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SICKNESS FREQUENCY AMONG INDUSTRIAL EMPLOYEES.¹

DISEASE PREVALENCE AMONG WAGE-EARNERS DURING THE FIRST HALF OF THE YEAR 1920.

In accordance with plans which the Public Health Service is developing with the aid of a committee of the American Public Health Association, for the collection, tabulation, and publication of information concerning the prevalence of disease among the wage-earning population,² the following tables are presented for the first half of the year 1920. The figures have been supplied by sick-benefit associations of the employees of certain plants which are cooperating with the Public Health Service by reporting currently the cases for which sick benefits were paid.

The tabulations herewith presented include those cases which caused disability for one week or longer; hence only the more serious illnesses are recorded. In subsequent publications the sickness reports from associations recording illnesses of shorter duration will be included. The present publication is intended as the first of a series of publications of industrial morbidity statistics which, it is hoped, will increase in volume, completeness, and accuracy.

Only a few of the associations have reported their morbidity experience for the entire six months' period. A number submitted their first report in May or June. Others which began to report earlier were unable at the time the figures were tabulated to submit complete statistics for the later months, owing to the unsettled status of some of their cases. For these reasons the statistics at the present time are not continuous for the entire period, and the changes in the associations considered from month to month made impracticable the computation of sickness frequency rates for the six months combined, though it is feasible to compute the rates for each month separately.

¹ From the Statistical Office, United States Public Health Service. The tables and graphs presented in this article were made under the immediate supervision of Assistant Statistician Dean K. Brundage.

² See "Sickness Records for Industrial Establishments," Reprint No. 573 from the Public Health Reports, November 14, 1919, pp. 2593–2604.

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The number of persons considered is the number of employees reported as holding membership in the various associations during each month. While practically all of the reporting associations require a physician's certificate naming the ailment causing disability, the correct diagnosis probably is not always reported; but a fairly accurate idea of the more serious affections occurring among the working people whose disabilities have been reported is afforded by the number of cases and frequency rates shown in the following tables.

Disabling Sickness According to Month of Onset.

It will be noticed in Table I that the number of disability cases which started in January was 267 per 1,000 persons. This means that if cases of sickness which disable for at least a week should occur as often during the whole year as they did in January, the number of such cases by the end of the year would be 267 for every 1,000 persons under consideration. When it is considered that illness causing incapacity for less than a full week is not included in the tables herein presented, an extraordinarily high frequency of sickness is manifested. The majority of the members of most associations for sickness insurance, moreover, are men in the vigorous period of life—i. e., 13 of the 29 associations whose reports have been tabulated specify definite age limits for eligibility to membership, the average being from 17 to 55 years of age. In some other respects. too, industrial employees insured in sick-benefit associations are a distinctly selected group, as temporary or casual laborers are seldom admitted to membership, and some may be too poor to afford the cost of insurance. Women have not the privilege of belonging to some of the reporting associations, and in those reporting associations which do have female members their number is relatively small. so that the sickness rates presented could not be affected to any appreciable extent by the supposedly greater frequency of illness among women. Furthermore, not all diseases are included in the tabulations, as sick benefits are denied for the venereal diseases, and 8 of the 29 reporting associations in this group refuse to pay benefits for chronic diseases contracted prior to the date of joining the association. Eighteen of the associations do not pay for disabilities brought on by the use of intoxicating liquors; 13 decline to pay for disabilities resulting from the violation of any civil law; and 10 for the results of willful or gross negligence. Just how rigidly these rules are enforced is not known, but, considering these restrictions, the statistics should be regarded as a minimum statement of the disabilities actually occurring and lasting seven days or longer.

Table I.—Frequency of cases of sickness causing disability for one accel or longer among the members of sick-benefit associations in certain industrial establishments reporting to the Public Health Service: By month of onset, January to June, 1920.

Month of onset.	Number of asso- ciations report- ing.	Member- ship.	Cases re- ported.	Cases per 1,000 per- sons per year.b
January	14 15	13, 818 21, 283 23, 196 24, 904 32, 035 40, 074	312 546 262 226 256 269	267 324 133 111 94 82

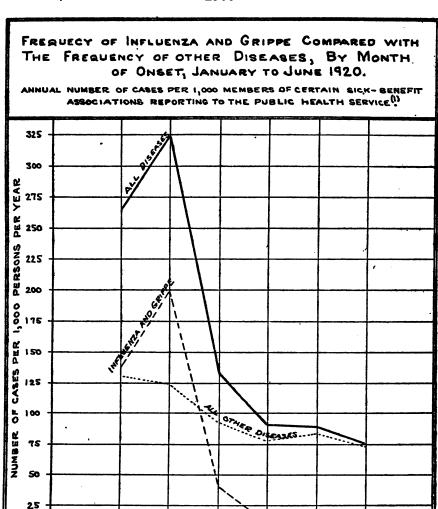
 $^{^{\}alpha}$ Including nonindustrial accidents, but not including the venercal diseases. b The annual frequency rate or case rate for a single month means the number of cases that would occur in a year among 1,000 persons if the rate at which new cases occurred during the month should continue throughout the year.

The marked seasonal variation in the occurrence of sickness from January to June is a conspicuous feature of Table I. The rate at which new cases occurred in February, for example, was approximately four times the incidence rate in June. It will be recalled that the recrudescence of epidemic influenza occurred in the first three months of this year, particularly in February, and in order to show the influence of the epidemic upon the seasonal variation in disease incidence, Figure 1 is presented. Cases diagnosed either as influenza or as grippe have been combined to represent the epidemic, because the terms are often used interchangeably in reporting the same disease. Figure 1 permits consideration of the incidence rates for influenza in relation to the rates for all other diseases, and shows the pronounced accentuation of the usual seasonal variation by the occurrence of the epidemic in the months in which sickness ordinarily is heavy.

Frequency of Specific Diseases and Groups of Diseases.

In Table II are presented the number of cases of the more important diseases and groups of diseases occurring each month and the annual incidence rate per 1,000 persons considered.

It should be stated that the monthly fluctuations in the incidence of all diseases or of the more important specific diseases or of groups of diseases herein noted are indicated in a general way for each association.



(1) INCLUDES ONLY THOSE SICKNESS AND NON-INDUSTRIAL ACCIDENT CASES WHICH CAUSED ABSENCE FROM WORK FOR ONE WEEK OR MORE.

APR.

MONTH OF ONSET

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Table II.—Number of cases of sickness causing disability for one week or longer, and annual frequency rates per 1,000 members of sick-benefit associations in certain industrial establishments reporting to the Public Health Service: By month of onset, January to June, 1920, and by disease causing disability.

