme.....	2		Henrico.....	6	
Beadle.....	2		Isle of Wight.....	58	
Brookings.....	3		Mecklenburg.....	26	
Brule.....	4		Montgomery.....	6	
Codington.....	34		Nansemond.....	96	1
Corson.....	6		Norfolk.....	111	
Day.....	1		Northampton.....	8	
Deuel.....	3		Nottaway.....	1	
Hamlin.....	11		Princess Anne.....	41	
Hughes.....	3		Prince George.....	3	
Lawrence.....	2		Prince William.....	4	
Lyman.....	18		Rockbridge.....	1	
McCook.....	1		Russell.....	1	
Marshall.....	1		Scott.....	5	
Roberts.....	1		Smythe.....	23	
Walworth.....	4		Southampton.....	47	
Yankton.....	6		Surry.....	10	
Total.....	102		Sussex.....	17	
			Tazewell.....	1	
			Warwick.....	2	
			Washington.....	71	1
			Total.....	876	3

¹ No case.

City Reports for Week Ended Feb. 14, 1914.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Aaltoona, Pa.....	2		Kansas City, Kans.....	20	
Aurora, Ill.....	4		Knoxville, Tenn.....	12	
Austin, Tex.....	1		La Crosse, Wis.....	2	
Baltimore, Md.....	26		Lexington, Ky.....	4	
Buffalo, N. Y.....	1		Lynchburg, Va.....	3	
Butte, Mont.....	13		Milwaukee, Wis.....	43	
Chicago, Ill.....	4		Muncie, Ind.....	1	
Coffeyville, Kans.....	1		Muscatine, Iowa.....	5	
Columbus, Ohio.....	9		Nashville, Tenn.....	18	
Dayton, Ohio.....	4		New Orleans, La.....	1	
Detroit, Mich.....	11		Philadelphia, Pa.....	2	
Evansville, Ind.....	11		Portsmouth, Va.....	3	
Hartford, Conn.....	1		Reading, Pa.....	1	
Kalamazoo, Mich.....	1		Richmond, Va.....	3	

SMALLPOX—Continued.

City Reports for Week Ended Feb. 14, 1914—Continued.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Roanoke, Va.....	1	.....	Superior, Wis.....	2	.....
Sacramento, Cal.....	1	.....	Toledo, Ohio.....	16	.....
St. Joseph, Mo.....	3	.....	Washington, D. C.....	7	.....
St. Louis, Mo.....	2	.....	Zanesville, Ohio.....	3	.....
Spokane, Wash.....	6	.....		

TYPHOID FEVER.

State Reports for January, 1914.

Places.	Number of new cases reported during month.	Places.	Number of new cases reported during month.
New York:		Texas—Continued.	
Albany County.....	8	Ellis County—	
Allegany County.....	2	Midlothian.....	1
Broome County.....	3	Galveston County—	
Cayuga County.....	2	Galveston.....	2
Chautauqua County.....	9	Johnson County—	
Chemung County.....	3	Cleburne.....	1
Chenango County.....	2	Midland County—	
Clinton County.....	1	Midland.....	2
Columbia County.....	2	Parker County.....	1
Cortland County.....	8	Rockwall County—	
Delaware County.....	1	Rockwall.....	1
Dutchess County.....	2	Tarrant County—	
Erie County.....	37	Fort Worth.....	37
Fulton County.....	1	Travis County—	
Genesee County.....	3	Austin.....	3
Greene County.....	2	Walker County.....	3
Jefferson County.....	15		
Monroe County.....	5	Total.....	67
Montgomery County.....	6		
Niagara County.....	9	Virginia:	
Onondaga County.....	5	Albemarle County.....	3
Ontario County.....	13	Alexandria County.....	1
Orange County.....	8	Alleghany County.....	1
Oswego County.....	2	Amherst County.....	1
Otsego County.....	4	Appomattox County.....	1
Rensselaer County.....	4	Augusta County.....	2
Rockland County.....	2	Bath County.....	1
St. Lawrence County.....	5	Bedford County.....	4
Stauben County.....	6	Bland County.....	2
Sullivan County.....	1	Botetourt County.....	3
Tompkins County.....	1	Brunswick County.....	1
Ulster County.....	3	Buchanan County.....	1
Washington County.....	3	Buckingham County.....	1
Wayne County.....	1	Campbell County.....	6
Westchester County.....	1	Caroline County.....	1
Yates County.....	4	Carroll County.....	2
New York City.....	100	Charlottesville County.....	2
Total.....	284	Chesterfield County.....	3
		Clarke County.....	2
North Dakota:		Dickenson County.....	3
Bowman County.....	1	Dinwiddie County.....	1
Cass County.....	1	Fauquier County.....	1
Golden Valley County.....	1	Floyd County.....	5
Grand Forks County.....	1	Fluvanna County.....	2
Griggs County.....	1	Franklin County.....	2
Wells County.....	1	Grayson County.....	5
Williams County.....	2	Greene County.....	1
Total.....	8	Greensville County.....	3
		Halifax County.....	7
Texas:		Hanover County.....	2
Burnet County—		Henrico County.....	8
Burnet.....	1	Henry County.....	2
Dallas County—		Isle of Wight County.....	1
Dallas.....	8	James City County.....	3
Grand Prairie.....	1	King and Queen County.....	1
Denton County.....	4	Lancaster County.....	1
Denton.....	2	Lee County.....	10
		Louisa County.....	4
		Lunenburg County.....	2

TYPHOID FEVER—Continued.

State Reports for January, 1914—Continued.

Places.	Number of new cases reported during month.	Places.	Number of new cases reported during month.
Virginia—Continued.		Virginia—Continued.	
Madison County.....	1	Scott County.....	8
Mecklenburg County.....	2	Shenandoah County.....	1
Montgomery County.....	8	Smyth County.....	2
Nansemond County.....	2	Southampton County.....	2
Norfolk County.....	6	Tazewell County.....	3
Northampton County.....	1	Warren County.....	4
Nottoway County.....	1	Warwick County.....	4
Orange County.....	1	Washington County.....	1
Page County.....	2	Westmoreland County.....	1
Prince Edward County.....	3	Wise County.....	10
Prince George County.....	1	Wythe County.....	1
Roanoke County.....	7		
Rockingham County.....	2	Total.....	184
Russell County.....	8		

City Reports for Week Ended Feb. 14, 1914.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Alameda, Cal.....	1		Medford, Mass.....	1	
Altoona, Pa.....		1	Nashville, Tenn.....	1	
Auburn, N. Y.....		1	Newark, N. J.....	1	1
Baltimore, Md.....	2	1	Oakland, Cal.....	1	
Binghamton, N. Y.....	3		Philadelphia, Pa.....	18	2
Boston, Mass.....	10	1	Pittsburgh, Pa.....	3	4
Braddock, Pa.....	1		Providence, R. I.....	1	
Buffalo, N. Y.....	1	3	Reading, Pa.....	2	3
Chicago, Ill.....	13	5	Richmond, Va.....	3	
Chicopee, Mass.....	1		Sacramento, Cal.....	5	1
Columbus, Ohio.....	2		St. Joseph, Mo.....	1	
Dunkirk, N. Y.....	2		St. Louis, Mo.....	2	2
Erie, Pa.....	1		San Francisco, Cal.....	9	1
Fitchburg, Mass.....	1		Spokane, Wash.....	1	
Grand Rapids, Mich.....	2	1	Washington, D. C.....	2	
Johnstown, Pa.....	1		Wheeling, W. Va.....		1
La Crosse, Wis.....	2		Wilkes-Barre, Pa.....	1	
Los Angeles, Cal.....	12		York, Pa.....	6	
Lynchburg, Va.....	1	1	Zanesville, Ohio.....	1	
Lynn, Mass.....	1				

CEREBROSPINAL MENINGITIS.

State Reports for January, 1914.

Places.	Number of new cases reported during month.	Places.	Number of new cases reported during month.
New York:		New York—Continued.	
Chautauqua County.....	2	New York City.....	19
Delaware County.....	1	Total.....	32
Erie County.....	1		
Herkimer County.....	1	Texas:	
Jefferson County.....	1	Dallas County—	
Monroe County.....	2	Dallas.....	1
Nassau County.....	1	Galveston County—	
Oneida County.....	1	Galveston.....	1
Orange County.....	1	Total.....	2
Rensselaer County.....	1		
Seneca County.....	1		

CEREBROSPINAL MENINGITIS—Continued.

City Reports for Week Ended Feb. 14, 1914.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Chicago, Ill.	1	1	Passaic, N. J.		1
Buffalo, N. Y.	1	1	Philadelphia, Pa.	1	1
Butte, Mont.	1	1	Pittsfield, Mass.	1	1
Los Angeles, Cal.	1	2	Richmond, Va.		3
Lowell, Mass.	1	1	St. Louis, Mo.	1	2
Manchester, N. H.	1	1	Washington, D. C.	2	2

POLIOMYELITIS (INFANTILE PARALYSIS).

State Reports for January, 1914.

Places.	Number of new cases reported during month.	Places.	Number of new cases reported during month.
New York:		Virginia—Continued.	
Niagara County.	1	Augusta County.	1
Westchester County.	1	Dickenson County.	1
New York City.	13	Essex County.	2
Total.	15	Fluvanna County.	2
Texas:		Frederick County.	1
Donley County.	1	Halifax County.	2
Erath County.	1	Lunenburg County.	1
Total.	2	Prince Edward County.	2
Virginia:		Rockingham County.	1
Alexandria County.	1	Russell County.	1
		Tazewell County.	1
		Washington County.	1
		Total.	16

ERYSIPELAS.

City Reports for Week Ended Feb. 14, 1914.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Baltimore, Md.		1	Los Angeles, Cal.	2	1
Bayonne, N. J.	1		Milwaukee, Wis.	5	
Binghamton, N. Y.	4		Newark, N. J.		2
Boston, Mass.		1	New Castle, Pa.	1	
Braddock, Pa.	1		New Orleans, La.		1
Bridgeport, Conn.	1		Norristown, Pa.	1	
Brockton, Mass.	2		Philadelphia, Pa.	28	1
Buffalo, N. Y.	8	1	Pittsburgh, Pa.	4	1
Chicago, Ill.	11	1	Providence, R. I.		2
Cleveland, Ohio.	3	1	Rutland, Vt.	1	
Dayton, Ohio.		1	St. Louis, Mo.	5	1
Harrisburg, Pa.	4	1	San Francisco, Cal.	3	
Hartford, Conn.	3		Schenectady, N. Y.	1	
Johnstown, Pa.	1		Spokane, Wash.	1	1
Kalamazoo, Mich.	2		Toledo, Ohio.		2
Lancaster, Pa.	1		West Hoboken, N. J.	1	

PLAGUE.

California—Squirrels Collected and Examined.

During the week ended February 7, 1914, 12 ground squirrels from Alameda County were examined for plague infection. None was found plague infected.

Rats Collected and Examined.

Places.	Week ended—	Found dead.	Total collected.	Examined.	Found infected.
California:					
Cities—					
Oakland.....	Feb. 7, 1914	20	527	449	.....
Berkeley.....	do.....	2	147	87	.....
San Francisco.....	do.....	7	1,306	1,017	.....
Washington:					
City—					
Seattle.....	do.....		1,348	1,046	.....

PNEUMONIA.

City Reports for Week Ended Feb. 14, 1914.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Ann Arbor, Mich.....	5	.....	Newport, Ky.....	3	3
Auburn, N. Y.....	2	1	Norristown, Pa.....	1	2
Beaver Falls, Pa.....	1	.....	Pasadena, Cal.....	2	2
Bennington, Vt.....	3	.....	Philadelphia, Pa.....	54	88
Binghamton, N. Y.....	3	7	Pittsburgh, Pa.....	25	35
Chicago, Ill.....	201	192	Reading, Pa.....	3	1
Cleveland, Ohio.....	27	17	San Diego, Cal.....	1	1
Galesburg, Ill.....	1	1	San Francisco, Cal.....	5	5
Grand Rapids, Mich.....	5	4	Saratoga Springs, N. Y.....	1	2
Harrisburg, Pa.....	1	1	Schenectady, N. Y.....	8	7
Kalamazoo, Mich.....	4	1	South Bethlehem, Pa.....	1	1
Los Angeles, Cal.....	17	9	South Omaha, Neb.....	1	.....
Manchester, N. H.....	6	6	Spokane, Wash.....	4	4
New Castle, Pa.....	1	.....	Steelton, Pa.....	1	1

RABIES.

Michigan—Detroit.

During the week ended February 14, 1914, a fatal case of rabies was notified at Detroit, Mich.

California—Berkeley and Oakland—Rabies in Animals.

Surg. Long, of the Public Health Service, reported by telegraph that during the week ended February 28, 1914, rabies in dogs had been notified as follows: Berkeley, 1 case; Oakland, 3 cases.

Washington—Seattle—Rabies in Animals.

Surg. Lloyd, of the Public Health Service, reported by telegraph that during the week ended February 28, 1914, 2 cases of rabies in dogs had been notified in Seattle, Wash.

TETANUS.

Massachusetts—Boston.

The case of smallpox noted as occurring in Boston during the week ended January 3 (Public Health Reports, Jan. 23, 1914, p. 184), was erroneously reported. This case was one of tetanus.

Texas—Galveston.

Surg. Bahrenburg, of the Public Health Service, reported that during the month of January, 1914, 1 fatal case of tetanus had been notified in Galveston, Tex.

City Reports for Week Ended Feb. 14, 1914.

