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A MODEL STATE LAW FOR MORBIDITY REPORTS.

ADOPTED BY THE ELEVENTH ANNUAL CONFERENCE OF STATE AND TERRITORIAL HEALTH AUTHORITIES WITH THE UNITED STATES PUBLIC HEALTH SERVICE, MINNEAPOLIS, JUNE 16, 1913.

The intrastate control of matters relating to the public health has been repeatedly construed to be a part of the police powers of the several States and to be therefore a power retained by the States and not delegated to the Federal Government. Because of this the only means by which uniformity can be attained in the notification of the occurrence of sickness and in morbidity reports in general is for the several States to enact uniform laws or promulgate uniform regulations covering the subject.

With this purpose in view, the annual conference of State and Territorial health authorities with the United States Public Health Service, provided for by act of Congress approved July 1, 1902, held at Minneapolis June 16, 1913, after careful deliberation, adopted a model law for morbidity reports.

The draft of the law was submitted to the conference by the standing committee on morbidity reports, the membership of which is as follows:

Mark W. Richardson, M. D., secretary and executive officer
Massachusetts State Board of Health, *chairman*.

S. J. Crumbine, M. D., secretary and executive officer
Kansas State Board of Health.

Ennion G. Williams, M. D., commissioner of health of
Virginia.

William F. Snow, M. D., secretary and executive officer
California State Board of Health.

R. L. Dixon, M. D., secretary and executive officer
Michigan State Board of Health.

John W. Trask, Assistant Surgeon General, United States
Public Health Service.

It is recommended that in the States where there is authority for so doing the provisions of the law be promulgated as regulations, until such time as the respective legislatures have the opportunity to enact the Model Law.

The following is the Model Law as adopted by the conference:

MODEL LAW.

A bill to provide for the notification of the occurrence and prevalence of certain diseases.

Be it enacted by the Senate and General Assembly of the State of _____:

SECTION 1. It shall be, and is hereby, made the duty of the State department of health (or commissioner or board of health) to keep currently informed of the occurrence, geographic distribution, and prevalence of the preventable diseases throughout the State, and for this purpose there shall be established in the State department of health a bureau (or division) of sanitary reports which shall, under the direction of the State commissioner of health (State health officer or secretary of the State board of health), be in charge of an assistant commissioner of health who shall receive an annual salary of _____ dollars and the necessary expenses incurred in the performance of his duties. The State department of health shall provide such clerical and other assistance as may be necessary for the establishment and maintenance of said bureau.

SEC. 2. 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).

Continued fever lasting seven days.

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).

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.

Syphilis.

GROUP IV.—DISEASES OF UNKNOWN ORIGIN.

Pellagra.

Cancer.

Provided, That the State department of health (or board of health) may from time to time, in its discretion, declare additional diseases notifiable and subject to the provisions of this act.

SEC. 3. Hereafter each and every physician practicing in the State of ——— 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, 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.

SEC. 4. 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. 5. 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, or other person in charge of the patient.

SEC. 6. Teachers or other persons employed in, or in charge of, public or private schools, including Sunday schools, shall 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. 7. The written reports of cases of the notifiable disease required by this act of physicians shall be made upon blanks supplied for the purpose, through the local health authorities, by the State department 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. 8. 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 department 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 office. 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 office and whether measures were taken to prevent the spread of the disease or the occurrence of additional cases.

SEC. 9. Local health officers or boards of health shall, in addition to the provisions of section 8, make such other reports as may be provided for by regulations promulgated by the State department of health (or board of health).

SEC. 10. 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 department of health of the number of cases occurring in the epidemic, 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 department 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.

SEC. 11. No person shall be appointed to the position of local health officer in any city, town, or county until after the qualifications of said person have been approved by the State department of health.

SEC. 12. In localities in which there are no local health officers or boards of health, and in localities in which, although there are health officers or boards of health, adequate provision has not, in the opinion of the State department of health, been made for the proper notification, investigation, and control of notifiable disease, and in localities in which the local health authorities fail to carry out the provisions of this act, the State department of health shall appoint properly qualified sanitary officers to act as local health officers and to prevent the spread of disease in and from such localities and to enforce the provisions of this act: *Provided*, That salaries and other expenses incurred under the provisions of this section shall be paid by the local authorities.

SEC. 13. Any physician or other person or persons who shall fail, neglect, or refuse to comply with, or who shall violate any of the provisions of this act shall be guilty of a misdemeanor and upon conviction thereof shall be sentenced to pay a fine of not less than — dollars nor more than — dollars for each offense: *Provided*, That in the case of a physician his license to practice medicine within the State may be revoked.

SEC. 14. No license to practice medicine shall be issued to any person until after the applicant shall have filed with the State licensing board a statement, signed and sworn to before a notary or other officer qualified to administer oaths, that said applicant has familiarized himself with the requirements of this act, a copy of which sworn statement shall be forwarded to the State department of health.

SEC. 15. The sum of ——— dollars is hereby appropriated from any money in the State treasury not otherwise appropriated for carrying out the provisions of this act.

SEC. 16. This act shall take effect immediately and all acts or parts of acts inconsistent with the provisions of this act are hereby repealed.

STANDARD NOTIFICATION BLANK.

The following model notification blank was also submitted by the committee on morbidity reports and approved and adopted by the conference as the standard notification blank referred to in section 7 of the Model Law as the one to be used in the reporting of cases of the notifiable diseases. This blank is intended to be printed on a post card:

[Face of card.]

....., 191...
(Date.)

Disease or suspected disease.....
 Patient's name....., age....., sex....., color.....
 Patient's address....., occupation.....
 School attended or place of employment.....
 Number in household: Adults....., children.....
 Probable source of infection or origin of disease.....
 If disease is smallpox, type....., number of times successfully vaccinated and approximate dates.....
 If typhoid fever, scarlet fever, diphtheria, or septic sore throat, was patient, or is any member of household engaged in the production or handling of milk.....
 Address of reporting physician.....
 Signature of physician.....

[Reverse of card.]

For use of local health department.

.....
 Was case investigated by health department?.....

 Was nature of disease verified?.....

 What measures were taken to prevent spread or the occurrence of additional cases from same origin?.....

....., 191.
(Date.)

Health Department,
(City).....
(State).....

AN INVESTIGATION OF THE PREVALENCE OF TRACHOMA IN THE STATE OF MINNESOTA.

By TALLAFERRO CLARK, Surgeon, United States Public Health Service.

Three surveys have been made since May 1, 1912, to determine the prevalence of trachoma among certain elements of the population in the State of Minnesota. Two of these surveys were made at the request of the State board of health.

The first survey occupied the month of May, 1912. It consisted of a preliminary survey of portions of the White Earth and Leech Lake Indian Reservations to define the reported prevalence of trachoma among the Indian population of the State, of an examination of a number of public-school children in towns contiguous to Indian reservations to determine the relative disease status of the neighboring white and Indian population, and, lastly, of an examination of a number of miners at various locations on the Mesaba and Vermilion iron ranges.

The public-school children of most of the towns of the Mesaba Range, St. Louis and Itasca Counties, were also examined to determine the spread of the disease from the minor to the general population of that section of the State.

A second survey was made between October 4 and November 15, 1912. This survey was of the Indian population and was made in compliance with the act of Congress approved August 24, 1912, making appropriation for the current and contingent expenses of the Bureau of Indian Affairs, containing the following provision:

Provided, That the sum of \$10,000, or as much thereof as may be necessary, is hereby appropriated, out of any money in the Treasury not otherwise appropriated, to enable the Public Health and Marine-Hospital Service to make a thorough examination as to the prevalence of tuberculosis, trachoma, smallpox, and other contagious and infectious diseases among the Indians of the United States, full report to be made to Congress not later than February 1, 1913, with such recommendations as may be deemed advisable.

A final survey was made by order of the Surgeon General of the Public Health Service at the request of the Minnesota State Board of Health. This survey consisted of an examination of school children, public and parochial, at various points within the State, of the pupils of the various State normal schools, of the students of the State agricultural school at Minneapolis, of the inmates of the various State penal and reformatory institutions, and of the schools for the deaf, blind, and feeble-minded.

This investigation commenced March 7, 1913, and was completed by April 18, 1913.

A glance at the accompanying maps will show that these surveys are the most extensive yet undertaken in any one State of the Union for the determination of the prevalence of trachoma.

The examinations were confined to no one particular part of the cosmopolitan population of the State, but embraced all elements at points widely separated. It is therefore believed that the results of these surveys are representative.

In this report the trachoma situation of the State is discussed under the following headings:

- I. Trachoma among the Indians.
- II. Survey of public schools in the vicinity of Indian reservations.
- III. Trachoma on the Mesaba and Vermilion iron ranges, St. Louis and Itasca Counties.
- IV. Trachoma in schools and State institutions.

The undue prevalence of trachoma among Indians of Minnesota and other States had been brought to attention early in 1912, and on April 10 of that year the Minnesota State Board of Health requested the cooperation of the Public Health Service in investigations to determine the prevalence of the disease among citizens of the State. Following these investigations the American Medical Association at its meeting in Atlantic City, June 3-7, 1912, by resolution requested the Public Health Service to conduct a nation-wide investigation of the disease.

Arriving aliens afflicted with trachoma were not deported because of the disease prior to its classification by the Secretary of the Treasury in 1897 as a dangerous contagious disease. Thousands of cases were imported among arriving immigrants prior to 1897. It therefore becomes necessary to seek the foci of infection established by these cases and to stamp them out wherever found.

Infected foci also receive additions through those who gain entry to the country in an illegitimate way. Over 30,000 desertions by foreign seamen are reported annually to the immigration authorities. A considerable percentage of the deserters who have been subsequently apprehended have been found afflicted with trachoma.

Nature, Course, and Treatment of Trachoma.

Trachoma is a dangerous contagious disease of the eyes. Under favorable conditions it may spread widely in a community.

Untreated, 90 per cent of the cases of this disease result in some optical defect, ranging from refractive errors to complete blindness. In countries where the disease is endemic it is estimated that 75 per cent of all cases of blindness are due to this cause.

The disease is chronic in its course, is difficult of cure, and its contagiousness may persist for years. The best treatment is preventive, and for this reason it is necessary to supplement the work done at

our ports of entry by a survey to detect existing cases in the population, in order to place such cases, wherever found, in proper hygienic surroundings and prevent the spread of the disease to others.

Throughout these investigations only those cases in which there was conjunctival infiltration and thickening associated with so-called granulations and scar tissue formation were classified as trachoma.

Quite a number of cases were encountered in which the conjunctiva was swollen and apparently thickened, in which the granulations were not characteristic, and in which no scar tissue was present. These cases were regarded as suspicious and could not be pronounced trachomatous at the one and only time observed. It would require the application of the therapeutic test to determine their true nature. Doubtless many of the cases regarded as suspicious at the time of this examination will ultimately prove not to be trachoma.

In each instance the examination consisted of an inspection of the conjunctiva exposed by everting the upper eyelids. Advanced cases of trachoma and cases with severe symptoms can easily be recognized by simple inspection. On the other hand, many apparently benign and quiescent cases present no easily recognizable external manifestations and can be detected only by everting the eyelids and exposing the conjunctiva.

From an epidemiological point of view, these are the most important cases, because they are potentially a source of danger, yet are not readily recognized unless looked for in the manner described.

General Results.

Within the past 12 months I have examined within the State of Minnesota 52,847 persons of all classes, including Indians, and found 610 cases of active trachoma—1.14 per cent.

In the white population 77 cases of trachoma were found among 49,305 people, in comparison with 533 cases among 3,542 Indians examined.

Owing to the fact that a separate survey was made by me of the Indian population of Minnesota during October and November, 1912, a separate table showing the result of the preliminary survey during May of the same year is not given in this report, nor is the number of examinations made included in the general results of this survey. The second more detailed survey of the Indian population no doubt included many, if not all, of the Indians seen in the course of the May examination. However, two white children were found on the White Earth Reservation who were suffering from trachoma.

An examination was also made of 49 white men at several lumber camps during this survey, but no trachoma was found among them.

I. Trachoma among the Indians of Minnesota.

This investigation started at Grand Portage, Cook County, Minn. October 7, 1912, and was completed at the Fond du Lac Reservation, Carlton County, Minn., November 15, 1912.

The following reservations and schools were visited: Grand Portage and Grand Marais, Vermilion Lake and Tower Reservation, Red Lake Reservation and schools, Nett Lake Reservation and Pelican Point, Leech Lake Reservation and schools, Cass Lake Boarding School and Winnibigoshish Lake region, Mille Lac nonreservation settlement, and Fond du Lac Reservation.

GENERAL CONSIDERATIONS.

The Indians of Minnesota are of the Chippewa Tribe.

The widely distributed Indian population, the lack of good roads, the element of time, and the season of the year constituted difficulties to be taken into consideration and overcome in making this investigation.

The reservation population of Minnesota is widely scattered, there being but few settlements, and these small and far apart. At every house visited it was necessary to explain the object of and the authority for the examination and, at times, to use persuasion before any examination could be made. In many instances it was necessary to use an interpreter, which was a considerable handicap because of the time consumed in making explanations.

The unusually mild and open autumn, with the incidence of the hunting season, caused many absentees from families visited. Indeed, many houses were found closed, the whole family being absent on a hunting expedition, still further limiting the total number that could be examined within a given time.

Furthermore, Congress having set a time limit for the completion of this investigation, it became necessary to limit the number of Indians examined within a given territory in order to complete the investigation within the designated period. However, every Indian school and reservation within the State was visited and a sufficient number of Indians were examined, at many widely separated points, to form a basis for the calculation of accurate and representative percentages. Over one-third of the Indians of the State were examined.

ORIGIN OF TRACHOMA AMONG THE INDIANS OF MINNESOTA.

The consensus of opinion expressed by older Indians is to the effect that trachoma is a disease of comparatively recent introduction among them. Nowhere in the early literature dealing with the Indian can I find any reference to a prevalence of eye affections among them. The presence of many old cases of the disease, of years' duration, in aged people, in connection with the present prev-

alence and wide distribution of the disease among Indian tribes, would indicate that it has existed among them for several generations.

The majority of the intelligent Indians believe the disease was introduced among the Chippewas by trappers and lumbermen and that it did not exist among them prior to the advent of the white man.

CAUSE OF THE SPREAD OF THE DISEASE AMONG INDIANS.

It may be that the Indian is peculiarly susceptible to the disease. In the course of the general survey of the Indian population referred to, Schereschewsky and others observed a number of cases of trachoma in infants in arms. This is in marked contradistinction to conditions among white people and is suggestive that the subconjunctival lymphoid tissue, the seat of trachomatous infection, is developed earlier in the Indian than in the other races, which is usually about the third year, and may be indicative of an increased susceptibility to the disease.

The principal causes of the spread of trachoma among Indians are their habits, their dwellings, and their indifference to treatment. The average Indian is careless in his personal habits, indifferent to dirt in connection with himself and his surroundings, and lives for the most part in overcrowded, poorly constructed, ill-ventilated houses.

These conditions, in connection with the Indian's known disinclination to continue the prolonged and painful treatment necessary for the cure of trachoma, are most favorable for the spread among them of not only trachoma, but other contagious and infectious diseases.

The Indian is very hospitable and fond of visiting. The social life of the Indian has no doubt played an important part in the spread of the disease, not only from one family to another, but also from tribe to tribe.

PREVALENCE.

Trachoma among the Indians of Minnesota is given special consideration in Tables I to V, inclusive.

TABLE I.—*Trachoma among the Indians of Minnesota.*

Reservation and schools.	Tribe.	Number examined.	Cases of trachoma.	Percentage of trachoma.
Fond du Lac.....	Chippewa.....	182	2	1.09
Grand Portage and Grand Marais.....	do.....	143	.....	.....
Leech Lake.....	do.....	598	95	15.88
Mille Lacs.....	do.....	178	4	2.24
Nett Lake and Pelican Point.....	do.....	171	.....	.....
Red Lake.....	do.....	640	117	18.28
White Earth.....	do.....	1,323	272	20.56
Vermillion Lake.....	do.....	120	1	.83
Pipestone ¹	do.....	187	42	22.46
Total.....	.....	3,542	533	15.04

¹ Examined by Preble.

TABLE II.—*Trachoma among reservation Indians, exclusive of school children.*

Reservation.	Number examined.	Cases of trachoma.	Percentage of trachoma.
Fond du Lac.....	162	2	1.23
Grand Portage and Grand Marais.....	143		
Leech Lake.....	458	63	13.75
Mille Lacs.....	178	4	2.24
Nett Lake.....	145		
Pelican Point.....	26		
Red Lake.....	464	66	14.13
White Earth.....	970	192	19.79
Vermilion Lake.....	36		
Total.....	2,582	327	12.66

Reference to Table I will show 533 cases of trachoma among 3,542 Indians examined, a percentage of 15.04.

No trachoma was found among the Indians in the northeastern section of the State, including Grand Portage, Grand Marais, Tower, and Nett Lake. The only explanation for this is lack of exposure. We are informed that these Indians have but little intercourse with the heavily infected Red Lake and White Earth Indians. The Canadian Northern Railway from this district and the Minnesota International Railway from the Red Lake and other districts converge and meet at International Falls, Minn. Across the Rainy River, at this point, is a Canadian Indian reservation, a common visiting ground for Indians from these two sections, which may, in the future, be the indirect means of spreading the disease among those at present uninfected.

One case of trachoma was found in the Indian boarding school at Tower, but this case was received from another section of the State and was subsequently excluded from the school. The highest percentages of trachoma were found in the White Earth, Red Lake, and Leech Lake Reservations, 20.56, 18.28, and 15.88 per cent, respectively.

The infection on the Red Lake and Leech Lake Reservations is rather uniform, but varies in different parts of the White Earth Reservation. At Pine Point, White Earth Reservation, in a house-to-house canvass, 147 people were examined, with 53 cases of trachoma among them, a percentage of 36.05. These Indians are greatly addicted to drink, are in abject poverty, and their homes and surroundings are the most squalid imaginable.

At the Fond du Lac Reservation the percentage of trachoma to the total examined was only 1.24. These Indians are in rather close contact with civilization, are fairly well housed, and have some reserve food supply.

TABLE III.—*Trachoma in Indian boarding schools.*

Name of school.	Pupils examined.	Cases of trachoma.	Percentage of trachoma.
Cass Lake.....	47	18	38.29
Cross Lake.....	46	12	26.06
Leech Lake.....	64	12	18.75
Pipe Stone.....	187	42	22.46
Red Lake.....	63	19	30.15
St. Benedict's Industrial.....	94	12	12.75
St. Mary's Mission, Red Lake.....	64	20	31.25
Vermilion Lake.....	84	1	.11
White Earth.....	130	42	32.30
Wild Rice River.....	54	15	27.77
Total.....	833	193	23.16

TABLE IV.—*Trachoma in Indian day schools.*

School.	Number of pupils.	Cases of trachoma.	Percentage of trachoma.
Fond du Lac.....	20	0	0.00
Portersville, White Earth.....	29	1	3.44
Squaw Point, Leech Lake.....	17	0	0.00
Sugar Point, Leech Lake.....	12	2	16.66
White Earth.....	46	10	21.73
Total.....	124	13	10.48

A comparison of Tables I to IV will show that the highest percentage of trachoma, 23.16, is found in the Indian boarding schools. The percentage among reservation Indians, exclusive of boarding-school children, and in the day schools is 12.66 and 10.48, respectively.

The enormously greater prevalence of trachoma among boarding-school children indicates strongly that the intimate daily contact of school life is a potent factor in the spread of the disease among the pupils.

The return of infected pupils to reservation life at the close of the school term may cause a further and more rapid spread of the disease in the general Indian population than would otherwise have been the case and carry the disease into uninfected territory.

INJURY TO VISION CAUSED BY TRACHOMA.

Grave visual defects are usually late effects of trachoma; therefore Table V may be considered as a presage of future visual damage. Most of the cases of trachoma enumerated in this survey are of comparatively recent origin, and in young subjects who may yet become blind as a late effect of trachoma.

Proportionately, the greatest number of cases of trachoma were found among Indian school children, among whom we would scarcely expect to find marked visual damage by reason of the comparatively short time they have had the disease. For this reason Table V was calculated on the basis of reservation Indians, exclusive of boarding-school children, among whom most of the visual defects were observed.

TABLE V.—*Injury to vision among reservation Indians caused by trachoma.*

Number examined.....	2,582
Cases of trachoma.....	327
Number with marked injury to vision.....	41
Number blind from trachoma.....	19
Percentage of marked visual damage in trachoma cases.....	18.04
Percentage of visual damage total examined.....	2.32
Percentage of blind from trachoma to total examined.....	.73

The greatest numbers of cases with serious damage to vision were encountered on the reservations most heavily infected with trachoma, and therefore presumably infected for the longest time. In these reservations trachoma has undoubtedly existed for generations and found conditions favorable for its spread and perpetuation, with consequent severity of its manifestations.

These figures do not take into consideration minor damage and refractive errors, invariable accompaniments of trachoma, which at the same time exert a powerful deterrent influence on the comfort and well-being of one so afflicted.

ECONOMIC LOSS TO THE STATE.

It will require prompt and drastic treatment to prevent the further spread of trachoma among the Indian population and to preserve vision to many of those who otherwise are doomed to blindness.

Many of the Indians are already citizens of the State and exercise the right of the franchise. In time all the Indian land will be allotted and the Federal Government will gradually relinquish its guardianship. The State is therefore threatened with a heritage of disease and blindness, which will be a dead economic loss and which will heavily tax the resources of communities wherein these people may reside.

BEARING OF THE PREVALENCE OF TRACHOMA AMONG THE INDIANS ON THE HEALTH OF THE STATE.

Indian reservations are no longer remote from centers of white population. The tide of settlement has reached their confines and overflowed their borders. Many white settlers have bought Indian lands and settled among them. Two of the largest reservations within the State are traversed by railroads. A county has been organized within the boundaries of one reservation, and children of both races attend the public schools.

The Indian is fond of travel and makes frequent trips by rail, increasing the danger of the spread of trachoma virus to the traveling public.

Many Indians are employed in and about lumber camps during the logging season. A number of Indian "shacks" are always to be found on the outskirts of lumber camps operating in the vicinity of reservations. A lumber jack, infected at this source, may spread the disease when the logging season is ended and he leaves, as is his custom, to engage in farming and other pursuits in this and other States.

II. Survey of public schools in vicinity of reservations.

An examination of public-school children at points contiguous to Indian reservations disclosed 77 children of mixed blood among a total of 1,428 examined. Three cases of trachoma, or 3.8 per cent, were found among these 77 children of mixed blood, and no cases among the remaining 1,351 white pupils. On the other hand, 2 cases suspicious of trachoma were found among white pupils and 4 cases among the mixed-blood children. It is a reasonable presumption that the mixed-blood school population is the source of infection in these cases, should they prove to be trachoma.

TABLE VI.

Place.	School.	Examined.		Cases of trachoma found.		Suspicious cases.	
		White.	Mixed blood.	White.	Mixed blood.	White.	Mixed blood.
Becker County.....	District No. 38.....	38	1		1		
Park Rapids.....	Central.....	365	3				
Do.....	East Side.....	73					
Mahnomen County.....	Districts No. 3 and No. 1.....	7	3				
Do.....	do.....	87	28		1	1	
Do.....	District No. 2.....	5	4				
Waukon.....		34	12				
Detroit.....	High school and Wash- ton School.	580	23		1	1	4
Walker.....		162	3				
		1,351	77		3	2	4
Miscellaneous (teachers, janitors, etc.).....		58					
Mixed-blood family.....			5				
Scattering.....		3					
		61	5				

Percentage of trachoma among mixed-blood pupils, 0.038.

This examination shows that children of mixed parentage are attending the public schools in appreciable numbers. It is reasonable to suppose as time goes by this number will be greatly increased. The existence of trachoma, among a few even of these children, is a possible source from which trachoma may spread to the surrounding white population, and is a danger to be guarded against.

III. Trachoma on the Mesaba and Vermilion Iron Ranges, St. Louis and Itasca Counties.

A total of 1,711 miners were examined and 34 cases of trachoma found, 1.99 per cent.

At Ely, on the Vermilion Range, 392 miners were examined, and no trachoma was found among them. Therefore the 34 cases of trachoma were confined to the 1,319 miners of the Mesaba Range, a percentage of 2.57.