Disease or condition causing disability. (With corresponding		Nu	mber of	new ca	ses.		Nun	aber of	cases per y		000 pe	rsons
title numbers in pa- rentheses from the International List of the Causes of Death.)	Jan.	Feb.	Mar.	Apr.	May.	June.	Jan.	Feb.	Mar.	Apr.	May.	June.
All diseases and conditions (1-189) ^b	312	546	262	155	211	223	266. 6	323. 8	133.3	91.5	89. 7	76.1
General diseases (1-59) Typhoid fever (1)	183 2	363	113	56	53	60	156. 4 1. 7	215. 2	57.5 .5	33.1	22.5	20.5
Influenza and			_	-	_		1		!	1]	
grippe (10) Tuberculosis of the	159	338	79	21	14	9	135.8	200. 4	40.2	12.4	5.9	3.1
lungs (28, 29) Cancer (all forms)	4	2	5 1	2 2	3	8	3.4	1.2	2.5	1.2	1.3	2.7
(39-46) Rheumatism (47,48)	8	ii	13	16	22	23	6.8	6.5	6.6	9.4	9.3	7.8
Others (2-9, 11-27, 30-38, 49-59)	10	12	14	14	12	20	8.5	7.1	7.1	8.3	5.1	6.8
Diseases of the nerv-				!	i	1	ĺ	l	1	1	١.	ŀ
ous system (60-76)c Neuralgia and neu-	10	15 -	15	9	16	20	8.5	8.9	7.6	5.3	6.8	6.8
ritis (73)	5	4	4		3	4	4.3	2.4	2.0	ļ	1.3	1.4
Cerebral hemor- rhage, apoplexy,				l		l	1			1		
paralysis (64-66)	1		1		1		.9		.5	· · · · ·	.4	
Mental alienation (insanity) (67, 68).	1	2	3	1	 	1	.9	1.2	1.5	.6	l	.3
(insanity) (67,68). Others (60–63,69–72,	3	4	6	4	7	9	2.5	2.4	3.1	2.4	3.0	
74) Diseases of the eyes	3			٠.		1	2.3	l	3.1	l	1	3.1
and annexa (75) Diseases of the ears		2		4	2	5		1.2		2.4	.8	1.7
(76)		3	1		3	1	ļ	1.8	.5		1.3	.3
Diseases of the circulatory system (77-85)	3	7	10	6	15		2.6	4.2	5.1	3.5	6.4	3.1
Diseases of the heart (77–80)	1	2	3	3	4	2	9.	1.2	1.5	1.8	1.7	.7
Diseases of the veins	•			1	l		i	1	1		1	I
(83) Others (81–82, 84–85)	1 1	4	5 2	2	5 6	5 2	.9	2.4	2.5 1.0	1.2	2.1 2.5	1.7
Diseases of the respir-	57	71	45	31	50	29	48.7	42.1	22.9	l	21.3	9.9
atory system (86-98) Bronchitis (89, 90)	23	33	23	10	12	7	19.6	19.6	11.7	18.3 5.9	5.1	2.4
Pneumonia (all	19	22	7	10	25	9	16.2	13.0	3.6	5.9	10.6	3.1
forms) (91,92) Others (86–88,93–98)	15	16	15	îĭ	13	13	12.8	9.5	7.6	6.5	5.5	4.4
Diseases of the diges- tive system (99-103, 105-118)	28	38	48	22	41	44	23.9	22.5	24.4	13.0	17.4	15.0
Tonsillitis and other		~					30.0	22.0	W2. T	15.0		10.0
diseases of the pharynx (100)	17	20	20	6	13	10	14.5	11.9	10.2	3.5	5.5	3.4
Diseases of the		9		6	9	9						
stomach (102, 103). Diarrhea and enter-	5		13		9		4.3	5.3	6.6	3.5	3.8	3.1
itis (105)	2 4	2	4 5	5	6	2 11	1.7 3.4	1.2 2.4	2.0 2.5	3.0	2.5	.7 3.8
Hernia (109) Others (99, 101, 106-		2	ĭ	5	8	6		1.2	.5	3.0	3.4	2.0
Others (99, 101, 106-1 107, 110-118)		1	5		5	6		.6	2.5		2.1	2.0
Diseases of the genito-		-			Ĭ				2.0			2.0
urinary system and annexa (119-133) Acute nephritis and	2	6	1	3	5	1	1.7	3.6	.5	1.8	2.1	.3
Bright's disease (119, 120)	2	1	1				1.7	.6				
Others (121-133) The puerperal state		5	1	3	5	1		3.0	.5	1.8	2.1	.3
(134-141)		•••••			••••••	••••••		•••••	•••••			•••••
and cellular tissue	اء				_ [
(142-145) Furuncle (143)	i	14 8	1	2	8 4	11 7	5.1 .9	8.3 4.7	3.1 .5	2. 4 1. 2	3.4 1.7	3.8 2.4
Others (142, 144, 145)	5 1	l 8 115e dif	5 1	2 1	4 '	4 1	4.3	3.6	2.5	1.2	1.7 1.7	1.4

[•] Totals for April, May, and June differ from those shown in Table I, because association II does not report diagnosis.
• Except the venereal diseases.
• Including organs of special sense (eyes, ears).

TABLE II.—Number of cases of sickness causing disability for one week or longer, etc.—Continued.

Diseases or condition causing disability. (With corresponding title numbers in pa-		Number of new cases.						Number of cases per 1,000 persons per year.				
renthesis from the International List of the Causes of Death)	Jan.	Feb.	Mar.	Apr.	May.	June.	Jan.	Feb.	Mar.	Apr.	Мау.	June.
Diseases of the bones and organs of loco- motion (146-149)	5	2	7	4	5	7	4.3	1.2	3. 6	2.4	2.1	2.4
Diseases of the bones (146) Diseases of the	1	1			1	1	.9	.6			.4	.3
joints (147) Others (including lumbago) (148,			. 4	1		1			2.0	.6	••••	.3
149)	4	1	3	3	4	5	3.4	. 6	1.5	1.8	1.7	1.7
External causes (155- 186)	4	17	6	17	10	29	3.4	10.1	3.1	10.0	4.3	9.9
and conditions (187- 189)	14	13	11	3	8	13	12. 0	7.7	5.6	1.8	3.4	4.4
Number of mem- bers	13, 818	21, 283	23, 196	20, 661	27,777	35, 766						

The outstanding causes of disability are found in the general, the respiratory, and the digestive groups of diseases. For these three groups combined the rate ranged from 86 per cent of total sickness in February to 60 per cent of the rate for all diseases in June.

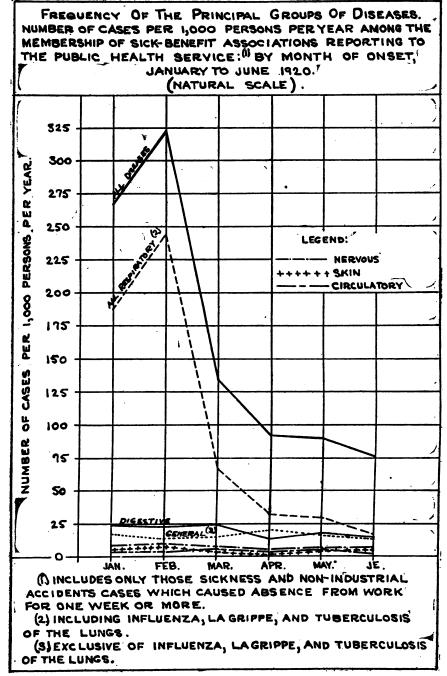
When influenza, grippe, and pulmonary tuberculosis are removed from the general diseases group, and added to the group designated as "Diseases of the respiratory system," as has been done in Table III and Figures 2 and 3, it becomes apparent that the rates for total respiratory diseases were greater than the rates for any other group, not only in January and February but in June as well. The respiratory affections are characterized from January to June by a tremendous seasonal fluctuation, and by a surprising prevalence, in comparison with other disease groups, in the first month of summer.

TABLE III.—Frequency of the principal groups of diseases. Number of cases of sickness causing disability for one week or longer per 1,000 persons per year among the membership of sick-benefit associations reporting to the Public Health Service: By month of onset January to June, 1920.