During the week ended February 14, 1914, tetanus was notified by cities as follows: Chicago, Ill., 1 death; Cleveland, Ohio, 1 death; New Orleans, La., 1 death; Saginaw, Mich., 1 death; St. Louis, Mo., 1 case.

SCARLET FEVER, MEASLES, DIPHTHERIA, AND TUBERCULOSIS.

State Reports for January, 1914.

	Scarlet fever.	Measles.	Diphtheria.
New York.....	1,904	4,280	1,988
North Dakota.....	76	43	8
Texas.....	150		48

City Reports for Week Ended Feb. 14, 1914.

Cities.	Popula- tion, United States census 1910.	Total deaths from all causes.	Diph- theria.		Measles.		Scarlet fever.		Tuber- culosis.	
			Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Over 500,000 inhabitants:										
Baltimore, Md.....	558,485	209	44	3	7		21	5	39	34
Boston, Mass.....	670,585	236	50		52		122		55	25
Chicago, Ill.....	2,185,283	857	116	10	56		83	15	143	82
Cleveland, Ohio.....	560,663	162	51	6	10		16	3	27	13
Philadelphia, Pa.....	1,549,008	508	52	4	217		65	6	61	48
Pittsburgh, Pa.....	533,905	186	32	2	19	1	100	4	27	24
St. Louis, Mo.....	687,029	241	60	5	99	1	32		44	23
From 300,000 to 500,000 inhab- itants:										
Buffalo, N. Y.....	423,715	162	21		23		9		11	17
Detroit, Mich.....	465,766		48	3			11			
Los Angeles, Cal.....	319,198	117	21		2		8		44	21
Milwaukee, Wis.....	373,857	119	14	2	70	2	44	3	22	15
Newark, N. J.....	347,469	134	33	1	357	3	59		38	11
New Orleans, La.....	339,075	156	21	1	21	1	7		31	27
San Francisco, Cal.....	416,912	165	6	1	11		14		25	18
Washington, D. C.....	331,069	128	5		64		17		20	15
From 200,000 to 300,000 inhab- itants:										
Jersey City, N. J.....	267,779	69		1		1				8
Providence, R. I.....	224,326	72	13		10	2	11		12	5

SCARLET FEVER, MEASLES, DIPHTHERIA, AND TUBERCULOSIS—Con.

City Reports for Week Ended Feb. 14, 1914—Continued.

Cities.	Popula- tion, United States census 1910.	Total deaths from all causes.	Diph- theria.		Measles.		Scarlet fever.		Tuber- culosis.	
			Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
From 100,000 to 200,000 inhabit- ants:										
Bridgeport, Conn.	102,054	33	6	.....	22	1	9	1	5	3
Cambridge, Mass.	104,839	29	4	.....	22	.....	5	.....	3	3
Columbus, Ohio.	181,548	68	1	.....	22	.....	4	.....	23	6
Dayton, Ohio.	116,577	32	9	.....	97	.....	8	.....	3	2
Fall River, Mass.	119,295	36	4	.....	.....	.....	15	1	10	5
Grand Rapids, Mich.	112,571	47	1	2	115	1	6	.....	4	4
Lowell, Mass.	106,294	37	9	.....	13	.....	1	.....	1	2
Nashville, Tenn.	110,364	34	1	.....	4	.....	.....	.....	1	3
Oakland, Cal.	150,174	48	1	.....	.....	.....	2	.....	1	5
Richmond, Va.	127,628	55	.....	.....	7	.....	11	1	3	3
Spokane, Wash.	104,402	.....	3	1	29	.....	3	.....	1	1
Toledo, Ohio.	168,497	55	2	.....	1	.....	1	.....	.....	3
Worcester, Mass.	145,986	50	2	.....	12	.....	4	.....	5	3
From 50,000 to 100,000 inhabit- ants:										
Altoona, Pa.	52,127	17	2	.....	.....	.....	2	.....	.....	.....
Bayonne, N. J.	55,545	14	2	1	23	.....	2	.....	4	.....
Brockton, Mass.	56,878	22	10	2	29	.....	7	.....	5	4
Camden, N. J.	94,538	.....	4	.....	1	.....	2	.....	10	.....
Erie, Pa.	66,525	5	3	.....	.....	.....	4	.....	1	.....
Evansville, Ind.	69,647	19	1	.....	1	.....	3	.....	.....	2
Harrisburg, Pa.	64,186	.....	3	.....	.....	.....	2	.....	6	.....
Hartford, Conn.	98,915	42	14	1	5	.....	6	.....	1	.....
Hoboken, N. J.	70,324	.....	4	.....	3	.....	.....	.....	11	.....
Johnstown, Pa.	55,482	20	12	4	8	.....	4	.....	.....	2
Kansas City, Kans.	82,331	17	.....	.....	.....	.....	2	.....	5	.....
Lynn, Mass.	89,336	29	2	1	4	.....	2	.....	2	3
Manchester, N. H.	70,063	29	2	.....	7	.....	10	1	1	1
New Bedford, Mass.	96,652	31	1	1	.....	.....	23	4	4	5
Passaic, N. J.	54,773	20	.....	.....	12	.....	3	.....	1	1
Pawtucket, R. I.	51,622	.....	1	.....	.....	.....	5	.....	.....	.....
Reading, Pa.	96,071	31	8	1	2	.....	15	.....	4	.....
Saginaw, Mich.	50,510	17	1	.....	.....	.....	2	.....	2	1
St. Joseph, Mo.	77,403	27	1	.....	.....	.....	4	.....	3	1
Schenectady, N. Y.	72,826	33	1	.....	1	.....	4	2	7	3
South Bend, Ind.	53,684	6	.....	.....	.....	.....	.....	.....	.....	1
Springfield, Ill.	51,678	20	1	.....	.....	.....	.....	.....	.....	2
Springfield, Mass.	88,926	19	1	.....	4	.....	5	.....	.....	2
Trenton, N. J.	96,815	43	7	1	1	.....	17	.....	4	5
Wilkes-Barre, Pa.	67,105	21	5	.....	33	.....	11	.....	6	.....
Yonkers, N. Y.	79,803	17	6	1	37	.....	8	.....	1	1
From 25,000 to 50,000 inhabitants										
Atlantic City, N. J.	46,150	8	2	.....	1	.....	1	.....	5	.....
Auburn, N. Y.	34,668	6	.....	.....	12	.....	6	.....	.....	.....
Aurora, Ill.	29,807	7	1	.....	.....	.....	1	.....	.....	1
Austin, Tex.	29,860	7	1	.....	.....	.....	.....	.....	5	1
Binghamton, N. Y.	48,443	28	.....	.....	53	.....	1	.....	1	5
Brookline, Mass.	27,792	.....	4	.....	13	.....	3	.....	5	.....
Butte, Mont.	39,165	19	.....	.....	.....	.....	1	.....	3	2
Chelsea, Mass.	32,452	20	1	.....	6	1	9	.....	1	.....
Chicopee, Mass.	25,401	9	.....	.....	.....	.....	1	.....	3	.....
Danville, Ill.	27,871	8	2	.....	1	.....	.....	.....	3	.....
East Orange, N. J.	34,371	.....	3	.....	30	.....	4	.....	3	.....
Elmira, N. Y.	37,176	16	1	.....	1	.....	2	.....	1	1
Everett, Mass.	33,484	12	2	.....	1	.....	4	.....	2	.....
Fitchburg, Mass.	37,826	6	.....	.....	1	.....	1	.....	5	.....
Haverhill, Mass.	44,115	.....	1	.....	.....	.....	5	.....	5	.....
Kalamazoo, Mich.	39,437	22	.....	.....	19	1	.....	.....	.....	2
Knoxville, Tenn.	36,346	.....	2	.....	4	.....	.....	.....	.....	.....
La Crosse, Wis.	30,417	13	.....	.....	2	.....	1	.....	2	1
Lancaster, Pa.	47,227	.....	2	.....	.....	.....	2	.....	1	.....
Lexington, Ky.	35,099	12	.....	.....	4	.....	3	.....	2	.....
Little Rock, Ark.	45,941	1	1	.....	82	.....	1	.....	.....	.....
Lynchburg, Va.	29,494	13	.....	.....	1	.....	.....	1	.....	.....
Newcastle, Pa.	36,280	.....	1	.....	1	.....	.....	.....	4	.....
Newport, Ky.	30,309	10	2	.....	.....	.....	2	2	2	2
Newport, R. I.	27,149	7	1	.....	.....	.....	1	.....	.....	.....
Newton, Mass.	39,806	12	1	.....	3	.....	6	.....	.....	1
Norristown, Pa.	27,875	10	.....	.....	9	.....	9	.....	.....	.....
Orange, N. J.	29,630	8	.....	.....	66	.....	.....	.....	2	.....
Pasadena, Cal.	30,291	14	.....	.....	1	.....	.....	.....	1	2

IN INSULAR POSSESSIONS.

HAWAII.

Examination of Rats and Mongoose.

Rats and mongoose have been examined in Hawaii for plague infection as follows: Honolulu, two weeks ended February 7, 1914, 723; Hilo, two weeks ended January 31, 1914, 4,790. No plague-infected animal was found.

PHILIPPINE ISLANDS.

Cholera.

Surg. Heiser, chief quarantine officer and director of health for the Philippine Islands, reports that during the three weeks ended January 24, 1914, 25 cases of cholera with 14 deaths were notified at Manila.

Cholera continues to make its appearance in widely separated sections of the islands and in persons who have apparently not come in contact with individuals suffering from cholera. Prompt measures have been taken in each instance, and the disease has been speedily eradicated without further spread in every place in which it appeared, with the exception of Capiz Province, where the disease has spread in the towns of Calivo, Capiz, and New Washington.

CHOLERA ON VESSEL.

On January 3, 1914, at the quarantine inspection made at Manila upon the arrival of the steamship *Prinz Sigismund*, there were found among the steerage passengers who had embarked at Rabaul, New Guinea, about nine days previously, four persons who were stated by the ship's surgeon to be suffering from beriberi. The inspection was made at about 9 a. m., and at 7 p. m. on the same date one of the passengers referred to died on board. The body was removed to the city morgue, and at the necropsy, which was made the following morning, the pathological lesions of beriberi and cholera were found. True cholera vibrios were isolated from the intestinal contents.

CHOLERA CARRIERS.

Almost without exception in the places in which cholera cases have been discovered cholera carriers have also been found. The records at the San Lazaro cholera hospital show that among 108 cholera car-

riers isolated there, the cholera organism disappeared from the stools in less than five days from admission to the hospital.

In the course of the routine stool examinations which are made of arriving aliens there was found on the steamship *Chicago Maru*, which arrived at Manila January 9, 1914, a Japanese woman, embarked at Kobe, Japan, who was a cholera carrier. She was promptly transferred to the San Lazaro Hospital, where she will be detained until her stools shall be free from cholera vibrios.

Plague.

On January 24, 1914, two cases of plague were notified at Manila. The patients were Chinese. One case occurred in the same general neighborhood in which plague has been occurring during the past six months. The other case occurred in a building which gave evidence of extensive rat infestation.

PORTO RICO.

Examination of Rats and Mongoose.

During the week ended February 13, 1914, 515 rats, 274 mice, and 6 mongoose were examined in Porto Rico for plague infection. No plague-infected animal was found.

FOREIGN REPORTS.

AUSTRIA-HUNGARY.

Certain Measures Against Importation of Cholera Suspended.

The ordinance of September 13, 1913, prohibiting the importation of food products from Bulgaria, Roumania, Servia, and Turkey on account of cholera was suspended January 20, 1914.

CHINA.

Plague-Infected Rats—Shanghai.

During the week ended January 24, 1914, 174 rats were examined at Shanghai for plague infection. Three plague-infected rats were found.

DENMARK.

Destruction of Rats—Copenhagen.

The following statement, dated January 28, 1914, was received from Consul General Winslow at Copenhagen:

The extermination of rats continues unabated in this city, and the authorities now pay for every dead rodent 10 öre (\$0.0268). This is an advance of 2 öre (\$0.00536) per head over the price paid formerly. The decrease of this animal pest is noticed.

The war against the rat commenced in 1908, and since that time it is estimated that some 6,000,000 have been killed.

JAPAN.

Communicable Diseases.

Communicable diseases have been notified in the Empire of Japan, exclusive of the island of Taiwan (Formosa), as follows:

MONTH OF DECEMBER, 1913.

Diseases.	Cases.	Deaths.	Diseases.	Cases.	Deaths.
Diphtheria.....	2,028	603	Scarlet fever.....	121	13
Dysentery.....	366	147	Smallpox.....	1 ²	.....
Paratyphoid fever.....	261	38	Typhoid fever.....	1,982	569
Plague.....	1	.....		

¹ In Fukuoka ken.

JAN. 1-DEC. 31, 1913.

Diseases.	Cases.	Deaths.	Diseases.	Cases.	Deaths.
Cholera.....	78	22	Plague.....	27	20
Diphtheria.....	19,130	5,011	Scarlet fever.....	1,293	106
Dysentery.....	16,779	3,691	Smallpox.....	108	39
Paratyphoid fever.....	3,869	473	Typhoid fever.....	27,708	5,442

PERU.

Status of Plague.

Plague has been notified in Peru as follows:

JAN. 19-24, 1914.