A significant fact is the finding of cases of active trachoma at each of the eight mining locations visited on the Mesaba Range.

The difference with respect to the trachoma situation on the two ranges is due to a difference in the social conditions of the miners of the two regions. The miners of the Vermilion Range are mostly Finns, who are married and live in their own homes. These men have remained and worked in this one location for years.

TABLE VII.—*Trachoma among miners of the Mesaba and Vermilion iron ranges.*

Location.	Number examined.	Trachoma.		Percentage of trachoma.
		Positive.	Suspected.	
Biwabik.....	73	3	1	4.10
Bovey.....	66	4	.....	6.06
Chisholm.....	1	1	.....	.....
Coleraine.....	93	3	2	2.15
Ely.....	392	.....	.....	.....
Gilbert.....	1	1	.....	.....
Hibbing.....	710	8	4	1.12
Marble.....	65	7	.....	10.76
Virginia.....	310	7	4	2.25
Total.....	1,711	34	11	1.99

The miners of the Mesaba Range are from southeastern Europe. The majority of them are single and live in crowded boarding houses. They frequently move from one location to another and have no fixed abode, so that one case of trachoma may infect not only one boarding house or camp but also other camps in other locations as he moves from place to place.

In the past miners have brought suit against the companies, claiming that they have contracted trachoma by getting dirt into the eyes while at labor. It has been the practice of the mining companies to discharge, therefore, all miners found to be afflicted with the disease. This practice has contributed not a little to the spread of trachoma among them, because, when discharged, the miner simply and conveniently changes his name and moves to another location, where he acts as a focus of infection in another family or boarding house.

The cases of trachoma seen among these miners were active, some of them in the acute stage of the disease. The presence of such numbers of comparatively recent cases of trachoma at so many different

locations points to foci of infection among them from which the disease is spreading, rather than that the number of diseased is augmented by fresh importations.

INVESTIGATION OF TRACHOMA IN PUBLIC SCHOOLS OF MESABA IRON RANGE.

TABLE VIII.

School district.	Number of pupils examined.	Cases of trachoma.	
		Positive.	Suspicious.
Biwabik.....	465	3	.....
Bovey.....	143	.....	.....
Chisholm.....	1,064	2	1
Coleraine.....	205	.....	.....
Eveleth.....	1,315	.....	.....
Gilbert.....	573	.....	.....
Hibbing.....	1,168	2	2
Marble.....	130	.....	.....
Taconite.....	71	.....	.....
Virginia.....	1,747	3	1
Total.....	6,881	10	14
Miscellaneous:			
Bovey.....	2	2	.....
Ely.....	2	2	.....
Total.....	6,885	14	4

¹ 0.001 per cent.

Trachoma has gained entry to the public schools in 4 of the 10 districts examined. Without exception the disease was found in children of foreign parentage. In one instance a case of trachoma was traced to a family in which two miners boarded, both of them having trachoma.

BEARING OF TRACHOMA AMONG MINERS ON THE HEALTH OF THE STATE.

The percentage of trachoma, 2.57, among the miners of the Mesaba Range is second to that among the Indians, 15.04 per cent. The Indian is a future contingency; the miner is a present problem. The Indian has but little direct association with the white population of the State; the miner is a part of the white population, and his children attend the public schools in preponderating numbers in certain locations. An increase of trachoma among the miners will be reflected by an increase of the disease in the school population and a wider spread in the general mining population.

Other mining locations are being opened up. Diseased miners going into these locations will carry trachoma to communities never before infected.

In this connection it is unfortunate that a strike by the miners of the newly opened Cuyuna Range prevented an inspection of the miners of that region. However, local physicians report trachoma to be prevalent among them.

IV. Trachoma in Schools and State Institutions.

In Tables IX and X is given a résumé of a survey of various public, parochial, and normal schools and other institutions made March 6 and April 19, 1913.

In the course of this survey 18 counties were visited and 39,164 inspections were made. The examinations were confined to school children and the inmates of State institutions, for the reason that any great prevalence of trachoma in a community would certainly manifest itself in the school population, and that the State institutions would furnish representatives from many and widely separated sections of the State.

TABLE IX.

County.	City, village, or township.	Schools and institutions.	Number examined.	Trachoma cases.		
				Positive.	Suspected.	Recovered.
Beltrami.....	Bemidji.....	3 public.....	880	1	1	
Do.....	Nymore.....	1 public.....	143		1	
Blue Earth.....	Mankato.....	6 public, 1 normal.....	1,870		5	
Carlton.....	Cloquet.....	4 public.....	1,097		1	
Do.....	do.....	1 parochial.....	306	1		
Clay.....	Moorhead.....	6 public, 1 normal.....	1,197			
Do.....	do.....	1 parochial.....	127			
Crow Wing.....	Brainard ¹	6 public.....	1,552	1 ⁴		
Dakota.....	South St. Paul.....	4 public.....	977	3	3	
Goodhue.....	Red Wing.....	2 public.....	754			
Do.....	do.....	State training.....	160			
Hennepin.....	Minneapolis.....	20 public.....	10,251	2	3	2
Do.....	do.....	6 parochial.....	1,584	1	2	
Itasca.....	Grand Rapids.....	3 public.....	1,530			
Otter Tail.....	Fergus Falls.....	5 public.....	1,094			
Polk.....	Crookston.....	6 public.....	1,066			
Ramsey.....	Rose Township.....	Agricultural.....	430			
Rice.....	Faribault.....	Blind.....	84		1	3
Do.....	do.....	Deaf.....	244			
Do.....	do.....	Feeble-minded.....	1,425	10	1	7
St. Louis.....	Duluth.....	19 public and normal.....	7,618		4	
Stearns.....	St. Cloud.....	6 public and normal.....	1,374			
Do.....	do.....	State reformatory.....	468			1
Steele.....	Owatonna.....	State public.....	255			
Washington.....	Stillwater.....	State prison.....	869	2		5
Winona.....	Winona.....	6 public and normal.....	1,603			
Do.....	do.....	5 parochial.....	1,306			
Total.....			39,164	24	22	18

¹ Three in family of an uninfected girl attending school.

Only 24 cases of active trachoma were found. Ten of these cases were in one institution, the school for feeble-minded children. Two other cases were found in the State prison and three more in a family residing in Brainard, making a total of 15 cases out of 24 that can not be classified as occurring among school children. Furthermore, 3 of the remaining 9 cases of trachoma were among members of the same family.

The existence of 10 cases of active trachoma, 1 suspicious case, and 7 old recovered cases among the inmates of the school for feeble-minded would indicate the disease has existed in this institution for several years and that some of the 10 cases contracted the disease subsequent to their admission to the school.

An examination, therefore, of 35,229 pupils of the public and parochial schools disclosed only 9 cases of trachoma and those were confined to 6 out of the 18 counties visited. The assumption is clear that trachoma is present but not alarmingly prevalent in the general white population of the State with the exception of the mining region.

Freeborn.....	6	8	1	1	1	4	1	3	20	36
Goodhue.....	11	20	1	7	22	2	1	3	1	36
Grant.....	2	1	3	48	1	64	30	1	2	36
Hennepin.....	14	53	2	1	1	75	1	1	297	207
Houston.....	1	9	1	1	1	2	1	1	15	17
Hubbard.....	1	1	2	6	1	4	1	1	7	10
Isanti.....	1	1	12	1	1	8	1	1	21	21
Jacosa.....	7	2	2	2	2	1	1	1	18	18
Jackson.....	7	2	2	2	2	2	1	1	6	6
Kanabec.....	.....	.....	.....	21	20	1	3	3	24	24
Kandiyohi.....	.....	.....	.....	5	4	4	1	1	27	27
Kittson.....	.....	.....	.....	3	4	4	1	1	8	8
Koochiching.....	.....	.....	.....	1	1	1	1	1	7	7
Lac qui Parle.....	4	1	1	1	1	5	1	1	11	11
Lake.....	.....	.....	.....	1	1	1	1	1	19	19
Le Sueur.....	53	2	1	1	1	2	1	1	38	38
Lincoln.....	14	2	1	3	5	2	2	2	14	14
Lyon.....	25	5	1	3	5	1	2	2	2	2
McLeod.....	3	3	2	5	5	1	2	2	14	14
Mahnomen.....	.....	.....	.....	.....	.....	.....	.....	.....	2	2
Marshal.....	.....	.....	.....	.....	.....	.....	.....	.....	5	5
Martin.....	14	1	1	9	6	2	1	1	18	18
Meeker.....	.....	.....	.....	.....	.....	.....	.....	.....	22	22
Mill Lake.....	.....	.....	.....	.....	.....	.....	.....	.....	2	2
Mille Lacs.....	.....	.....	.....	.....	.....	.....	.....	.....	2	2
Morrison.....	.....	.....	.....	.....	.....	.....	.....	.....	3	3
Mower.....	.....	.....	.....	.....	.....	.....	.....	.....	3	3
Murray.....	10	5	24	1	3	1	2	2	20	20
Nearby.....	19	3	.....	.....	.....	.....	.....	.....	58	58
Nicollet.....	46	1	1	1	1	3	1	1	17	17
Nobles.....	12	1	.....	.....	.....	.....	.....	.....	2	2
Norman.....	.....	.....	.....	.....	.....	.....	.....	.....	5	5
Olmsted.....	8	10	2	73	1	2	2	2	80	80
Otter Tail.....	1	1	2	1	1	1	1	1	23	23
Pennington.....	1	1	7	134	7	1	2	2	153	153
Plus.....	1	1	13	5	18	2	1	1	19	19
Plymouth.....	7	1	5	5	3	2	1	1	24	24
Pok.....	.....	.....	.....	.....	.....	.....	.....	.....	14	14
Pope.....	.....	.....	.....	.....	.....	.....	.....	.....	78	78
Ramsey.....	3	11	2	52	6	6	6	6	20	20
Red Lake.....	.....	.....	.....	.....	.....	.....	.....	.....	171	171
Redwood.....	27	1	1	2	2	31	65	65	11	11
Renville.....	7	5	1	6	6	1	1	1	35	35
Rice.....	21	5	1	5	3	3	3	3	24	24
Rock.....	1	1	2	2	1	6	6	6	36	36
Roseau.....	.....	.....	.....	.....	.....	.....	.....	.....	3	3
St. Louis.....	12	181	1	1	1	78	37	37	346	346
Scott.....	16	3	12	2	2	2	2	2	21	21
Seaton.....	.....	.....	.....	.....	.....	.....	.....	.....	41	41
Sharburne.....	.....	.....	.....	.....	.....	.....	.....	.....	16	16
Sibley.....	8	1	4	4	4	1	6	6	175	175
Stearns.....	4	1	156	1	1	4	1	1	4	4
Steele.....	18	7	.....	.....	.....	.....	.....	.....	22	22
Stevens.....	1	1	13	4	4	1	1	1	3	3

1 Distribution by counties could not be obtained for the 430 examined.

County representation in State institutions inspected for trachoma in March-April, 1915, by Tahajferro Clark, surgeon, United States Public Health Service—Continued.

PART I—Continued.

Counties.	Normal schools.					Special schools.				Total for each county.
	Man-kato.	Winona.	Duluth.	St. Cloud.	Moor-head.	For deaf, Fort-bault.	State public, Owatonna.	Training (boys), Red Wing.	Department of agriculture, University of Minnesota.	
Swift.....	2	2		8	2	3		1		18
Todd.....	1			13	1	6				20
Traverse.....				4	3	1				8
Wabasha.....	2	36	1			3		1		45
Wadena.....	2	2		5	4	3				16
Waseca.....	24	2				3				28
Washington.....	2	10	1	4		4		1		19
Watsonwan.....	32	2				4				39
Wilkin.....				2	17	1				21
Winona.....		1		30	1	4				16
Wright.....	21	1	2	6	1	9		1		43
Yellow Medicine.....						1				33

PART II.

[Cases were found in these institutions.]

Counties.	Normal schools.				Special schools.				Sum total Parts I and II, representation by counties.
	Feeble-minded, Faribault, + old ?	Prison, Stillwater, + old ?	Reformatory, St. Cloud, + old ?	School for blind, Faribault, + old ?	Total for each county.	Part I, total for each county.	Department of agriculture, University of Minnesota.		
Atkin.....	5	6	3		14	7		21	
Anoka.....	17	6	3		26	11		37	
Becker.....	11	14	4		29	43		72	
Beltrami.....	8	20	4		32	20		52	
Benton.....	10				10	33		43	

Big Stone.....	5	3	.....	8	30
Blue Earth.....	31	19	.....	53	338
Brown.....	15	7	.....	23	59
Carlton.....	5	8	.....	12	36
Carver.....	11	3	.....	14	40
Cass.....	11	10	.....	22	23
Chippewa.....	6	1	.....	7	41
Chisago.....	6	5	.....	8	8
Clay.....	6	1	.....	12	15
Clearwater.....	8	19	.....	31	36
Cook.....	4	3	.....	37	181
.....	.....	5	.....	5	9
.....	.....	5	.....	5	8
.....	.....	7	.....	15	38
.....	.....	7	.....	23	38
.....	.....	7	.....	23	44
.....	.....	9	.....	28	44
.....	.....	2	.....	13	35
.....	.....	2	.....	21	35
.....	.....	5	.....	33	54
.....	.....	2	.....	42	54
.....	.....	2	.....	10	71
.....	.....	1	.....	15	42
.....	.....	3	.....	22	82
.....	.....	6	.....	40	82
.....	.....	3	.....	36	82
.....	.....	10	.....	46	82
.....	.....	5	.....	36	42
.....	.....	3	.....	7	.....
.....	.....	3	.....	539	826
.....	.....	219	.....	12	26
.....	.....	3	.....	13	7
.....	.....	1	.....	9	16
.....	.....	1	.....	9	95
.....	.....	25	.....	34	65
.....	.....	5	.....	10	23
.....	.....	2	.....	6	10
.....	.....	2	.....	5	10
.....	.....	2	.....	6	38
.....	.....	1	.....	14	38
.....	.....	4	.....	11	38
.....	.....	4	.....	27	37
.....	.....	19	.....	8	19
.....	.....	2	.....	7	17
.....	.....	2	.....	6	17
.....	.....	2	.....	11	58
.....	.....	2	.....	59	27
.....	.....	8	.....	19	43
.....	.....	1	.....	8	43
.....	.....	6	.....	15	31
.....	.....	6	.....	38	31
.....	.....	3	.....	17	4
.....	.....	3	.....	14	4
.....	.....	1	.....	2	31
.....	.....	0	.....	5	34
.....	.....	9	.....	18	34
.....	.....	6	.....	19	41
.....	.....	4	.....	10	16
.....	.....	1	.....	22	16
.....	.....	1	.....	6	47
.....	.....	2	.....	33	47
.....	.....	7	.....	30	52
.....	.....	14	.....	27	52
.....	.....	14	.....	49	52
.....	.....	5	.....	9	58
.....	.....	5	.....	15	58
.....	.....	7	.....	22	59
.....	.....	1	.....	17	59
.....	.....	1	.....	9	89
.....	.....	17	.....	80	89
.....	.....	1	.....	22	38
.....	.....	17	.....	16	22
.....	.....	45	.....	64	217
.....	.....	17	.....	153	.....

1. Distribution by counties could not be obtained for the 84 examined.

County representation in State institutions inspected for trachoma in March-April, 1913, by Tubiajerro Clark, surgeon, United States Public Health Service—Continued.

PART II—Continued.

Counties.	Feeble-minded, Faribault. + old ? 10 7 1	Prison, Still-water. + old ? 2 5 0	Reformatory, St. Cloud. + old ? 0 1 0	School for blind, Faribault. + old ? 0 3 1	Total for each county.	Part I, total for each county.	Sum total, Parts I and II, representation by counties.
Pennington.....					18	19	19
Pine.....	10	4	4		24	24	42
Preston.....	3	3			6	6	20
Polk.....	18	37			47	78	125
Pope.....	8	7	2		15	30	35
Ramsey.....	205	106	47		358	171	529
Red Lake.....	7	4			11	11	22
Redwood.....	13	4			17	35	42
Renville.....	16	6	1		23	24	44
Rice.....	27	6	3		36	36	72
Rock.....	3	2	1		6	6	9
Rogau.....	4	2			6	4	10
St. Louis.....	49	129	40		218	346	664
Scott.....	20	4			24	21	45
Sherburne.....	6	6	1		13	41	54
Sibley.....	3	2	1		6	16	22
Stearns.....	42	10	4		66	175	261
Steele.....	9	1	2		12	30	42
Stevens.....	10	3			13	22	35
Swift.....	11	2			13	18	31
Todd.....	17	7	24		48	30	54
Traverse.....	3	2			5	8	13
Wabasha.....	19	2			21	45	66
Wadena.....	6	5			11	15	27
Waseca.....	12		1		13	33	46
Washington.....	16	12			28	19	47
Watsonwan.....	9		1		10	39	49
Wilkin.....	8				11	21	32
Winona.....	19	3			22	16	50
Wright.....	24	11			35	42	77
Yellow Medicine.....	15	1			16	33	49

A very important fact from an epidemiological viewpoint is that not one of the cases of trachoma discovered in the course of this survey was known to be existing. These few cases, therefore, emphasize the necessity of a periodic inspection of schools and institutions for the detection of existing cases of the disease, so that measures may be instituted to prevent its spread to others.

In the school for the blind 3 old "played-out" cases of trachoma were found among the 84 pupils. Trachoma was the cause of blindness in at least 1 of these pupils and, very possibly, of the other 2 also.

Two cases of active trachoma were found in the State prison, and both cases were in the persons of former residents of St. Louis County, the great mining county of the State, where a considerable number of trachoma cases were found in the mining population.

Sporadic cases of trachoma have occurred in the general population of the State for years, as is evidenced by the cases of recovered trachoma found during this survey. No alarming prevalence of the disease among the general population of the State outside of the Indians and mining population has been found during this survey. A sufficient number of cases, however, have been discovered to serve as a warning to the proper authorities to be on the lookout for the disease even in the least suspected localities.

TRACHOMA AND NATIONALITY.

From Table XI, showing parentage of foreign-born whites in connection with these trachoma examinations, and Table XII, showing the number of pupils of alien birth or parentage in the schools of Minneapolis, South St. Paul, and Winona, it may be seen that the parentage of foreign born and of native born of foreign or mixed parentage is very high in the counties where these examinations were made. This fact, taken in connection with the low percentage of trachoma found in this general population, leads to the inevitable conclusion that the examination for trachoma at ports of entry is very thorough and that any relaxation of present restrictions in this respect would result most disastrously to the health of a State with a cosmopolitan population, as is the case in Minnesota.

TABLE XI.—Foreign nationalities resident in Minnesota counties where trachoma examinations were made.

[Population statistics taken from the United States census, 1910.]

County.	Population, 1910.	Native whites, foreign or mixed parentage.	Per cent of population, 1910.	Foreign-born whites.	Per cent of population, 1910.	Total number examined in county.	Number trachoma cases found.
Becker	18,840	8,443	44.8	4,335	23.0	690	+ 0 0 5
Beltrami	19,337	7,015	36.3	5,237	27.1	1,023	1 0 2
Blue Earth	29,337	12,754	43.5	5,348	18.2	1,870	0 0 5
Carlton	17,559	7,858	44.8	6,620	37.7	1,403	1 0 1
Cass	11,620	3,316	28.5	2,548	21.9	181	2 0 0
Clay	19,640	10,201	51.9	5,375	27.4	1,324	0 0 0
Crow Wing	16,861	6,900	40.9	4,095	24.3	1,552	4 0 0
Dakota	25,171	10,954	43.5	6,236	24.8	977	3 0 3
Goodhue	31,637	15,632	49.4	7,486	23.7	914	0 0 0
Hennepin	333,480	129,473	38.8	92,835	27.8	11,805	3 2 5
Hubbard	9,831	3,153	32.1	1,785	18.2	439	1 0 0
Itasca	17,208	5,746	33.4	6,958	40.4	3,183	16 0 2
Mahnomen	3,249	769	23.7	298	9.2	135	2 0 0
Ottertail	46,086	23,638	51.3	12,554	27.3	1,094	0 0 0
Polk	36,001	19,826	55.1	10,594	29.4	1,096	0 0 0
Ramsey	223,675	97,800	43.7	58,619	26.2	430	0 0 0
Rice	25,911	12,131	46.8	4,636	17.9	1,753	10 10 2
St. Louis	163,274	62,337	38.2	75,480	46.2	13,561	32 0 17
Stearns	47,733	23,505	49.2	8,749	18.3	1,842	0 1 0
Steele	16,146	7,880	48.8	3,351	20.8	255	0 0 0
Washington	26,013	12,807	49.2	6,531	25.1	869	2 5 0
Winona	33,398	16,159	48.4	6,519	19.5	2,909	0 0 0
Total						49,305	77 18 42
Indians examined in October, 1912 (see S. Doc. No. 1038)						3,542	533 (1) (1)

¹ Among Indians only active cases were recorded.

Dr. Clark examined in May, 1912, at White Earth, Cass Lake, and Vermilion Lake Reservations, 659 Indians, finding 186 active and 11 suspicious cases of trachoma. These are not counted in above because some undoubtedly were reexamined in October, 1912.

TABLE XII.—Number of foreign-born pupils, or pupils whose parents were foreign-born, examined in schools.

Nationalities.	Minneapolis.				Winona, 4 parochial; cases found: None.	South St. Paul, 4 public; cases found:			Total.
	16 public; cases found:		5 parochial; cases found:			+ old ?	+ old ?	+ old ?	
	+ old ?	2 2 3	+ old ?	1 0 2					
Africans	68							68	
Austrians	193				1 46		25	264	
Canada:									
French	5						3	8	
Other	19						2	21	
Chinese	6 (1?)							6	
Dutch	5							5	
English	193						9	202	
Finnish	99							99	
French	262		246				2	510	
Germans	952 (2?)		284		154		95	1,485	
Greeks	4							4	
Hungarians	18							24	
Irish	519		280				6 (43+; 3?)	811	
Italians	72							72	
Roumanians	20						1	21	
Russians	800		626 (2?)		982		31	2,439	
Scotch	60						4	64	
Swiss	6							6	
Welsh	3							3	
Jews	1,027							1,027	
Scandinavians	2,350 (2+; 2?)						83	2,433	
	6,681		1,436		1,182		273	9,572	

¹ Bohemians.

² Polish.

³ All in one family.

NOTE.—Nationalities could not be obtained for pupils of one Minneapolis and one South St. Paul school. In the Duluth schools (18 public and 1 normal) only 4 suspicious cases were found among 7,618 persons, largely of alien birth or parentage.

Conclusions.

(1) Trachoma is extremely prevalent among the Indians of Minnesota, and the highest prevalence among them is found in the Indian boarding schools.

(2) The Indians in the northeastern section of the State, including Grand Portage, Grand Marais, Vermilion Lake, and Nett Lake, are free from trachoma.

(3) There is a possibility that the Indians of the northeastern section of the State may become infected through association with infected districts with improvement in facilities for intercommunication.

(4) The habits and social customs of the Indians favor the spread of trachoma among them.

(5) The Indian boarding schools have doubtless played an important part in the spread of trachoma among the Indians of the State.

(6) The heavily infected Indian reservations of Minnesota are a threatening source of danger to the public health of the State.

(7) The Indian is coming into closer contact with the white population with increasing opportunity for the spread of trachoma through improvements in lines of communication, the purchase and settlement of allotted Indian lands by white settlers, and the organization of counties within the boundaries of Indian reservations.

(8) Children of mixed parentage are attending the public schools contiguous to reservations in considerable numbers. Trachoma has been found among these children of mixed parentage, and they are a possible means by which the disease may spread from the Indian to the white population.

(9) The Federal Government will sooner or later relinquish its guardianship of the Indian; therefore conditions of health reducing his future economic usefulness is a matter of present concern to the State authorities.

(10) Trachoma is dangerously prevalent among the miners of the Mesaba iron range.

(11) More trachoma is found in the public schools of the Mesaba Range than among the white pupils of the public schools contiguous to Indian reservations; there is therefore greater danger of the disease spreading from this source at present than from the Indian reservations.

(12) The trachoma situation in the mining region of the State is a pressing public health problem demanding immediate solution.