Disease or condition causing disability (with corresponding title numbers in parentheses from the International List of the Causes of Death).	Jan.	Feb.	Mar.	Apr.	Мау.	June.
All diseases and conditions (1-189) a All respiratory diseases (10, 28, 29, 85-98) b General diseases (1-9, 11-27, 30-59) c Diseases of the enervous system (60-76) Diseases of the circulatory system (77-85) Diseases of the digestive system (99-103, 105-118) Liseases of the genito-urinary system (119-133) Diseases of the skin and cellular tissue (142-145) Diseases of the bones and organs of locomotion (146-149) External causes (155-186) Ill-defined diseases and conditions (187-189)	8.5 2.6 23.9 1.7 5.1 4.3	323. 8 243. 7 13. 6 8. 9 4. 2 22. 5 3. 6 8. 3 1. 2 10. 1 7. 7	133.3 65.6 14.8 7.6 5.1 24.4 .5 3.1 3.6 3.6	31.9 19.5 5.3 3.5 13.0 1.8 2.4	28.5 15.3 6.8 6.4 17.4 2.1 3.4 2.1	76.1 15.7 14.7 6.8 3.1 15.0 .3 3.8 2.4 9.9 4.4

a Except the venereal diseases.

b Including influenza, grippe, and tuberculosis of the lungs (10, 22, and 20).
c Exclusive of influenza, grippe, and tuberculosis of the lungs (10, 23, and 29).



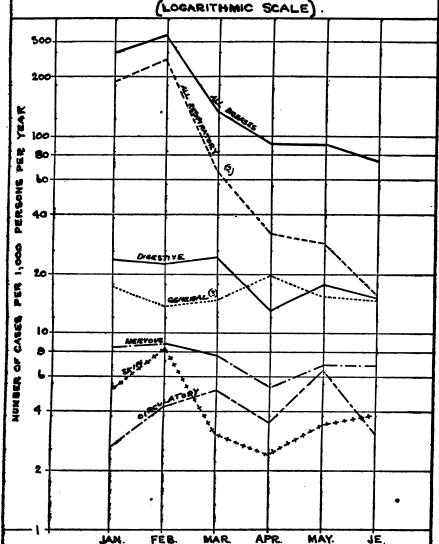
FREQUENCY OF THE PRINCIPAL GROUPS OF DISEASES.

NUMBER OF CASES PER LOCO PERSONS PERYEAR AMONG THE

MEMBERSHIP OF SICK-BENEFIT ASSOCIATIONS REPORTING TO

THE PUBLIC HEALTH SERVICE: BY MONTH OF ONSET,

JANUARY TO JUNE 1920.



(i) INCLUDES ONLY THOSE SICKNESS AND NON-INDUSTRIAL ACCIDENTS CASES WHICH CAUSED ABSENCE FROM WORK FOR ONE WEEK OR MORE.

(2) INCLUDING INFLUENZA, LA GRIPPE, AND TUBERCULOSIS OF THE LUNGS.

(3) Exclusive of influenza, la grippe, and tuberculosis of the lungs.

In Figure 3 the incidence of the several groups of diseases are plotted on a logarithmic scale for the purpose of showing the relative variations rather than the actual variations. It will be noted that the digestive diseases were the second most prevalent group among the persons under consideration during the six months' period. The slight seasonal fluctuation may be accounted for by the fact that tonsillitis, which occurs mostly in winter weather, is included in this group in accordance with the International List of the Causes of Death.

The general diseases in every month except April were slightly less frequent than the digestive troubles. They include those affections listed under this title in the International List of the Causes of Death, with the exception of influenza, grippe, and tuberculosis of the lungs, which have been added to the respiratory group as mentioned above. Among the more common diseases in the general group are rheumatism, cancer, diabetes, goiter, anemia, erysipelas, smallpox, and other epidemic diseases.

The rates for the other disease groups are lower than those for the three that have been mentioned, and they fail to exhibit any very marked seasonal tendencies.

Referring to the frequency rates for specific diseases exhibited in Table II, the most outstanding feature is, of course, the incidence of epidemic influenza. Next to influenza and grippe the most prevalent diseases were bronchitis, pneumonia, and diseases of the pharynx (principally tonsillitis); and their frequency fluctuated from month to month in fairly similar fashion. It is interesting to observe the behavior of rheumatism, which occurred oftener in June than in the winter months, the incidence rate in June being fairly high for all large reporting establishments. Rheumatism was most prevalent in April and May.

Less frequent than the particular diseases just mentioned were the stomach troubles, appendicitis, neuralgia and neuritis, and tuberculosis of the lungs. For new cases of tuberculosis the rate varied between one and three per 1,000 persons per year, which seems to indicate a relatively slight disability from tuberculosis lasting seven days or longer. It may be offered in explanation that many cases which actually began in the period under consideration probably had not yet reached a stage involving actual incapacity for work.

^{*}The reader is referred to the following recent discussions of the use of the logarithmic scale in graphic presentation: Whipple, G. W., Vital Statistics (1919), pp. 83-87; Fisher, Irving, The Ratio Chart: Quarterly Publication of the American Statistical Association, 1917, p. 577; Field, J. A., Some Advantages of the Logarithmic Scale in Statistical Diagrams: Journal of Political Economy, XXV, 8, October, 1917.

Sickness Rates for the Reporting Sick-Benefit Associations.

The frequency of sickness which caused absence from work for one week or longer in the reporting associations is shown in Table IV. The associations have been classified according to size—those having more than 3,000 members appearing in Group I and those with less than that number in Group II—to facilitate observation of the rates for the large and for the small industrial establishments.

Table IV.—Number of cases of sickness and case rates for all reporting sickbenefit associations, and for each reporting association having more than 500 members, by months, January to June, 1920.

[Where blank spaces appear, the statistics were not availal

Sick-benefit asso-	Aver- age mem-		Number of cases in—				Number of cases per 1,000 persons per year.						
ciations.	ber- ship.	Jan.	Feb.	Mar.	Apr.	Мау.	June.	Jan.	Feb.	Mar.	Apr.	May.	June.
All reporting asso- ciations	25, 885	312	546	262	226	256	269	267	324	133	111	94	82
Group I b A B c	21,563 8,485 2,910	258 123 135	406 79 181	180 43 62	157 26	185	237	267 171 546	283 118 784	118 60 252	99 37	82	81
C D E.	6,678 4,133 18,481		146	75	60	38 102	33 80		276	133	110	108 66	98 53
F G H.	3,061 5,577 4,270				71	45	20 58 46				204	125	80 127 130
Group II d N O	4,322 874 552	54 20	140 45 19	82 13 4	69 5 8	71 13 2	32 5 1	264 270	551 649 461	189 175 83	153 70 174	160 176 43	88 70 22
P Q R	640 695 1,128	19	39	12 9 9	8 9 5	11 8 11	8 8	327	719	219 152 96	151 157 55	203 135 115	156 84
Others e	1, 230	15	37	35	34	26	10	207	414	336	259	227	101

a Includes only those sickness and nonindustrial accident cases which caused absence from work for one week or longer.

b Associations which have more than 3,000 members.
 c Included with the large associations because the membership is nearly 3,000.