Places.	New cases.	Remain- ing Jan. 24, 1914.	Places.	New cases.	Remain- ing Jan. 24, 1914.
Callao.....	2	.....	Lima (city).....	1	7
Catacaos.....	2	6	Lima (country).....	.....	1
Chiclayo.....	11	21	Mollendo.....	2	1
Contumaza.....	12	8	Piura.....	1	1
Ferremaje.....	2	4	San Pedro.....	2	4
Guadalupe.....	2	2	Trujillo.....	13	18

SOUTHERN NIGERIA.

Yellow Fever—Lagos.

Between December 24 and 28, 1913, 2 cases of yellow fever were notified on a vessel arrived at Lagos.

TRIPOLI.

Plague—Bengazi.

An outbreak of plague was notified January 31, 1914, at Bengazi, Tripoli.

Bengazi is the starting point of caravans from Tripoli to Egypt.

ZANZIBAR.

Plague Case on Vessel—Zanzibar.

A case of plague was notified December 31, 1913, at Zanzibar. The patient arrived at Zanzibar, December 30, on the steamship *President* from Dar-es-Salaam, German East Africa.

Plague—Infected Rats Found.

During the three weeks ended January 14, 1914, 3,256 rats were examined at Zanzibar for plague infection. Three plague-infected rats were found.

CHOLERA, YELLOW FEVER, PLAGUE, AND SMALLPOX.

Reports Received During Week Ended Mar. 6, 1914.

CHOLERA.

Places.	Date.	Cases.	Deaths.	Remarks.
Ceylon:				
Colombo.....	Jan. 11-17.....	1	1	
Dutch East Indies:				
Java—				
Samarang.....	Dec. 21-27.....	17	10	
Sumatra—				
Padang.....	Dec. 1-13.....	11	11	

CHOLERA, YELLOW FEVER, PLAGUE, AND SMALLPOX—Continued.**Reports Received During Week Ended Mar. 6, 1914—Continued.****CHOLERA—Continued.**

Places.	Date.	Cases.	Deaths.	Remarks.
India:				
Bombay.....	Jan. 18-24.....	1	1	
Calcutta.....	Jan. 11-17.....		40	
Madras.....	Jan. 18-24.....	2	2	
Negapatam.....	Jan. 4-10.....		7	
Indo China:				
Saigon.....	Jan. 13-19.....	1		
Philippine Islands:				
Manila.....	Jan. 4-24.....	25	14	Jan. 3, 1 fatal case on s. s. Sigmund from Rabaul, New Guinea. At the necropsy pathological lesions of cholera and beriberi were found.
Capiz, province.....	do.....			Still present in Calivo, Capiz, and New Washington.
Bulacan, province.....	Jan. 28.....			Present.
Pampanga, province.....	do.....			Do.
Rizal, province.....	do.....			Present in Pateros and Rizal.
Turkey in Europe:				
Constantinople.....	Feb. 2-8.....		1	Total Aug. 2-Feb. 8: Cases, 216; deaths, 95.

YELLOW FEVER.

Brazil:				
Bahia.....	Jan. 1-31.....		1	
Southern Nigeria: ¹				
Logos.....	Dec. 24-28.....	1	1	From a vessel.

PLAGUE.

Brazil:				
Bahia.....	Jan. 24-31.....	2		
China:				
Hongkong.....	Jan. 11-17.....	7	6	
Egypt:				
Provinces—				
Garbieh.....	Jan. 17.....	3		
Minieh.....	Jan. 9-29.....	1	1	
India:				
Bombay.....	Jan. 18-24.....	24	17	
Karachi.....	do.....	31	36	
Indo-China:				
Saigon.....	Jan. 13-19.....	1		
Japan:				
Kobe.....				Total, Jan. 1-Dec. 31: Cases, 27; deaths, 20; exclusive of Taiwan.
Mauritius.....	Dec. 12-18.....	11	7	
Peru:				
Arequipa—				
Mollendo.....	Jan. 19-24.....	2		
Cajamarca—				
Contumaza.....	do.....	12		
Callao—				
Callao.....	do.....	2		
Lambayeque—				
Chiclayo.....	do.....	11		
Ferrenaje.....	do.....	2		
Guadalupe.....	do.....	2		
Libertad—				
San Pedro.....		2		Feb. 1: 1 case in Salaverry.
Trujillo.....	Jan. 19-24.....	13		
Lima—				
Lima.....	do.....	1		
Piura—				
Catacaos.....	do.....	2		
Piura.....	do.....	1		
Philippine Islands:				
Manila.....	Jan. 18-24.....	2	1	
Tripoli:				
Bengazi.....	Jan. 31.....			Present.
Zanzibar.....	Dec. 31-Jan. 2.....	1	1	On s. s. Præsident from Dar-ee-Salaam.

¹ From the Veröffentlichungen des Kaiserlichen Gesundheitsamtes, Feb. 11, 1914.

CHOLERA, YELLOW FEVER, PLAGUE, AND SMALLPOX—Continued.
Reports Received During Week Ended Mar. 6, 1913—Continued.

SMALLPOX.

Places.	Date.	Cases.	Deaths.	Remarks.
Algeria:				
Departments—				
Algiers.....	Nov. 1-30.....	6		
Constantine.....	do.....	5		
Oran.....	do.....	90		
Australia:				
New South Wales.....				July 1, 1913-Jan. 8, 1914: Cases, 1,074.
Sydney, metropolitan area.....				July 1, 1913-Jan. 8, 1914: Cases, 1,026.
Western Australia:				
Freemantle.....				Dec. 2, 1 fatal case on R. M. S. Malwa, from London via Port Said, Aden, and Colombo.
Brazil:				
Bahia.....	Jan. 25-31.....	2		
Rio de Janeiro.....	Jan. 24-31.....	47	10	
Canada:				
Montreal.....	Feb. 15-21.....	3		
China:				
Nanking.....	Jan. 24.....			Present.
Egypt:				
Alexandria.....	Jan. 28-Feb. 4.....	2		
Cairo.....	Jan. 22-28.....	12		
Port Said.....	do.....	1		
France:				
Nantes.....	Feb. 1-7.....	1		
Nice.....	Dec. 1-31.....	1		
St. Etienne.....	Jan. 1-31.....	1		
Germany:				
Gibraltar.....	Jan. 2-8.....	1		Total, Feb. 1-7: Cases, 1.
Japan:				
Fukuoka ken.....	Dec. 1-31.....	2		Jan. 1-Dec. 31, 1913: Cases, 108; deaths, 39. Exclusive of Taiwan.
Mexico:				
Guadalajara.....	Feb. 8-14.....	40	20	
Tampico.....	Jan. 24-30.....		10	
Portugal:				
Lisbon.....	Jan. 25-Feb. 7.....	3		
Russia:				
St. Petersburg.....	Jan. 11-24.....	2	3	
Warsaw.....	Oct. 19-Nov. 29.....	18	13	
Servia:				
Belgrade.....	Jan. 18-Feb. 8.....	75	18	
Spain:				
Almeria.....	Jan. 1-31.....		2	
Madrid.....	do.....		29	
Valencia.....	Feb. 1-7.....	1		
Switzerland:				
Basel.....	Jan. 18-Feb. 7.....	29		
Turkey in Asia:				
Beirut.....	Jan. 18-Feb. 7.....	45	22	
Jaffa.....	Jan. 25-31.....	1		
Turkey in Europe:				
Constantinople.....	Jan. 25-31.....		2	
Saloniki.....	Feb. 1-7.....		5	

Reports Received from Dec. 27, 1913, to Feb. 27, 1914.

CHOLERA.

Places.	Date.	Cases.	Deaths.	Remarks.
Austria-Hungary:				
Bosnia-Herzegovina—				
Brod.....	Nov. 13-18.....	2		
Kostjnica.....	do.....	1		
Novigrad.....	Oct. 26-Nov. 5.....	1		
Sjekocac.....	Nov. 6.....	1		
Travnik, district.....	Dec. 10-16.....	6		
Vranduk.....	Nov. 20.....	1		
Zenica.....	Oct. 20-Nov. 19.....	9	2	

CHOLERA, YELLOW FEVER, PLAGUE, AND SMALLPOX—Continued.

Reports Received from Dec. 27, 1913, to Feb. 27, 1914—Continued.

CHOLERA—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.	
Austria-Hungary—Continued.					
Croatia-Slavonia—					
Pozanga.....	Nov. 18-Dec. 1.....	2			
Syrmen—					
Adasevci.....	do.....	6	2		
Semlin.....	do.....	1	1		
Vitroviča—					
Dobrovic.....	do.....	2	2		
Hungary					
Bacs-Bodrog district... Jasz-Nagy-Kun-Szolnok—	Nov. 9-Dec. 29.....	52	31	Total, Sept. 1-Dec. 29: Cases 729, deaths 372; Dec. 29, free.	
Szolnok.....	Nov. 9-15.....	2	2		
Maramaros.....	Nov. 30-Dec. 6.....	1	1		
Fest Pils—					
Soroksar.....	Nov. 9-22.....	2	1		
Szaboies—					
Nyiregyhaza.....	Nov. 9-15.....	1	1		
Temes—					
Varasliget.....	do.....		1		
Torontal.....	Nov. 9-Dec. 13.....	27	19		
Ung—					
Jasza.....	Nov. 9-15.....	1	1		
Ceylon:					
Colombo.....	Nov. 9-Jan. 10.....	32	18		
China:					
Hongkong.....	Nov. 9-Dec. 20.....	4			
Dutch East Indies:					
Java—					
Batavia and Tanjong Priok.....	Nov. 9-Dec. 27.....	45	34		
Samarang.....	Nov. 30-Dec. 20.....	30	15		
India:					
Bombay.....	Nov. 10-Jan. 17.....	15	7		
Calcutta.....	Nov. 9-Jan. 3.....		417		
Madras.....	Nov. 16-Jan. 10.....	4	2		
Rangoon.....	Nov. 1-30.....	3	2		
Philippine Islands:					
Manila.....	Nov. 9-Jan. 3.....	44	34	Total, Aug. 23-Jan. 3: Cases 161, deaths 110. Third quarter, 1913: Cases 14, deaths 6.	
Provinces.....					
Bulacan—					
Bulacan.....	Dec. 14-20.....			Present in vicinity.	
Meycauayan.....	do.....			Present.	
Capiz.....					
Banga.....	Dec. 17-20.....			Total, Dec. 17-23; Cases, 26; deaths, 18.	
Calivo.....	do.....			Present.	
New Washington.....	do.....			1 death daily.	
Cavite—					
Santa Cruz.....	Nov. 13-19.....			Present.	
Cebu—					
Cebu.....	do.....			Do.	
Opon.....	Nov. 19.....	1		Do.	
Pampanga.....					
	Dec. 27.....			On Mactan Island.	
Pangasinan.....					
	Dec. 19-29.....			Present in Guagua, Macabebe, San Fernando, and other places.	
Rizal—					
Las Pinas.....	do.....	1		Persent in Dagupan, Lingayen, San Carlos, and Urdaneta.	
Pasig.....	Nov. 19.....			Present.	
Roumania.....					
				Total, Nov. 14 to Dec. 7: Cases, 18; deaths, 15.	
Russia:					
Bessarabia—					
Ismail.....	Oct. 26-Nov. 8.....	6	1		
Ekaterinoslav.....	do.....	1			
Kherson.....	do.....	6	9		
Taurida—					
Dneiper district.....	do.....	1	2		
Servia.....					
				Nov. 10-24, 8 cases with 2 deaths in the districts Podrigne and Pojarevatz.	

CHOLERA, YELLOW FEVER, PLAGUE, AND SMALLPOX—Continued.

Reports Received from Dec. 27, 1913, to Feb. 27, 1914—Continued.

CHOLERA—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
Siam:				
Bangkok.....	Nov. 2-Dec. 29.....		78	
Straits Settlements:				
Singapore.....	Nov. 2-Jan. 10.....	18	17	
Turkey in Asia:				
Aivali.....	Jan. 10-23.....	9	6	
Beirut.....	Dec. 23.....	2	1	From among troops on the s. s. Bahr Amer from Rodosto.
Smyrna.....	Dec. 16-Jan. 8.....	11	4	
Trebizond.....	Dec. 9-Jan. 24.....	22	16	Dec. 9-16, 6 cases among troops from s. s. Guldjema. Jan. 17, 1 case in the city.
Turkey in Europe:				
Constantinople.....	Nov. 25-Feb. 1.....	141	54	Total, Aug. 2, 1913, to Feb. 1, 1914: Cases, 215; deaths, 94.
Dardanelles.....	Jan. 9-20.....	10	9	
Gallipoli.....	Jan. 1-3.....	2	2	
Pera.....	Jan. 3-10.....	5		
Rodosto.....	Dec. 21-Jan. 9.....	22		

YELLOW FEVER.

Brazil:				
Bahia.....	Nov. 23-Jan. 24.....	5	6	
Ceara.....	Nov. 1-30.....		2	
Ecuador:				
Guayaquil.....	Nov. 1-Dec. 31.....	9	6	
Milagro.....	do.....	2	1	
Naranjito.....	do.....	3	2	
Mexico:				
Merida.....	Dec. 10-11.....	1	1	From Campeche.
Do.....	Jan. 4-10.....	1	1	Do.
Southern Nigeria:				
Lagos.....	Oct. 20-28.....	3	1	Among Europeans from a vessel. Including previous report.
Togo:				
Lome.....	Sept. 12.....	1		
Trinidad:				
Brighton.....	Dec. 30.....	1		Total Nov. 22-Dec. 30: Cases, 10; deaths, 3, including previous reports.

PLAGUE.