(13) Nearly all the cases of trachoma found among miners were of recent origin, which indicates the existence of widely scattered foci of infection in the mining region rather than recent importation of cases.

(14) Trachoma is not prevalent to an alarming degree in the State of Minnesota outside of Indian reservations and the mining regions.

Recommendations.

The control of trachoma in Minnesota is complicated by the Federal guardianship of the most heavily infected portion of the State population, namely, that of the Indian reservations.

A report transmitted to Congress January 27, 1913, by the Public Health Service, of investigations made in accordance with an act of Congress approved August 24, 1912, into the prevalence of contagious and infectious diseases among the Indians of the United States, contains general and specific recommendations for the control of trachoma in the Indian population of the United States. The survey of the Indian population herein set forth is a component part of this report and the recommendations contained therein are pertinent to the trachoma situation in the State and are as follows:

(1) Hospital facilities should be provided on reservations for the reception of Indians suffering from severe trachoma and in need of hospital treatment. Sufficient authority should be granted to require them to undergo such treatment when, from the condition of their eyes, they are a menace to the public health. Hospitals for this purpose need not be expensive, and most trachoma cases could receive out-patient treatment.

(2) In each infected sanitary district of a reservation a dispensary or office, portable or permanent in character, should be provided for the treatment of cases of trachoma not requiring hospital care, and such dispensaries should be in charge of those qualified to administer treatment for diseases of the eyes.

(3) A sufficient number of field nurses should be provided to administer, under the direction of the physician, home treatment and instruction to those who can not be sent to the hospital nor attend the dispensary.

(4) The present regulation of the Office of Indian Affairs relating to the physical welfare and sanitary supervision of school children should be strictly enforced and report thereon made regularly.

(5) All Indian schools, day and boarding, both Federal and mission, should at all times be under competent medical and sanitary supervision.

(6) No children suffering from trachoma should be admitted to uninfected schools.

(7) Separate schools, where practicable, should be established for trachomatous children.

(8) Whenever it is impracticable to establish such separate schools, trachomatous children in boarding schools should be strictly segregated from healthy pupils. Separate dormitories, class rooms, dining rooms, and playgrounds should be assigned for their exclusive use.

(9) All boarding schools wherein trachomatous pupils are admitted should be provided with adequate facilities for the care and treat-

ment of trachoma, such facilities to include the permanent services of a nurse trained in the care and treatment of diseases of the eye.

(10) Systematic medical examinations should be made regularly of all children in schools. This provision is contained in an existing regulation governing schools.

It is also recommended that "Whenever necessary and practicable cooperation should be had with State boards of health in putting these recommendations into effect."

The following recommendations are made for the control of trachoma in the white population:

(1) Trachoma should be declared a notifiable disease and every case notified should be investigated by local health officials to enforce State regulations relating to the control of trachoma.

(2) Trachoma should be declared conditionally quarantinable and sufficient funds provided in order that cases of trachoma which are not or can not be treated at home, in accordance with the regulations of the State board of health governing this disease, may be apprehended and treated at the expense of the State.

(3) All cases of active trachoma should be excluded from the public schools.

(4) A detailed examination of public-school children should be made at least once each year by school physicians, or local health officers where there is no school physician, for the detection of possible cases of trachoma.

(5) All cases of conjunctivitis should be excluded from school until such condition is recovered from.

(6) Wherever practicable, school nurses should be employed whose duty it shall be to visit the houses of trachomatous children excluded from school on that account, to administer treatment under a physician's direction, and to instruct the parents in the rules of hygiene governing this disease.

(7) Trachomatous children whose parents are unable to provide medical treatment should be treated at expense of the State.

(8) The cooperation of all the mining companies of the State should be secured in the making of a detailed examination of the mining population for the detection of all the cases of trachoma among the miners employed by them.

(9) Miners suffering from trachoma should not be allowed to drift from one location to another unregulated and unrestricted.

(10) All miners suffering from trachoma should be compelled to undergo treatment under such restrictions as may insure safety to others. If necessary, this treatment should be at the State's expense, and be made mandatory.

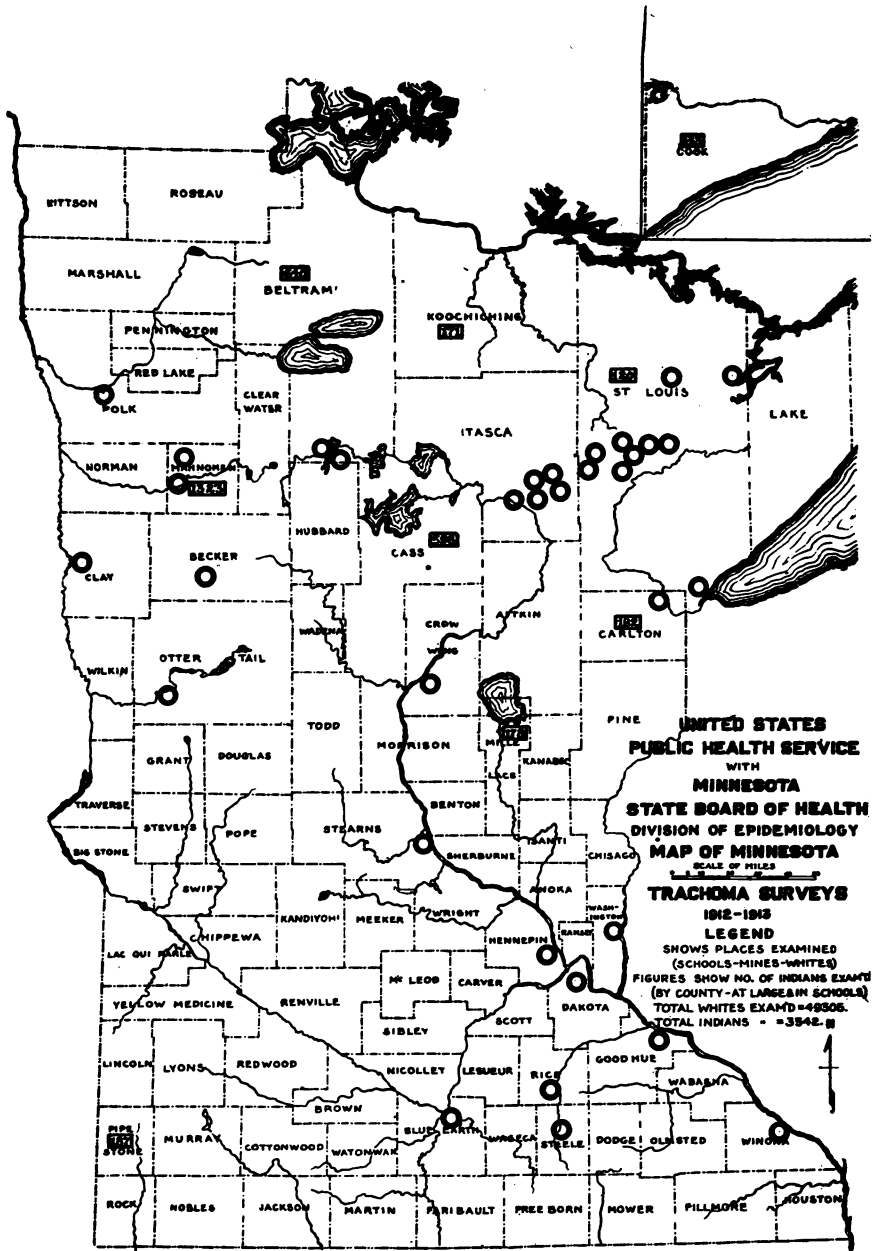
(11) All miners' boarding houses and boarding shacks should be regularly inspected and rules and regulations prescribed and enforced to prevent the spread of trachoma among the men dwelling therein.

Acknowledgments.

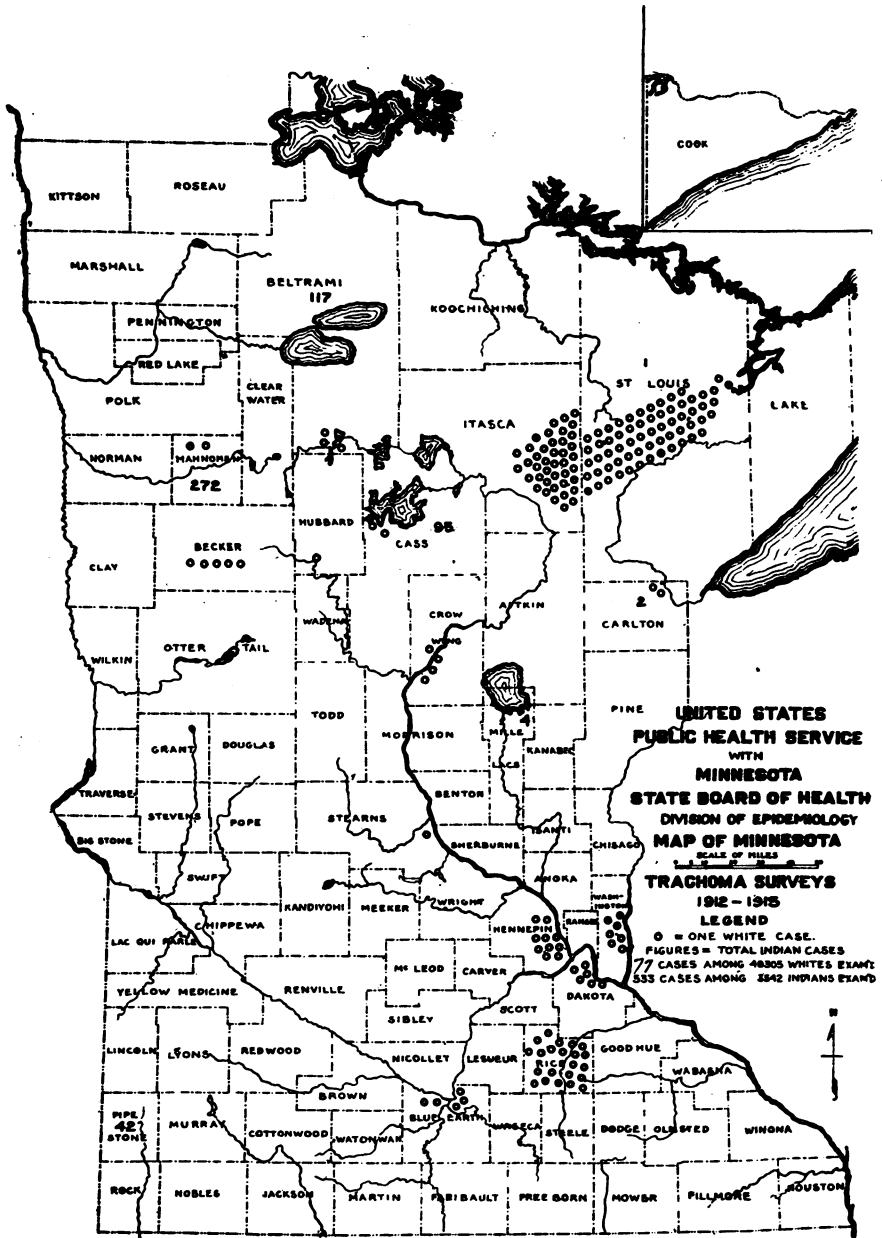
I was accompanied on each of the two surveys made at the request of the State board of health by a member of the staff, who acted as recorder. Thanks are due Dr. H. W. Hill for assistance rendered in the preliminary survey of the White Earth and Leech Lake Indian Reservations, and to Dr. A. J. Chesley, director of the division of epidemiology of the State department of health, who accompanied me during the survey of the mining region of the State and, recently, of the public schools and other institutions.

Credit is due and hereby given Dr. Chesley for the compilation of data and the preparation of maps. The State board of health was represented by Drs. Leonard and Burns in the investigation of trachoma and other diseases among the Indian population.

Especial thanks are due Dr. H. M. Bracken, secretary of the State board of health, for the many courtesies extended and facilities afforded during these investigations.



Map 1.—Showing localities visited. The circles (O) show the localities (schools and mines) where the white population was examined. The rectangles containing figures show the localities in which Indians were examined and the number examined.



Map 2.—Showing localities in which cases of trachoma were found. Each circle (O) indicates a case or suspected case or recurrent case found in a white person. The figures show the number of cases found in Indians.

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.

State Reports for May, 1913.

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.
Michigan:						
Alpena County—						
Alpena.....	1					1
Bay County—						
Fraser Township.....	1				1	
Berrien County—						
Benton Township.....	1					1
Sodus Township.....	4				4	
Cass County—						
Volinia Township.....	1				1	
Calhoun County—						
Battle Creek.....	1					1
Dickinson County—						
Sagola Township.....	1					1
Hillsdale County—						
Wright.....	8				7	1
Ingham County—						
Alaiedon Township.....	1				1	
Aurelius Township.....	1				1	
Delhi Township.....	2				2	
Ionia County—						
Ionia.....	2			1	1	
Kalamazoo County—						
Kalamazoo Township.....	3				3	
Kalamazoo.....	2				2	
Kent County—						
Byron Township.....	1					1
Lenawee County—						
Fairfield Township.....	1					1
Seneca Township.....	6				3	3
Adrian.....	1		1			
Livingston County—						
Conway Township.....	1					1
Mason County—						
Riverton Township.....	3				3	
Sherman Township.....	1					1
Victory Township.....	5					5
Scottville.....	4			1	3	
Monroe County—						
Bodford Township.....	2				2	
Ida Township.....	2				2	
Monroe Township.....	1				1	
Carleton.....	1				1	
Monroe.....	4				4	

SMALLPOX—Continued.

State Reports for May, 1913—Continued.

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.
Michigan—Continued.						
Oakland County—						
Southfield Township.....	6				6	
Oceana County—						
Hesperia.....	1				1	
St. Clair County—						
Clay Township.....	3				3	
Algonac.....	1				1	
Sandiac County—						
Austin Township.....	1				1	
Schoolcraft County—						
Germfesk Township.....	1				1	
Tuscola County—						
Dayton Township.....	1				1	
Van Buren County—						
Waverly Township.....	2				2	
Bloomingsdale.....	1				1	
Washtenaw County—						
Ann Arbor.....	3				3	
Wayne County—						
Dearborn.....	1				1	
Ecorse.....	6				6	
Hamtramck.....	2				2	
Detroit.....	10				10	
Wyandotte.....	1				1	
Total.....	102		1	2	80	
Minnesota:						
Aitkin County—						
Aitkin.....	1				1	
Haugen Township.....	1				1	
Blue Earth County—						
Lyra Township.....	1				1	
Brown County—						
Burnstown Township.....	2				2	
Carver County—						
Hollywood Township.....	1		1			
Cottonwood County—						
Amboy Township.....	1				1	
Crow Wing County—						
Braierd.....	1				1	
Dakota County—						
Egan Township.....	1				1	
Ravenna Township.....	1				1	
South St. Paul.....	2				2	
Dodge County—						
Dodge Center.....	2		1	1		
Kasson.....	1				1	
Faribault County—						
Blue Earth.....	1				1	
Elmore.....	2			1	1	
Elmore Township.....	2			1	1	
Fillmore County—						
Preston.....	1				1	
Spring Valley.....	1			1		
Sumner Township.....	4				4	
Freeborn County—						
Manchester Township.....	2				2	
Hennepin County—						
Minneapolis.....	56				56	
Kandiyohi County—						
Mamre Township.....	1				1	
Lake County—						
Two Harbors.....	1				1	
Le Sueur County—						
Kasota.....	1				1	

SMALLPOX—Continued.

State Reports for May, 1913—Continued.

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.
Minnesota—Continued.						
Lyon County—						
Minnesota.....	2			1	1	
Monroe Township.....	1				1	
McLeod County—						
Acoma Township.....	3				3	
Hutchinson.....	1				1	
Lynn Township.....	2				2	
Round Grove Township.....	2			1	1	
Mower County—						
Adams Township.....	2				2	
Marshall Township.....	4				4	
Rose Creek.....	1				1	
Murray County—						
Scandia Township.....	1				1	
Nicollet County—						
Lake Prairie Township.....	1				1	
North Mankato.....	1			1		
St. Peter.....	1				1	
Nobles County—						
Worthington.....	1				1	
Olmsted County—						
Rochester.....	2				2	
Polk County—						
Lessor Township.....	1				1	
Ramsey County—						
St. Paul.....	35			2	11	22
Red Lake County—						
Poplar River Township.....	2			1	1	
Redwood County—						
North Hero Township.....	1				1	
Renville County—						
Olivia.....	7		3		4	
Rice County—						
Cannon City Township.....	2			1	1	
Faribault.....	9				8	1
St. Louis County—						
Duluth.....	20			5	15	
Ely.....	1			1		
Sibley County—						
Gibbon Township.....	1				1	
Grafton Township.....	1				1	
Steele County—						
Havana Township.....	14				14	
Owatonna.....	1				1	
Waseca County—						
Blooming Grove Township.....	1				1	
Washington County—						
Stillwater.....	4				4	
Wilkin County—						
Foxhome.....	1					1
Total.....	213		5	17	166	25

California—Los Angeles.

Senior Surg. Brooke, of the Public Health Service, reported, by telegraph, that during the week ended June 21, 1913, 1 case of smallpox had been notified in Los Angeles, Cal., making a total of 47 cases reported since January 1, 1913.

SMALLPOX—Continued.

California—San Francisco.

Surg. Long, of the Public Health Service, reported, by telegraph, that during the week ended June 21, 1913, 1 case of smallpox had been notified in San Francisco, Cal.

Indiana—Evansville.

Surg. Clark, of the Public Health Service, reported by telegraph that during the week ended June 21, 1913, 12 cases of smallpox had been notified in Evansville, Ind., making a total of 830 cases reported since October 1, 1912.

Maryland—Collington.

The State department of health of Maryland reported, by telegraph, June 20, 1913, that 1 new case of smallpox had been notified at Collington, Prince Georges County, Md.

Massachusetts—Lowell, Huntington, and Blandford.

The State Board of Health of Massachusetts reported by telegraph June 25, 1913, the presence of outbreaks of smallpox in Lowell, Huntington, and Blandford, Mass.

Miscellaneous State Reports.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Kansas (May 1-31):			Indiana (May 1-31)—Contd.		
Counties—			Counties—Continued.		
Allen.....	40		Dekalb.....	2	
Bourbon.....	1		Floyd.....	10	
Cloud.....	8		Gibson.....	15	
Crawford.....	20		Grant.....	4	
Dickinson.....	10		Hendricks.....	1	
Douglass.....	1		Henry.....	1	
Elk.....	1		Jackson.....	1	
Ford.....	1		Knox.....	16	
Franklin.....	3		Lake.....	16	
Labette.....	3		Lawrence.....	1	
Leavenworth.....	1		Madison.....	51	
Marshall.....	1		Marion.....	1	
McPherson.....	21		Martin.....	5	
Montgomery.....	3		Miami.....	1	
Neosho.....	7		Owen.....	10	
Norton.....	1		Perry.....	3	
Ottawa.....	2		Pike.....	9	
Reno.....	3		Porter.....	1	
Rice.....	5		Posey.....	1	
Sedgwick.....	24		Putnam.....	5	
Sumner.....	20		Shelby.....	2	
Wilson.....	15		Spencer.....	4	
Wyandotte.....	8		Steuben.....	1	
			St. Joseph.....	1	
Total.....	199		Vanderburg.....	104	
			Vigo.....	37	
Indiana (May 1-31):			Wabash.....	6	
Counties—			Warren.....	1	
Brown.....	3		Warrick.....	8	
Carroll.....	2		Washington.....	1	
Clark.....	21		White.....	2	
Clay.....	3				
Dearborn.....	3		Total.....	361	
Decatur.....	3				

SMALLPOX—Continued.

Miscellaneous State Reports—Continued.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Iowa (May 1-31):			Montana (May 1-31)—Contd.		
Counties—			Counties—Continued.		
Adair.....	5		Lincoln.....	2	
Blackhawk.....	2		Madison.....	1	
Boone.....	24		Musselshell.....	2	
Buchanan.....	1		Rosebud.....	2	
Buena Vista.....	3		Silverbow.....	4	
Calhoun.....	1		Sweetgrass.....	5	
Cass.....	9		Teton.....	1	
Cerro Gordo.....	1		Yellowstone.....	2	
Clinton.....	16		Total.....	32	
Crawford.....	2				
Dallas.....	9		North Dakota (May 1-31):		
Davis.....	1		Counties—		
Fayette.....	1		Benson.....	2	
Floyd.....	1		Burlingh.....	2	
Fremont.....	5		Emmons.....	2	
Grundy.....	8		Golden Valley.....	1	
Guthrie.....	1		Grand Forks.....	2	
Hamilton.....	2		McHenry.....	1	
Hardin.....	1		Total.....	10	
Ida.....	1				
Jefferson.....	1		Vermont (May 1-31):		
Johnson.....	2		County—		
Kossuth.....	1		Chittenden.....	21	
Lee.....	1				
Linn.....	8		Virginia (May 1-31):		
Marshall.....	8		Counties—		
Mitchell.....	3		Botetourt.....	1	
Muscatine.....	2		Brunswick.....	1	
Osceola.....	8		Carroll.....	4	
Plymouth.....	6		Charles City.....	6	
Polk.....	31		Chesterfield.....	3	
Pottawattamie.....	12		Floyd.....	3	
Sac.....	1		Henrico.....	1	
Scott.....	7		Henry.....	2	
Shelby.....	3		Isle of Wight.....	7	
Story.....	1		Middlesex.....	3	
Tama.....	9		Montgomery.....	5	
Webster.....	31		New Kent.....	3	
Total.....	229		Prince William.....	1	
			Roanoke.....	6	
Montana (May 1-31):			Russell.....	9	
Counties—			Sussex.....	7	
Beaverhead.....	1		Tazewell.....	3	
Blaine.....	2		Warwick.....	1	
Cascade.....	4		Wythe.....	12	
Custer.....	1		York.....	5	
Dawson.....	1		Total.....	83	
Fergus.....	2				
Hill.....	1				
Lewis and Clark.....	1				

City Reports for Week Ended June 7, 1913.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Alameda, Cal.....	1		Muncie, Ind.....	1	
Altoona, Pa.....	2		New Orleans, La.....	9	
Ann Arbor, Mich.....	4		New York, N. Y.....	1	
Cambridge, Ohio.....	1		Niagara Falls, N. Y.....	1	
Chicago, Ill.....	1		Philadelphia, Pa.....	7	
Cincinnati, Ohio.....	1		San Diego, Cal.....	2	
Cleveland, Ohio.....	1		San Francisco, Cal.....	1	
Columbus, Ohio.....	8		Seattle, Wash.....	2	
Danville, Ill.....	5		South Bethlehem, Pa.....	1	
Dayton, Ohio.....	1		Spokane, Wash.....	5	
Evansville, Ind.....	9		Springfield, Ohio.....	4	
Houston, Tex.....	1		Steeltown, Pa.....	1	
Johnstown, Pa.....	4		Toledo, Ohio.....	6	
Knoxville, Pa.....	4		Trenton, N. J.....	1	
Los Angeles, Cal.....	3		Washington, D. C.....	12	
Manchester, N. H.....	3		Wheeling, W. Va.....	1	
Milwaukee, Wis.....	5				

TYPHOID FEVER.

State Reports for May, 1913.