It will be noticed at once how large the fluctuation in disease incidence was from month to month in accordance with expected seasonal variation for all establishments. What are perhaps more important are the wide differences among reporting establishments in the same month. In February, for instance, the frequency rate for association B was nearly seven times as great as the rate for association A, and in April, association H had nearly six times as much sickness as establishment A. It may be observed that similar differences appear in the rates among the smaller associations. These marked differences afford strong reasons for a careful study not only of the causes of illness in the different plants, but of the conditions which give rise to them. While it is not the purpose to analyze these differences at this time, since the records for the different associations are not sufficiently comparable with respect to the period covered, the value

d Associations which have less than 3,000 members.
Associations which have less than 500 members.

of statistics of this nature will, it is believed, become more and more manifested as they accumulate. In later publications it is hoped to present more detailed analyses.

Cooperation Invited.

The tables herein presented represent merely a beginning in the publication of industrial morbidity statistics. It is intended to extend the collection of sickness statistics to as many plants as will cooperate by furnishing reports periodically. While the number of reporting associations has been considerably augmented of late, it is hoped that more establishments will report the disabilities occurring among their employees.

ACKNOWLEDGMENTS.

Acknowledgments are made to those corporation managers and association secretaries whose generous assistance has made possible the inauguration of the present plan to obtain current information of the incidence of disease among the wage-earning population.

RECENT EXPERIMENTS IN THE CONTROL OF AIR DUSTINESS.¹

By O. M. Spencer, Passed Assistant Surgeon (R.), United States Public Health Service.

We may assume as generally accepted that tuberculosis never appears unless the tubercle bacilli are present, and that even when such bacilli are present, tuberculosis does not develop unless they are in sufficient numbers to overthrow normal resistance or unless they find in the ultimate victim a physical condition sufficiently subnormal to predispose him to their virulent assaults. Factors that may so predispose an individual vary. Perhaps they may be due to the virulence of the tubercle bacilli, to racial stock, or to emaciation resulting from various causes, such as deterioration caused by alcohol, or from fatigue, or like factors within the individual; or they may come from more remote factors that influence or tend to develop physical disabilities, such as poor ventilation, exposure to extremes of heat and cold, wet processes, inadequate lighting, bad housing, low standards of living, insanitary community conditions, or unhealthy climatic conditions.

Because there are these ramifications of the influencing factors of tuberculosis, a restriction in the scope of this subject may not be out of harmony with the general program. I am, therefore, taking the liberty to discuss the results of some recent studies made by

¹ Read at the North Atlantic Tuberculosis Conference held at Richmond, Va., Oct. 7-8, 1920.

United States Public Health Service officers, of air conditions prevailing in certain occupations and having a tendency to excite or accelerate the development of tuberculosis.

It is commonly known that there are certain principal occupations creating air conditions that tend to produce characteristic fibroid changes in the lungs, commonly designated as pneumonoconiosis. which changes predispose the worker to infection from the tubercle bacilli. I refer here to such trades as those followed by cutlery makers. filers, grinders, abrasive workers, polishers, buffers, manufacturers of jewelry, brass workers, finishers, sand blasters, saw filers, toolmakers. glass blowers, glassworkers, cotton workers (because of mineral substances used in sizing), marble and stone quarry men, molders, potters, miners of copper, gold, silver, graphite, iron, lead, zinc, mica, phosphate, spar, and quicksilver. These trades are typical, and the list inserted here is not at all complete. The important point is not how many trades carry this exposure, but what preventive measures are available when a trade tends to produce an air dustiness of particles capable of producing fibroid changes in the lung tissue, or capable of filling the lung with foreign matter, thereby restricting its capacity to function.

We have become accustomed to-day to certain standard methods for air purification in industrial plants. These methods take the form of hoods, exhausts, and fume lines usually beginning at or near the work plane and following certain engineering specifications, exhausting at a place sufficiently remote and protected to control the hazards arising from the occupation. In certain occupations where it has been thought that such fume lines could not be satisfactorily installed and operated, wet processes have been introduced. In point of origin, the wet process antedates the exhaust as a means for controlling dusty operations. To a large extent these two processes have given a sense of security to the operator and the operative.

States as governmental units, and, in some instances, municipal authorities, have endeavored to standardize such safety devices by fixing the size of the fume line, the number of branches that may enter a main without increasing the size of the main, the angle at which such branch pipes must enter the main pipes, the strength of the exhaust as determined by anemometer or U-tube readings, and like precautions. These regulations, occasionally enforced by factory inspection, have given an added sense of security to the hazardous occupations. The great question is, however, Is this sense of security fancied or real? Certain observations made by officers of the Public Health Service aroused a doubt as to the adequacy of these so-called protective devices and led to a comprehensive research. The results of the investigation show that in many instances,

because of mistakes in planning and installation and because of an imperfect method for determining the efficiency of such devices, operatives have been exposed to almost as great a hazard as if no protective devices had been installed. The crux of the problem as now presented in the industries cited is largely the production of a method for checking up the efficiency of the apparatus installed; and I shall endeavor to show that such a check can best be made, not by anemometer or U-tube readings, but by air samples taken at the plane of work and dust counts made therefrom.

All dust counts mentioned in this work were made from samples collected by the Palmer water-spray machine, and refer to the number of one-fourth standard unit dust particles per cubic foot of air, as classified by Palmer,² and arranged according to size, from 1 to 10 microns. It was shown by Dr. McCrea, in the report of the Miners' Phthisis Prevention Committee, of Johannesburg, South Africa,³ that the dust extracted from the lungs of deceased miners by acid oxidation consisted of particles from 12 microns to less than 1 or 2 microns in diameter. The majority of particles were found in the smaller sizes.

It has been the almost universal belief that, of the two main types of control of air dustiness, wet grinding is safer and has a smaller dust hazard than dry grinding under an exhaust system. This in some instances has been proved false by recent studies conducted by Winslow and Greenburg in an ax-grinding factory. In this plant the owners were worried by the dry grinding with an exhaust system and were satisfied with a wet-grinding process, and so sought advice as to a feasible plan for correcting the former.

Dust counts of samples were collected by the Palmer water-spray machine in the wet and dry grinding shops by Winslow and Greenburg, with the following results:

Wet-grinding shops.

Number	Number of dust particles per cubic foot of air. (One-fourth standard unit.)								
samples.	Minimum.	Maximum.	Average.						
32	4 870,000	50,000,000	15,800,000						

a This was the only sample below one million.

³ Palmer, G. T., Coleman, L. V., and Ward, H. C., A Study of Methods for Determining Air Dustiness: American Journal of Public Health, Vol. VI, p. 1049, 1916.

Miners' Phthisis Prevention Committee-General Report. Johannesburg, 1916.

Winslow, C.-E. A., and Greenburg, Leonard, A Study of the Dust Hazard in the Wet and Dry Grinding Shops of an Ax Factory: Public Health Reports, vol. 35, No. 41, Oct. 8, 1920, pp. 2393-2401. Reprint No. 616.

Dry-grinding shops with exhaust system.

Number of	Number of dust particles per cubic foot of air. (One-fourth standard unit.)								
samples.	Minimum.	Minimum. Maximum.							
. 10	51,500	400,000	154,500						

By these experiments Winslow and Greenburg not only showed that the wet grinding was hazardous and gave a false sense of security, but they also showed that the exhaust system in the dry-grinding plant was adequate.

Two important facts stand out as a result of this test: one is that wet grinding was not, here at least, a safe method; the other is that the methods of testing adopted in this test give an actual picture of the efficiency of the system of dust reduction installed.