Australia:				
Thursday Island Quarantine station.....	May 21.....	5		Pestis minor from s. s. Taynan from Hongkong to Townville.
Azores:				
Terceira—Angra-Heroismo.....	Dec. 21.....		1	
Brazil:				
Bahia.....	Nov. 23-Jan. 10.....	19	7	
Pernambuco.....	Dec. 16-31.....		1	
Do.....	Jan. 1-15.....		1	
Rio de Janeiro.....	Nov. 16-22.....	1	1	
British East Africa:				
Kisumu.....	Sept. 12-Oct. 13.....	2	2	
Mombasa.....	Sept. 12-Dec. 15.....	31	16	
Nairobi.....	Sept. 12-Nov. 15.....	3	3	
Chile:				
Iquique.....	Nov. 9-Jan. 4.....	15	6	
China:				
Hongkong.....	Nov. 2-Jan. 3.....	34	32	
Shanghai.....	Oct. 1-7.....	1		
Dutch East Indies:				
Provinces—				
Kediri.....	Nov. 1-30.....	307	268	
Madoen.....	do.....	89	81	
Malang.....	do.....	820	770	
Surabaya.....	do.....	60	64	

CHOLERA, YELLOW FEVER, PLAGUE, AND SMALLPOX—Continued.

Reports Received from Dec. 27, 1913, to Feb. 27, 1914—Continued.

PLAGUE—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
Ecuador:				
Babahoyo.....	.....do.....	1		
Duran.....	Dec. 1-31.....	1		
Guayaquil.....	Nov. 1-Dec. 31.....	349	157	
Manta.....	Dec. 1-31.....	8		
Milagro.....	Nov. 1-Dec. 31.....	2	1	
Naranjito.....	.....do.....	3	1	
Yaguachi.....	Nov. 1-30.....	2	2	
Egypt:				Jan. 1-Dec. 24, 1913: Cases, 694; deaths, 304. Jan. 1-15: Cases, 6; deaths, 4.
Provinces—				
Assiout.....	Jan 5.....	1	1	
Assouan.....	Dec. 10.....	1		
Do.....	Jan. 5.....	1	1	
Garbieh.....	Dec. 11.....	1		
Do.....	Jan. 15.....	4	2	
Minieh.....	Dec. 9-24.....	3	1	
Do.....	Jan. 8.....	1	1	
India.....				Total Jan. 1, 1913-Jan. 3, 1914: Cases, 238,198; deaths, 198,875.
Bombay.....	Nov. 9-Jan. 17.....	51	43	
Calcutta.....	Nov. 2-Dec. 13.....		11	
Karachi.....	Nov. 9-Jan. 17.....	124	119	
Madras.....	Nov. 16-Dec. 20.....	4	2	
Rangoon.....	Oct. 26-Nov. 30.....	26	25	
Indo-China.....				Total Jan. 1-Nov. 20: Cases, 3,665; deaths, 3,465.
Saigon.....	Nov. 11-Jan. 12.....	10		
Japan.....				Total Jan. 1-Nov. 30: Cases, 26; deaths, 20.
Kobe.....	Dec. 1-7.....	1		
Yokohama.....	Jan. 4-10.....	1		Total Sept. 19-Jan. 10: Cases, 22; deaths, 17.
Mauritius.....	Oct. 26-Dec. 11.....	60	43	Total Jan. 1-Nov. 27: Cases, 273; deaths, 163.
Morocco:				
Casablanca.....	Jan. 7.....	1	1	
El-Araish (Larache).....	Sept. 17.....	1		Among the military.
New Caledonia:				
Bourail.....	Sept. 1-Oct. 14.....	8	2	In a school of the tribe of the Azaren.
Peru:				
Ancachs—				
Casma.....	Dec. 1-Jan. 18.....			Present.
Nepena.....	.....do.....			Do.
Arequipa—				
Mollendo.....	.....do.....	6		
Lambayeque—				
Chiclayo.....	.....do.....	41		
Ferrenaje.....	.....do.....	13		
Guadalupe.....	.....do.....			Present.
Libertad—				
San Pedro.....	.....do.....	28		
Trujillo.....	.....do.....	41		Jan. 21: 12 cases in the lazaretto.
Lima.....	.....do.....	6		
Lima.....	.....do.....	28		
Pisco.....	.....do.....	2		
Monsefu.....	.....do.....	2		
Piura—				
Catacaos.....	.....do.....	10		
Piura.....	.....do.....	9		
Philippine Islands:				
Manila.....	Nov. 23-29.....	1	1	Third quarter, 1913: Cases, 2; deaths, 1.
Russia:				
Ural, territory.....				Total Oct. 20-Nov. 10: Cases, 212; deaths, 170; and 2 fatal cases from Issum Tube.
Djakisabevsk district—				
Djumarta.....	Nov. 9-10.....	5	1	
Djantayu.....	Nov. 8-10.....	2	2	
Kizilu.....	Nov. 8.....	1	1	
Fourteenth village.....	Nov. 7-9.....	6		
Sarbas.....	Nov. 8-10.....	13	7	
Kaziljar district.....	Nov. 5-10.....	39	24	In Assaukurt, Baitchurek, Bis-kuduk, and Djamankuduk.
Lbistchensky district—				
Issum Tube.....	Oct. 20-Nov. 10.....	138	127	
Kaimikov.....	Nov. 4-10.....	6	6	

CHOLERA, YELLOW FEVER, PLAGUE, AND SMALLPOX—Continued.

Reports Received from Dec. 27, 1913, to Feb. 27, 1914—Continued.

PLAGUE—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
Siam:				
Bankok.....	Nov. 2-29.....		1	
Turkey in Asia:				
Beirut.....	Dec. 10-23.....	2	2	
Jiddah.....	Feb. 2.....	1		

SMALLPOX.

Algeria:					
Departments—					
Algiers.....	Sept. 1-Oct. 31.....	2			
Constantine.....	Oct. 1-31.....	9			
Oran.....	Sept. 1-Oct. 31.....	84			
Arabia:					
Aden.....	Nov. 25-Dec. 15.....	5	4		
Maskat.....	Nov. 30-Dec. 6.....	10		Dec. 20, present.	
Matarah.....	Dec. 23-Jan. 10.....	9		Nov. 30, present.	
Argentina:					
Buenos Aires.....	Nov. 1-30.....		1		
Australia:					
New South Wales.....					Total, July 1-Dec. 20: Cases, 1,058.
Sydney.....	Dec. 6-20.....	8			July 1-Dec. 20: Cases, 1,017.
Arabia:					
Matarah.....	Jan. 10.....				Present.
Austria-Hungary:					
Lower Austria—					
Vienna.....	Jan. 4-10.....	1			
Tyrol and Vorarlberg.....	Nov. 23-Jan. 10.....	5			
Upper Austria.....	Dec. 14-Jan. 3.....	18			
Brazil:					
Bahia.....	Nov. 23-Jan. 24.....	20			
Para.....	Dec. 1-Jan. 24.....	23	32		
Pernambuco.....	Nov. 1-Jan. 15.....		70		
Rio de Janeiro.....	Nov. 9-Jan. 24.....	305	51		
Canada:					
Ontario—					
Hamilton.....	Jan. 1-31.....	9			
Ottawa.....	Dec. 7-20.....	3			
Toronto.....	Dec. 7-Feb. 7.....	4			
Quebec—					
Montreal.....	Dec. 7-Feb. 14.....	38			
Ottawa.....	Dec. 28-Feb. 14.....	11			
Quebec.....	Jan. 24-31.....	1			
Ceylon:					
Colombo.....	Nov. 30-Dec. 6.....	1			
China:					
Amoy.....	Dec. 14-Jan. 10.....				Present.
Antung.....	Jan. 4-11.....	1			
Dairen.....	Dec. 7-27.....	4	1		
Hankow.....	Nov. 2-Jan. 17.....	11	1		
Hongkong.....	Dec. 14-20.....	1			
Shanghai.....	Dec. 8-Jan. 18.....	6	4		Deaths among natives.
Tientsin.....	Nov. 9-15.....	6	1		
Ting Chow.....	Jan. 5.....				Epidemic, 130 miles from Amoy.
Tong An.....	Dec. 27.....				Present, 20 miles from Amoy.
Dutch East Indies:					
Java.....					Dec. 13 to Jan. 10, 40 cases with 20 deaths in the interior.
Batavia.....	Nov. 9-Dec. 27.....	51	13		
Surabaya.....	Oct. 28-Nov. 8.....	3			
Egypt:					
Alexandria.....	Nov. 26-Jan. 28.....	18	9		
Cairo.....	Nov. 19-Jan. 7.....	79	28		
Port Said.....	Dec. 3-9.....		1		
France:					
Marseille.....	Nov. 1-Dec. 31.....		72		
Nice.....	Nov. 1-30.....	1			
Paris.....	Nov. 23-Jan. 31.....	13			
St. Etienne.....	Nov. 16-30.....	8	3		
Germany:					
Hamburg.....	Dec. 11-25.....	4			Dec. 7-Jan. 11: Cases, 6.
Gibraltar.....	Dec. 1-28.....	3			
Great Britain:					
London.....	Jan. 18-24.....	1			
Nottingham.....	Dec. 21-27.....	28			

CHOLERA, YELLOW FEVER, PLAGUE, AND SMALLPOX—Continued.

Reports Received from Dec. 27, 1913, to Feb. 27, 1914—Continued.

SMALLPOX—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
Greece:				
Achaia and Elis, Province.	Jan. 29			Present.
Piraeus	Jan. 18-27	10	5	
India:				
Bombay	Nov. 23-Jan. 17	30	17	
Calcutta	Nov. 2-Jan. 10		19	
Karachi	Nov. 2-Jan. 17	6	1	
Madras	do.	17	4	
Indo-China:				
Saigon	Nov. 11-24	1	1	
Italy:				
Leghorn	Dec. 21-27	1		
Turin	Dec. 22-28	1		
Japan				Total Jan. 1-Nov. 30: Cases, 106; deaths, 39, exclusive of Taiwan.
Tokyo	Nov. 1-30	1		
Yokohama	Jan. 6-12	1	1	
Mauritius	Oct. 2-25	60	4	
Mexico:				
Acapulco	Dec. 6		1	
Agascalientes	Dec. 1-Feb. 8		43	
Chihuahua	Dec. 29-Feb. 1		10	
Durango	Apr. 1-May 31		77	
Guadalajara	Jan. 11-31	49	26	
Imuris	Dec. 29-Jan. 4	5		
Llano	Jan. 17	8		
Mexico	Oct. 26-Nov. 29	31	15	
Monterey	Nov. 17-Jan. 4		4	
San Luis Potosi	Nov. 2-29	2		
Tampico	Dec. 24-Jan. 20	100	21	
Vera Cruz	Dec. 6-Feb. 7	9	4	
New Zealand				Apr. 8, 1913, to Jan. 7, 1914: Cases, 2,000, including report, p. 2963, vol. 28.
Norway:				
Trondhjem	Nov. 1-Jan. 31	14		
Peru:				
Callao	Jan. 26			Still epidemic.
Lima	do.			Do.
Philippine Islands:				Third quarter 1913: Cases, 15.
Manila				
Portugal:				
Lisbon	Nov. 16-Jan. 24	11		
Russia:				
Moscow	Dec. 14-27	2	2	
Odessa	Nov. 16-Jan. 10	4	2	
St. Petersburg	Nov. 23-Jan. 3	37	5	
Warsaw	Oct. 5-Nov. 15	26	16	
Servia:				
Belgrade	Nov. 7-Jan. 10	24	17	
Spain:				
Almeria	Nov. 1-Dec. 31		7	
Barcelona	Nov. 30-Jan. 31		49	
Madrid	Nov. 1-Dec. 31		58	
Seville	Nov. 1-30		1	
Valencia	Dec. 1-Jan. 31	6		
Straits Settlements:				
Penang	Nov. 2-Dec. 6	13	1	
Singapore	Nov. 2-22	2		
Switzerland:				
Canton—				
Basel	Nov. 23-Jan. 17	45		
Genoa	Nov. 23-29	3	1	
Turkey in Asia:				
Adana	Jan. 10-24	2		Dec. 28, epidemic.
Beirut	Nov. 23-Jan. 17	192	85	
Jaffa	Dec. 6-Jan. 24	18	1	
Mersina	Jan. 4-24	2		
Smyrna	Nov. 16-Jan. 17		143	
Tarsus	Dec. 25-Jan. 24			Still present.
Trebizond	Jan. 11-24			Present.
Tripoli	Jan. 25-31	16		
Turkey in Europe:				
Constantinople	Nov. 20-Jan. 24		11	
Salonki	Dec. 1-Jan. 31		75	

SANITARY LEGISLATION.

STATE LAWS AND REGULATIONS PERTAINING TO PUBLIC HEALTH.

COLORADO.

Tuberculosis—Notification of Cases and Control of. (Chap. 125, Act Mar. 17, 1913.)

SECTION 1. For the purposes of this act, tuberculosis is hereby declared to be an infectious and communicable disease. Every attending physician or person practicing as a physician in the State of Colorado shall report in writing on a form to be furnished as hereinafter provided, the name, nativity, age, sex, color, occupation, place where last employed, if known, and address of every person known by said physician or person practicing as a physician to have tuberculosis, to the health officer of the county, town, village or city in which said person resides, within 24 hours after such fact comes to the knowledge of said physician or person practicing as a physician. The chief officer having charge for the time being of any hospital, dispensary, asylum, or other similar private or public institution in said State of Colorado, shall report in like manner the name, nativity, age, sex, color, occupation, place where last employed, if known, and previous address of every patient having tuberculosis who comes into his care or under his observation, within 24 hours thereafter. The chief officer in charge of a regular incorporated sanatorium or other institution solely for the care of persons having tuberculosis shall make the report required in this section.