Places.	Number of new cases reported during month.	Places.	Number of new cases reported during month.
Indiana:		Michigan—Continued.	
Bartholomew County.....	1	Grand Traverse County—	
Cass County.....	1	Paradise Township.....	1
Clark County.....	7	Gratiot County—	
Daviess County.....	1	Ithaca.....	1
Dearborn County.....	1	Houghton County—	
Decatur County.....	1	Hancock.....	1
Dekalb County.....	1	Huron County—	
Delaware County.....	1	Huron Township.....	1
Fayette County.....	13	Ingham County—	
Floyd County.....	4	Delhi Township.....	1
Gibson County.....	2	Meridian Township.....	1
Howard County.....	2	Mason.....	1
Huntington County.....	1	Jackson County—	
Jasper County.....	1	Jackson.....	1
Kosciusko County.....	1	Kalamazoo County—	
Lake County.....	10	Kalamazoo.....	1
Laporte County.....	1	Kent County—	
Lawrence County.....	3	Gratton Township.....	1
Madison County.....	2	Oakfield Township.....	2
Ohio County.....	1	Grand Rapids.....	1
Parke County.....	6	Lapeer County—	
Perry County.....	1	Rich Township.....	1
Ripley County.....	3	Almont.....	1
St. Joseph County.....	1	Livingston County—	
Tippecanoe County.....	3	Howell.....	1
Vanderburg County.....	2	Marquette County—	
Wabash County.....	1	Negaunee.....	1
Warrick County.....	2	Mason County—	
Washington County.....	3	Ludington.....	1
Wayne County.....	3	Midland County—	
White County.....	1	Ingersoll Township.....	1
		Lincoln Township.....	1
Total.....	81	Monroe County—	
		Lasalle Township.....	1
Kansas:		Oakland County—	
Atchison County—		Rochester.....	1
Atchison.....	3	Ontonagon County—	
Cowley County.....	2	Ontonagon.....	1
Elk County.....	2	Saginaw County—	
Ellis County.....	5	Saginaw.....	1
Finney County.....	3	St. Clair County—	
Franklin County.....	1	Cottrellville Township.....	1
Geary County.....	1	St. Joseph County—	
Greeley County.....	1	Leonidas Township.....	1
Leavenworth County—		Colon.....	1
Leavenworth.....	3	Shiawassee County—	
Lyon County.....	3	Bennington Township.....	1
Neosho County.....	1	Tuscola County—	
Reno County.....	1	Reese.....	1
Hutchinson.....	1	Wayne County—	
Republic County.....	2	Detroit.....	3
Sedgwick County—		Wyandotte.....	1
Wichita.....	2	Total.....	43
Smith County.....	1		
Wyandotte County—		Minnesota:	
Kansas City.....	2	Clay County—	
Total.....	33	Barnesville.....	1
		Freeborn County—	
Michigan:		Glenville.....	1
Alpena County—		Goodhue County—	
Alpena.....	2	Goodhue Township.....	1
Long Rapids Township.....	1	Hennepin County—	
Barry County—		Corcoran Township.....	2
Johnstown Township.....	1	Itasca County—	
Cass County—		Deer River Township.....	1
Edwardsburg.....	1	Kittson County—	
Delta County—		Davis Township.....	2
Maple Ridge Township.....	1	Martin County—	
Genesee County—		Center Creek Township.....	1
Flint.....	3	Mower County—	
Gladwin County—		Austin.....	1
Tobacco Township.....	1	Lansing Township.....	1

TYPHOID FEVER—Continued.

State Reports for May, 1913—Continued.

Places.	Number of new cases reported during month.	Places.	Number of new cases reported during month.
Minnesota—Continued.		North Dakota:	
Pipestone County—		Dickey County.....	1
Osborn Township.....	1	Golden Valley County.....	1
Polk County—		Grand Forks County.....	1
Chester Township.....	1	McHenry County.....	4
Crookston.....	1	Total.....	7
Ramsey County—		Vermont:	
St. Paul.....	2	Addison County.....	1
St. Louis County—		Caledonia County.....	2
Duluth.....	3	Essex County.....	2
Hibbing.....	3	Franklin County.....	3
Kitzville.....	2	Orleans County.....	1
Wabasha County—		Windsor County.....	3
Minneiska.....	1	Total.....	12
Total.....	25		

CEREBROSPINAL MENINGITIS.

State Reports for May, 1913.

Places.	Number of new cases reported during month.	Places.	Number of new cases reported during month.
Indiana:		Kansas—Continued.	
Clark County.....	1	Crawford County.....	1
Shelby County.....	1	Greenwood County.....	1
Porter County.....	1	Wyandotte County—	
Laporte County.....	1	Kansas City.....	1
Elkhart County.....	1	Total.....	4
Vanderburg County.....	1	Minnesota:	
Total.....	6	Rice County—	
Iowa:		Northfield.....	1
Davis County.....	1	Winona County—	
Linn County.....	2	Winona.....	1
Total.....	3	Total.....	2
Kansas:			
Atchison County—			
Atchison.....	1		

Cases and Deaths Reported by Cities for Week Ended June 7, 1913.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Binghamton, N. Y.....		1	Los Angeles, Cal.....	3	1
Boston, Mass.....	3	2	New York, N. Y.....	10	1
Cincinnati, Ohio.....		1	Pittsburgh, Pa.....	1	
Cleveland, Ohio.....	2		Springfield, Ill.....		1
Johnstown, Pa.....	1	1	Wheeling, W. Va.....	1	1

POLIOMYELITIS (INFANTILE PARALYSIS).

State Reports for May, 1913.

Places.	Number of new cases reported during month.	Places.	Number of new cases reported during month.
Indiana:		Kansas:	
Allen County.....	1	Greenwood County.....	1
Vanderburg County.....	1	Michigan:	
Total.....	2	Washtenaw County—	
Iowa:		Salem Township.....	1
Linn County.....	1	Vermont:	
		Lamoille County.....	1

Cases and Deaths Reported by Cities for Week Ended June 7, 1913.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Austin, Tex.....	1	1	Richmond, Va.....	1	
Manchester, N. H.....	1	1	San Francisco, Cal.....	1	
New York, N. Y.....	6				

BERIBERI.

Austin, Tex.

During the week ended June 7, 1913, 2 deaths from beriberi were reported by the health officer at Austin, Tex.

ERYSIPELAS.

Cases and Deaths Reported by Cities for Week Ended June 7, 1913.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Bayonne, N. J.....		1	Los Angeles, Cal.....	3	2
Binghamton, N. Y.....	2		Newark, N. J.....		3
Boston, Mass.....		1	New York, N. Y.....		7
Braddock, Pa.....	1		North Adams, Mass.....		1
Bridgeport, Conn.....	1		Philadelphia, Pa.....	6	
Chicago, Ill.....	14		Pittsburgh, Pa.....	3	
Cincinnati, Ohio.....	6		St. Louis, Mo.....	7	1
Cleveland, Ohio.....	3		San Francisco, Cal.....	3	1
Harrisburg, Pa.....	1		Seattle, Wash.....	1	
Hartford, Conn.....	2		Springfield, Ill.....	1	
Kalamazoo, Mich.....	2				

PELLAGRA.**Cases and Deaths Reported by Cities for Week Ended June 7, 1913.**

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Baltimore, Md.....		1	Nashville, Tenn.....	1	1
Lynchburg, Va.....		1	New Orleans, La.....		3
Montgomery, Ala.....		3			

PLAGUE.**Human Case in San Benito County, Cal.**

Surg. Currie reported the occurrence June 4 of a case of plague in the vicinity of San Juan Bautista, San Benito County, Cal. The case occurred in a Japanese woman employed as a strawberry picker. The case terminated fatally June 13.

Rats Collected and Examined.

Places.	Week ended—	Found dead.	Total collected.	Examined.	Found infected.
California:					
Cities—					
Berkeley.....	June 7, 1913	8	196	125	.....
Oakland.....	do.....	19	556	416	.....
San Francisco.....	do.....	13	2,094	1,407	.....
Washington:					
City—					
Seattle.....	May 31, 1913		806	765	.....
Do.....	June 7, 1913		884	885	.....

¹ Rats taken dead from steamships: Shinyo Maru, 42; rats trapped on steamships after fumigation: Shinyo Maru, 6.

California—Squirrels Collected and Examined.

During the week ended June 7, 1913, there were examined for plague infection 1,047 squirrels from Contra Costa County, 178 from San Joaquin County, 81 from Alameda County, and 17 from San Benito County.

Plague-Infected Squirrels Found.

From May 15 to June 5, 1913, there were found in Contra Costa County 20 plague-infected ground squirrels collected from 11 localities.

Campaign Against Infected Squirrels.

Hunting operations during 1912 and 1913 have been conducted in such manner that the operations for the two years are as nearly parallel as it is possible to make them; that is to say, that hunting operations are conducted over the same lands for practically the same periods of time and in the same general manner. When a plague squirrel is found on a given piece of land, the hunter is instructed at once to hunt intensively upon that land for the purpose of determining the percentage of infection, and also to hunt upon

adjoining land for the purpose of determining whether plague has extended from that property to the adjoining property; also to determine the percentage of infection upon that property. From the time that hunting operations began in 1912 until June 7, 1912, squirrels were found as follows:

County.	Squirrels found.	Squirrels infected.	Percentage of infection.
Contra Costa.....	9,477	110	<i>Per cent.</i> 1.16
Alameda.....	1,516	56	3.7

From the time that hunting operations began in 1913 until June 7, 1913 (this period being slightly longer in 1913 than in 1912), squirrels were shot as follows:

County.	Number of squirrels.	Squirrels infected.	Percentage of infection.
Contra Costa.....	6,926	70	<i>Per cent.</i> 1.01
Alameda.....	217		

The total squirrels for the two counties in 1912 was 10,993; infected 166; percentage of infection 1.5 per cent.

The total squirrels for the two counties in 1913 is 7,143; number infected, 70; percentage of infection, 0.98 per cent.

The percentage of infection, therefore, for the year 1913 is 65 per cent of that of 1912, so that there has been an apparent reduction of infection, under conditions as nearly identical as possible, of 35 per cent.

This statement is submitted in view of the relatively large number of infected squirrels that are now being reported and that probably will be reported in the future, in order that a thorough understanding of the situation may be had.

PNEUMONIA.

Cases and Deaths Reported by Cities for Week Ended June 7, 1913.

Places.	Cases.	Deaths.	Places.	Cases.	Deaths.
Beaver Falls, Pa.....	1	1	Los Angeles, Cal.....	3	10
Binghamton, N. Y.....	3	2	Manchester, N. H.....	4	4
Braddock, Pa.....	2		New Castle, Pa.....	3	
Chicago, Ill.....	64	87	Oakland, Cal.....		1
Cleveland, Ohio.....	25	9	Philadelphia, Pa.....	27	28
Dunkirk, N. Y.....	2		Pittsburgh, Pa.....	18	24
Galesburg, Ill.....	1	1	San Diego, Cal.....	2	2
Grand Rapids, Mich.....	1		San Francisco, Cal.....	15	
Kalamazoo, Mich.....	2	1	Schenectady, N. Y.....	2	2
La Crosse, Wis.....	1		South Bethlehem, Pa.....	3	
Lancaster, Pa.....	2		Trenton, N. J.....	5	

RABIES.**San Francisco, Cal.—Rabies in Animals.**

Surg. Long, of the Public Health Service, reported, by telegraph, that during the week ended June 21, 1913, 1 case of canine rabies had been notified in San Francisco, Cal.

TETANUS.

During the week ended June 7, 1913, tetanus was reported by cities as follows: Newark, N. J., 1 death; New York, N. Y., 1 death; Philadelphia, Pa., 1 case; St. Louis, Mo., 1 case.

SCARLET FEVER, MEASLES, DIPHThERIA, AND TUBERCULOSIS.**State Reports for May, 1913.**

Places.	Scarlet fever.	Measles.	Diphtheria.
Indiana.....	357	3,517	145
Iowa.....	95	61	61
Kansas.....	104	1,062	38
Michigan.....	330	1,224	329
Minnesota.....	394	1,107	275
North Dakota.....	33	69	16
Vermont.....	34	766	15

Evansville, Ind.—Scarlet Fever, Measles, and Diphtheria.

Surg. Clark, of the Public Health Service, reported by telegraph that during the week ended June 21, 1913, 7 cases of scarlet fever, 7 cases of measles, and 5 cases of diphtheria had been notified in Evansville, Ind., making totals of 447 cases of scarlet fever reported since October 1, 1912, 127 cases of measles reported since January 1, 1913, and 321 cases of diphtheria reported since August 1, 1912.

Los Angeles, Cal.—Measles.

Senior Surg. Brooks, of the Public Health Service, reported, by telegraph, that during the week ended June 21, 1913, 210 cases of measles had been notified in Los Angeles, Cal., making a total of 6,018 cases reported since January 1, 1913.

Pittsburgh, Pa.—Measles.

Surg. Stoner, of the Public Health Service, reported, by telegraph, that during the two weeks ended June 21, 1913, 109 cases of measles, with 2 deaths, had been notified in Pittsburgh, Pa., making a total of 9,457 cases, with 161 deaths, reported since November 1, 1912.

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

Cases and Deaths Reported by Cities for Week Ended June 7, 1913.

Cities.	Population United States census, 1910.	Total deaths from all causes.	Diphtheria.		Measles.		Scarlet fever.		Tuberculosis.	
			Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Over 500,000 inhabitants:										
Baltimore, Md.	558,485	200	15	.....	96	3	19	.....	29	23
Eo Ion, Mass.	670,585	203	50	4	138	2	35	.....	63	32
Chicago, Ill.	2,185,283	689	158	18	322	5	229	25	270	73
Cleveland, Ohio.	560,663	163	53	3	176	5	14	3	23	16
New York, N. Y.	4,766,883	1,447	311	24	1,466	24	228	22	460	170
Philadelphia, Pa.	1,549,008	461	50	11	260	8	55	5	85	50
Pittsburgh, Pa.	533,805	178	17	3	75	3	33	1	28	15
St. Louis, Mo.	687,029	225	34	1	110	.....	23	1	42	19
From 300,000 to 500,000 inhabitants:										
Cincinnati, Ohio.	364,463	135	9	1	6	.....	6	.....	26	27
Los Angeles, Cal.	319,198	108	9	1	401	.....	4	.....	28	23
Milwaukee, Wis.	373,857	123	19	3	45	.....	17	.....	28	18
Newark, N. J.	347,469	112	31	1	100	1	10	1	52	9
New Orleans, La.	339,075	151	14	3	54	1	.....	.....	30	24
San Francisco, Cal.	416,912	126	4	2	6	.....	7	2	16	11
Washington, D. C.	331,069	117	26	.....	36	.....	6	1	30	10
From 200,000 to 300,000 inhabitants:										
Jersey City, N. J.	267,779	.....	12	.....	55	.....	20	.....	18	.....
Providence, R. I.	224,326	62	12	2	16	.....	19	.....	6	9
Seattle, Wash.	237,194	41	5	.....	34	.....	1	.....	.....	3
From 100,000 to 200,000 inhabitants:										
Bridgeport, Conn.	102,054	.....	3	.....	1	.....	8	.....	1	2
Cambridge, Mass.	104,839	24	2	.....	41	.....	2	.....	8	5
Columbus, Ohio.	181,548	63	1	.....	11	.....	3	.....	5	6
Dayton, Ohio.	116,577	36	4	.....	8	.....	1	.....	5	5
Fall River, Mass.	119,295	49	6	1	41	6	10	1	3	4
Grand Rapids, Mich.	112,571	29	10	2	30	.....	9	.....	1	1
Lowell, Mass.	106,294	33	9	1	11	.....	4	.....	2	1
Nashville, Tenn.	110,364	36	.....	.....	2	1	.....	.....	2	5
Oakland, Cal.	150,174	30	3	.....	.....	.....	.....	.....	1	1
Richmond, Va.	127,628	55	1	.....	5	.....	2	.....	3	5
Spokane, Wash.	104,402	.....	.....	.....	6	.....	3	.....	3	4
Toledo, Ohio.	168,497	49	5	1	60	.....	3	.....	3	4
Worcester, Mass.	145,966	42	8	.....	21	1	5	.....	8	2
From 50,000 to 100,000 inhabitants:										
Altoona, Pa.	52,127	11	2	.....	.....	.....	2	.....	1	.....
Bayonne, N. J.	55,545	54	1	1	2	.....	1	1	2	5
Brockton, Mass.	56,878	.....	.....	.....	6	.....	2	.....	4	.....
Camden, N. J.	94,583	.....	5	.....	10	.....	5	.....	5	.....
Elizabeth, N. J.	73,409	18	2	.....	9	.....	2	.....	13	.....
Erie, Pa.	66,525	6	6	.....	14	.....	5	.....	6	.....
Evansville, Ind.	69,647	17	1	.....	13	1	11	.....	.....	3
Fort Wayne, Ind.	63,933	24	5	1	55	1	2	.....	1	1
Harrisburg, Pa.	64,186	.....	2	1	19	.....	1	.....	.....	1
Hartford, Conn.	98,915	42	14	2	31	.....	4	.....	2	1
Houston, Tex.	78,800	.....	2	1	.....	.....	4	.....	.....	.....
Johnstown, Pa.	55,482	14	10	.....	41	1	2	.....	.....	.....
Kansas City, Kans.	82,331	.....	1	.....	23	.....	3	.....	3	.....
Lawrence, Mass.	85,892	6	.....	.....	6	.....	2	.....	3	4
Lynn, Mass.	89,336	19	1	.....	22	.....	1	.....	8	1
Manchester, N. H.	70,063	30	4	1	10	.....	2	.....	2	2
New Bedford, Mass.	96,652	28	3	1	21	.....	4	.....	14	5
Passaic, N. J.	54,773	18	2	1	19	.....	2	.....	5	1
Pawtucket, R. I.	51,622	.....	.....	.....	.....	.....	1	.....	.....	1
Peoria, Ill.	66,950	12	.....	.....	.....	.....	.....	4	.....	3
Reading, Pa.	96,071	31	4	.....	12	.....	4	.....	.....	4
Saginaw, Mich.	50,510	17	.....	.....	10	.....	3	.....	1	.....
St. Joseph, Mo.	77,403	13	2	.....	34	.....	3	.....	2	.....
Schenectady, N. Y.	72,826	.....	.....	.....	17	.....	23	5	4	2
South Bend, Ind.	53,684	17	1	1	5	.....	1	.....	.....	.....
Springfield, Ill.	51,678	20	4	.....	6	.....	.....	.....	1	1
Springfield, Mass.	88,926	19	1	.....	20	.....	5	.....	3	.....
Trenton, N. J.	96,815	.....	8	1	7	1	9	1	8	2
Wilkes-Barre, Pa.	67,105	13	1	.....	11	.....	3	.....	6	.....
Yonkers, N. Y.	79,803	20	1	.....	23	.....	.....	.....	13	3
From 25,000 to 50,000 inhabitants:										
Atlantic City, N. J.	46,150	.....	.....	.....	18	.....	.....	.....	1	.....
Aurora, Ill.	29,807	8	.....	.....	2	.....	3	.....	.....	.....
Austin, Tex.	29,860	17	.....	.....	15	.....	4	.....	.....	2
Berkeley, Cal.	40,434	3	.....	.....	1	.....	1	.....	1	1
Binghamton, N. Y.	48,443	19	3	1	5	.....	.....	.....	2	2
Brookline, Mass.	27,792	3	5	1	7	.....	.....	.....	.....	.....

IN INSULAR POSSESSIONS.

HAWAII.

Examination of Rodents.

Rats and mongoose were examined in Hawaii as follows: Honolulu—week ended May 24, 361; week ended May 31, 268; week ended June 7, 407. Hilo—week ended May 24, 1,252; week ended May 31, 1,433. Honokaa—week ended May 24, 1,374; week ended May 31, 1,355. No plague-infected rodent was found.

PORTO RICO.

Rodents Collected and Examined.

Passed Asst. Surg. Creel reports that during the week ended June 7, 1913, there were examined 1,815 rodents, collected from various points in Porto Rico, and that of these, 487 were collected from various parts of San Juan municipality. None was found infected with plague.

FOREIGN REPORTS.

AUSTRIA-HUNGARY.

Trieste—Typhus Fever.

The American consul reported June 13 the presence of typhus fever in the consular district of Trieste.

BRITISH GOLD COAST.

Akkra—Yellow Fever.

Yellow fever was reported present at Akkra June 18, 1913.

CHINA.

Amoy—Plague.

Acting Asst. Surg. Strick reported May 20: Plague is increasing at Amoy and outbreaks of the disease have occurred in many of the villages on Amoy Island. During the week ended May 17 there were notified in the international settlement of Kulangsu 9 deaths from plague.

Hongkong—Plague—Plague-Infected Rats.

Surg. Brown reports: During the week ended May 3 there were notified at Hongkong 6 cases of plague with 6 deaths, and during the week ended May 10, 10 cases with 7 deaths, and 6 foci of infection reported.

Rats have been collected and examined for plague infection as follows: Week ended May 3, 2,067, with 13 plague-infected rats found; week ended May 10, 2,239 rats, with 13 found infected.

COLOMBIA.

Quarantine Station at Puerto Belillo.

The following statement was received from Consul Manning at Barranquilla:

The president of Colombia issued a decree dated March 14 authorizing the opening of the sanitary or quarantine station at Puerto Belillo, near Puerto Colombia, which has been recently constructed according to regulations of the sanitary conventions of Washington and Paris. This station has been open since May 15, 1913.

The decree provides for two sanitary inspectors in Colombia, one residing at Barranquilla and the other at Buenaventura. These inspectors shall have immediate charge of the sanitary stations and they shall direct these operations in so far as quarantine and prophylaxis are concerned in conformance with instructions from the central board of hygiene and the minister of the government, adjusted to the text of the international sanitary conventions.

The Atlantic station will have the following personnel: One sanitary physician; 1 assistant, who shall be also a pharmacist; an administrator; chief of sanitary guards; 5 guards; an engineer and electrician; 1 assistant; 1 pilot; and 3 marines or sailors. The members of this personnel shall be immunes from yellow fever.

The sanitary inspectors are directed to report at once to the Government any appearance of cholera, plague, or yellow fever and the extension of either, and may also report this to the signatory powers of the sanitary conference.

Arrangements are made in the decree for carrying out the full requirements of the sanitary conferences of Paris, Washington, etc., including fumigation of baggage, cargo, etc., in case of infection, and also for the immediate isolation of sick in isolation hospital and observation of other passengers, crew, etc., in the quarantine station, or on board, which shall not exceed five days. In cases of yellow fever, all who may prove immunity through having suffered the disease will be passed without quarantine.

Any ship not willing to submit to the regulations of quarantine will have the privilege of putting to sea again. Such ships, after isolation of ship, passengers, and crew, may present information as to condition, and after disinfection may be permitted to unload passengers and cargo. The decree prohibits the disembarkation of lepers and passengers suffering from trachoma or such other infectious diseases as may be determined by the board of hygiene, except in case of natives of Colombia.

A charge will be made of \$3 per day for first-class passengers and \$1.50 for third-class passengers at the quarantine station, and agents of steamship lines sailing from Antillian ports supposed to be infected will be required to collect this amount from passengers embarking for Puerto Colombia, Cartagena, or Santa Marta.

Santa Marta—Plague Officially Denied.

A communication dated May 16, 1913, has been received from the minister of foreign affairs at Bogata, Colombia, stating that the disease which broke out in Santa Marta barracks early in April and which was at first declared to be plague has been determined not to have been plague.

CUBA.**Habana—Quarantine Against Haiti.**

On account of the reported presence of plague in Haiti, quarantine was ordered June 17 at Habana against vessels arriving from Haitian ports.

GREAT BRITAIN.**Pellagra.**

Charles R. Box, M. D., and F. W. Most, F. R. S., report in the Transactions of the Society of Tropical Diseases for the month of April, 1913, the occurrence of a fatal case of pellagra in London. The case occurred in a boy of 8 years admitted to hospital September 20, 1913. A similar case had occurred previously in a brother of the patient, but the disease was not diagnosed at the time as pellagra. The duration of the disease in the first patient was about six years. He died in 1911, the immediate cause of death not being ascertained.

MEXICO.**Campeche—Yellow Fever.**

During the week ended June 7, 1913, a fatal case of yellow fever was notified at Campeche.

SIAM.**Bangkok—Quarantine Against Swatow.**

According to a notice issued May 1, 1913, by the minister of local government at Bangkok, vessels arriving in Siamese waters from Swatow, China, will be subject to quarantine detention at the island of Koh Phra for a period of 10 days.

CHOLERA, YELLOW FEVER, PLAGUE, AND SMALLPOX.**Reports Received During Week Ended June 27, 1913.****CHOLERA.**

Places.	Date.	Cases.	Deaths.	Remarks.
Dutch East Indies:				
Celebes—				
Batangmata	Mar. 4-15	26	21	
Java—				
Batavia	May 4-10	29	19	
Madioen	May 3	2		
India:				
Bassein	Apr. 26-May 3	35	33	
Madras	May 11-17	1	1	
Moulmine	Apr. 26-May 3	1	1	
Rangoon	Apr. 1-30	10	8	

YELLOW FEVER.