Another corporation using the wet method of grinding, not satisfied with conditions in their grinding rooms, requested the Public Health Service to assist them in improving health conditions. The plant management realized that the mere compliance with the State laws in wet-grinding processes did not prevent a dust hazard. The labor turnover from accidents and sickness was very high, and the men employed in the grinding room were discontented because of the wet process in use and its attendant dust hazard.

A survey of the plant was made by Scientific Assistant Myron Bantrell,⁵ and dust samples from which counts were made were taken in various rooms of the plant. The counts were of one-fourth standard unit dust particles and ranged in number from 69,000 on the roof of building to 4,548,000 in the grinding room. The average number of particles in the grinding room was 2,841,000. These conditions prevailed notwithstanding the fact that the management complied with the State laws in every way in its wet-grinding process, using a special compound of oil and water.

This survey brings out the important fact that even a strict compliance with the present laws in regard to wet grinding does not always prevent a dust hazard, and that it is absolutely necessary to have some definite method of checking up the efficiency of dust-prevention devices after their installation.

These illustrations are not intended to depreciate wet grinding as a safeguard against air dustiness, but to point to the fact that wet grinding, as such, must not be allowed to allay suspicion and thereby cause plant managers or factory inspectors to fail to establish a satisfactory checking device against its possible failure. As a matter of

fact, numerous surveys have shown that dust particles in wet-grinding processes are often caused by the worker's regulating the flow of liquid to suit himself, decreasing the specified amount in order to protect himself from the spray and to increase the speed in his work. The stream of water is often out of line, the speed of the grinding wheel causes the spray to be thrown in all directions, and this spray carries metal and mineral particles to various parts of the room; the tool in process of grinding deflects the stream of water from the wheel, and thus the dust particles are not properly settled; in some plants the liquid solution is used continuously for a certain period of time, and therefore carries a certain amount of metal and metallic dust and bacteria in the solution; and in some instances workers were found to have discontinued the stream of water and hence were dry grinding without any method for settling the dust.

On the other hand, dry grinding with an exhaust system also has dangers and shortcomings; for care and attention must be given to the size and location of the hoods, the angle of taper of the ducts, the angle at which the branch pipes enter the main pipe, the use and size of the bends and elbows, the plugging and stoppage of the screens in the hoods, and, the most important factor, the suction maintained at the terminal hoods. I assume that it is generally known that there are several ways of testing the suction velocity of exhaust systems. One of the most popular is that of drilling a hole one-eighth inch in diameter in the suction pipe and applying to this hole the end of the rubber tube which is connected to a glass tube containing a colored solution and backed with a scale on which can be read the difference in the level of the two arms of the U-tube produced by the negative head in the suction pipe.

Using this method of testing the suction in the exhaust pipe, and the Palmer dust machine to count the dust particles in the air, Winslow, Greenburg, and Angermyer and a special study in the polishing shops of a small-arms plant by making observations in pairs: first, under normal conditions, with the exhaust system working, a dust count was made; then the doors in the main exhaust ducts were opened between the fans and the hood, and after an interval of 5 to 10 minutes, the work process being continued, a second dust count was made.

The results of these experiments showed that a reduction in the suction head readings of the U-tubes is quickly followed by an increase in the air dustiness; and a tabulation of the suction head pressure and the number of dust particles in these experiments proved that there is a definite relation between the suction head in the

⁶ Winslow, C.-E. A., Greenburg, L., and Angermyer, H. C., Standards for Measuring the Efficiency of Exhaust Systems in Polishing Shops: Public Health Reports, vol. 34, No. 10, March 7, 1919, pp. 427-449, Reprint No. 509.

exhaust and the dust in the air, provided there is no interference with the exhaust system between the point of the U-tube reading and the polishing wheels. And it is this possible defect in the arrangement of the hood with regard to slope, size, position, angle, and partial or total stoppage of the screen, that forces us to realize that the U-tube test is not always one of accuracy and reliability.

Not only do these experiments demonstrate this fact, but they demonstrate the fact that only by the actual dust count at the plane of work and of the atmosphere of the room could the efficiency of the exhaust system be checked or relied upon.

As to the two methods of preventing dust mentioned here, there are processes where dry grinding falls far short in giving a finished surface as compared with that obtained by wet grinding. There may be processes where dry grinding is preferable to wet; but both methods are essential, being determined by the character of the work and the finish desired.

Circumstances and the nature of the work to be done should determine the type of safety device to be installed. The air exhaust has certain advantages in sanitation, because the worker can not, by cutting off the fluid, convert the wet method into the dry method; there is no deflected spray in the dry method causing the clothes of the worker to become damp; hoods can be arranged in the dry method to catch any particles of dust liberated; the suction head at every grinding wheel can be tested in the dry method and a comparison of the amount of dust produced by each worker can be made, and in this way any defects in the separate hood and branch line can be located. There is no stream of water or liquid to be kept fixed on a certain point in the dry method. The dry method is cleaner, more comfortable for the workers, and less likely to produce discontentment among them.

The important point, however, in connection with the installation or maintenance of either the wet or the dry system, is that the supervision of its operation should guarantee efficient control of the dust caused by the process. This can best be accomplished by use of a dust sampling machine and a dust count.

No general standard of air dustiness has yet been worked out. An attempt is now being made by Prof. C.-E. A. Winslow and other workers in the Public Health Service. In the report made by Winslow, Greenburg, and Angermyer the authors make the following statements from deductions drawn in extensive dust studies: "It appears then that the dust content of a polishing shop can be kept generally under 300,000 small one-fourth standard unit dust particles per cubic foot and should not average over 200,000."

But this tentative standard seems a probable one, as suggested by dust counts made from samples taken under ordinary conditions to which men are exposed in offices, department stores, and on the street. Palmer, Coleman, and Ward ⁷ recorded the following dust content of the air of the city streets and occupied space where no particular dust hazard exists.

Source of samples.	Number of samples.	Average total count.c
Outdoors—Balcony City College Outdoors—Woolworth Building (street level, 10th floor, and 58th floor) Business office Department store, basement	3 3 2 4	153,000 71,000 150,000 108,000

^a The counts in this study included five sizes of particles, viz., 100-standard units, 25-standard units, 1-standard unit, and one-fourth standard unit.

This and the previous counts made under varying conditions demonstrate a method whereby standards for dustiness in any or all processes may be established. However, the standard mentioned here for polishing shops is tentative, and has been arrived at by engineers without the aid of medical officers. Physical examinations of the exposed workers, as well as X-ray plates of the lungs, in an intensive study over a long period of time, to see if the standard adopted for certain processes prevents the fibroid changes in the lungs produced by pneumonoconiosis, must yet be made before the tentative standards can be accepted as adequate. It is in this direction that future work in dustiness must be conducted in hazardous industries to make the workplaces safe for the employees. This applies not only to grinding and polishing and to wet and dry exhaust systems, as here mentioned, but to all occupations and processes where dust hazards exist.

There are many factors which are essential to dust-prevention devices and systems; however, any one of them may be only slightly defective and yet cause the entire system to fail in its purpose. It is to the method of determining the efficiency and inefficiency of all devices for decreasing dustiness that I particularly wish to call your attention; because, as stated by Winslow, "the actual efficiency of any exhaust system or method for the control of the dust hazard can only be determined by the actual examination of the air in the workroom while the process is being carried on and the exhaust system at work."