SEC. 2. Such report shall be upon a blank form to be furnished by the State board of health, and such blank in addition to the name, color, age, sex, nativity, occupation, place where last employed and present address, as stated above, shall give also the evidence upon which the diagnosis of tuberculosis has been made, the part of the body affected, and the stage of the disease. All cases in which the sputum, urine, feces, pus, or any other bodily discharge, secretion, or excretion shall contain the tubercle bacillus, shall be regarded as open cases of tuberculosis, and the rules given herein providing for disinfection of premises occupied by cases of tuberculosis shall apply only to such open cases.

SEC. 3. Any health officer of a county, town, village or city, when so requested by any physician or person practicing as a physician, or by authorities of any hospital or dispensary, shall make or cause to be made a microscopical examination of the sputum or other bodily excretion or discharge forwarded to him as that of a person having symptoms of tuberculosis, which shall be forwarded to such officer in a package supplied by the State board of health, accompanied by a blank giving name, nativity, age, sex, color, occupation, place where last employed, if known, and address of the person whose sputum it is. Said health officer shall promptly make a report of the result of such examination free of charge to the physician or person upon whose application the same is made: *Provided*, That the examination provided for in this section shall be by the State board of health.

SEC. 4. Every health officer of a county, town, village or city, shall cause all reports made in accordance with the provisions of the first section of this act, and also

all results of examinations showing the presence of the bacilli of tuberculosis made in accordance with the provisions of the third section of this act, to be recorded in a register to be furnished by the State board of health, of which he shall be the custodian, and a copy of which he shall transmit quarterly to the State board of health. Such register shall not be open to inspection by any person other than the health authorities of the State and of the said county, town, village, or city, and said health authorities shall not permit any such report or record to be divulged so as to disclose the identity of the person to whom it relates, except as may be necessary to carry into effect the provisions of this act. All blanks, vouchers, registers and receptacles by this act required shall be furnished by the State board of health.

SEC. 5. In case of the vacating of any apartment or premises by the death or removal therefrom of a person having open tuberculosis, the attending physician, or, if there be no such physician or, if such physician be absent, the owner, lessee, occupant, or other person having charge of the said apartments or premises, if he knows or has been notified that such deceased person or persons who have been removed therefrom had open tuberculosis, shall notify the health officer of said county, town, village, or city of said death or removal within 24 hours thereafter, and such apartments or premises so vacated shall not again be occupied until duly disinfected, cleaned, or renovated, by the local board of health, in accordance with the methods indorsed and recommended by the State board of health.

SEC. 6. When notified of the vacating of any apartments or premises as provided in section 5 hereof, the local health officer or one of his assistants or deputies shall within 24 hours thereafter visit said apartments or premises and shall order and direct that, except for purposes of cleansing or disinfection, no infected article shall be removed therefrom until properly and suitably cleaned or disinfected; and said health officer shall determine the manner in which such apartments or premises shall be disinfected, cleaned, or renovated in order that they may be rendered safe and suitable for occupancy. If the health authorities determine that disinfection is sufficient to render them safe and suitable for occupancy, such apartments or premises, together with all infected articles therein, shall immediately be disinfected by the health authorities at public expense, or, if the owner prefers, at the owner's expense to the satisfaction of the health authorities: *Provided, however,* That in any locality which, in the judgment of the State board of health, may be considered a resort for persons having tuberculosis, such disinfection may, in the discretion of the health authorities, be done by such health authorities at the expense of the owner of the premises. Should the health authorities determine that such apartments or premises are in need of thorough cleansing and renovation, a notice in writing to that effect shall be served upon the owner or agent of said apartments or premises, and said owner or agent shall thereupon proceed to the cleansing or renovating of such apartments or premises in accordance with the instruction of the health authorities, and such cleansing and renovation shall be done at the expense of the said owner or agent.

SEC. 7. In case the orders or directions of the local health officer requiring the disinfection, cleansing, or renovation of any apartments or premises or any articles therein, as hereinbefore provided, shall not be complied with within 72 hours after such orders or directions shall be given, the health officer shall cause a placard in words and form substantially as follows to be placed upon the door of the infected apartments or premises:

Tuberculosis is a communicable disease. These apartments have been occupied by a consumptive and may be infected. They must not be occupied until the order of the health officer directing their disinfection or renovation has been complied with. This notice must not be removed under penalty of the law except by the health officer or other duly authorized official.

SEC. 8. Any person having tuberculosis who shall dispose of his sputum, saliva, or other bodily secretion or excretion so as to cause offense or danger to any person or persons occupying the same room or apartment, house, part of house or premises

or adjoining premises, shall on complaint of any person or persons subjected to such offense or danger, be deemed guilty of committing a nuisance, and any person subjected to such a nuisance may make complaint in person or writing to the health officer of any county, town, village, or city where the nuisance complained of is committed. The local health officer receiving such complaint shall investigate, and if it appear that the nuisance complained of is such as to cause offense or danger to any person occupying the same room, apartment, house, or part of a house or premises, or adjoining premises, he shall serve notice upon the person so complained of, reciting the alleged cause of offense or danger and requiring him to dispose of his sputum, saliva, or other bodily secretion or excretion in such a manner as to remove all reasonable cause of offense or danger. Any person failing or refusing to comply with orders or regulations of local health officer of any county, town, village, or city requiring him to cease to commit such nuisance shall be deemed guilty of a misdemeanor, and on conviction thereof shall be punished as hereinafter provided.

SEC. 9. A physician attending a patient having tuberculosis shall take all proper precautions and give proper instructions to provide for the safety of all individuals occupying the same house or apartment, and if no physician be attending such patient, this duty shall devolve upon the local health officer, and all duties imposed upon physicians by any section of this act shall be performed by the local health officer in all cases of tuberculosis not attended by a physician.

SEC. 10. Every local health officer shall transmit to every physician or person practicing and a physician reporting any case of tuberculosis, or to the person reported as suffering from this disease, provided the latter has no attending physician, a circular of information provided by the State board of health. This circular of information shall inform the consumptive of the precautions necessary to avoid transmitting the disease to others.

SEC. 11. Any physician or person practicing as a physician who shall fail to report any case of tuberculosis or any person who shall report as affected with tuberculosis any person who is not so affected, or who shall willfully make any false statement concerning the name, nativity, age, sex, color, occupation, place where last employed, if known, or address of any person reported as affected with tuberculosis, or, who shall certify falsely as to any of the precautions taken to prevent the spread of infection, shall be deemed guilty of a misdemeanor, and on conviction thereof shall be subject to a fine of not more than \$100.

SEC. 12. Upon the recovery of any person having tuberculosis the attending physician shall make a report of this fact to the local health officer, who shall record the same in the records of his office and shall relieve said person from further liability or duty imposed by this act.

SEC. 13. Any person violating any of the provisions of this act shall be deemed guilty of a misdemeanor and upon conviction thereof shall be punished by a fine of not less than \$5 nor more than \$100.

SEC. 14. Justices of the peace in their respective jurisdictions and police magistrates in cities and towns shall have jurisdiction of offenses under this act.

SEC. 15. All acts and parts of acts contrary to or inconsistent with the provisions of this act are hereby repealed.

KANSAS.

Morbidity Reports. (Reg. Bd. of H., Dec. 13, 1913.)

Be it resolved, By the State Board of Health of Kansas, that the following be and is hereby adopted as a part of the rules and regulations of said board:

SECTION 1. The following-named diseases and disabilities are hereby made notifiable, and the occurrence of cases shall be reported as herein provided.

GROUP I.—INFECTIOUS DISEASES.

- Actinomycosis.
- Anthrax.
- Chicken pox.
- Cholera, Asiatic (also cholera nostras when Asiatic cholera is present or its importation threatened).
- Dengue.
- Diphtheria.
- Dysentery:
 - (a) Amebic.
 - (b) Bacillary.
- Favus.
- German measles.
- Glanders.
- Hookworm disease.
- Leprosy.
- Malaria.
- Measles.
- Meningitis:
 - (a) Epidemic cerebrospinal.
 - (b) Tuberculous.
- Mumps.
- Ophthalmia neonatorum (conjunctivitis of newborn infants).
- Paragonimiasis.
- Paratyphoid fever.
- Plague.
- Pneumonia (acute lobar).
- Poliomyelitis (acute infectious).
- Rabies.
- Rocky mountain spotted or tick fever.
- Scarlet fever.
- Septic sore throat.
- Smallpox.
- Tetanus.
- Trachoma.
- Trichinosis.
- Tuberculosis (all forms; the organ or part affected in each case to be specified).
- Typhoid fever.
- Typhus fever.
- Whooping cough.
- Yellow fever.

GROUP II.—OCCUPATIONAL DISEASES AND INJURIES.

- Arsenic poisoning.
- Brass poisoning.
- Carbon-monoxide poisoning.
- Lead poisoning.
- Mercury poisoning.
- Natural-gas poisoning.
- Phosphorus poisoning.
- Wood-alcohol poisoning.
- Naphtha poisoning.
- Bisulphide of carbon poisoning.
- Dinitrobenzine poisoning.

Caisson disease (compressed-air illness).

Any other disease or disability contracted as a result of the nature of the person's employment.

GROUP III.—VENEREAL DISEASES.

Gonococcus infection.

Syphillis.

GROUP IV.—DISEASES OF UNKNOWN ORIGIN.

Pellagra.

Cancer.

SEC. 2. Hereafter each and every physician practicing in the State of Kansas who treats or examines any person suffering from or afflicted with, or suspected to be suffering from or afflicted with, any one of the notifiable diseases shall immediately report such case of notifiable disease in writing to the local health authority having jurisdiction. Said report shall be forwarded either by mail or by special messenger and shall give the following information:

1. The date when the report is made.
2. The name of the disease or suspected disease.
3. The name, age, sex, color, nativity, occupation, address, and school attended or place of employment of patient.
4. Number of adults and of children in the household.
5. Source or probable source of infection or the origin or probable origin of the disease.
6. Name and address of the reporting physician.

Provided, That if the disease is, or is suspected to be, smallpox, the report shall, in addition, show whether the disease is of the mild or virulent type and whether the patient has ever been successfully vaccinated, and if the patient has been successfully vaccinated, the number of times and dates or approximate dates of such vaccination; and if the disease is, or is suspected to be, cholera, diphtheria, plague, scarlet fever, smallpox, or yellow fever, the physician shall, in addition to the written report, give immediate notice of the case to the local health authority in the most expeditious manner available; and if the disease is, or is suspected to be, typhoid fever, scarlet fever, diphtheria, or septic sore throat, the report shall also show whether the patient has been, or any member of the household in which the patient resides is, engaged or employed in the handling of milk for sale or preliminary to sale: *And provided further*, That in the reports of cases of the venereal diseases the name and address of the patient need not be given, and that all such reports of venereal disease shall be made direct to the State board of health on special blank.

SEC. 3. The requirements of the preceding section shall be applicable to physicians attending patients ill with any of the notifiable diseases in hospitals, asylums, or other institutions, public or private, provided that the superintendent or other person in charge of any such hospital, asylum, or other institution in which the sick are cared for, may, with the written consent of the local health officer (or board of health) having jurisdiction, report in the place of the attending physician or physicians the cases of notifiable diseases and disabilities occurring in or admitted to said hospital, asylum, or other institution in the same manner as that prescribed for physicians.

SEC. 4. Whenever a person is known or is suspected to be afflicted with a notifiable disease, or whenever the eyes of an infant under two weeks of age become reddened, inflamed or swollen, or contain an unnatural discharge, and no physician is in attendance, an immediate report of the existence of the case shall be made to the local health officer by the midwife, nurse, attendant, householder, or other person in charge of the patient.

SEC. 5. Teachers or other persons employed in, or in charge of, public or private schools, including Sunday schools, should report immediately to the local health officer

each and every known or suspected case of a notifiable disease in persons attending or employed in their respective schools.

SEC. 6. The written reports of cases of the notifiable diseases required by this act of physicians shall be made upon blanks supplied for the purpose, through the local health authorities, by the State board of health. These blanks shall conform to that adopted and approved by the State and Territorial health authorities in conference with the United States Public Health Service.

SEC. 7. Local health officers or boards of health shall within seven days after the receipt by them of reports of cases of the notifiable diseases forward by mail to the State board of health the original written reports made by physicians, after first having transcribed the information given in the respective reports in a book or other form of record for the permanent files of the local health officer. On each report thus forwarded the local health officer shall state whether the case to which the report pertains was visited or otherwise investigated by a representative of the local health officer and whether measures were taken to prevent the spread of the disease or the occurrence of additional cases.

SEC. 8. Local health officers or boards of health shall, in addition to the provisions of section 7, make such other reports as may be provided for by regulations promulgated by the State board of health.

SEC. 9. Whenever there occurs within the jurisdiction of a local health officer or board of health an epidemic of a notifiable disease, the local health officer or board of health shall, within 30 days after the epidemic shall have subsided, make a report to the State board of health of the number of cases occurring in the epidemic, and the number of cases terminating fatally, the origin of the epidemic, and the means by which the disease was spread; provided, that whenever the State board of health has taken charge of the control and suppression or undertaken the investigation of the epidemic, the local health authority having jurisdiction need not make the report otherwise required.

LOUISIANA.