British Gold Coast:				
Akkra	June 18			Present.
Mexiao:				
Campeche	June 1-7	1	1	

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

Reports Received During Week Ended June 27, 1913—Continued.

PLAGUE.

Places.	Date.	Cases.	Deaths.	Remarks.
Arabia:				
Aden.....	May 28-June 2....	6	7	
China:				
Amoy.....	May 11-17.....		9	
Hongkong.....	May 4-17.....	18	15	
Egypt:				May 9-29: Cases, 64; deaths, 32.
Alexandria.....	May 5-27.....	19	9	
Galloubeh.....	May 8-21.....	2	2	
Garbieh.....	May 9-26.....	4	2	
Fayoum.....	May 7-29.....	14	7	
Menouf.....	May 3-26.....	3	2	
Minieh.....	May 8-29.....	19	6	
Eritrea:				
Massowa.....	May 9-30.....	43		
India:				
Bombay.....	May 11-17.....	185	165	
Karachi.....	do.....	14	12	
Madras.....	do.....	1	1	
Rangoon.....	Apr. 1-30.....	111	113	
Provinces.....				Total, year 1911: Cases, 878,221; deaths, 733,451. Year 1912: Cases, 322,436; deaths, 270,520: Apr. 6-May 3: Cases, 45,360; deaths, 40,022.
Delhi.....	Apr. 6-May 3....	70	65	
Bombay.....	do.....	1,907	1,572	
Madras.....	do.....	147	115	
Bengal.....	do.....	292	276	
Bihar and Orissa.....	do.....	6,675	5,953	
United Provinces.....	do.....	26,191	23,868	
Punjab.....	do.....	8,791	7,048	
Burma.....	do.....	352	250	
Central Provinces.....	do.....	82	68	
Mysore.....	do.....	76	55	
Hyderabad.....	do.....	16	14	
Central India.....	do.....	16	13	
Rajputana.....	do.....	660	580	
Kashmir.....	do.....	83	35	
Baluchistan.....	Apr. 13-May 3....	2	2	
Mauritius ¹	Apr. 11-17.....	1		
Persia:				
Kermanshah.....	June 1.....			Epidemic.
Peru:				
Trujillo.....	May 27.....			3 cases in the lazaretto.
Turkey in Asia:				
Basra.....	May 31-June 3....	1	1	In Schmer, the Persian quarter.
Jiddah.....	May 31.....	1		

SMALLPOX.

Algeria:				
Oran.....	Mar. 1-31.....	8	2	
Arabia:				
Aden.....	May 10-19.....	1	1	
Canada:				
Montreal.....	June 1-14.....	7		
Ottawa.....	June 1-7.....	2		
Quebec.....	do.....	1		
Toronto.....	June 8-14.....	4		
Vancouver.....	May 25-31.....	2		
Winnipeg.....	May 24-June 7....	3		
China:				
Dalny.....	May 4-10.....	1		
Hongkong.....	May 4-17.....	4	3	
Dutch East Africa:				
Java—				
Surabaya.....	May 1-6.....	4		
Egypt:				
Cairo.....	Apr. 30-May 13....	5	1	
Germany:				
Bremen.....	May 1-31.....	1		
Greece:				
Patras.....	May 26-June 1....		1	
India:				
Bombay.....	May 11-17.....	17	8	
Rangoon.....	Apr. 1-30.....	101	30	

¹ Bulletin Quarantenaire d'Egypte.

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

Reports Received During Week Ended June 27, 1913—Continued.

SMALLPOX—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
Japan:				
Nagasaki.....	May 19-25.....	3		
Malta.....	Mar. 1-31.....	1	1	
Mauritius.....	Mar. 15-20.....	54		
Do.....	Mar. 15-Apr. 12.....		20	
Mexico:				
Aguascalientes.....	June 2-8.....		6	
Chihuahua.....	do.....		2	
Guadalajara.....	May 4-27.....	10		
Veracruz.....	June 1-7.....	3	1	
Newfoundland:				
St. Johns.....	do.....	7		
Portugal:				
Lisbon.....	May 18-24.....	5		
Russia:				
Moscow.....	May 4-17.....	11	3	
Warsaw.....	Feb. 16-22.....	2		
Servia.....	May 25-31.....			Generally epidemic.
Spain:				
Barcelona.....	May 24-June 7.....		22	
Madrid.....	May 1-31.....		23	
Valencia.....	May 25-31.....	1		
Sweden:				
Stockholm.....	May 11-17.....	1	1	
Switzerland:				
Basel.....	May 11-31.....	12		
Turkey in Asia:				
Beirut.....	May 18-24.....	3	2	
Mersina.....	do.....		2	
Smyrna.....	Apr. 6-19.....		5	
Turkey in Europe:				
Constantinople.....	May 18-31.....		8	
Saloniki.....	May 19-June 1.....	6	3	

Reports Received from Dec. 27, 1912, to June 27, 1913.

CHOLERA.

Places.	Date.	Cases.	Deaths.	Remarks.
Bulgaria:				
Burgas.....	May 1.....			Present.
Eski Saghara.....	Dec. 9.....	2		
Sofia.....	Nov. 21-Dec. 16.....	6	1	
Shumia.....	Dec. 30.....	18		
China:				
Amoy.....	Apr. 25.....			Present.
Foochow.....	Nov. 20-Dec. 2.....			Isolated cases.
Hongkong.....	Mar. 23-29.....	5	5	Among Chinese.
Shanghai.....				Total 1912: Cases, 10, in the foreign settlement.
Dutch East Indies:				
Borneo—				
Bandermanin.....	Nov. 22-30.....	5	5	
Pontrank.....	Oct. 6.....	1		
Samarinda.....	Oct. 9-Nov. 2.....	26	25	
Singkawang.....	Oct. 8-Nov. 1.....	2	2	
Celebes—				
Batangmata.....				Present.
Java—				
Batavia.....	Nov. 9-Dec. 31.....	40	28	And Tanjong Priok, the harbor.
Do.....	Jan. 19 y 10.....	201	153	Report Apr. 6-25 not received.
Madioen.....	Sept. 15-Nov. 9.....	192	105	
Do.....	Jan. 31-May 4.....	17	10	
Megalang.....	Oct. 7-12.....	9	6	
Paseroean Residency.....	Sept. 20-26.....	2	1	
Samarang.....	July 19-Dec. 26.....	591	485	
Do.....	Dec. 27-Mar. 17.....	13	14	
Surabaya.....	Oct. 16-Nov. 28.....	4	3	
Sumatra—				
Air Tiris.....	Dec. 3-22.....	11	11	
Benkoelen.....	Nov. 3-30.....	3	1	
Koeoh.....	Dec. 3-15.....	4	9	
Jambi.....	Sept. 18-24.....	1	2	
Roembo.....	Dec. 3-15.....	2	2	
Telokbetong.....	Nov. 1-Dec. 31.....	121	20	

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

Reports Received from Dec. 27, 1912, to June 27, 1913—Continued.

CHOLERA—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
India:				
Bassein	Jan. 25-May 3.	272	236	
Bombay	Nov. 17-May 10.	223	159	
Calcutta	Nov. 9-Apr. 26.		965	
Cochin	Oct. 10-Nov. 9.	6	6	
Do	Feb. 17-23.	5	5	
Madras	Nov. 24-May 17.	42	39	
Moulmine	Feb. 23-Apr. 26.	12	12	
Negapatam	Nov. 11-Apr. 19.	43	43	
Rangoon	Nov. 1-Dec. 28.	3	3	
Do	Dec. 29-Apr. 30.	48	44	
Indo-China: Saigon	Aug. 20-Oct. 27.	42	38	
Japan				Total, year 1912: Cases, 2,722; deaths, 1,678, exclusive of Taiwan. Epidemic, Aug. 1, 1912-Mar. 3, 1913: Cases, 2,634; deaths, 1,666, including cases p. 2233, Vol. XXVII, and p. 259, Vol. XXVIII. Total, Jan. 1-Mar. 31: Cases, 76; deaths, 22, exclusive of Taiwan.
Prefectures—				
Akita	Dec. 2.	1	1	
Chiba	Nov. 21-Mar. 3.	116	83	
Ehime	Sept. 21-Dec. 2.	52	21	
Fukuoka	Aug. 1-Dec. 2.	816	531	
Fukushima	Dec. 5.	1		
Higo	Sept. 27-Nov. 24.	137	100	
Hiroshima	Sept. 21-Nov. 23.	49	32	
Ibaraki	Dec. 6.	2	2	
Iwate	Dec. 16.	2	1	
Kagawa	Oct. 12-Nov. 21.	15	10	
Kagoshima	Sept. 21-Oct. 18.	11	5	
Kanagawa	Sept. 25-Feb. 4.	122	94	Including Yokohama.
Yokohama	Sept. 29-Jan. 9.	39		Sept. 25-Dec. 7: 9 cases from vessels.
Kochi	Oct. 19-Dec. 4.	25	14	
Kioto	Sept. 21-Nov. 1.	5	5	
Kumamoto	do.	15	9	
Minami Tokakigun	Sept. 15-Dec. 2.			40 cases not included in total.
Nagasaki	do.	188	112	Including Nagasaki city, and with outlying islands, 134 deaths:
Oita	Sept. 21-Dec. 5.	38	21	
Okayama	Sept. 21-Nov. 22.	67	39	
Osaka	Sept. 21-Mar. 3.	166	108	
Saga	Sept. 21-Dec. 3.	109	76	
Saitama	Oct. 12-18.	3	2	
Shizuoka	Oct. 19-Mar. 3.	90	33	
Shimane	To Mar. 3.	2		
Taiwan (Formosa)				Total, year 1912: Cases, 333; deaths, 256.
Tokyo	Sept. 23-Feb. 4.	314	217	
Tokushima	Sept. 15-Dec. 1.	8	5	
Wakamatsu	Nov. 26.			1 case not included in total.
Wakayama	Oct. 19-Nov. 16.	13	12	
Yamaguchi	Sept. 21-Nov. 26.	267	162	
Yamanchi	Feb. 3.	1	1	
Russia:				
Odessa	Jan. 8-21.	5	2	Nov. 18-20: 1 case from s. s. Bosnian, from Constantinople. Confined in the quarantine barracks.
Servia:				
Pirot	Apr. 10.	5		Among returning soldiers and prisoners.
Siam:				
Bangkok	Oct. 13-Mar. 22.		8	
Straits Settlements:				
Singapore	Nov. 17-23.	2	2	
Do	Jan. 27-Apr. 12.	6	2	
Turkey in Asia:				
Adana—				Total, Nov. 17-23: Cases, 160; deaths, 218.
Adana	Nov. 17-Dec. 2.	2		
Aleppo—				
Aleppo	Nov. 24-Dec. 2.	5	3	
Alexandretta	do.	3	2	
Angora—				
Angora	Nov. 24-Dec. 11.	29	23	
Balikesir	Nov. 24-Dec. 2.		1	

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

Reports Received from Dec. 27, 1912, to June 27, 1913—Continued.

CHOLERA—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
Turkey in Asia—Continued.				
Beirut—				
Merdijoun.....	Dec. 3-11.....		15	Present.
Tavarlyeh.....	Dec. 13-22.....			
Brusa.....	Nov. 17-Dec. 11.....	26	38	
Castamoni.....	Nov. 17-Dec. 2.....	6	4	
Dierbekir.....	do.....	8	2	
Hedjaz—				
Jedda.....	Nov. 25-Dec. 14.....	395	393	Among returning pilgrims.
Medina.....	Dec. 3-11.....		6	
Mekka.....	Nov. 17-23.....	111	172	Dec. 3-11: Deaths, 3,007.
Ismidt.....	Nov. 17-Dec. 2.....	3	1	
Kartal.....	Dec. 30-Feb. 12.....	9	3	
Khodavendikar—				
Karassi.....	Jan. 30-Feb. 12.....		2	
Mosul.....	Nov. 17-Dec. 2.....		2	
Sinope.....	Dec. 3-11.....	1	4	
Smyrna.....	Nov. 17-Dec. 2.....	3	1	
Syria—				
Haifa.....	Dec. 21.....		1	
Tiberias.....	Dec. 3-25.....	129	68	
Tarsus.....	Nov. 24-Dec. 2.....		2	
Turkey in Europe:				
Constantinople.....	Dec. 3-Jan. 28.....	1,598	787	Total, Nov. 5-Jan. 28: Cases, 2,515; deaths, 1,245.
Do.....	Mar. 12-Apr. 28.....	15	5	New outbreak.
Kavala.....	Apr. 1.....		1	
Saloniki vilayet.....	June 10.....			June 10, 12 cases in Orfana and 100 cases in Seras.
Zanzibar.....	Nov. 8-Dec. 21.....	131	130	Total, Aug. 5-Dec. 23: Cases, 943; deaths, 912, including previous reports from Mwara, Chwaka, and Mokoton. Chwaka district, Oct. 4-Dec. 31, 332 cases, not included in previous reports.
At sea.....				Nov. 18-20: 1 fatal case on s. s. Bosnian, en route from Constantinople to Odessa.

YELLOW FEVER.

Brazil:				
Bahia.....	Jan. 24-Apr. 26.....	19	23	Case reported May 10, p. 953, from the Brazilian steamer Mararia May 6, and placed in observation hospital, where he died May 9.
Manaos.....	Jan. 5-May 17.....	27	27	
Para.....				
Pernambuco.....				Year 1912: Deaths, 41.
British Gold Coast:				
Akra.....	Mar. 22-Apr. 26.....			Present. June 18, again present.
Ecuador:				
Agua Piedra.....	Dec. 1-31.....	7	4	
Do.....	Jan. 1-Mar. 31.....	10	6	
Bucay.....	Nov. 15-Dec. 31.....	3	2	
Do.....	Jan. 1-Apr. 30.....	6	3	
Duran.....	Nov. 1-Dec. 31.....	3	3	
Do.....	Jan. 1-Apr. 30.....	16	9	
Guayaquil.....	Nov. 1-Dec. 31.....	25	16	
Do.....	Jan. 1-Apr. 30.....	154	79	
Milagro.....	Nov. 1-Dec. 31.....	2	2	
Do.....	Jan. 1-Apr. 30.....	40	22	
Naranjito.....	Nov. 1-Dec. 31.....	3	2	
Do.....	Jan. 1-Apr. 30.....	22	12	
Yaguachi.....	Apr. 1-30.....	1		
Mexico:				
Campeche.....	June 1-7.....	1	1	From Campeche.
Merida.....	Apr. 2-10.....	1	1	
Senegal:				
Dakar.....	Dec. 7.....			Present.
Venezuela:				
Caracas.....	Nov. 1-Dec. 31.....	9	2	In September 2 deaths and in October 1 death not previously reported. Feb. 7, 1 case.
Do.....	Jan. 1-31.....	2		

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

Reports Received from Dec. 27, 1912, to June 27, 1913—Continued.

PLAGUE.

Places.	Date.	Cases.	Deaths.	Remarks.
Afghanistan:				
Tchebel-Bagdareh.....	Sept. 1-30.....			And vicinity, 100 deaths daily. Present to Oct. 29.
Arabia:				
Aden.....	Apr. 9-June 2.....	73	55	
Oran—				
Debal.....	Feb. 16.....			Present.
Argentina:				
Herrera.....	Feb. 22.....	9	6	Southeastern part of Entre Rios.
Rosario.....	Jan. 4.....	4	1	Endemic.
Brazil:				
Bahia.....	Jan. 12-May 10.....	38	20	
Pernambuco.....	Nov. 1-Jan. 31.....		11	Year 1912: Deaths, 20.
Rio de Janeiro.....	Nov. 3-Apr. 26.....	26	10	Year 1912: Cases, 21.
Santos.....	Dec. 1.....	2	2	
British East Africa.				
Dagoretti.....	Jan. 14-Feb. 26.....		17	
Khambu.....	Jan. 14-Feb. 5.....	1		
Do.....	Nov. 16-Dec. 8.....	2		
Do.....	Feb. 27-Mar. 31.....	1		
Kisumu.....	Dec. 8-28.....	7		
Do.....	Jan. 14-Apr. 24.....	10		
Mombasa.....	Oct. 1-Dec. 25.....	16	12	Free Nov. 18.
Do.....	Feb. 6-Apr. 24.....	10	5	
Nairobi.....	Nov. 16-Mar. 31.....	21	1	
Canary Islands:				
Teneriffe—				
Santa Cruz.....	Feb. 21-27.....		5	
Chile:				
Antofagasta.....	Feb. 12.....			Present.
Iquique.....	Jan. 8-May 10.....	18	7	
Taltal.....	Oct. 22-28.....	3		
China.				
Amoy.....	Apr. 6-12.....		1	Apr. 25-May 17, present in Chaowfu and vicinity, Chaoyang, Chenghai, Kityang, Mi-ou, San-hopa, and Puning. Jan. 17-Apr. 15, few sporadic cases. Pneumonic form present and in vicinity. May 26, epidemic. Present and in vicinity.
Canton.....	Apr. 29.....			
Fungshun.....	Apr. 25.....	10		
Kulangsu.....	Apr. 6-12.....			Increasing.
Hai An.....	Mar. 8.....			Present in pneumonic form in 2 localities in vicinity about 48 miles from Amoy.
Hoihow.....	Nov. 1-30.....			Present.
Kulangsu.....	Jan. 17.....	3		International settlement of Amoy.
Hongkong.....	Jan. 12-May 17.....	52	48	Total January to September, 1912: Cases, 1,848; deaths, 1,728. June 17, 10 cases.
Manchuria	Dec. 14.....			Present along the railway between Harbin and Chang-Chun.
Pakhoi.....	Dec. 1-31.....	30		Feb. 1, from 10 to 12 deaths daily.
Shanghai.....	Nov. 18-Dec. 15.....		2	Dec. 18, present in vicinity of the French settlement. Total 1912: Cases, 9, among natives.
Do.....	Mar. 31-Apr. 6.....		1	June 17: Cases 1, deaths 7.
Swatow.....	Apr. 25.....	3	2	Jan. 9 to May 17, present in vicinity.
Dutch East Indies.				
Java—				
Kediri.....	Oct. 6-Dec. 31.....	406	377	
Do.....	Jan. 1-Mar. 31.....	443	201	
Madison.....	Oct. 6-Jan. 1.....	98	96	
Do.....	Jan. 1-Mar. 31.....	156	146	
Malang.....				
Do.....	Jan. 1-Mar. 31.....	949	928	
Surabaya.....	Oct. 6-Jan. 4.....	43	43	
Do.....	Jan. 1-Mar. 31.....	47	46	
				Total, year 1912: Cases, 1,477; deaths, 1,406, among natives, including Pasoeroean Residency.

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

Reports Received from Dec. 27, 1912, to June 27, 1913—Continued.

PLAGUE—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
Ecuador:				
Alausi.....	Apr. 1-30.....	5	2	
Duran.....	Nov. 1-Dec. 31.....	4	1	
Do.....	Jan. 1-Mar. 31.....	9	6	
Guayaquil.....	Nov. 1-Dec. 31.....	139	52	
Do.....	Jan. 1-Apr. 30.....	145	77	
Huigra.....	Apr. 1-30.....	8	2	
Milagro.....	Dec. 1-31.....	8	1	
Do.....	Jan. 1-Mar. 31.....	10	2	
Egypt.....				Total, Jan. 1-Dec. 31, 1912: Cases, 834; deaths, 441, Jan. 1-May 29, 1913: Cases, 409; deaths, 208.
Alexandria.....	Mar. 2-May 27.....	63	41	
Cairo.....	Dec. 30.....	1	1	
Port Said.....	Dec. 29.....	1	1	
Do.....	Jan. 1-Mar. 5.....	4	2	
Provinces—				
Assiout.....	Jan. 22-May 1.....	34	31	
Behera.....	Nov. 29-Dec. 12.....	2	1	
Do.....	Mar. 10-May 5.....	6	6	
Benisouef.....	Jan. 22-May 4.....	8	5	
Charkieh.....	Nov. 29-Dec. 12.....	3	2	
Do.....	Jan. 2-Mar. 22.....	16	7	
Fayoum.....	Jan. 19-May 29.....	57	28	
Galloubeh.....	Jan. 1-May 26.....	12	4	
Garbieh.....	Jan. 1-May 8.....	8	3	
Do.....	Nov. 23-Dec. 17.....	3	3	
Girgeh.....	Jan. 1-Apr. 30.....	14	14	
Do.....	Dec. 21-25.....	1	1	
Gizeh.....	Jan. 1-May 28.....	48	15	
Keneh.....	Apr. 15-May 4.....	2	2	
Menouf.....	Jan. 1-May 2.....	48	22	
Do.....	Oct. 1-Dec. 31.....	13	7	
Minieh.....	Nov. 28-Dec. 29.....	7	4	
Do.....	Jan. 23-May 29.....	67	18	
Sohag.....	Apr. 4.....	15	6	
Eritrea:				
Massowa.....	May 9-30.....	43		And vicinity.
Haiti:				
Jacmel.....	June 17.....			Presence of plague reported June 17, but later denied by commission of experts sent to investigate.
Hawaii:				
Honokaa.....	May 2.....	1	1	
Kukuihaele.....	Jan. 11-31.....	2	2	
Paauhau.....	May 8.....	1	1	
India:				
Bombay.....	Nov. 17-May 17.....	2,121	1,623	
Calcutta.....	Nov. 9-Apr. 26.....		568	
Karachi.....	Nov. 19-Dec. 28.....	15	14	
Do.....	Mar. 2-May 17.....	159	135	
Madras.....	Dec. 29-Jan. 17.....	2	2	
Rangoon.....	Oct. 1-Nov. 30.....	68	68	
Do.....	Dec. 29-Apr. 30.....	463	540	
Provinces.....				Total, Oct. 27-Dec. 28, 1912: Cases, 25,212; deaths, 19,863. Year 1911: Cases, 878,221; deaths, 733,451. Year 1912: Cases, 322,436; deaths, 270,520.
Delhi.....	Oct. 27-Dec. 28.....	31	14	
Bombay.....	do.....	6,785	5,121	
Madras.....	do.....	1,833	1,337	
Bengal.....	do.....	60	59	
Bihar and Orissa.....	do.....	1,269	1,025	
United Provinces.....	do.....	7,844	6,001	
Punjab.....	do.....	952	709	
Burma.....	do.....	85	85	
Central Provinces.....	do.....	404	301	
Mysore.....	do.....	1,506	1,114	
Hyderabad.....	do.....	1,498	1,212	
Central India.....	do.....	70	60	
Rajputana.....	do.....	2,862	2,824	
Kashmir.....	do.....	3	1	

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

Reports Received from Dec. 27, 1912, to June 27, 1913—Continued.