I have reviewed briefly the findings of investigators of air conditions having a tendency to excite the development of tuberculosis, the question of the efficiency of certain devices and processes in eliminating the hazard, and the matter of tentative standards of air dustiness. Evidence shows that occupations which cause the worker to breathe dusts containing mineral and metallic dust particles rang-

ing from 1 to 10 microns in diameter, subject the individual to pneumonoconiosis, caused by the rough, sharp, jagged, and hard dust particles, which predisposes to infection from the tubercle bacilli.

It has also been shown that the present methods used for removing dusts are subject to many faults and defects, and that it is only by an actual dust count at the plane of work and in the room or at the place where the process is being conducted that we can determine the efficiency of the system and the amount of protection that is afforded the worker; and that tentative standards of dustiness can be created, by making dust counts in any place and under any conditions desired, pending a study of living conditions to change the tentative to real standards.

I believe that I have made clear the following needs in the study of the control of air dustiness:

- 1. The necessity for establishing a "standard dust table" of the number of dust particles of a certain size permissible in all dust-creating or dust-hazardous processes and occupations.
- 2. The necessity for checking the efficiency of all dust-removing systems or devices at regular intervals by an actual dust count at the plane of work and in the workroom, which count must come within the limits prescribed by the "standard dust table" for that particular process.

If these two suggestions should be adopted and included in every State law for the control of air conditions in industries, the amount of pneumonoconiosis would be unquestionably reduced, and the mortality from tuberculosis in dusty trades diminished.

If, in addition to the establishment of the "standard dust table" and the regular testing of dust-removing devices in plants by actual dust count, intensive education of employees as to their constant danger of tuberculous infection at home and in the plant is carried out and workers come to realize the hazards to which they are subjected, we may expect to lower the present industrial mortality rate from tuberculosis to that of the ordinary death rate.

AMBULATORY TREATMENT OF DRUG ADDICTION.

THE PENNSYLVANIA STATE DEPARTMENT OF HEALTH CONSIDERS IT A VIOLATION OF THE STATE ANTINARCOTIC LAW.

In an article published in Public Health Reports for July 18, 1919,¹ the ambulatory treatment of drug addiction was defined and held to be presumptively a violation of the Harrison narcotic drug act. As the Pennsylvania antinarcotic law follows the Harrison law very closely, the action of the commissioner of health of Pennsylvania in the order published herewith, declaring the ambulatory treatment of

¹ Treatment of Drug Addiction, by Arthur D. Greenfield, Attorney and Counselor at Law.

drug addiction not to be in compliance with the Pennsylvania law, further strengthens this interpretation.

"Whereas the Pennsylvania antinarcotic law rigidly interdicts the issuance of narcotic drugs in any quantity whatsoever to a known habitual user thereof except in pursuance of a prescription issued in good faith by a physician (a) for the cure or treatment of some malady other than the drug habit, or (b) for the purpose of curing such patient of such habit, and not for the purpose of satisfying a craving for the drug, and since the parallel provisions of the Federal law, as construed by the courts in numerous decisions, are to the effect that an order for morphine issued to an habitual user thereof, not in the course of professional treatment in an attempted cure of the habit, but for the purpose of providing the user with narcotics sufficient to keep him comfortable by maintaining his customary use, is not a prescription within the meaning and intent of the act.

"Therefore the so-called reductive ambulatory treatment of drug addiction, rejected by the United States Internal Revenue Bureau, must not be accepted as fulfilling the requirements of section 8 of

the Pennsylvania antinarcotic law.

"The bureau of drug control of the Pennsylvania Department of Health must see to it that in the treatment of drug addiction, as such, narcotics must not be furnished, either on dispensing or prescribing in writing, by physicians to the addict himself, but must be personally administered by the physician or be placed in the hands of a nurse or other reliable person who is not an addict and who is held personally responsible for carrying out the directions of the physician in charge. Written records must be kept of all such administration of narcotics.

"Druggists filling narcotic prescriptions for the treatment of addiction, as such—but not in the treatment of disease other than addiction and in the usual medicinal dosage—will not be permitted to deliver the drugs into the hands of the addict for whom the prescription is written, but must place the drugs in the hands of the person known to the druggist as qualified to receive them under this order and as certified in writing on each such prescription or by the physician writing the same, as the designated recipient thereof, and such person, on the delivery to him of the drugs, must receipt for the same by signing his or her name and address on the back of each prescription.

(Signed) "EDWARD MARTIN, "Commissioner of Health.

"September 28, 1920."

In April, 1919, the department of health of the city of New York opened a dispensary for drug addicts. The "clinic" was established

immediately following the arrest by internal revenue agents of certain physicians and druggists who had been supplying narcotic drugs, and was opened because of the fear of possible consequences resulting from the sudden shutting off of the source of supply of the many addicts who had been obtaining drugs from the arrested persons and from others in the same business who had suspended operation because of being frightened by these arrests. This clinic was closed in March, 1920. An account of its operation, its failure, and the conclusions reached after its trial, was published in Public Health Reports for March 26, 1920,

In a recent report of a Committee of the Institute of Criminal Law and Criminology ² occurs this statement:

It is now generally conceded that the so-called narcotic drug clinics, as conducted, have been a failure and probably no more municipalities will establish clinics of this type.

In view of the failure of the ambulatory treatment of drug addiction, it is believed that the action of the commissioner of health of Pennsylvania will stimulate other States whose laws authorize a similar interpretation by their administrative officials.

PUBLIC HEALTH ENGINEERING ABSTRACTS.

State supervision of municipal water supplies.—H. A. Whittaker, Director, Division of Sanitation, Minnesota State Board of Health.—

Journal-Lancet, October 15, 1920.

The sanitary faults most commonly found in water supplies are (1) the use of surface waters without treatment; (2) the use of surface waters, with water-purification plants, in localities where underground supplies are preferable; (3) the installation of water-purification plants by local authorities possessing but little knowledge of the treatment methods; (4) the installation of chlorine plants to treat water that can not be properly purified with chlorine; (5) the addition of chlorine to raw water entering a filter plant, rather than to the effluent; (6) failure to provide duplicate parts of important equipment of water-purification plants; (7) the installation of by-passes around water-treatment plants; (8) the use of unskilled waterworks operators; (9) the location of exposed mains, reservoirs, etc., where they are subject to flooding with surface waters; (10) improper construction of well casings and covers; (11) the construction of pits around wells at the surface, in which all or part of the pumping equipment is located; (12) the connection of any part of the water-supply system with sewers or drains, making it possible for sewage or surface water

³ Narcotic Drugs and Crime—Report of Committee (G) of the Institute. L. L. Stanley, resident physician, California State Prison, San Quentin, Calif.

to back up into the wells, well pits, etc., (13) the improper construction of underground and surface reservoirs; and (14) emergency connections between public and private water-supply systems.

These errors can be prevented if proper supervisory powers are afforded the State health authorities over all water supplies in the State. A well-organized subdivision with adequate engineering and laboratory facilities should be provided for this work.

The benefits of such supervision have been demonstrated in Minnesota, where the average annual typhoid death rate of 428 from 1900 to 1910 has been reduced to 82 in 1919, resulting in the year 1919 alone of a saving of \$1,380,000 in fees, not including the lives saved and the reduction in typhoid carriers.

The de-watering of sewage sludge, with special reference to the Birmingham method.—F. R. O'Shaughnessy, Consulting Chemist, Birmingham, England.—Journal Royal Sanitary Institute, volume 41, No. 2, September, 1920, page 147.

In the Birmingham Sludge Digestion Process the digestion chamber is separate from the sedimentation tank containing the crude sewage. When charged from the latter tank, the digestion chamber receives a dose of several hundred tons of crude sludge (about 90 per cent water) in a few hours.