Privies—Construction and Care of. (Reg. Bd. of H., Aug. 20, 1913.)

The Sanitary Code was amended by substituting for section 366 the following as section 366:

No privy or water-closet shall hereafter be maintained or built except such as are so constructed as to render them flyproof and easily cleaned. They shall be of wood, brick, or other material approved by the Louisiana State Board of Health, as follows:

(a) The floor shall be solid and water-tight, covering the entire base of the building inside the walls.

(b) The house shall be without cracks through which flies may enter. It shall be provided with a tight self-closing door, and shall be lighted and ventilated by one or more openings, said opening or openings to give space not less than 4 square feet; all openings, whether for ventilation or otherwise, which are not provided with doors, windows, or shutters, shall be screened with 18-mesh cross wire per inch. Doors shall be kept closed.

(c) The roof of each privy or earth closet shall be water-tight, and if sloped to the rear of the house it shall project not less than 6 inches beyond the rear wall of the house.

(d) The seat shall have a self-closing hinged cover over the box opening. That flies may be excluded, the compartment under the seat, in which stands the night-soil container, shall be tightly constructed of sound lumber without cracks or crevices. Any opening in this compartment for ventilation shall be screened with 18 mesh crossed per inch wire.

(e) The box, tub, or can soil container shall be strongly constructed. It shall rest on the floor of the privy in such a position that its top shall not be more than 1 inch below

the under surface of the closet seat. Whenever such box, tub, or can container shall cease to be water-tight it shall be replaced by a sound one.

(f) There shall be at the back or side of each privy an opening for the removal of the night-soil container, which opening shall be provided with a tightly fitting let-down board, or 18-mesh cross wire per inch cover, hinged to the house and so constructed as to prevent the access of flies to the night soil. This cover shall be provided with a hook or button and shall always be kept closed. Where practicable, the opening shall abut on a public alley so as to be readily accessible to the city scavenger.

(g) No privy shall be built or maintained within 20 feet of the line of any street or any house, or within 50 (preferably 100) feet of any well, or within 3 feet of the party line of the adjacent lot or lots, except in the rear or side of lots where they abut on the public alley:

(h) Whenever, in the opinion of the State board of health, the condition of any privy is such that it can not be put in sanitary condition the State board of health shall order a new privy constructed in conformity with the foregoing regulations.

(i) All privies shall be kept clean at all times. The excrement shall be removed at least once each week, seat scoured, and building thoroughly cleaned so as to prevent objectionable odors. The door of the house must not be left open.

(j) No wash water, garbage, kitchen slops, or other liquid waste shall be emptied into the privy. No night soil from any person suffering from typhoid fever or other serious bowel trouble shall be emptied into any privy without being previously disinfected in such manner as directed or approved by the State board of health.

(k) Every hotel, restaurant, residence, sleeping apartment, factory, mill, store, workshop, mercantile establishment, theater, picture show, or other places where people are employed, live, or congregate shall be provided with one or more privies, one seat for every 25 or fraction thereof, with separate apartments for the sex and color, and they shall be provided with proper wash and dressing rooms with an abundance of water, soap, and individual towels, and kept at all times in a cleanly state and free from effluvia arising from drain, privy, or otherwise. In public places, stores, etc., the privies shall be plainly designated for color and sex, provided with a supply of toilet paper, and no person shall be allowed to enter or use any such closet or privy assigned to persons of the other color or sex.

(l) Where there is an established system of waterworks and sewer system, all privies located on premises within 300 feet of sewer main or lateral shall be connected with the waterworks and sewer.

Embalmers—Board of Examiners. (Reg. Bd. of H., Aug. 20, 1913.)

The Sanitary Code was amended by striking out from section 110, in the first paragraph, the clause “* * * residing at the domicile of the State board,” so that the first paragraph shall read as follows:

“The State board hereby appoints a commission of examiners, composed of two medical members and two practical embalmers, with the president of the State board as ex officio chairman.”

Water Supplies. (Reg. Bd. of H., Aug. 20, 1913.)

The Sanitary Code was amended by adding the following to chapter 13, on page 102:

“Whenever any person or corporation furnishing water for potable purposes finds it necessary, for any reason whatever, to make any change, temporary or permanent, in the operation of their plant or in the manner of furnishing such water, which may in any way, either temporarily or permanently, tend to deteriorate the potable qualities of the water so furnished, by pumping directly into reservoirs or supply mains untreated water, when the ordinary supply is subjected usually to some form of purification treatment, or any other similar or dissimilar change in said supply, the tendency

of which is to cause polluted waters to be forced into distributing pipes, the said person or corporation, before making such changes, or, in case of emergency, requiring the immediate making of changes in the operation of the plant, or in the manner of furnishing such water, within six hours of making such change, shall notify the local board of health, and shall also notify, by telegraph or telephone, the State board of health as to character and estimated duration of such change."

By amending paragraph 279 so as to read as follows: "It shall be unlawful for any person to use water from any canal, sewer, ditch, or other excavation in the ground, within the limits of any city, except such wells as have been approved by the State board of health, for the purpose of making bread or any other article intended for human consumption or subsistence, nor shall any person use the water so procured for the purpose of washing or cleansing implements or utensils used in the preparation, manufacture, or vending of any article or commodity intended for, or used as, human food or drink."

In paragraph 281, by inserting before the word "well" in the first line the word "shallow."

(The paragraph as amended reads as follows:)

"281. It is hereby made unlawful to excavate or sink a shallow well on any premises used as a bakery or bake shop."

In paragraph 282: By changing last clause to read "that nothing herein shall be construed as prohibiting the boring of deep or artesian wells."

(The paragraph as amended reads as follows:)

"282. Upon any such premises where a well now exists, it shall be the duty of the owner of the property to cause same to be immediately filled up to the surface of the ground: *Provided*, That nothing herein shall be construed as prohibiting the boring of deep or artesian wells."

By inserting in chapter 13 the following:

"It shall be the duty of the mayor of each city, and of the proper officers of all private corporations, partnerships, and of individuals who shall hereafter install a waterworks system, or shall make any changes in any existing system, to file with the State board of health a true and correct copy of the plans and specifications of the entire system to be installed or changed by such city, corporation, partnership, or individual, including plans and specifications of such filtration or other purification plant as may be operated by them in connection therewith, and also plans and specifications of all alterations, additions, or improvements to such systems which may be made from time to time.

"The words 'plans and specifications' as used here shall be construed to mean a true description or representation of the entire system and also a full and fair statement of how the same is to be operated, and in addition to all other things, shall show all the sources through or from which water is or may be at any time pumped or otherwise caused or permitted to enter such system. Such plans and specifications shall be certified by the mayor and the city engineer of city corporations, and by such proper officers and the engineer employed by a private corporation for private corporations, and by some individual member of a partnership, or by the individual owner in case of a waterworks owned and operated by partnerships or individuals, including the engineer employed, if any."

On receipt of the plans and specifications by the State board of health they will be inspected with reference to their effect on the public health and if such board on inspection finds that the proposed water supply is impure and dangerous to individuals or to the public generally, or that the proposed purification system is inadequate to supply a safe water, the said board on its order may require the corporation, partnership or individual owning and operating the same to make such alterations in such waterworks systems as may be required or advisable in the opinion of said board, in order that the water supply may be healthful and free of pollution. Such recom-

recommendations or orders of the State board of health shall be served in writing on such corporations, partnerships, or individuals, and it shall thereupon be the duty of such corporations, partnerships, or individuals to comply with such recommendations or orders.

Toilets and Urinals—Light and Ventilation. (Reg. Bd. of H., Aug. 20, 1913.)

The sanitary code was amended by adding to chapter 18, paragraph 413: "Toilets and urinals shall be in a space which is well lighted and well ventilated and which is separated from space used for any other purpose by walls extending from floor to ceiling. Doors to toilet rooms must fit tightly and be self-closing, except when doors open to outside of building or to open court."

Sewerage Systems—Plans and Specifications Subject to Approval by Board of Health. (Reg. Bd. of H., Aug. 20, 1913.)

The sanitary code was amended by inserting under regulations concerning drains and sewers, the following:

It shall be the duty of the mayor of each city, and of the proper officer of all private corporations, partnerships, and of individuals who shall hereafter install a sewerage system for any city or town in the State, or shall make any additions or changes in existing system, to file with the State board of health a true and correct description of such system. Such plans and specifications shall, upon their receipt by the State board of health be inspected with reference to their effect upon the public health, and if such board finds that such sewerage systems or any part thereof are dangerous to individuals or to the public health generally, the said board on its order may require such alterations as may be required or advisable.

Morbidity Reports—Venereal Diseases. (Reg. Bd. of H., Nov. 25, 1913.)

The sanitary code was amended by adding to section 12, paragraph (a), the following-named diseases: Gonorrhoea, syphilis, and chancroid. This paragraph names diseases which are declared by the State board of health to be communicable and dangerous to the public health. These diseases are notifiable.

MASSACHUSETTS.

Broken Eggs not for Food—Marking of. (Reg. Bd. of H., Nov. 6, 1913.)

At a meeting of the State board of health held November 6, 1913, it was voted to change paragraphs 8 and 15 of the Rules and Regulations Governing the Business of Cold Storage to read as follows:

8. Broken eggs, packed in barrels, kegs, cans, or any other container, if not intended for use as food, shall be marked by the owner when deposited in cold storage, with a stamp or label reading "Not for food" on the side of the body of the container. The words "Not for food" shall be indicated in letters not less than three-eighths of an inch in height and a similar stamp or label shall be placed upon the side of any crate or other package containing more than a single can.

15. Any person, firm, or corporation violating any of the provisions of the above rules and regulations shall be subject to a fine not exceeding \$100 for each offense.

Cold-Storage Eggs—Marking of. (Reg. Bd. of H., Aug. 7, 1913.)

At a meeting of the State board of health held August 7, 1913, it was voted to modify the regulation made June 5, 1913, to read as follows:

The sign or placard required by section 1 of chapter 538 of the Acts of 1913 to be placed upon or immediately above cold-storage eggs, or upon the basket, box, or other container in which cold-storage eggs are placed, shall consist of the words "Cold-storage

eggs" printed in uncondensed gothic type, in letters not less than 1 inch in height, printed in black on a white background, no other lettering to appear on or to be attached to said sign or placard. (This sign or placard to be used only where eggs are offered or exposed for sale.)

Cold-Storage Eggs—Marking of. (Reg. Bd. of H., Oct. 10, 1913.)

On October 10, 1913, the State board of health voted to make the following additional regulation concerning the proper marking of cold-storage eggs when sold to a purchaser:

The marking required by section 1 of chapter 538 of the Acts of 1913,¹ to be placed upon the bag, basket, box, or other container in which cold-storage eggs are placed, after having been sold to a purchaser, shall consist of the words "Cold-storage eggs," printed or stamped in uncondensed gothic type, in letters not less than one-half inch in height, in black, purple, or red ink, no other lettering to appear in connection with the words "Cold-storage eggs." (This method of marking to appear on the bag, basket, box, or other container in which eggs are delivered to the purchaser.)

NEBRASKA.

Common Drinking Cups—Prohibited in Public Places. (Chap. 82, Act Apr. 11, 1913.)

SECTION 1. *Common drinking cup; State board of health.*—In order to prevent the spread of communicable diseases, the State board of health is hereby authorized to prohibit in such public places, vehicles, or buildings as it may designate the providing and use of a common drinking cup and to establish such rules and regulations for this purpose as it may deem necessary.

SEC. 2. *Penalty.*—Whoever violates the provisions of this act, or any rule or regulation of the State Board of health made under authority hereof, shall be deemed guilty of a misdemeanor and be liable to a fine not exceeding \$25 for each offense.

State Board of Health—Powers and Duties. (Chap. 193, Act. Apr. 21, 1913.)

SECTION 1. That section 9867 of Cobbeys' Annotated Statutes for 1911 [C. S., chapter 55, article 7, section 6] is hereby amended to read as follows:

State board of health; rules; quarantine.—The State board of health shall have supervision and control of all matters relating to sanitation and quarantine necessary to the protection of the people of this State from disease arising from insanitary conditions and from contagious, infectious, and epidemic diseases; and it shall be the duty of said State board of health to formulate, adopt, and publish such proper and reasonable general rules and regulations as will best serve to promote sanitation throughout the State, and prevent the introduction or spread of disease. In addition to such general and standing rules and regulations, in cases of emergency wherein the health of the people of the entire State or any locality therein shall be menaced by or exposed to any such contagious, infectious, or epidemic disease or diseases arising from insanitary conditions, or when a local board of health having jurisdiction of a particular locality shall fail or refuse to act with sufficient promptitude and efficiency in any such emergency; or in localities wherein no local board of health shall have been established as provided by law, it shall be the duty of the board to adopt and enforce such special quarantine and sanitary regulations as the occasion and the proper protection of the public health may require; and all necessary expenses incurred in the enforcement of such rules and regulations shall be paid by the city, village, or county for and within which the same shall have been incurred. It shall be the duty of all local,

¹ Public Health Reports, July 25, 1913, p. 1583.

municipal, and county boards of health, health authorities and officials, officers of State institutions, police officers, sheriffs, constables, and all other officers and employees of the State or of any county, city, village, or township thereof, and every person to obey and enforce such quarantine and sanitary rules and regulations as may be adopted by the State board of health; and each and every person or officer specified in this section who shall fail, neglect, or refuse to obey or enforce such rules or regulations shall, upon conviction for each and every such offense, be subject to a fine of not less than \$15 nor more than \$100.