PLAGUE—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
India - Continued.				
Provinces.....				Total, Dec. 29-May 3: Cases, 154,195; deaths, 131,814.
Delhi.....	Dec. 29-May 3.....	225	181	
Bombay.....	do.....	8,803	6,817	
Madras.....	do.....	2,595	1,960	
Bengal.....	do.....	690	652	
Bihar and Orissa.....	do.....	26,638	22,358	
United Provinces.....	do.....	90,494	79,646	
Punjab.....	do.....	16,023	12,869	
Burma.....	do.....	2,312	2,112	
Central Provinces.....	do.....	746	554	
Mysore.....	do.....	1,897	1,434	
Hyderabad.....	do.....	1,237	1,019	
Central India.....	do.....	74	56	
Rajputana.....	do.....	2,306	2,076	
Kashmir.....	do.....	152	70	
Northwest Provinces.....	Dec. 29-Feb. 1.....	1	1	
Baluchistan.....	Apr. 13-May 3.....	2	2	
Indo-China: Saigon.....	Aug. 20-Apr. 7.....	68	42	
Japan:				
Taiwan (Formosa).....				Total, year 1912: Cases, 223; deaths, 185.
Kagi.....	Mar. 18-Apr. 17.....	98	73	
Mauritius.....	Oct. 11-Apr. 17.....	265	166	
Morocco:				
Mehedia.....	Apr. 24.....	4		Among the military.
Rabat.....	Nov. 1.....	3		Do.
New Caledonia: Numea.....	Sept. 17-Dec. 2.....	62	32	7 cases with 2 deaths among Europeans.
Persia:				
Bushir.....	Apr. 13-May 17.....	27	22	
Kermanshah.....	June 1.....			Epidemic.
Peru:				
Departments—				
Ancachs.....	July 1-Aug. 31.....	8	3	
Do.....	Jan. 1-Mar. 31.....	8	3	
Arequipa.....	July 1-Aug. 31.....	12	5	
Do.....	Jan. 1-Mar. 31.....	14	10	Mollendo, Apr. 1-27: Cases, 3; deaths, 4.
Callao.....	July 1-31.....	1	1	Present in September.
Do.....	Jan. 1-Mar. 31.....	14	9	
Ferrenaje.....	Dec. 23-Jan. 12.....	1		
Ica.....	do.....	1		
Lambayeque.....	Jan. 1-Mar. 31.....	168	81	Do.
Chiclayo.....	Apr. 1-27.....	2	3	
Jayanca.....	Dec. 2-22.....			Present.
Libertad.....	July 1-Aug. 31.....	20	9	
Do.....	Jan. 1-Mar. 31.....	107	52	
Humachuco.....	Mar. 25.....			Do.
Cosma.....	Dec. 2-22.....			Do.
Paijan.....	do.....			Do.
Salaverry.....	Dec. 23-Jan. 12.....	1		
San Pedro.....	Dec. 2-Jan. 12.....	27		
Do.....	Apr. 1-27.....	6	6	
Trujillo.....	Dec. 2-Jan. 12.....	44		
Do.....	Apr. 1-27.....	7	7	May 27, 3 cases in the lazaretto.
Lima.....	July 1-Aug. 31.....	7	4	
Do.....	Apr. 1-27.....	6	6	
Piura.....	Jan. 1-Mar. 31.....	21	13	
Catacaos.....	Dec. 2-Jan. 12.....			Present.
Pañta.....	do.....			Do.
Piura.....	Dec. 23-Jan. 12.....			Do.
Sulanna.....	Dec. 2-22.....			Do.
Philippine Islands:				
Manila:				
Provinces.....				Third quarter, 1912: Cases, 8, deaths, 7. Fourth quarter, 1912: Cases, 39; deaths, 33 Jan. 1-Mar. 8: Cases, 5; deaths, 5.
Russia:				In Popova, Kiraejevo, and vicinity, including report, p. 1094.
Don, territory.....	Nov. 1-Apr. 2.....	40	21	
Moscow.....	Dec. 29-Jan. 11.....	3	1	
Trans-Baikal district—				
Verneudinsk.....	Oct. 18-28.....	3	3	Near Nerchinsk.
Trans-Caspian Ter., Merv.....	Dec. 9-21.....	29	29	Pneumonic.
Siam: Bangkok.....	Jan. 5-Mar. 22.....			
Turkey in Asia:				
Basra.....	May 31-June 3.....	1	1	In Sehmer, the Persian quarter.
Jiddah.....	Mar. 10-May 31.....	31	27	

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

Reports Received from Dec. 27, 1912, to June 27, 1913—Continued.

SMALLPOX.

Places.	Date.	Cases.	Deaths.	Remarks.
Abyssinia: Adis Ababa.....	Nov. 24-Dec. 21.....			Present.
Algeria:				
Departments—				
Algiers.....	Oct. 1-31.....	11		
Constantine.....	do.....	11		
Do.....	Feb. 1-28.....	12		
Oran.....	Oct. 1-Dec. 31.....	170	10	
Do.....	Jan. 1-Mar. 31.....	33	7	
Arabia: Aden.....	Jan. 14-May 19.....	16	3	
Argentina:				
Buenos Aires.....	Nov. 1-Dec. 31.....		7	
Do.....	Feb. 1-Mar. 31.....		3	
Australia:				
Darwin.....	Feb. 12.....			1 case in quarantine from s. a. Eastern en route from Japan to Sydney.
Sydney—				
North Head Quarantine Station.....	Apr. 9-May 1.....	6		From s. s. Baralong from London via South Africa, Mauritius, and Albany.
Do.....				May 1: 6 cases with 1 death on bark E. J. Spence from Mauritius.
Austria-Hungary:				
Bohemia.....	Apr. 13-19.....	2		
Dalmatia.....	Feb. 9-15.....	1		
Galicia.....	Nov. 10-Dec. 7.....	3		
Do.....	Apr. 15-26.....	3		
Fiume.....	Jan. 14-May 12.....	9	2	
Moravia.....	Jan. 17-Apr. 21.....	3		
Trieste.....	Dec. 8-May 17.....	58		Returning travelers.
Belgium: Antwerp.....	Mar. 24-31.....	1		
Brazil:				
Bahia.....	Apr. 6-May 3.....	5		
Para.....	Dec. 8-Feb. 1.....	2		June 18: 7 cases.
Pernambuco.....	Nov. 1-Apr. 30.....		200	Year 1912: Deaths, 762.
Rio de Janeiro.....	Nov. 3-May 3.....	101	28	
British East Africa:				
Mombasa.....	Dec. 1-31.....	17	10	
Do.....	Feb. 1-28.....	16	3	
Canada:				
British Columbia—				
Vernie.....	Feb. 23-Mar 1.....	12		Apr. 22: 1 case in vicinity.
Vancouver.....	Feb. 2-May 31.....	6		
Victoria.....	May 4-10.....	2		
Manitoba—				
Winnipeg.....	Mar. 30-June 7.....	20		
Ontario—				
Cornwall.....	Mar. 16-22.....	2		
Fort William.....	Mar. 31-Apr. 16.....	4		
Hamilton.....	Jan. 1-May 31.....	68		
Niagara Falls.....	Feb. 1-Apr. 21.....	21		
Ottawa.....	Jan. 4-June 7.....	52		
Port Arthur.....	Mar. 16.....	1		
Sault de Ste. Marie.....	May 4-10.....	1		
Toronto.....	Dec. 1-June 14.....	29		
Windsor.....	Feb. 9-Apr. 26.....	12		
Quebec—				
Grosse Isle Quarantine.....				May 15: 1 case on s. a. Canada from Trieste, via Patras, Naples, and Lisbon.
Montreal.....	Dec. 15-June 14.....	183	1	
Quebec.....	Dec. 15-June 7.....	38		
St. Johns.....	Jan. 12-May 24.....	27	1	
Chile:				
Punta Arenas.....	Oct. 31-Nov. 30.....	3		Oct. 31: 1 case in vicinity.
Do.....	Jan. 1-31.....	1		
Santiago.....	May 11-17.....			Present.
China:				
Amoy.....	Mar. 15-Apr. 12.....		2	
Kulangsu.....	Jan. 12-Feb. 29.....	1	1	Apr. 5, present.
An Kho.....	Jan. 4.....			Epidemic; 2 days' journey from Amoy.
Chungking.....	Nov. 3-May 10.....			Present.
Dalny.....	Jan. 12-May 10.....	2	1	
Hankow.....	Dec. 29-Jan. 4.....	1		
Harbin.....	Dec. 1-31.....	6		
Do.....	Jan. 17-Feb. 13.....	2		

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

Reports Received from Dec. 27, 1912, to June 27, 1913—Continued.

SMALLPOX—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
China—Continued.				
Hoihow	Jan. 3			Present.
Hongkong	Nov. 24—May 17	82	57	
Nanking	Dec. 7—May 10			Do.
Shanghai	Nov. 18—May 18	53	202	Deaths among natives. Year 1912: Cases, 144.
Tientsin	Nov. 17—May 10	9	27	
Costa Rica: Limon	Feb. 1	2	2	
Dutch East Indies:				
Java—				
Batavia	Nov. 9—Mar. 15	42	12	Jan. 5-11, 10 cases, with 5 deaths in the district, mainly in Samarang.
Samarang				
Do.	Oct. 4-24	57	23	
Do.	Jan. 5—Mar. 15	906	202	
Surabaya	Mar. 16—May 6	10	5	
Egypt:				
Alexandria	Dec. 9—May 27	82	25	
Cairo	Nov. 12—May 13	47	8	
Port Said	Dec. 3-31	1	1	
France:				
Marseille	Nov. 1—Apr. 30		28	
Nantes	Jan. 5—Mar. 31	8		
Nice	Feb. 1-28	2		
Paris	Dec. 1—May 24	66	1	
Germany				
Total: Nov. 24-30, 5 cases not included in report, p. 2231, vol. xxvii, Dec. 1—May 31, 77 cases.				
Bremen	May 1-31	1		
Breslau	Jan. 19-25	1		
Hamburg	Jan. 10—Mar. 29	4		
Kehl	Feb. 1-28		1	
Gibraltar	Dec. 9—Apr. 27	4	1	
Great Britain:				
Hull	Mar. 8—Apr. 1	5		
Liverpool	Jan. 4—Apr. 26	4	1	
London	Apr. 27—May 24	3		
Newcastle on Tyne	Feb. 9-15	15		
Sheffield	Feb. 26—Mar. 2	1		
Greece:				
Athens	Feb. 10—Apr. 5	1	3	
Patras	Mar. 3—May 25		43	Epidemic.
Pireus	Jan. 1—Mar. 13	119	49	May 11-24, 15 cases.
Hawaii: Pauhanu	May 2	1		
Honduras: Trujillo	Feb. 2-8	1		
India:				
Bombay	Nov. 17—May 17	333	150	
Calcutta	Dec. 1—Mar. 8		27	
Karachi	Dec. 1—May 10	82	25	
Madras	do	49	12	
Moulmine	Feb. 23—Mar. 29	1	3	
Rangoon	Oct. 1—Apr. 30	281	79	
Indo-China: Saigon	Aug. 20—Dec. 23	3	3	
Italy:				
Leghorn				Year 1912: Cases, 315; deaths, 19.
Naples	Mar. 16—May 24	9	1	
Palermo	Dec. 15—Apr. 12	40		
Turin	Feb. 3—Mar. 2	5		
Japan				
Total, year 1912: Cases, 14; deaths, 1. Total, Jan. 1—Mar. 31: Cases, 4; deaths, 1, exclusive of Taiwan.				
Hokkaido	Jan. 1-31	1		
Nagasaki	Mar. 9—May 25	9	4	Nov. 1-30, 1 case.
Nagahama quarantine station	May 9	1		From s. s. Shingo Maru from Kobe to Yokohama.
Oita, Province	Apr. 1-30	1		
Osaka	Apr. 1—May 10	5		
Taiwan (Formosa)				Year 1912: Cases, 4.
Kangawaken	Jan. 1-31	1		
Yokohama				Jan. 1-13, 2 cases from s. s. Pera from London via ports.
Malta	Feb. 1—Mar. 31	2	1	
Mauritius	Mar. 15-22	54		
Do.	Mar. 15—Apr. 12		20	

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

Reports Received from Dec. 27, 1912, to June 27, 1913—Continued.

SMALLPOX—Continued.

Places.	Date.	Cases.	Deaths.	Remarks.
Mexico.....				Feb. 16: Cases, 1,500 to 2,000, with 10 per cent of deaths; mainly along the western coast. Jan. 30-Feb. 16: Present in Aguierre Cajame, Corral, Esperanza Navoja, Puga, and Tarin.
Aguascalientes.....	Dec. 9-June 8.....		71	
Cananea.....	May 22.....			Many fatal cases.
Chihuahua.....	Dec. 9-June 8.....		27	
Durango.....	Dec. 1-Mar. 31.....		157	
Guadalajara.....	Jan. 5-May 27.....	42	3	
Hermosillo.....	Feb. 16-June 6.....	58	10	80 cases among troops in quarantine 3 miles distant.
Juarez.....	Mar. 1-29.....	2		
Manzanillo.....	May 7.....			2 cases among troops from s. s. General Pesqueira.
Mazatlan.....	Jan. 1-7.....	2		
Mexico.....	Nov. 17-Apr. 19.....	245	123	
Monterey.....	Mar. 24-May 8.....		7	
Nogales.....	May 23.....	3		
Progreso.....	May 24-30.....	2		From s. s. Sinaloa from Guana- vaca via Vera Cruz.
Salina Cruz.....	Nov. 17-May 3.....	17	7	
San Luis Potosi.....	Sept. 15-Apr. 12.....	10	6	
Sonora—				
Agua Zarca.....	Jan. 30.....	1	2	
Nogales.....	do.....	1		
Tamaulipas, State.....	Apr. 16.....			Epidemic in Chamal, 100 miles north of Tampico.
Vera Cruz.....	Jan. 26-June 7.....	27	4	1 case imported from Pasco del Macho. Apr. 13-May 3: Cases, 28; deaths, 4.
Netherlands: Rotterdam.....	Dec. 22-28.....		1	
Newfoundland: St. Johns.....	Feb. 23-June 7.....	24		
Peru:				
Callao.....	Sept. 1-14.....			Present.
Lima.....	do.....			Do.
Mollendo.....	Nov. 24-Dec. 7.....	5	1	
Salaverry.....	Dec. 4-11.....	1		
Philippine Islands: Manila.....	Dec. 21.....			1 case removed from s. s. Maulban to the San Lazaro Hospital. Third quarter, 1912: Cases, 9; deaths, 0. Fourth quarter, 1912: Cases, 16; deaths, 0.
Portugal: Lisbon.....	Dec. 1-May 24.....	69		
Roumania.....				Total, Oct. 1-31: Cases, 6.
Russia:				
Batoum.....	Dec. 1-31.....	1		
Libau.....	Dec. 16-May 18.....	6		
Moscow.....	Dec. 8-May 17.....	69	16	
Odessa.....	Nov. 17-Apr. 26.....	11	3	
St. Petersburg.....	Nov. 24-May 17.....	138	20	
Warsaw.....	Sept. 22-Feb. 22.....	53	45	
Riga.....	Dec. 1-31.....	1		
Siberia—				
Omsk.....	Jan. 1-27.....	7		
Vladivostok.....	Dec. 15-28.....	4	1	
Do.....	Jan. 1-13.....	4		
Servia.....				May 25-31, epidemic.
Belgrade.....	Dec. 22-28.....	2		
Siam: Bangkok.....	Nov. 10-Mar. 22.....		11	
Spain:				
Almeria.....	Dec. 1-31.....		40	
Do.....	Jan. 1-Apr. 30.....		23	
Barcelona.....	Dec. 1-June 7.....		255	
Cadiz.....	Nov. 1-Dec. 31.....		7	
Do.....	Feb. 1-Apr. 30.....		3	
Madrid.....	Nov. 1-Dec. 31.....		34	
Do.....	Jan. 1-May 31.....		110	
Malaga.....	Dec. 1-31.....		1	
Seville.....	do.....		27	
Do.....	Jan. 1-Apr. 30.....		28	
Valencia.....	Nov. 14-May 31.....	146	5	
Straits Settlements:				
Singapore.....	Nov. 24-Apr. 26.....	19	5	
Penang.....	Mar. 31-Apr. 5.....	1		
Sweden: Stockholm.....	Apr. 13-May 17.....	37	2	Oct. 8-21, 3 cases.

CHOLERA, YELLOW FEVER, PLAGUE, AND SMALLPOX—Continued.**Reports Received from Dec. 27, 1912, to June 27, 1913—Continued.****SMALLPOX—Continued.**

Places.	Date.	Cases.	Deaths.	Remarks.
Switzerland:				
Cantons—				
Aargau.....	Dec. 15-Apr. 5....	7		
Basel.....	Nov. 14-May 31....	63		
Grisons.....	Dec. 1-Feb. 1.....	15		
Luzerne.....	Apr. 13-19.....	1		
St. Gall.....	Apr. 16-22.....		1	
Vaud.....	Apr. 27-May 3.....	1		
Turkey in Asia:				
Adana.....	Apr. 26.....			Present.
Beirut.....	Dec. 8-May 23....	106	14	
Damascus.....	Mar. 8.....			Do.
Mersina.....	Mar. 9-May 24....	112	82	
Smyrna.....	Nov. 24-Dec. 14..		5	
Do.....	Jan. 19-Apr. 19..		16	
Tarsus.....	Apr. 12-26.....			Do.
Trebisond.....	Mar. 9-15.....			Do.
Turkey in Europe:				
Constantinople.....	Dec. 1-28.....		43	
Do.....	Dec. 29-May 31..		183	
Saloniki.....	Apr. 21-June 1....	13	15	
Union of South Africa: Durban.	Feb. 2-8.....	1		Imported.
Uruguay:				
Montevideo.....	Dec. 1-31.....	3		Last previous case in May, 1912. Feb. 18, present.
Do.....	Jan. 1-Feb. 28....	3	1	
West Indies:				
Barbados.....	Mar. 8.....	1		From Grenada.
Grenada.....				May 8, 3 cases, in vicinity of St. Georges.
Concord.....	Apr. 23.....	1		
La Filette.....	do.....	1		
Pomme Rose.....	Apr. 17.....	3		
Zanzibar.....	Nov. 8-Feb. 7....	22	3	

SANITARY LEGISLATION.

MUNICIPAL ORDINANCES, RULES, AND REGULATIONS PERTAINING TO PUBLIC HEALTH.

DAYTON, OHIO.

Buttermilk—Production, Care, and Sale of. (Reg. Bd. of H., Dec. 11, 1912.)

SECTION 1. That the regulations relating to milk, adopted December 3, A. D. 1903, and published in the book entitled "Health Laws of Ohio and Dayton" as division 23 of Part III in said book be, and the same are hereby, amended so to include the word buttermilk, and all the terms and provisions of said division 23 of Part III shall apply to the sale or supply of buttermilk in the city of Dayton in like manner as they apply to the sale or supply of milk.

This resolution shall take effect and be in force from and after 10 days from the date of its first publication.

DENVER, COLO.

Drugs—Regulating the Sale of Poisons and Habit-Forming Drugs. (Ord. No. 20, Feb. 21, 1912.)

SECTION 1. It shall be unlawful for any apothecary, druggist, or pharmacist, or any employee thereof, or any person whatsoever to sell, furnish, give away, obtain, or procure any cocaine or its salts, alpha or beta eucaine or their salts, or any compound mixture or solution or other product whatsoever of which cocaine or any of its salts, or alpha or beta eucaine or any of their salts is a constituent or ingredient, opium, morphine or its derivatives, except upon the original written order, or prescription, of any authorized practitioner of medicine, dentistry, or veterinary surgeon not to exceed 45 grains of cocaine and its salts, alpha or beta eucaine and their salts; not to exceed 12 ordinary doses of opium; not to exceed 6 ordinary doses of morphine and its salts; and not to exceed 16 ordinary doses of the derivatives of opium and morphine; which order or prescription shall not again be refilled or copy given of same without the consent of the original prescriber if so specified on the original prescription in writing. But these provisions shall not apply to tablets of heroin or its salts not to exceed 2 grains; not to talbets of codeine or any of its salts not to exceed 3 grains; not to paregoric; not to any mixture or compound containing codeine 2 grains, opium 2 grains, morphine one-half of a grain, or heroin one-third of a grain to the fluid or Troy ounce; not to the preparations containing opium and recommended and sold in good faith for diarrhea or cholera, each bottle or package of which is accompanied by specific directions for use and a caution against habitual use; nor to the powder of ipecac and opium, commonly known as Dover's powder not to exceed 60 grains; not to liniments or ointments when plainly labeled for "external use"; nor to toothache drops which are plainly labeled "for toothache, for external use"; nor to the sales made by wholesale druggists to retail druggists actively engaged in business, to physicians, dentists, or veterinary surgeons; nor to regularly incorporated hospitals, sanatoria, or dispensaries; nor to the sale of retail druggists to retail druggists actively

engaged in business; nor to the sale by retail druggists actively engaged in business to physicians, dentists, veterinary surgeons, regularly incorporated hospitals, sanatoria, or dispensaries, provided that the wholesale and retail druggists shall affix or cause to be affixed to the bottle, box, vessel, or package containing the article sold, and upon the outside wrapper of the package as originally put up, a label distinctly displaying the name and quantity of cocaine or its salts, alpha or beta eucaine or their salts, or any compound mixture or solution or other product whatsoever of which cocaine or any of its salts, or alpha or beta eucaine or any of their salts is a constituent or ingredient, opium, morphine, or any derivative thereof, and the word "poison" with the name and place of business of the seller printed in red ink; and provided also that the wholesale and retail dealer shall, before delivering any of the articles, make or cause to be made in a book kept for the purpose an entry of the sale thereof stating the date of sale, the quantity, name, and form in which sold, the name and address of the purchaser, and the name of the person by whom the entry is made. Said book shall always be open for inspection by the proper authorities of the law and shall be preserved for at least five years after the last entry made therein.

SEC. 2. It shall be unlawful for any duly registered physician, dentist, or veterinary surgeon, or any other person to prescribe, sell, or offer for sale, dispense or give away any cocaine or its salts, alpha or beta eucaine or their salts, or any compound mixture or solution or other product whatsoever of which cocaine or any of its salts, or alpha or beta eucaine or any of their salts is a constituent or ingredient, opium, morphine, or any derivative thereof to any person addicted to the habitual use of opium, morphine, or any derivative thereof, cocaine or its salts, alpha or beta eucaine or their salts, or any compound mixture or solution or other product whatsoever of which cocaine or any of its salts, or alpha or beta eucaine or any of their salts is a constituent or ingredient, except in emergency cases, but at the time administering same they shall make or cause to be made an entry in a book kept for that purpose, stating the date, quantity, name, and form in which administered, name and address of the patient, and the name of the person by whom the entry is made, such book to be subject to same inspection as those of the wholesale and retail dealer.

SEC. 3. It shall be unlawful for any retail druggist or other person to sell pure carbolic acid, except on a physician's prescription, but a mixture composed of equal parts, by measure, of carbolic acid, alcohol, and glycerin, bearing the label stating the percentage of alcohol may be sold.

SEC. 4. It shall be unlawful for any person to present any false, or forged, or untrue, or fictitious prescription or order for any poisons, or to obtain the same by means thereof, or to give any false or fictitious name, or to give or make any false statement or any false representation to obtain or in obtaining the same.

SEC. 5. Any person violating any of the provisions of this ordinance shall be punished by a fine of not less than \$10 nor more than \$200 for each offense.

SEC. 6. That sections 786 to 792, inclusive, chapter 18, of the Municipal Code of the city and county of Denver, signed and approved on the 12th day of April, A. D. 1906, be, and the same are hereby, repealed.

Foodstuffs—Protection of. (Ord. No. 11, Sept. 4, 1912.)

SECTION 1. Any person, firm, or corporation that maintains or conducts within the limits of the city and county any butcher shop, meat market, grocery store, or other place where fresh meats, fresh fish, poultry, or fowl are offered or exposed for sale or sold shall keep any such fresh meat or poultry, when offered or exposed for sale, in a cleanly and sanitary manner, and when any such food is laid out or exposed for sale on any counter, table, or other fixture, the same shall be inclosed in glass or covered with proper screen or other material that will keep flies from reaching, touching, or contaminating such food; and any such person, firm, or corporation shall obey any reasonable rules or orders received from the health commissioner, or any of his agents,

employees, or inspectors that may be made concerning the method of keeping such food cleanly and sanitary. Any such person, firm, or corporation shall not permit any customer or other person to touch or handle any such food.

SEC. 2. Any person, firm, or corporation that shall keep, maintain, or conduct any market, fruit stand, or grocery store, or other place where fruits are offered or exposed for sale or sold shall keep any such fruit in a cleanly and sanitary manner, and if the same is offered or exposed for sale in uncovered or open boxes or other receptacles the same shall be properly covered with a suitable screen or other covering for the purpose of excluding flies therefrom, which said screen or other covering shall be so arranged as not to touch the fruit covered therewith; and such person, firm, or corporation shall obey any and all reasonable rules made by the health commissioner, his employees or inspectors, with reference to the method of keeping such fruit or exposing or offering the same for sale.

SEC. 3. Any person, firm, or corporation violating any of the provisions of this ordinance shall, upon conviction, be fined in a sum not less than \$10 nor more than \$200 for each and every offense.

Milk—Regulation of Dairies. (Ord. 113, Sept. 9, 1912.)