In the process the sludge is made to undergo vigorous fermentation without causing nuisance, the action producing a black, inoffensive, mobile sludge with altered physical characteristics so that it readily parts with its aqueous content. The end product is pumped on prepared plots about one-half acre in area, which are leveled, drained, and covered with several inches of ashes, the depth of sludge being 18 inches. By drainage and evaporation the water escapes, leaving a firm, inodorous, peat-like solid about 6 inches thick, which is removed.

The results show one-third of the sludge to be destroyed by this exhaustive digestion. The action causes a change in the physcial condition of the sludge from a highly complex colloidal state to a simple and practically noncolloidal state.

The presence of industrial wastes, such as tar, in the sewage at various times interferes with the action, and this condition requires careful attention in order to obtain good results.

Novel application of copper sulphate to basin walls for control of algæ.—George A. Bilkison, Chief Chemist, Water Department, Kansas City, Mo.—Engineering and Contracting, volume 54, No. 19, November 10, 1920, page 469.

The algal growth in seven storage basins, especially along the walls, causes offensive odors and trouble in the meters. Various methods were tried to prevent this growth. A satisfactory method now used

consists of applying a 5 per cent aqueous solution of copper sulphate, by means of a spray, directly to the algal growth on the basin walls after the water elevation in the basin is brought down below the algal line. After such application, a wire brush is used to scrub the walls.

With the use of this method every two months during warm weather the basin walls are kept comparatively free from alge.

A rational program for the prevention of the pollution of our lakes and streams.—Paul Hansen, Consulting Engineer, Chicago, Ill.—
Illinois Medical Journal, volume 38, No. 5, November, 1920, page 404.

A waterway must be regarded as both draining and watering the territory through which it flows. The treatment of polluted material entering a waterway will depend on whether the waterway is used for domestic purposes, fishing, bathing, or to remove industrial wastes. For domestic purposes, the water can be made practically safe by water purification. For bathing and fishing purposes, the quality of water should be similar to that of the best bathing beaches. Signs of pollution should not be evident to the senses. Where fishing is an important activity, the pollution should not be sufficient to harm the fish. For disposal of industrial wastes, waterways should provide sufficient clear water to prevent putrefactive decomposition.

The public does not object to waterway pollution to a limited degree. What really is wanted is clean waterways containing no pollution which will unduly jeopardize a reasonable use of our waterways by riparian owners or by the general public. It is a matter which can be effectively and satisfactorily handled by State departments of health, as has been proved in the State of Ohio and many other States. Technically speaking, the limitation of water pollution is best worked out when under the supervision of some expert authority operating under adaptable general laws which represent in broad terms the will of the people.

PRINCIPAL CAUSES OF DEATH AMONG INSURED WAGE EARNERS.

COMPARISONS, BY COLOR, OF THE DEATH RATES FOR THE THIRD QUARTERS AND THE FIRST NINE MONTHS OF 1918, 1919, AND 1920.

Among the 13,000,000 (approximately) insured wage earners in the industrial department of the Metropolitan Life Insurance Co. during the first nine months of 1920, the death rate was 10.2 per 1,000, or 9 per cent lower than the rate for the corresponding period of 1919. This suggests that, barring possible severe epidemics in the last quarter, 1920 will have an even better mortality rate than the record-breaking figure for 1919. The low death rate for tuberculosis

is the outstanding feature in this mortality experience. As compared with the data for the same period in 1919, the mortality was much lower this year from influenza, pneumonia, and external causes, typhoid fever, diarrhea and enteritis, and Bright's disease.

The principal epidemic diseases of children showed higher death rates this year than last. The high figures for diphtheria during the summer indicate that we shall have, perhaps, a still more unfavorable mortality record for this disease during the colder weather if steps are not taken to protect susceptibles.

In a group of eight American cities the number of deaths from puerperal diseases per 1,000 births was 6.3 during the first six months of 1920, as compared with 5.5 in 1919. This is an increase of 15 per cent.

Death rates (annual basis) per 100,000 persons exposed—Third quarters of 1918, 1919, and 1920 compared, by color, for principal causes of death.

[Industrial Department, Metropolitan Life Insurance Co.]

		Death rat	es per 100,	000 persons	exposed.		
Cause of death.		White.		Colored.			
	July- Sept., 1920.	July- Sept., 1919.	July- Sept., 1918.	July- Sept., 1920.	July- Sept., 1919.	July- Sept., 1918.	
All causes of death	709.9	747.2	884.0	1,232.0	1,379.7	1,575.2	
Typhoid fever. Measles Scarlet lever Whooping cough Diphtheria and croup Influenza Tuberculosis—all forms. Tuberculosis—all forms. Tuberculosis meningitis Other forms of tuberculosis. Meningitis—total. Cerebral henorrhage, apoplexy Organic diseases of heart Total respiratory diseases Bronchitis Broncho-pneumonia Pneumonia—lobar and undefined Other diseases of respiratory system Diarrhea and enteritis. Under 2 years 2 years and over Nephritis and Bright's disease. Total puerperal state Puerperal septicemia Puerperal septicemia Puerperal albuminuria and convulsions Other diseases of puerperal state.	5.5 13.7 100.3 6.0 6.0 5.0 4.4 45.2 83.9 83.9 83.9 83.9 10.5 13.1 13.1 158.5 7.7 5.2	8.8 2.3 2.7 3.5 14.6 9.8 114.4 101.6 7.0 5.5 4.7.4 81.8 34.3 11.7 27.8 13.1 14.2 13.2 13.2 13.2 13.2 14.5 13.2 14.5 14.5 15.0 16.0 16.0 16.0 16.0 16.0 16.0 16.0 16	11.8 5.0 1.6 6.0 7.2 13.9 5.2 132.7 117.9 8.1 6.0 6.0 7.7 97.4 50.0 4.9 11.1 12.8 6.2 41.4 19.0 4.9 4.9 4.9 4.9 4.9 4.9 4.9 4.9	16. 8 2. 8 1. 0 6. 8 3. 5 17. 6 272. 4 247. 8 5. 8 18. 3 3. 5 76. 3 152. 2 78. 6 8. 3 16. 8 36. 2 12. 3 16. 8 36. 2 12. 3 16. 8 36. 2 11. 8	17. 7 1. 1 4. 6 4. 6 4. 6 26. 7 329. 1 294. 6 9. 5 25. 0 3. 3 2. 7 75. 7 173. 7 19. 6 42. 5 12. 8 28. 0 11. 7 16. 7 12. 8 23. 7 12. 8	36.1 1.7 16.9 6.4 8.4 372.5 311.4 9.6 21.5 7.6 4.9 94.8 189.3 100.3 18.6 7 16.0 41.9 916.0 25.9 9.0 4.9 9.0 4.9 9.0 8.0 8.0 9.0 9.0 9.0 9.0 9.0 9.0 9.0 9.0 9.0 9	
Total external causes a Suicides. Homicides Accidental and unspecified violence b Accidental drowning. Automobile accidents. War deaths. All other and ill-defined causes of death	80.1 6.3 3.8 69.7 13.4 15.2 .4 218.3	89.5 7.0 3.7 71.0 15.5 12.3 7.9 225.0	136. 2 8. 9 3. 6 84. 0 17. 5 12. 8 39. 7 237. 3	103.7 3.0 28.9 71.6 18.0 8.8 .3 338.0	122.0 5.2 36.8 77.3 18.5 8.4 2.7 353.1	132.3 4.9 30.0 95.4 13.3 7.9 2.0 388.5	

a Includes "war deaths."

b Excludes "war deaths."