SEC. 2. *Repeal.*—Section 9867 of Cobbeys’s Annotated Statutes for 1911 is hereby repealed as it now exists.

Bacteriological and Pathological Laboratory—Establishment. (Chap. 218, Act Apr. 21, 1913.)

SECTION 1. *State board of health bacteriological and pathological laboratory, establishment.*—That there shall be and is hereby established in this State a laboratory for conducting and carrying on microscopical, bacteriological, and other scientific investigations and tests by and for the State board of health. Said laboratory to be used exclusively for the public benefit, and in cooperation with local boards of health and health officers, and under such regulations as the State board of health, on the recommendation of the secretaries thereof, may prescribe.

SEC. 2. *Same; location, director.*—Such laboratory shall be known as the State board of health bacteriological laboratory and shall be located at such place as the State board of health, on recommendation of its secretaries, may designate. The said State board of health shall appoint, on recommendation of its secretaries, a competent bacteriologist and pathologist who shall be known as director of said laboratory.

SEC. 3. *Director; tests, investigations.*—It shall be the duty of the director to make, or cause to be made, under his personal supervision all tests and investigations within the scope of section 1 hereof, as may be required by the State board of health or local boards of health or health officers of the State or of municipalities therein under and in accordance with rules prescribed by the State board of health, as heretofore provided.

SEC. 4. *Appropriation; director, salary.*—There is hereby appropriated out of the moneys in the treasury of the State not otherwise appropriated, for the equipment of said laboratory, the sum of \$5,000, and for the maintenance and running expenses of said laboratory for the biennium ensuing, that is to say, for the salary of the director, for labor, express, postage, and for incidental expenses, the sum of \$7,000: *Provided, however,* That the salary of the director, which shall be fixed by the State board of health on the recommendation of the secretaries thereof, shall not exceed the sum of \$2,400 per annum.

Appropriation—State Board of Health. (Chap. 231, Act Apr. 23, 1913.)

Appropriation “For the payment of expenses of the State government and miscellaneous items, for the biennium beginning April 1, 1913, and ending March 31, 1915”:

* * * * *

STATE BOARD OF HEALTH.

Office and traveling expenses and other necessary expenses for the gathering of vital statistics and carrying out the intent of the law in behalf of the health inspector and bureau of vital statistics.	\$9,000
For use in case of epidemics and for prevention of the same when authorized by unanimous vote of the State board of health.	5,000
Total for the biennium.	14,000

Appropriation—State Board of Health. (Chap. 233, Act Apr. 23, 1913.)

Appropriation "For the payment of salaries of officers and employees, as follows, for the biennium ending March 31, 1915":

*	*	*	*	*	*	*
STATE BOARD OF HEALTH.						
Salary of health inspector.....						\$1,800
For the biennium.....						3,600
Salary of stenographer.....						840
For the biennium.....						1,680

NEW HAMPSHIRE.

Inspected Milk—Standard for. (Reg. Bd. of H., Apr. 15, 1913.)

License for the production and sale of "inspected milk" may be granted by the State board of health for a period not exceeding one year after an inspection of the premises where the said milk is to be produced by a representative of the State board of health, and after all the requirements promulgated by the board have been provided for and all of the conditions have been agreed to in writing by the producer.

When all of the conditions and requirements have been met to the satisfaction of the State board of health, the latter board may issue a license to use the term "inspected milk," and shall furnish milk-bottle caps with such inscription, statement, or design as may be decided upon, the same to be paid for by the producer.

The purpose of the procedure is to secure a reasonably clean, safe, and healthful milk of a high grade, because produced under strict supervision and better conditions than is usual.

The following, briefly stated and without elaboration of details, are the conditions under which such milk may be produced and sold:

Stables.—Stables shall be kept well whitewashed, ventilated, and reasonably clean. The walls shall be whitewashed, unless their construction renders it unnecessary, and they shall be kept free from cobwebs, dirt, etc. The manure should be removed at least twice daily, and proper bedding should be provided to keep the animals reasonably clean.

Cows.—Physical examination shall be made of the cows at least twice a year by a veterinarian approved by the State board of health. The tuberculin test shall be applied at least once a year, and any cows reacting shall be promptly removed from the herd.

No new cows shall be added until after they have passed the tuberculin test and a physical examination by a veterinary surgeon approved by the State board of health.

Cows, and especially their udders, shall be clean at the time of milking.

Milk room.—A milk room that is clean, light, and screened shall be provided for the cooling, bottling, and storing of the milk and the operations incident thereto.

Employees.—All employees connected in any way with the handling of the milk shall be personally clean and free from any communicable disease.

The health authorities shall be notified at once if any communicable disease appears in any person having to do with the handling of the milk, or in the family of the milkman or producer. Under such circumstances no milk shall be disposed of until officially authorized in writing.

Utensils.—All utensils and apparatus with which the milk comes in contact shall be thoroughly washed, and sterilized with boiling water or steam, and shall be used for no other purpose than that for which they were designed.

No milk bottles shall be removed from a house in which there is or recently has been a case of communicable disease until official permission is granted.

Small-top milk pails shall be used.

No unwholesome food or food liable to taint the milk shall be fed to the cows.

Milk.—The milk shall not be strained in the cow stable, but shall be removed to the milk room immediately after it is drawn. It shall be cooled to 50° Fahrenheit, or below, immediately after it is drawn from the cow, and shall be kept at that temperature until it is delivered to the consumer.

The milk shall be delivered in single-service containers, unless special permission for other method of delivery is granted.

The milk shall not contain bacteria in excess of 100,000 per cubic centimeter, and must be entirely free from pathogenic germs.

Inspections.—Inspections will be made from time to time by inspectors designated by the State board of health. No person will be appointed as inspector who has not first obtained a certificate from the superintendent of the dairy department of the New Hampshire College of Agriculture showing the holder to be qualified to perform the duties imposed under the regulations. Samples of the milk for chemical and bacteriological examination may be taken at any time. License to use the term "inspected milk" may be revoked at any time for noncompliance with the regulations established by the State board of health.

OHIO.

Appropriations State Board of Health. (Acts May 9, 1913.)

For year ending February 15, 1914. (The principal appropriation act for this year was approved Feb. 28, 1913. This act was published in the Public Health Reports Nov. 7, 1913, p. 2393.)

Expenses of pathological work.....	\$500
File cases.....	200
Contingent expenses.....	1,000
* * * * *	
Per diem and expenses of members of board and employees.....	3,500
Apparatus, fittings and supplies, engineering department and laboratory.....	2,000
Contingent expenses.....	1,000
Rent of offices.....	5,328
Traveling expenses, inspector of plumbing.....	1,000
Division of tuberculosis.....	20,000
Survey of occupational diseases.....	7,000

For the fiscal year ending February 15, 1915:

Salary of secretary.....	\$3,500.00
Salary of assistant secretary.....	3,000.00
Salary of chief engineer.....	3,000.00
Salary of bacteriologist.....	3,000.00
Salary of epidemiologist.....	2,000.00
Salary of State inspector of plumbing.....	1,800.00
Salaries of 4 assistant engineers.....	4,800.00
Salaries of 3 laboratory assistants.....	4,240.00
Salary of record clerk.....	1,280.00
Salary of correspondence clerk.....	1,000.00
Salaries of 3 general clerks.....	2,160.00
Salaries of 3 stenographers.....	1,980.00
Salaries of 3 laboratory helpers.....	1,560.00
Salary of mailing clerk and messenger.....	660.00
Salaries of extra clerks.....	720.00
Per diem and expenses of members of board and employees.....	3,500.00
Apparatus, fittings, and supplies, engineering department and laboratory.....	2,500.00
Contingent expenses.....	3,000.00
File cases.....	200.00
Rent of offices.....	7,328.40
Traveling expenses, inspector of plumbing.....	1,200.00
Expenses of pathological work.....	500.00
Division of tuberculosis.....	20,000.00
Survey of occupational diseases.....	7,000.00

Municipal Boards of Health—Duties and Salaries of Employees. (Act May 5, 1913.)

SECTION 1. That section 4411 of the general code be supplemented by the enactment of section 4411-1, to read as follows:

“SEC. 4411-1. The board shall determine the duties and fix the salaries of its employees; but no member of the board of health shall be appointed as health officer or ward physician.”

Foods and Drugs—Standards—Enforcement of Laws. (Act Mar. 29, 1913.)

SECTION 1. That section 375 of the general code be amended to read as follows:

SEC. 375. The State dairy and food commissioner shall enforce the laws against fraud, adulteration, or impurities in foods, drinks, or drugs, and unlawful labeling within the State. The State dairy and food commissioner, in collaboration with the official chemists of the State dairy and food department, shall establish standards of quality, purity, and strength for foods, when such standards are not otherwise established by any law of this State. Such standards shall conform to the standards for foods adopted by the United States Department of Agriculture. The State dairy and food commissioner, in collaboration with the official chemists of the State dairy and food department, shall make such uniform rules and regulations as may be necessary for the enforcement of the food, drug, dairy, and sanitary laws of this State. Such rules and regulations shall, where applicable, conform to, and be the same as, the rules and regulations adopted from time to time for the enforcement of the act of Congress, approved June 30, 1906, and known as the food and drugs act. The State dairy and food commissioner, each assistant commissioner, and each inspector shall inspect drugs, butter, cheese, lard, sirup, and other articles of food or drink, made or offered for sale in the State, and prosecute or cause to be prosecuted each person, firm, or corporation engaged in the manufacture or sale of an adulterated drug or article of food or drink, in violation of law.

SEC. 2. That said original section 375 of the general code be, and the same is hereby, repealed.

Tuberculosis—Visiting Nurses, Appointment Authorized. (Act May 2, 1913.)

SECTION 1. The medical superintendent of any county or district tuberculosis hospital may appoint, subject to the approval of the State board of health, one or more instructing and visiting nurses who may visit any house or place in the county or district wherein there is a case of tuberculosis. In such counties as have not constructed a county hospital for tuberculosis, or joined in the construction of a district tuberculosis hospital, the county commissioners may appoint one or more instructing and visiting nurses who may visit any home or place in the county wherein there is a case of tuberculosis, but such appointments shall be subject to the approval of the State board of health.

SEC. 2. Such nurses shall be subject to the supervision of the medical superintendent of the county or district tuberculosis hospital and the State board of health. Where such appointments are made by the board of county commissioners, such nurses shall be subject to the supervision of the county commissioners and the State board of health.

SEC. 3. The board of county commissioners in counties not supporting a tuberculosis hospital or the board of trustees of such hospitals shall fix the compensation of such nurses. Such compensation and the necessary expenses incurred by such nurses shall be paid from the poor fund of the county, or from the funds provided for the hospital for tuberculosis.

Interurban Cars—Water-Closets and Drinking Water Must be Provided. (Act Mar. 11, 1913.)

SECTION 1. Whoever engages in the operating of interurban car or cars, for a greater distance than 10 miles, and does not place and maintain within such car or cars, so run or operated, a water-closet or dry-hopper closet, properly and sanitarily constructed,

and suitable drinking water for the use of the passengers of such car or cars, shall be fined not less than \$500 nor more than \$1,000.

Industrial Diseases—State Board of Health to Investigate Conditions. (Joint Res. Feb. 13, 1913.)

Whereas the employment of men and women in certain occupations is known to be attended with more than ordinary danger to health, giving rise to what is known as "occupational diseases"; and

Whereas unnecessary sickness and shortening of life, from whatever cause, is a serious loss and of grave concern to the State and to all the people; and

Whereas it is believed to be possible, by public education and by the enforcement of proper measures, to largely prevent unnecessary sickness and premature death among employees in various trades and occupations: Therefore,

Be it resolved by the General Assembly of the State of Ohio, That the State board of health is hereby authorized and directed to make a thorough investigation of the effect of occupations upon the health of those engaged therein with special reference to dust and dangerous chemicals and gases, to insufficient ventilation and lighting, and to such other unhygienic conditions as in the opinion of said board may be specially injurious to health, and to report to the next general assembly the results of such investigation, with such recommendations for legislative or other remedial measures as it may deem proper and advisable.

Be it further resolved, That the finance committee of the house and senate be requested to place in the general appropriation bill an appropriation of \$7,000 for the year 1913 and \$7,000 for the year 1914 for carrying on the above work by the State board of health.

School Physicians—Examination of School Children. (Act May 9, 1913.)

SEC. 7692. Each and every board of education in this State may appoint at least one school physician: *Provided,* Two or more school districts may unite and employ one such physician, whose duties shall be such as are prescribed in this act. Said school physician shall hold a license to practice medicine in Ohio. School physicians may be discharged at any time by the appointing power, whether the same be a board of education or of health or health officer, as herein provided. School physicians shall serve one year and until their successors are appointed, and shall receive such compensation as the appointing board may determine. Such boards may also employ trained nurses to aid in such inspection in such ways as may be prescribed by the board. Such board may delegate the duties and powers herein provided for to the board of health or officer performing the functions of a board of health within the school district if such board or officer is willing to assume the same. Boards of education shall cooperate with boards of health in the preventing of epidemics.