SECTION 1. That section 8 of ordinance No. 88 of the series of 1909, as amended by ordinance No. 150 of the series of 1910, be, and the same is hereby, amended, so that it shall read as follows, to wit:

SEC. 8. *Care of dairies.*—It shall be unlawful for any person, firm, or corporation to ship to or bring within the limits of the city and county of Denver, or to, within the limits of the city and county of Denver, keep, sell, offer for sale, store, exchange, transport, convey, carry, or deliver, or have in custody, control, or possession with the intent to sell or dispose of for the purpose of human food any milk drawn from a sick or diseased cow or cows, or cow or cows kept in any crowded or unhealthy stable or place, or fed on food that produces impure, diseased, and unwholesome milk, or from cows which are affected with tuberculosis or any other form of disease, or from cows which are fed either wholly or in part upon distillery waste or upon wet brewers' grain when in a musty, fermented, or decomposed condition, or upon waste of vinegar factories, or upon any other form of food which will produce milk which is unhealthy or unwholesome, or from cows which are supplied with water which is impure or unwholesome; and no wet brewers' grain which is in a musty, fermented, or decomposed condition shall be stored or kept in, upon, or near any premises whereon a dairy is maintained, with the intent of feeding the same to cows from which milk is or shall be drawn for human consumption; and the possession of such wet brewers' grain, which shall be in such musty, fermented, or decomposed condition in, upon, or near such premises shall be deemed prima facie evidence of an intent to so feed the same to such cows. When brewers' grain is used the same must be kept in screened tanks or boxes, which said tanks or boxes, when used for storing brewers' grain, must be thoroughly washed out and cleaned at intervals not to exceed two days. The cows must be kept clean at all times by currying and brushing and the flanks and udders cleaned with a cloth before each and every milking. The milkers must have separate and clean suits and caps for use for milking only and shall wash their hands with soap and warm water before each milking. The milk buckets must be fly and dust proof. The milk cans must be covered by a fly and dust proof strainer, and removed as soon as possible to the milk room and the milk immediately cooled to a temperature of not exceeding 50° F. In a dairy the barn must have water-tight floors, with a sanitary drain. The corral must at all times be kept cleaned, and no stagnant water shall be on the premises. The milk room must be in a separate room and must be well ventilated and drained. It must be a cemented floor and all openings must be screened. No other animals or fowls shall be kept nearer than 50 feet

from the milk, cows, or milk house, except horses, and they shall be in a separate room, and no running stream of water must in any event come in contact with the milk. The privy must be located not less than 75 feet from the milk house, and must be screened and the privy must be a vault, bricked and cemented and fly proof."

EAST ORANGE, N. J.

Dogs—Keeping of. (Ord. Oct. 17, 1912.)

SECTION 1. No person or persons, firm, or corporation shall receive or keep dogs or other animals in any hospital or breeding place for the care or treatment of invalid dogs or other animals, or for breeding purposes, or keep or maintain such hospital or breeding place in any building or upon any premises in the city of East Orange, without first obtaining permission therefor from the board of health.

The applicant for such permit, at the time of making the application, shall present in writing at the office of the board a full description of the location and premises where such dogs or other animals, hospitals, or breeding places are to be kept or maintained. Thereupon the health officer shall make a full inspection of said premises and report thereon to the board of health. Each permit granted by the board of health shall run for the term of one year from the date when issued and shall be revocable by the board for good cause shown at any time upon 10 days' notice to such applicant.

The board of health may, in the case of any application, if in their judgment the keeping of dogs or other animals or the keeping or maintenance of such hospital or breeding place will be detrimental to the public health, refuse to grant such permit.

SEC. 2. No person or persons shall keep any dog or other animal in any part of a dwelling house or upon any premises in the city of East Orange where the board of health may deem such keeping of animals detrimental to the public health, and after due notice by the said board of health to the owner in charge of said animals he or they shall remove the same or cause them to be removed from any place where such keeping shall be prohibited by the board within such time as the board may name in the notice.

SEC. 3. In all cases where a permit is granted for the keeping of animals the building and property shall at all times be kept in a clean and sanitary condition, and upon failure of the person or persons to comply with this ordinance the board of health have full power to revoke any permit so granted.

SEC. 4. Any persons violating any of the provisions of this ordinance shall, upon conviction thereof, forfeit and pay a penalty of not less than \$10 and not more than \$50 for each and every offense, and the amount of such penalty shall be fixed by the court in which, or magistrate before whom, such conviction is had.

All ordinances or parts of ordinances inconsistent with the provisions of this ordinance are hereby repealed, and this ordinance shall take effect on the 1st day of December, 1912.

EAST ST. LOUIS, ILL.

Milk—Production, Care, and Sale. (Ord. No. 1792, Feb. 14, 1912.)

SECTION 1. That section No. 670, article 12, of the Revised Municipal Code of East St. Louis be, and the same is hereby, amended by adding section No. 670½, as follows, to wit:

SEC. NO. 670½. *Inspection—Temperature—Penalty.*—It is hereby made the duty of the health commissioner, either in person or by one of his deputies, to, whenever practicable, or whenever complaint shall be made to said health commissioner, examine, ascertain the temperature of, and test any and all milk, cream, or skimmed milk arriving in the city by train, wagon, or any other means of transportation; also to examine, ascertain the temperature of, and test any and all milk, cream, or skimmed milk in the

city being sold, offered for sale, or exposed for sale for human food, and to condemn and destroy any and all such milk, cream, or skimmed milk that is not up to the requirements of the provisions of this article; and he shall condemn and destroy any and all milk, cream, or skimmed milk found to be above the temperature of 50° F. or not contained in air-tight vessels, cans, or packages.

Any person, firm, or corporation found violating any of the provisions of this section shall be fined not less than \$5 nor more than \$200 for each offense.

Household Goods—Removals of, to be Reported. (Ord. No. 1832, Aug. 8, 1912.)

SECTION 1. That it shall be the duty of every person, individual, partnership, firm, or corporation whatsoever in the city of East St. Louis engaged in the moving business, operating vans or wagons for the purpose of removing household goods, from one house to another, to report in writing once a day to the health commissioner every such removal, stating in the report, upon blanks furnished by said health commissioner, the name or names of the parties moved, the street address from which such removal takes place, and the street address to which such removal is made.

SEC. 2. Whoever violates the provisions of section 1 of this ordinance shall upon conviction thereof be fined in any sum not less than \$1 nor more than \$25 for each offense: *Provided*, The failure to report any single removal shall constitute a separate offense.

Communicable Diseases—Poliomyelitis Added to List of Contagious Diseases. (Ord. No. 1850, Nov. 6, 1912.)

SECTION 1. That section 545, article 9, of the Revised Municipal Code of the City of East St. Louis, of 1908, be, and the same is hereby amended, so as to include acute poliomyelitis, or infantile paralysis, in the therein contained list of contagious diseases.

FORT SCOTT, KANS.

Milk and Milk Products—Sanitary Officer to Inspect—Care and Sale. (Ord. No. 1280, Apr. 23, 1912.)

SECTION 1. There is hereby created the office of sanitary officer of the city of Fort Scott. Such officer shall be appointed by the mayor, by and with the consent of the council. Said sanitary officer shall have a practical knowledge of and experience in the manufacture and commercial handling of dairy products. His salary shall be determined by the appointing powers, and he shall hold office during a period of efficient work.

The officer shall be furnished a suitable room in the city of Fort Scott, to be fitted out as a laboratory with sufficient apparatus and chemicals to enable him to test dairy products that may come under his inspection. Such room shall be owned or rented by the city for such purpose, and all apparatus and chemicals and records shall be accounted for by said sanitary officer.

SEC. 2. It shall be the duty of the sanitary officer to inspect or cause to be inspected all dairies and dairy products within the city of Fort Scott as often as he deems necessary and to take samples and analyze them.

The sanitary officer shall prepare and keep accurate statistics of the extent of the dairy industry in Fort Scott, Kans., and shall make an annual report to the city clerk for each fiscal year ending June 30.

SEC. 3. It shall be unlawful for any person to sell or offer for sale any milk or cream within the city of Fort Scott without first having registered his name and place of business with the city clerk in a book kept for that purpose and paying a registration fee of 25 cents.

The city clerk shall assign to each dairyman paying said registration fee a number, and this number shall be placed on the delivery wagon in plain figures, not less than one and one-half inches in length. Said registration fee shall be paid annually.

SEC. 4. It shall be unlawful for any person to sell, offer for sale, or have in his possession with intent to sell, any milk to which any water has been added or milk showing less than 12 per cent of milk solids, which solids shall contain not less than 3.25 per cent of fat, unless branded in clear letters and figures showing the per cent of fat the milk contains. No keeper, proprietor, or employee of a hotel, restaurant, lunch counter, or boarding house shall serve or place before its guests or boarders any milk which fails to conform to the standards herein defined unless a placard bearing the words "Skim milk served here," in plain black letters not less than 4 inches high, is posted in a conspicuous place. It shall be unlawful to sell, offer for sale, or have in possession with intent to sell, any milk produced by any cow or cows before the sixth day after or 15 days before freshening. It shall be unlawful to sell or offer for sale any cream containing less than 18 per cent of fat unless the said cream be labeled showing the per cent of fat contained therein. It shall be unlawful to sell or offer for sale ice cream containing less than 14 per cent butter fat except that the butter fat standard for fruit and nut ice cream shall be 12 per cent.

SEC. 5. It shall be unlawful to sell milk containing a preservative or visible dirt or a dark-colored sediment, or milk produced from cows kept in an insanitary or poorly ventilated stable, or produced by cows not kept clean, or any milk obtained from cows that are fed on refuse matter or decomposed feed or any article of food which is fermented or fermenting other than clean well-cured silage; or milk stored in an insanitary place, or milk kept or delivered in vessels not properly cleaned, or in vessels which are rusted, or in wooden vessels. All milk, cream, milk receptacles, measures, and utensils shall be protected from dirt, dust, and other contaminating influence during delivery by keeping all milk and cream measures and utensils inside of a closed wagon or in a tight box or chest having a close-fitting lid.

SEC. 6. It shall be unlawful for any person to sell or offer for sale milk, cream, or other dairy products which have been drawn or handled by any person suffering from or exposed to any contagious or infectious disease.

SEC. 7. Any person in the city of Fort Scott receiving milk, cream, or other dairy products for sale shall keep said products in a clean, well-ventilated and sanitary place, and it shall be the duty of the said person to thoroughly cleanse and scald all milk, cream, or ice-cream utensils as soon as empty. It shall be unlawful for any person or persons handling dairy products to use any of the milk, cream, or ice-cream utensils for storing any substance other than milk, cream, or ice cream, or to bottle any milk or cream until it has been cooled to a temperature of 60° F. or lower.

SEC. 8. It shall also be unlawful for any person to sell or offer for sale any milk or cream produced by unhealthy cows or by cows milked or handled in the same stable or corral or near where such diseased cows or other diseased animals are kept.

SEC. 9. The sanitary officer shall have power to enter without previous notice any dairy, milk depot, ice-cream or milk salesroom, or any place where dairy products are kept, sold, or prepared for sale, and take such amount as will prove a sufficient sample to perform the necessary tests. He is hereby vested with authority to stop any person or wagon suspected of carrying milk or cream for sale or to be offered for sale in the city of Fort Scott, and whosoever shall obstruct or hinder the sanitary officer in his work shall be guilty of a misdemeanor. The sanitary officer is authorized and it shall be his duty to cancel without previous notice the registration certificate of any person who shall violate any of the provisions of this ordinance or who shall fail to comply within 30 days with the written instructions or orders of the sanitary officer.

SEC. 10. Any person violating any of the provisions of this ordinance shall be deemed guilty of a misdemeanor, and upon conviction thereof shall be punished by a fine not less than \$10 nor more than \$100, or by imprisonment in the city prison not exceeding 100 days, or by both such fine and imprisonment, for each offense.

HARRISBURG, PA.**Milk—Production, Care, and Sale. (Reg. Bd. of H., Nov. 20, 1912.)**

No person engaged in the business of producing milk for sale or selling milk in the city of Harrisburg shall store, cool, mix, bottle, or transfer said milk from one container to another in any room which is occupied by cows, horses, or other animals, or is in an otherwise unsanitary condition.

No person shall transfer milk to bottles or other vessels on the streets except to vessels supplied by the purchaser at the time of delivery.

All bottles, cans, vessels, or other utensils used in the production, storage, sale, or distribution of milk shall be regularly cleaned and sterilized with boiling water or live steam before the same are again used.

Any person violating any rule or regulation heretofore or hereafter adopted by the board of health applying to the sale of milk or meat or regulating or affecting the same shall have his or her or its license revoked by the milk and meat inspector, and shall not be relicensed until said inspector shall be satisfied that such delinquent shall and will comply with said rules and regulations.

Nuisances—Definition—Abatement. (Reg. Bd. of H., Oct. 23, 1912.)

ARTICLE VII:

SECTION 1. The following are declared to be nuisances prejudicial to the public health and are hereby prohibited:

Rule I. Contaminating any water supply or maintaining a well for domestic purposes within the corporate limits of the city.

Rule II. Obstructing the natural flow of any stream of water within the corporate limits of the city.

Rule III. Allowing any uninal, privy, or cesspool to become offensive or injurious to public health.

Rule IV. The storing of manure except in tightly covered regulation boxes or pits, or the keeping of more than one two-horse load on any premises within the city.

SEC. 2. Rule I. Whenever any citizen of Harrisburg wishes to complain of the existence of a nuisance in the city, he or she shall be required to hand such a complaint in writing over his or her signature to the board of health, such complaint to describe the nature of the nuisance, location, name of occupants or of owner or owners of properties upon which the nuisance exists.

Rule II. Anonymous communications will receive no attention from the board.

Rule III. When any nuisance thus prohibited shall be brought to the attention of the health officer, he shall make prompt and careful investigation, and if satisfied that the nuisance exists he shall serve upon the person or persons who are responsible for creating or maintaining same a notice signed by himself directing the said party to take proper steps to abate it within 48 hours.

Rule IV. If the proper steps to secure the abatement of the nuisance shall not be taken, as required by Rule III, the health officer shall make information against the delinquent before the mayor or any alderman of the city for the violation thereof.

Rule V. Service of notice in each case shall be made to the delinquent or his agent personally, but if he can not be found, it shall be sufficient to leave a copy with an adult member of the family at the residence of the delinquent.

Rule VI. Any person maintaining any of the aforesaid nuisances shall, upon conviction before the mayor or any alderman in the city, be subject to a fine of not less than \$5 nor more than \$100, or be imprisoned in the Dauphin County jail for a period not to exceed 30 days.

HUTCHINSON, KANS.

Board of Health—Organization, Powers, and Duties of. (Ord. No. 992, July 7, 1912.)

SECTION 1. That there be, and is hereby, created a board of health for the city of Hutchinson, to be composed of the city commissioner of health, the city engineer, the city physician, and one regularly practicing physician, to be elected annually by the board of commissioners in the same manner as other city officers are appointed. Said board thus created shall organize as such and the physician elected to such board by the city commissioners shall be its presiding officer and the city physician shall be the secretary of such board.

SEC. 2. Said board of health shall supervise the health interests of the city of Hutchinson and shall meet at such times as may be necessary and upon call of the president.

SEC. 3. The secretary shall keep a record of all the transactions of the board; shall have custody of all books, papers, documents, and other property belonging to the office; shall communicate with the county and State boards of health; shall file and keep all reports received from such boards and other correspondence appertaining to the business of the board of health. He shall perform all other duties prescribed in this act for said secretary or as directed by the board of health of the city of Hutchinson.

* * * * *

SEC. 26. The board of health shall have the right to enter in or upon any premises at any reasonable hour of the day to determine whether nuisances exist therein or thereon, or to determine whether the provisions of this ordinance are being followed or obeyed, and it shall be unlawful for any person to oppose such entry or examination.

Nuisances—Definition—Abatement. (Ord. No. 992, July 7, 1912.)

SEC. 4. Whatever is dangerous to human health, whatever renders the ground, the water, the air, or food a hazard or an injury to human health, and the following specific acts, conditions, and things are, each and all of them, hereby declared to constitute nuisances:

(a) The deposits or accumulation of foul, decaying, or putrescent substance or other offensive matter in or upon any lot, street, or highway, or in or upon any public place; the storage of such foul or decaying or putrescent matter in liquid or solid form in any vault, cesspool, or other receptacle not permitted by this ordinance; the overflow of any foul liquids or the escape of gases to such an extent that the same or any one of them shall become hazardous to health or that the same shall by reason of offensive odors become a source of discomfort to persons living or passing in the vicinity thereof.

(b) A polluted well or cistern, or the pollution of any body of water used for drinking purposes.

(c) The maintenance of any privy, vault, or cesspool, except as hereinafter provided.

(d) Keeping any building or room in such a state of uncleanness as to endanger the health of persons residing therein.

(e) The accumulation of manure beyond the amount or length of time hereinafter prescribed.

(f) The accumulation of water in stagnant ponds or otherwise, in which mosquito larvæ breed.

(g) Filthy stock pens or places where stock are kept which may become annoying or offensive.

(h) The rank growth of weeds or decaying vegetation on any lots or grounds.

SEC. 5. Any person aiding or maintaining in the creation or maintenance of any nuisance shall be given three days' notice thereof in writing by the secretary of the board, and if such person shall refuse or fail to remove such nuisance within the time prescribed in said notice he shall be deemed guilty of a misdemeanor and, upon

conviction thereof, shall be fined in any sum not exceeding \$10 and the costs of the prosecution, and each day during which the nuisance is allowed to exist shall constitute a separate and distinct offense.

SEC. 6. It shall be the duty of the board of health to have removed and abated from any lot or parcel of ground or alley within the corporate limits of the city of Hutchinson any nuisance herein described at the expense of the owner of the property on which the nuisance is located. Said board shall, after having served the notice provided for in section 5 of this ordinance, file its statement or notice in writing to that effect with the clerk of said city, describing same, where located, requiring owner or agent of such premises to remove and abate said nuisance, and specifying time in which same shall be removed and abated. A copy of this statement or notice shall be served by the city marshal to owner or agent of such property described in said statement or notice, or if a nonresident, then by mailing the notice to his last known address, and if the owner or agent of the owner shall fail or neglect to comply with the requirements of the statement or notice within the time specified, then the board shall have the nuisance described in said statement or notice removed or abated from said premises, and the cost of such removal or abatement shall be certified to the city clerk, and the same shall be assessed and charged against the lot or parcel of ground on which the nuisance was located, and the city clerk shall at the time of certifying other city taxes to the county clerk certify the aforesaid costs, and the county clerk shall extend the same on the tax roll of the county against said lot or parcel of ground and it shall be collected in the same manner as other city taxes are collected.

SEC. 7. No privy vault, cesspool, or manure pit shall hereafter be constructed in the city of Hutchinson without a permit from the board of health. This shall not prohibit the construction of temporary privy vaults during the erection of new buildings; but in all cases the contractor shall cause the contents of such vaults to be covered with lime, fresh earth, or ashes once each day. All privy vaults, cesspools, or manure pits for the construction of which permits may have been granted shall be built water-tight and shall be fly proof, and all existing privy vaults and manure pits shall be made fly proof within 30 days after the publication of this ordinance.

SEC. 8. No privy vault, cesspool, or manure pit shall hereafter be constructed within 50 feet of any well or cistern, within 5 feet of any party line or fence, within 15 feet of the line of any street, and within 25 feet of the door or window of any house; nor shall any cover be put on the same until the said privy vault, cesspool, or manure pit has been inspected and approved by the board of health.

SEC. 9. All stables and stable yards shall be kept clean and dry, and between the 1st day of May and the 1st day of November not more than one wagon load of manure at any private stable nor more than two wagon loads at any livery stable shall be allowed to accumulate at any one time.

SEC. 10. Any person violating sections 6, 7, 8, and 9 shall be deemed guilty of a misdemeanor and upon conviction thereof shall be fined in any sum not exceeding \$10 and the costs of the prosecution, and each day during which the violation of these sections is allowed to exist shall constitute a separate and distinct offense.

SEC. 11. No pigpen shall be maintained within 100 feet of any well or spring of water used for drinking purposes and within 30 feet of any street or 50 feet of any inhabited house. No swine shall be kept within the corporate limits of the city of Hutchinson between May 1 and November 1 of any year.

SEC. 12. Any person violating the provisions of section 11 of this ordinance shall be deemed guilty of a misdemeanor and upon conviction thereof shall be fined in any sum not exceeding \$10 and the costs of the prosecution, and every day during which the violation of this section is allowed to exist shall constitute a separate and distinct offense.

SEC. 13. All refrigerators and ice boxes maintained in any butcher shop or other mercantile shop in said city shall be open to inspection by this board at any time when business is being carried on in said shop. No person shall allow any animal or vegetable matter which is foul or which is in a state of decay to remain in said refrigerator or ice box, nor shall said refrigerator or ice box be allowed to become foul or malodorous.

Communicable Diseases—Reporting, Isolation, Placarding, and Disinfection.
(Ord. No. 992, July 7, 1912.)

SEC. 14. Every physician shall report in writing to the city clerk the name of every patient he or she may have in the city of Hutchinson affected with cholera, smallpox, diphtheria, typhus, typhoid, or scarlet fever, measles, tuberculosis in any form, varicella, mumps, whooping cough, epidemic dysentery or epidemic cerebrospinal meningitis, or any other communicable disease that may hereinafter be declared dangerous to public health, together with the precise locality where such patients may be found, immediately after such physician shall ascertain the nature of such disease.

SEC. 15. Wherever it shall be deemed necessary by this board to establish the true character of any disease which is suspected to be communicable, a medical examination of person or persons affected by disease may be ordered by this board and it shall be unlawful for any person or persons to refuse to permit or interfere with such examination.

SEC. 16. No principal, teacher, nor superintendent of any school shall knowingly permit any child sick with any disease mentioned in section 14 of this ordinance, or with any other communicable disease, or any child residing in any house in which any communicable disease shall exist, to attend school until such time as some reputable physician shall certify to such teacher, principal, or superintendent that said child may attend school without danger of communicating the disease to others.

SEC. 17. No person from any dwelling wherein a disease dangerous to public health exists shall take any book or magazine to or from any circulating or school library. The board will inform the librarian of all cases of such diseases, and until a written permit is given the librarian shall allow neither books nor magazines to be taken to or returned from a dwelling where such disease exists.

SEC. 18. No person shall sell or distribute milk from a building wherein a disease dangerous to the public health exists, or has existed, until he has obtained a written permission from the board of health.

SEC. 19. Any person in the city of Hutchinson having a communicable disease may be isolated as the board of health may direct, subject to the approval of the board of commissioners of the city of Hutchinson, and all buildings, clothing, property, premises, and vehicles which may be affected from and by examination from such persons shall be disinfected as the board of health may direct. No premises shall be disinfected after diphtheria until at least two negative cultures, taken on successive days, have been obtained from the throat of the patient, or from the nose if a case of nasal diphtheria.

SEC. 20. No person shall knowingly bring or cause to be brought into the city of Hutchinson any person infected with any communicable disease, except upon a permit granted by the board of health; and no person shall bring or cause to be brought into the said city any article liable to propagate a communicable disease.

SEC. 21. Whenever there shall occur in the city of Hutchinson any case of disease mentioned in section 14, the board of health shall, if such has not already been done by the county health officer, cause to be placed upon the house or houses in which said disease or cases are confined a placard naming the disease, said placard to remain until said premises are disinfected by said board; and any person or persons removing said placard without the authority of said board, shall, upon conviction thereof, be fined in any sum not exceeding \$25, together with the costs of the prosecution.

SEC. 22. Whenever a placard shall be placed as provided in section 20 of this ordinance, no person or persons having entered said premises shall depart therefrom without being first fumigated.

SEC. 23. In case a coach, cab, hack, carriage, or other vehicle shall convey a patient suffering from a communicable disease, said vehicle shall be disinfected under the direction of the board of health before being used again.

SEC. 24. Every veterinarian or other person who is called to examine or professionally attend any animal within the city of Hutchinson having the glanders or farcy, rabies, tuberculosis, or any other communicable disease shall within 24 hours thereafter report in writing to the board of health the following facts:

- (1) A statement of the location of the diseased animal.
- (2) The name and address of the owner thereof.
- (3) The type and character of the disease.

* * * * *

SEC. 27. Any person violating any of the provisions of sections 13, 14, 15, 16, 17, 18, 19, 21, 22, 23, 24, 25, and 26 of this ordinance shall be deemed guilty of a misdemeanor, and upon conviction thereof shall be fined in any sum not exceeding \$10, together with the costs of the prosecution.

Rabies—Suspected and Exposed Animals to be Killed or Confined. (Ord. No. 992, July 7, 1912.)

SEC. 25. Every animal which is mad or has hydrophobia, or which shows symptoms thereof, shall be at once killed or else securely confined until the diagnosis is accurately made and then killed if found to be so affected. Every animal which has been exposed to such disease shall be at once confined in some secure place for such length of time as to show that such exposure has not given such animal said disease, and the body of any animal that has died of any such disease, after being killed shall be disposed of as the board of health may direct.

Repealer. (Ord. No. 992, July 7, 1912.)

SEC. 28. That ordinances Nos. 474, approved October 22, 1900, and 256, approved June 5, 1903, and 922, approved May 29, 1912, be, and the same are hereby, repealed.

INDIANAPOLIS, IND.

Milk—Sealed Containers to be Used. (Ord. No. 42, Sept. 2, 1912.)

SECTION 1. Be it ordained by the common council of the city of Indianapolis, Ind., that every person, firm, or corporation engaged in buying or selling milk which is shipped, hauled, or transported in any way whatsoever, in cans, buckets, or any other kind of receptacle, and which is to be distributed in any way whatsoever to the public of the city of Indianapolis, shall seal the covers or lids of such cans, buckets, or other receptacles in such a manner that the receptacle can not be opened or the lid removed without a key or without breaking or destroying seal. And the milk contained in every such can, bucket, or other receptacle which is not sealed or fastened as aforesaid, shall be condemned when found by the inspectors of the board of health.

SEC. 2. It shall be unlawful for any person, firm, or corporation engaged in the wholesale or retail distribution or sale of milk to the public of the city of Indianapolis to receive milk for any purpose whatsoever, in cans, buckets, or other receptacles, the covers or lids of which are not so sealed that they can not be removed or opened without a key or without breaking or destroying seal.

SEC. 3. Any person, firm, or corporation violating any of the provisions of this ordinance shall be subject to a fine not to exceed \$50, to which may be added, for a second offense, imprisonment of not to exceed 30 days.

Ashes, Refuse, and Rubbish—Removal of. (Ord. No. 45, Sept. 2, 1912.)

SECTION 1. Be it ordained by the common council of the city of Indianapolis, Ind. that it shall be unlawful for any owner, lessee, tenant, or occupant of any rooming tenement, lodging house, or residence or hotel in the city of Indianapolis to permit the accumulation of house dirt, rubbish, filth, refuse, waste matter, ashes, or other unsanitary or unsightly matter in the rooms, halls, cellars, yards, sheds, stables, out-buildings, or anywhere else upon the same premises.

SEC. 2. That it shall be unlawful for any occupant of any dwelling house, building, or structure of any kind or description whatever, regardless of how such occupant came into possession of said premises, to vacate said premises without first causing to be removed therefrom and properly disposed of all unwholesome or impure substances of any kind and description whatsoever, and also refuse, waste matter, dirt, rubbish, ashes, or trash of any kind and description.

SEC. 3. Any person who shall violate any of the provisions of this ordinance shall be subject, upon conviction thereof, to a fine of any sum not exceeding \$100, and each and every day said ordinance is violated shall constitute a separate offense.

ISHPEMING, MICH.**Nuisances—Prohibiting the Maintenance of—Penalty. (Ord. May 16, 1912.)**

SECTION 1. It shall be unlawful for any person, persons, or company within the city limits of the city of Ishpeming to deposit, throw, or place any garbage, offal, dead animal, manure, paper, straw, dirt, ashes, swill, stagnant or filthy water, putrid or unwholesome meat, decayed vegetables, tin cans, wire, glassware, crockery, bottles, or any rubbish or refuse matter, whether offensive or not to the public health, or any wagon, buggy, sleigh, cutter, material of any kind, or other obstruction, in any lane, street, alley, sidewalk, crosswalk, or public place in the city of Ishpeming; nor shall any person place, deposit, or throw any garbage, offal, dead animal, manure, straw, dirt, ashes, swill, stagnant or filthy water, putrid or unwholesome meat, decayed vegetables, tin cans, glassware, crockery, bottles, wire, or any other rubbish or refuse matter upon any private property, whether owned by said person or not, unless the same shall be inclosed in proper metal cans, with tight-fitting covers, such as may be prescribed by the board of public works: *Provided, however,* That the capacity of such cans shall not exceed 5 cubic feet, which cans shall be kept in the rear of the house or in the basement, area, or passageway, but never upon any street, alley, or sidewalk, and all such cans shall be promptly delivered to the collector when called for, and shall be returned by him to said place or places without unnecessary delay; and no person, except for such purpose, shall in any manner interfere with said cans or with the contents thereof: *Provided, however,* That this section shall not apply to any persons who destroy by cremation, or otherwise, satisfactory to the board of public works, of the city of Ishpeming, such garbage, offal, dead animal, manure, paper, dirt, straw, swill, stagnant or filthy water, putrid or unwholesome meat, decayed vegetables, tin cans, crockery, glassware, bottles, wire, or any rubbish or refuse matter.

SEC. 2. No person shall keep, place, or have on or in any private house, lot, or premises in this city, any dead carcass, putrid, offensive, or unsound beef, pork, fish, hides, skins, bones, horns, stinking or rotten soap, grease, tallow, offal, garbage, or other animal or vegetable matter or substance which may cause any unwholesome, noisome, or offensive smell for any unnecessary length of time.

SEC. 3. The words "garbage" and "offal," as used in this ordinance, are held to include every refuse accumulation of animal, fruit, or vegetable matter, liquid or otherwise, that attends the preparation, use, cooking, dealing in or working of meat, fish, fowl, or vegetable.

SEC. 4. No owner or occupant of any grocery, cellar, tallow chandler's shop, tannery, butcher shop, slaughterhouse, stable, barn, privy, sewer, or other building or place shall allow any nuisance to exist or remain on his or her premises for an unnecessary length of time.

SEC. 5. The keeper of any livery barn or livery stable or any other keeper of cows, horses, or other animals, shall keep the stable and stable yards clean and shall not permit any manure to accumulate in or near the same in such quantities as to be offensive to the public or to obstruct the use of the public streets, alleys, lanes, or any of them in said city, and at no time shall the same be allowed to accumulate on any lot, alley, street, or premises or near any building in said city.

SEC. 6. No person shall own, occupy, or keep any grounds or other premises in such condition as to be offensive and a nuisance to the neighborhood or public, or permit any cellar, vault, drain, privy, pool, sewer, or sink upon premises belonging to or occupied by him or her to become nauseous, foul, offensive, or injurious to the public health.

SEC. 7. The board of public works shall have power, and it is hereby made its duty, to make diligent inquiry with respect to all nuisances of every description in said city which are or may be injurious to public health or obstruct public travel, and abate the same summarily, and on refusal or neglect of the owner or occupant to abate or remove the same to make and enter a proper complaint for each and every violation of any of the provisions of this ordinance.

SEC. 8. Any person or persons failing to comply with or violating any of the provisions of this ordinance shall be punished by a fine of not less than \$5 nor exceed \$25, or by imprisonment in the Marquette County jail or the city jail of said city of Ishpeming for a term of not exceeding 30 days, or by both such fine and imprisonment, in the discretion of the court.

SEC. 9. All ordinances or parts of ordinances relating to the same subject matter and contravening the proceedings of this ordinance are hereby repealed.

This ordinance shall take effect on the 1st day of June, 1912.

JACKSON, TENN.

Privies—Construction and Maintenance of. (Reg. Bd. of H., Apr. 24, 1912.)

Rule 1. All privies shall be constructed so as to prevent the access of flies to the night-soil compartment. The night-soil compartment shall be provided with a substantial, tightly fitting, let-down wood cover hinged to the back of the house and so constructed as to avoid warping and 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.

Rule 2. The roof of each privy shall be water tight, and if it slopes to the rear of the house it shall project not less than 6 inches beyond the rear wall of the house. The doors of all privies shall be tight fitting and self-closing, and any windows or openings for ventilation shall be covered by wire fly screens. All privies shall have at least one opening for ventilation of not less than 2 square feet.

Rule 3. All privies hereafter constructed shall be so located on the premises as to be readily accessible to the city scavengers.

Rule 4. The house shall be without cracks or openings through which flies may enter.

Rule 5. The seat shall be provided with a substantial tight wood cover hinged to the back of the house and of sufficient size to cover the opening or openings in the seat.

Rule 6. All alterations or repairs which shall be hereafter made on any privy in the city of Jackson shall be made in accordance with the rules and regulations of the board of health, and whenever it shall become necessary to entirely reconstruct or change the location of any existing privy the new privy shall be constructed throughout in conformity with said requirements. Whenever in the opinion of the board of health the condition of any privy is such that it can not be put in sanitary condition

the board of health shall order a new privy constructed in conformity with said rules and regulations.

Rule 7. All privies shall be kept clean at all times. The door of the house shall not be allowed to remain open at any time unless there is a self-closing fly door in addition to that required under the above rules. The cover to the seat or seats shall be kept closed at all times when the privy is not in use. No wash water, garbage, kitchen slops, or other liquid wastes shall be emptied into the privy. No night soil from any person suffering from typhoid fever or other serious bowel trouble shall be deposited in any privy without being previously disinfected in such manner as directed or approved by the city board of health.

Rule 8. The sanitary officers and the city scavengers are required to report to the board of health any and all violations of the above rules and regulations. Under said rules and regulations the owner of the premises is responsible for the construction of privies and the occupant is responsible for their proper maintenance.

The penalty prescribed by law for the violations of the above rules and regulations is not less than \$5 and not more than \$50.

JACKSONVILLE, FLA.

Communicable Diseases—Reporting and Quarantining of. (Ord. No. L-60, Feb. 12, 1912.)

• SECTION 1. That section 802 of the city code be amended so as to read as follows:

SEC. 802. Physicians to report contagious diseases. Every physician who shall visit or attend any patient suffering from cholera, yellow fever, smallpox, typhus fever, scarlet fever, diphtheria, measles, pellagra, anterior poliomyelitis or infantile paralysis, cerebrospinal meningitis, iliocolitis, summer complaint, diarrhea or dysentery, shall within 12 hours report such case to the health officer.

No person or thing liable to propagate a contagious or infectious disease shall be introduced into the city, except by the consent of the health officer. And when it shall come to the knowledge of any person that such dangerous person or thing has been introduced into the city, such person having the knowledge thereof shall immediately communicate such information to the health officer.

No person suffering from a contagious or infectious disease shall be removed from one place to another, except by permission of and under the direction of the health officer.

Persons having an infectious or contagious disease, and all articles exposed to infection therefrom, shall be immediately isolated, and no person except the attending physician, nurses, and spiritual adviser shall be allowed access to the room containing the affected person.

Convalescents from an infectious or contagious disease, and their attendants, shall not be permitted to leave their premises until their clothing shall have been properly disinfected. Vessels, bedding and other articles used by persons having a contagious or infectious disease shall be thoroughly disinfected or destroyed under the direction of the attending physician or health officer.

Any person violating any of the provisions of this section, shall, upon conviction before the municipal court, be fined in a sum of not less than \$10 nor more than \$50 or be imprisoned for not less than 10 nor more than 50 days.

Deaths—Certificates of—Burial Permits. (Ord. No. L-61, Feb. 23, 1912.)

SECTION 1. *Death certificates.*—In the event of the death of any human being within the corporate limits of the city of Jacksonville it shall be the duty of the attending physician, or, if no physician be in attendance, of the nearest relations, nurse, or attendant, to report the same to the city health officer or his deputy at the office of the city board of health within six hours after such death, or if said office is closed, immediately after the same shall be opened and within said time, file in said office a certificate of death, giving accurately the name, age, sex, nationality, or color, cause of death, and other information and details required by the city board of health.

upon blanks furnished for that purpose. This certificate shall be signed by the physician in attendance, or, if there be no physician, by the health officer, or in the case of a new-born child, by the midwife or other attendant upon the mother.

SEC. 2. *Burials and removals.*—It shall be unlawful for any undertaker or other person to bury or to remove from the city the body of a deceased human being who may die within the corporate limits of the city of Jacksonville without first securing from the city board of health a burial or transportation permit signed by the city health officer or his deputy. This burial or transportation permit shall be issued by the health officer or his deputy only when a properly executed death certificate of the decedent named in the burial permit shall be on file in the office of the city board of health. This permit shall show the name, address, sex, age, color, cause of death, place of burial or removal, name of attending physician, and such other information and details as the city board of health may require. It shall be made out in duplicate, the carbon copy being on file in the office of the city board of health and the original given to the undertaker or other person having charge of the remains of the decedent.

SEC. 3. No owner, caretaker, or other employee of any cemetery shall permit the burial of the body of any human being who may die within the corporate limits of the city of Jacksonville without first receiving and filing such burial permit, nor shall any body be removed from the corporate limits of the city of Jacksonville by any transportation company until the original transportation permit shall be filed by the undertaker or other person in charge of said body in the office of the State board of health. The burial permit or transportation permit shall be signed by the city health officer or his deputy.

SEC. 4. Any person violating any of the provisions of this ordinance shall, upon conviction before the municipal court, be punished by a fine of not more than \$100 or be imprisoned for 50 days.

SEC. 5. All ordinances and parts of ordinances in conflict with this ordinance be, and the same are hereby, repealed.

Narcotic Drugs—Sale of. (Ord. No. L-108, Aug. 9, 1912.)

SECTION 1. From and after the passage of this ordinance it shall be unlawful for any druggist or other dealer in drugs or medicines or any other person to sell, give away, exchange, or otherwise dispose of the drugs known as cocaine or any of its salts, alpha or beta-eucaine or any of their salts, or any morphine or its salts, or opium or the salts of alkaloids of opium, or heroin, codeine, or their salts, or laudanum or the deodorized tincture of opium; also mixtures containing more than one grain of heroin or the salts of heroin, except upon the written prescription of a licensed physician, which prescription shall contain the name and address of the individual for whom it is intended, together with the signature of the physician writing it. This prescription shall be filled but once; shall be retained by the druggist filling it and no copy shall be given to the individual for whom it was written or to any other person by the druggist or any of his employees. Every druggist or employee of any druggist who shall fill a prescription containing any of the before-mentioned drugs or mixtures shall record, in a book kept for that purpose, the name and address of the individual for whom the prescription was filled, together with the date of such filling and the serial number of the prescription, and this record and the original prescription shall at all times be open for inspection by the city board of health and the police department. All such prescriptions for any of the before-mentioned drugs or mixtures shall contain the quantity of said drug or mixture to be sold or disposed of, and dispose of or sell upon prescription more than the quantity therein described, *Provided*, That this section shall not be construed so as to restrict or prohibit sales of any of the above enumerated articles in bulk to each other by importers, jobbers, manufacturers, or retailers in original packages or to physicians, dentists, veterinary surgeons, hospitals, or infirmaries, for their own use.

SEC. 2. Nothing in this ordinance shall apply to the sale of bona fide cough medicines, colic and diarrhea mixtures, liniments, or ointments which shall contain not over one quarter of a grain of morphine or its salts or their equivalent to each ounce of said mixture.

The city health officer or any physician in the employ of the city as he may designate, may upon the furnishing of satisfactory evidence from a practicing physician or pharmacist, give to an habitual user of any of the above-mentioned drugs or preparations a prescription for such drug or preparation in such quantity as he may deem expedient, such prescription to be filled by any registered pharmacist subject to the requirements of section 1 of this ordinance concerning the filling of such prescriptions.

It shall be the duty of the city health officer to keep or cause to be kept in a special record provided for this purpose a record containing the name and address of the individual for whom the prescription is intended, the date upon which such prescription was written, and a true copy of the prescription or a reference to a copy already entered on such record in case the prescription is rewritten for the same individual.

SEC. 3. It shall be unlawful for any person to have in his or her possession any of the hereintofore named drugs, their alkaloids, salts, or any derivative or mixture of such drugs, except they shall be able to show to the proper authorities that such drug, alkaloid, salt, derivative, or mixture has been prescribed for him or her according to the provisions of this ordinance. It shall be unlawful for any person to have in his or her possession a greater quantity of such drug, alkaloid, salt, derivative, or mixture than the amount provided for in the legitimate dispensing of such drug mixture. The fact of possession of any such drug, alkaloid, salt, derivative, or mixture, except as provided above, shall be prima facie evidence of the violation of this ordinance on the part of the possessor.

SEC. 4. It shall be the duty of every physician who shall write a prescription for any of the above-mentioned drugs or mixtures to send to the office of the city board of health within three days a true copy of such prescription, on which copy shall appear the name and address of the individual for whom the prescription was written and the name of the physician writing it, providing that such prescription calls for more than 3 grains of morphine or its salts or their equivalent in opium or any alkaloid, extract, derivative, mixture, or other preparation of opium, or more than 2 grains of cocaine or its salts or their equivalent in any alkaloid, extract, or derivative of erythroxyton coco or in any synthetic preparation or mixture used as a substitute for cocaine.

Nothing in this section shall apply to the prescribing of legitimate ointments, liniments, or lotions which, by reason of the presence in same of poisonous, nonhabit-forming drugs or chemicals, can not be taken internally.

SEC. 5. Any person violating any of the provisions of this ordinance shall be punished by a fine of not more than \$100 for each offense or by imprisonment not exceeding 30 days.

JANESVILLE, WIS.

Garbage—Disposal of. (Ord. No. 356, June 7, 1912.)

SECTION 1. The words "garbage" and "offal" as used in this ordinance shall be held to include every accumulation of animal, fruit, or vegetable matter that attends the preparation, use, cooking, dealing in, or storage of meats, fish, fowl, fruits, vegetables; and it shall be unlawful for any person to place in the garbage vessels any ashes, old cans, broken dishes, or any dry waste whatsoever other than designated in this section.

SEC. 2. It shall be the duty of all resident householders, tenants, hotel keepers, boarding-house keepers, retail dealers, and all persons occupying dwellings within the city of Janesville to provide or cause to be provided and at all times to keep or cause to be kept portable vessels or cans for the deposit of garbage or offal, said vessels or cans to be water-tight, provided with handles, and a cover which shall not be removed except when necessary. These vessels or cans shall be of suitable size, and shall be

constructed of or lined with metal. Such vessels or cans shall be kept in the rear of the building and in a place which is easily accessible to the collector, but shall not be placed on the sidewalk, street, or other public place. In addition to these vessels or cans for the reception of the kitchen garbage there shall be provided suitable receptacles for the accumulation of old cans, broken dishes, ashes, and other dry refuse: *Provided, however,* That this section shall not apply to any person who immediately destroys by cremation satisfactory to the health officer and superintendent of streets such garbage, offal, and other refuse.

SEC. 3. The removal of the perishable garbage and offal of the hotels, restaurants, and boarding houses, groceries, butter shops, and similar places shall be made only during the months of May, June, July, August, and September; three times per week during the months of April, October, and November; and during the remaining months such collection and removal shall occur twice per week. In the residence portions of the city the collections and removals shall occur two times per week during the months of June, July, August, and September, and once per week during the remaining months of the year. And it shall be the duty of all persons, firms, or corporations affected by this ordinance to deposit all garbage and offal in receptacles as above described, and at no time shall liquids be deposited in said cans. Such garbage and offal shall be removed to a place outside of the city limits.

SEC. 4. Every person violating any provision of this ordinance shall for every offense, upon conviction thereof, be fined not less than \$5 nor more than \$50.

SEC. 5. This ordinance shall take effect and be in force from and after its passage and upon its publication, which publication shall be for three successive days.

JOHNSTOWN, PA.

Communicable Diseases—Removal to Municipal Hospital. (Reg. Bd. of H., Nov. 19, 1912.)

Whenever in the city of Johnstown any person shall be found to be suffering from a contagious or infectious disease who shall be so located and housed as in the opinion of the board of health to constitute a menace to the health of the public, the board of health shall have power to take and remove such person from the premises whereon he is located to the municipal hospital. Any person or persons who shall resist or interfere with the said board of health or its health officer or other representative or representatives in the performance of their duty as aforesaid, shall, upon conviction before the mayor or any magistrate of this city, be subject to a fine of not more than \$100 and cost of proceedings, or imprisonment for a period of not more than 30 days or both, at the discretion of the court.

Board of Health—Penalty for Violation of Regulations of. (Reg. Bd. of H., Nov. 19, 1912.)

Every person who violates any order or regulation of the board of health or who resists or interferes with any officer or agent thereof in the performance of his duties in accordance with the regulations and orders of the board of health, shall, upon conviction thereof, be punished by a fine of not more than \$100, or by imprisonment not exceeding one month, or both, at the discretion of the court.

KALAMAZOO, MICH.

Foodstuffs—Protection of. (Ord. No. 330, Dec. 4, 1912.)

SECTION 1. It shall be unlawful for any person, persons, firm, or corporation to handle, expose for sale, or sell any meats, poultry, game, sea foods, fish, vegetables, fruits, bread or other bakers' products, or any other articles intended for food within the limits of the city of Kalamazoo except as hereinafter provided.

(a) Raw or uncooked meat, poultry, game, fish, and sea food, vegetables, or fruit shall not be kept or offered for sale in or near any open window or doorway, outside

of a building, or in any street, private way, or public place in the city of Kalamazoo unless so covered or screened as to be protected from dust and flies and contact with animals, and no such articles intended to be used as food shall be exposed or displayed in front of any place of business unless the bottom of the box or receptacle containing such articles is raised at least 2 feet above the sidewalk, platform, or landing upon which such receptacle rests. No such articles shall be carried through any street, private way, or public place in said city unless properly protected or screened from dust and flies: *Provided*, That melons, pumpkins, turnips, squash, green corn, peppers, green peas, dry onions, potatoes, cabbage, cucumbers, carrots, and parsnips may be so kept, displayed, and carried without cover or screen. Berries, grapes, and other fruit kept in any building or store shall be screened and covered to protect from flies and dust.

(b) Every person being the occupant or owner, lessee, or otherwise of any room, stall, building, or place in said city where meat, poultry, game, fish, sea food, butter, vegetables, fruit, confectionery, bakers' products, or other articles intended for human food shall be kept or offered for sale shall maintain such room, stall, building, or place and its appurtenances in a clean and sanitary condition, properly screened from flies and other insects, and shall exclude all dogs and cats therefrom.

No dry sweeping of stores or other place where any of these products are handled or sold shall be allowed.

(c) Every peddler of foodstuffs from wagons or carts shall keep in his wagon or cart a suitable receptacle for the wastes of his business, such wastes to be disposed of in such a manner as not to create a nuisance. He shall keep said foodstuffs properly protected and screened from dust and flies. Celery when sold on the streets or at the railway stations shall be wrapped in clean, new paper.

(d) Bread and other bakers' products shall not be transported in any manner through the streets or alleys of the city of Kalamazoo unless wrapped in suitable paper to protect it from contamination from flies, dust, the conveyance, lines, or the hands of the driver or other persons handling such bakers' products.

All bakers' products shall be suitably wrapped, as above specified, before leaving the bakery, by persons whose hands have been thoroughly washed and sterilized immediately preceding. No bread or bakers' products shall be kept or offered for sale in the city of Kalamazoo which have not been handled and wrapped in conformity with the requirements of this section.

(e) Meat cutters or other attendants in meat shops who handle raw or uncooked meat, shall be cleanly dressed, and their hands and outer garments shall be kept clean. They shall not wrap any such meat in a newspaper or any part thereof, or in wrapping paper that has been soiled or has been used for any other purpose, but shall wrap the same in a clean, fresh wrapping paper. No refuse, scraps, bones, rancid fat, or decaying flesh shall be kept in any ice box in any meat shop with any fresh meat.

(f) Live poultry shall not be kept in area way nor in the same room or compartment in which meat is kept or offered for sale; nor shall live poultry be kept in any room or compartment adjoining such room or compartment, if the conditions are such that the room or compartment in which the live poultry is kept ventilates or is liable to ventilate into said room or compartment.

SEC. 2. Any person violating any of the provisions of this ordinance shall, upon conviction thereof in the municipal court of the city of Kalamazoo, be punished by a fine not to exceed \$100, or by imprisonment in the county jail of Kalamazoo County not to exceed 90 days, or by both such fine and imprisonment, in the discretion of said court.

SEC. 3. All ordinances or parts of ordinances inconsistent with or contrary to the provisions of this ordinance are hereby repealed.

SEC. 4. This ordinance shall take effect 30 days after its adoption by the city council.