SEC. 7692-1. School physicians may make examinations and diagnoses of all children referred to them at the beginning of every school year and at other times if deemed desirable. They may make such further examination of teachers, janitors, and school buildings as in their opinion the protection of health of the pupils and teachers may require. Whenever a school child, teacher, or janitor is found to be ill or suffering from positive open pulmonary tuberculosis or other contagious disease, the school physician shall promptly send such child, teacher, or janitor home, with a note, in the case of the child, to its parents or guardian, briefly setting forth the discovered facts, and advising that the family physician be consulted. School physicians shall keep accurate card-index records of all examinations; and said records, that they may be uniform throughout the State, shall be according to the form prescribed by the State school commissioner, and the reports shall be made according to the method of said form: *Provided, however,* That if the parent or guardian of any school child or any teacher or janitor after notice from the board of education shall within two weeks thereafter furnish the written certificate of any reputable physician that the child, or teacher, or

janitor has been examined, in such cases the services of the medical inspector herein provided for shall be dispensed with, and such certificate shall be furnished by such parent or guardian from time to time, as required by the board of education. Such individual records shall not be open to the public and shall be solely for the use of the boards of education and health or other health officer. If any teacher or janitor is found to have positive open pulmonary tuberculosis or other communicable disease, his or her employment shall be discontinued upon expiration of the contract therefor, or, at the option of the board, suspended upon such terms as to salary as the board may deem just until the school physician shall have certified to a recovery from such disease.

SEC. 7692-2. The State school commissioner and the State board of health, shall jointly pass rules for the detailed enforcement of the purposes of this act, which rules shall bear the seals of said board and commissioner, the said rules to be printed and promulgated by the State printer; promulgation to consist in supplying a reasonable number of copies to each school superintendent, from whom all that are interested may receive copies.

SEC. 7692-3. No member of the board of education in any district in this State shall be eligible to the appointment of school physician during the period for which he or she is elected.

SEC. 7692-4. Each board of education by the affidavit of an officer thereof or otherwise shall prove to the satisfaction of the State school commissioner that it has complied with the requirements of sections 7692, 7692-1, and 7692-2, of the general code.

SEC. 7693. The board of education of any school district may provide and pay compensation to the employees of the board of health in addition to that provided by the city; township, or other municipality.

PORTO RICO.

Communicable Diseases—Funerals—Preparation of Bodies. (Proclamation Nov. 10, 1913.)

The following amendment to section 11 of Sanitary Rules and Regulations No. 11, entitled "Regulations governing the removal of corpses, cemeteries, burials, disinterments and cremations," as promulgated in Administrative Bulletin No. 57, having been approved by the executive council on November 4, 1913, is hereby promulgated for the information and guidance of all concerned:

SECTION 1. Section 11 of Sanitary Rules and Regulations No. 11, entitled "Regulations governing the removal of corpses, cemeteries, burials, disinterments and cremations" is hereby amended to read as follows:

SEC. 11. Funeral services, with the body present shall not be held in church or in any place, for persons who have died of smallpox, Asiatic cholera, yellow fever, exanthematous typhus, bubonic plague or cerebrospinal meningitis. The bodies of persons who have died of any other diseases may be taken to the church or to any other place for such services provided that said bodies have been wrapped in sheets wet with an antiseptic solution, the formula of which shall be prescribed by the service of sanitation, and placed in a coffin hermetically sealed; and provided further that the death certificate issued by the attending physician has been countersigned by the health officer or his delegate.

Sanitary Regulations—"Urbe" and "Urban Zone" Defined. (Proclamation Dec. 22, 1913.)

The following amendment to Sanitary Rules and Regulations Nos. 2, 3, 4, 5, 7, 8, 9, 10, 11, 14, 15, and 16, as promulgated in Administrative Bulletins Nos. 44, 45, 46, 47, 52, 53, 55, 56, 57, 60, 61, and 63, respectively, having been approved by the execu-

tive council on December 11, 1913, is hereby promulgated for the information and guidance of all concerned:

SECTION 1. The following article will be inserted after section 18 of Regulations No. 2, governing tenement houses; after section 11 of Regulations No. 3, rat-proofing of all buildings and outhouses in Porto Rico; after section 6 of Regulations No. 4, garbage; after section 11 of Regulations No. 5, governing the keeping of dogs, the suppression of stray animals, and prevention of rabies; after section 80 of Regulations No. 7, plumbing and sewerage in Porto Rico; after section 19 of Regulations No. 8, for the extinction of mosquitoes in the island of Porto Rico; after section 11 of Regulations No. 9, amending rules and regulations for the collection of garbage and refuse; after section 3 of regulations No. 10, governing smoke and the use of soft or bituminous coal; after section 40 of Regulations No. 11, governing the removal of corpses, cemeteries, burials, disinterments, and cremations; after section 31¹ of Regulations No. 14, governing the keeping of houses and outhouses in sanitary condition, and to regulate construction in cities, towns, and villages; after section 10² of Regulations No. 15, amendments to Regulations No. 3, rat-proofing of all buildings and outhouses in Porto Rico; and after section 1 of Regulations No. 16, amending Regulations No. 5, governing the keeping of dogs, the suppression of stray animals, and prevention of rabies:

Sec. That the words "urban zone," wherever they may appear in these regulations, will be understood to be substituted by the word "urbe," (a) which means, so far as this regulation is concerned, every conglomeration of buildings, streets, plazas, gardens, parks, etc., wherein the functions of the collective lives are developed with that harmony, efficacy, and convenience that characterizes the individual life. (b) Every "urbe," whatever may be its extension, is formed by three fundamental parts constituting same—the urban nucleus, primitive center of the urbe, around which later on the urban zone develops as periphery of the same, and finally the suburbs which are prolongations or extensions, adjacent or not, to said "urban zone."

Buildings—Light and Ventilation. (Proclamation Dec. 22, 1913.)

The following amendments to Sanitary Rules and Regulations No. 14, entitled "Rules and regulations to govern the keeping of houses, edifices, and outhouses in sanitary condition, and to regulate construction in cities, towns, and villages," as promulgated in Administrative Bulletin No. 60, having been approved by the executive council on December 11, 1913, is hereby promulgated for the information and guidance of all concerned:

SECTION 1. Section 26³ of Sanitary Rules and Regulations No. 14, "Governing the keeping of houses and outhouses in sanitary condition, and to regulate the construction in cities, towns, and villages," is hereby amended so as to read as follows:

"SEC. 26. In the houses or edifices used as dwelling places the capacity of each living or sleeping room shall not be less than 22.75 cubic meters; and each room, including the bathroom and water-closet, shall receive light and ventilation directly from the street, yard, or garden when possible, and in each room the area of the openings to the outside air shall be not less than one-fifth the area of the floor, at least one-fifth of the area of the outside openings shall be disposed of in such manner as to insure ventilation when the doors and windows are closed. All inside doors shall be provided further with open transoms for ventilation, the height of which shall not be less than 30 centimeters. The total area of the floor of each living or sleeping room shall be at least 7 square meters, the width of the same shall be not less than 2½ meters, the height from floor to ceiling shall be not less than 3 meters, and the length shall not exceed twice the height. Kitchens shall have an area of at least 4 square meters and shall be ventilated the same as living rooms.

¹ Public Health Reports June 20, 1913, p. 1311.

² Public Health Reports June 20, 1913, p. 1312.

³ Public Health Reports, June 20, 1913, p. 1310.

All new dwelling houses, the walls of which are less than 2 meters from the side lines of the lot, shall be provided with courts to afford ventilation as above set forth; the width of said courts shall be not less than 3 meters, and if the court is inclosed, the length shall be not less than 5 meters. When the building is constructed with an open space between the lot lines and the side walls, the width of the court shall be measured from the side lines of the lot.

No court hereafter erected for ventilation purposes shall be covered by a roof or skylight, but every such court shall be open, except when the first floor is used for mercantile purposes, in which case the court shall be open from the top of the first floor to the sky.

TENNESSEE.

Habit-Forming Drugs—Sale of. (Chap. 11, Act Sept. 25, 1913.)

SECTION 1. That on and after the taking effect of this act, it shall be unlawful for any person in the State of Tennessee to sell, barter, distribute, or give away any opium or coca leaves, or any compound, manufacture, salt, derivative, or preparation thereof: *Provided*, That this shall not apply—

(a) To the dispensing or distribution of any said drugs to any patient by a physician, dentist, or veterinary surgeon, registered in the State of Tennessee under the provisions of the several acts regulating the practice of their profession: *Provided, however*, That said distribution or dispensing shall be in the course of his professional practice only, and that such physician, dentist, or veterinary surgeon shall personally attend such patient.

(b) To the sale, dispensing, or distribution of any said drugs by pharmacists registered under the laws of the State governing the practice of the profession of pharmacy to a consumer under and in pursuance to a written prescription issued by a physician, dentist, or veterinary surgeon of the standing mentioned in (a) above: *Provided, however*, That such prescription shall be dated as of the day on which signed and shall be signed by the physician, dentist, or veterinary surgeon who shall have issued the same.

(c) To the sale or distribution of any of the aforesaid drugs by any wholesale druggist, dealer, or jobber within the State to a retail dealer.

SEC. 2. That every wholesale or retail dealer shall keep in his place of business a registry, to be made in accordance with the rules and regulations hereinafter provided for; said registry shall plainly show all purchases made by said persons of the aforesaid drugs, date purchased, from whom purchased, and amount of said purchase. He shall likewise keep a registry which shall show all sales of said products, including the date on which sale is made, the amount sold, and to whom sold. All retail dealers and pharmacists doing business pursuant to the terms of this act shall likewise keep on file for a period of two years all prescriptions containing such drugs, which have been filled by them. Said records of every character shall be open to inspection by all State and municipal officials who are charged with the enforcement of any law or municipal ordinance regulating the sale, prescribing, dealing in, or distribution of the aforesaid drugs. Physicians who shall dispense or distribute any of the aforesaid drugs provided by this act shall keep a duplicate of all prescriptions issued by them for a term of two years, and said duplicates shall be subject to inspection by any of the officers named in the preceding paragraph.

SEC. 3. That the possession or control of any of the aforesaid drugs, by any persons other than those excepted in section 1 and 2 of this act shall be presumptive evidence of a violation of this act: *Provided*, That this section shall not apply to any employee of any person exempted as above, who has such possession or control by virtue of his employment, and not on his own account, or to any United States, State, or municipal officer, board, or other authorities who or which has possession of any such drugs for purposes of investigation enforcement of law, or otherwise; or to a warehouseman holding possession of same for a person exempted under the provisions of this act, or to

common carriers engaged in transporting such drugs: *Provided further*, That it shall not be necessary to negative any of the aforesaid exemptions in any complaint, information, indictment, or other writ or proceeding laid or brought under this act; and the burden of proof of any such exception shall be upon the defendant.

SEC. 4. That the provisions of section 2 above shall not apply to any person who keeps the records therein named in accordance with the laws of the United States as now existing, or which shall hereafter be made providing for such records.

SEC. 5. That the word "person" as used in this act shall be construed to import the plural or singular, as the case demands, and shall include firms, corporations, companies, societies, and associations.

SEC. 6. That it is hereby made the special duty of the pure food and drug inspector and his duly appointed assistant inspectors and chemists to specially enforce the provisions of this act, and rules and regulations for its enforcement shall be made by the said State pure food and drug inspector, and the secretary of State board of health.

SEC. 7. That any person who shall disclose any of the information contained in the registers, prescriptions, or other records mentioned in this act, except for the purpose of the enforcement of the provisions of this act, or of enforcing any other law of the State or the ordinances of any municipality, shall be guilty of a misdemeanor, and shall, upon conviction thereof, be fined and imprisoned as hereinafter provided.

SEC. 8. That the provisions of this act shall not be construed to apply to the sale, distribution, giving away, or dispensing of preparations and remedies which do not contain more than 2 grains of opium, or more than one-fourth of a grain of morphine, or more than one-twelfth of a grain of heroin, or more than 1 grain of codein, or any salt or derivative of any of them in 1 fluid ounce, or if a solid or semisolid preparation, in 1 avoirdupois ounce; or to liniments, ointments, or other preparations which are prepared for external use only, except liniments, ointments, and other preparations which contain cocaine or any of its salts or alpha or beta eucaine, or any of their salts or any synthetic substitute for them: *Provided*, That such remedies and preparations are sold, distributed, given away, or dispensed as medicines and not for the purpose of evading the intentions and provisions of this act. The provisions of this act shall not apply to decocainized coca leaves, or preparations made therefrom or to other preparations of coca leaves which do not contain cocaine.

SEC. 8-A. That no retail druggist or dealer shall have on hand at one time a stock greater than 5 ounces of cocaine or of tropa-cocaine, hollo-cocaine, nova-cocaine, alpha eucaine, beta eucaine, and if the stock on hand of any one of said substances shall be as much as 5 ounces none of the other substances shall be kept on hand at the same time. Said drugs shall not be sold in the flake or crystal form, but in solution only, which said solution shall not be stronger than 5 per cent.

SEC. 9. That any person violating any of the provisions of this act shall be guilty of a misdemeanor, and on conviction thereof for the first offense, shall be punishable by a fine of not less than \$50 nor more than \$100, and for the second offense by a fine of not less than \$100 nor more than \$500, and by imprisonment for 30 days in the county workhouse. It shall be the duty of the circuit and criminal court judges of this State to give the provisions of this act in special charge to the grand jury, and the grand jury shall have and exercise inquisitorial power over any violation of this act, and no prosecutor shall be required for an indictment against a person for violating the provisions of this act.

SEC. 10. That all laws and parts of laws in conflict herewith shall be and the same are hereby repealed, and this act shall take effect from and after January 1, 1914, the public welfare requiring it: *Provided, however*, That nothing contained in this act shall be construed to impair, alter, amend, or repeal any of the provisions of chapter 297 of the acts of 1907, or any amendments thereto.