Death rates (annual basis) per 100,000 persons exposed—First nine months of 1918, 1919, and 1920, compared, by color, for principal causes of death.

[Industrial Department, Metropolitan Life Insurance Co.]

		Death ra	tes per 100	,000 person	ıs exposed.		
Cause of death.		White.		Colored.			
·	January- Septem- ber, 1920.	January- Septem- ber, 1919.	January- Septem- ber, 1918.	January- Septem- ber, 1920.	January- Septem- ber, 1919.	January- Septem- ber, 1918.	
All causes of death	955. 6	1,051.8	1,027.8	1,539.1	1,656.9	1,821.1	
Typhoid fever	10.9	5.9 4.0 4.1	8.2 11.3 4.3	10.8 4.5	13.3 2.4 .3	23.3 7.0 .7	
Whooping cough	7. 0 20. 7	3.3 18.8	8.7 18.4	8.5 5.2	3.0 5.8	16.7 7.5	
Influenza. Tuberculosis, all forms. Tuberculosis of lungs.	121.6	120.3 138.0 124.4	12.3 160.6 144.1	101.9 297.6 272.3	152. 6 329. 4 298. 8	31. 2 405. 6 369. 4	
Tuberculous meninaitis Other forms of tuberculosis. Meningitis, total	6.3 6.1	7.0 6.6 7.4	9.1 7.3 9.6	6.3 19.0 7.3	10.3 20.4 5.2	10. 4 25. 8 9. 6	
Cerebrospinal meningitis Cerebral hemorrhage, apoplexy	5. 2 56. 7	5. 9 54. 9	6.3 59.4	6. 2 86. 2	4.7 87.4	6. 1 95. 2	
Organic diseases of heart	112.1 131.9 8.6	107.7 146.2 8.5	123.3 131.9 9.4	175. 4 216. 6 12. 2	180.8 235.1 11.7	210.6 277.5 15.8	
Broncho-pneumonia Pneumonia, lobar and undefined	38.6	39. 4 89. 7 8. 6	30. 2 82. 9 9. 3	46.3 143.9 14.3	49. 1 159. 5 14. 8	47. 1 196. 8 17. 8	
Other diseases of respiratory system Diarrhea and enteritis Under 2 years	15.5 7.1	16.6 7.8	23.7 12.1	14.8 4.8	19.6 6.5	25. 1 8. 9	
2 years and over	8.3 72.1 23.1	8.8 73.9 19.8	11.6 85.2 17.0	10. 0 128. 9 30. 5	13. 1 136. 3 25. 1	16.3 168.3 27.4	
Puerperal septicemia Puerperal albuminuria and convulsions. Other diseases of puerperal state	7.9	5.9 4.5	7.0 4.3	12.8 6.9	11.5 5.0	11.4 7.8	
Other diseases of puerperal state Total external causes	10.3 67.6 6.1	9.4 97.5 7.5	5. 7 105. 6 7. 7	10.8 91.1 3.7	8.7 116.4 5.0	8. 2 123. 8 5. 3	
Homicides	3. 2 57. 7 7. 2	3.7 63.2	3.4 74.0	22.8 64.3 9.7	32.1 69.2	28. 1 90. 1	
Automobile accidents	10.3	(c) 23.1	(c) 20.4	5.8	(c) (c) 10.2	(e) 2. 2	
All other and ill-defined causes of death	235.6	233. 4	248.3	358.9	344.3	391.7	

a Includes war deaths.

b Excludes war deaths.

c Data unavailable.

DEATHS DURING WEEK ENDED NOV. 20, 1920.

[From the "Weekly Health Index," Nov. 23, 1920, issued by the Bureau of the Census, Department of Commerce.]

Deaths from all causes in certain large cities of the United States during the week ended Nov. 20, 1920, infant mortality (per cent), annual death rate, and compurison with corresponding week of preceding years.

. *	Population		ded Nov. 1920.	Average		of deaths 1 year.
City.	Jan. 1, 1920, sub- ject to revision.	Total deaths.	Death rate.1	death rate per 1,000.2	Week ended Nov. 20, 1920.	Previous year or years.2
Akron, OhioAlbany, N. Y	208, 435 113, 344	40 23	10.0 10.6	³ 8.6 C 13.9	12.5	8 11.7 C 3.3
Atlanta, Ga	200,616	54	14.0	C 13.2	16.7	C 6.0
Baltimore, Md	733,826	193 56	13.7 16.4	A 15.5 A 18.3	16.6 17.9	A 13.4 A 11.2
Birmingham, AlaBoston, Mass	178, 270 747, 923	192	13.4	A 14.9	15.6	A 15.8
Bridgeport, Conn	143, 152	. 26	9.5	A 14.7	15.4	A 17.1
Buffalo, N. Y	506,775	131	13.5	C 12.9	16.8	C 15.3
Bridgeport, Conn Buffalo, N. Y	109, 456	29	13.8	A 15.1	6.9	A 12.7
UIIICA20. III	2,101,100	576 88	11.1 11.4	A 12.7 C 14.2	13.4 6.8	A 17.5 C 11.0
Cincinnati, Ohio	401, 247 796, 836	155	10.1	C 9.9	12.3	Č 18.1
Columbus, Ohio	796, 836 237, 031 158, 976 153, 830	71	15.6	C 15.1	15.5	C 10.3
Dallas Tex	158,976	71 37	12. 1	A 11.4	13.5	A 13.8
Dayton, Ohio	153,830	26	8.8	C 9.6	11.5	C 21.4
Denver, Colo	256,491	75 206	15. 2 10. 8	A 14.6	12.0 24.3	
Detroit, MichFall River, Mass	993, 739 120, 485	33	14.3	C 13.4	24.3 24.2	C 41.9
Cound Danida Wish	137,634	32	12. 1	č îi i	15.6	C 27.6
Hartford, Conn	138,036	26	9.8		19. 2	
oranic Raines, Michael Raines,	138, 276	25	9.4		12.0 16.9	C 11.7
Indianapolis, Ind	314, 194 298, 079	65 56	10.8 9.8	C 10.1 C 13.7	21.4	C 11.7 C 24.4
Kansas City, Kans	101, 177	27	13.9	0 13.7	25.9	0 24.4
Kansas City. Mo	321,410	92	14.8	C 12.7	12.0	C 9.0
LOS Angeles, Cami	576,673	161	14.6	A 12.9	9.3	A 7.8
Louisville, Kv	234, 891	65 29	14. 4 13. 4	C 14.7 A 15.2	15.4 20.7	C 10.6 A 21.5
Lowell, Mass	112,479 457,147	111	12.7	A 11.0	15.3	A 23.4
Morrospolic Minu	380,582	87	11.9	C 12.7	11.5	C 14.1
Nashville, Tenn	118,342	35	15.4	C 13.3	14.3	C 6.7
Nashville, Tenn Newark, N. J New Bedford, Mass New Hayen, Conn	414,216	95	12.0 9.9	C 10.8 A 14.2	23.2 26.1	C 12.9
New Bedlord, Mass	121, 217 162, 519	23 37	11.9	A 14.2 C 12.6	8.1	A 17.3 C 5.1
New Orleans, La	387, 219	134	18.0	A 19.7	8.2	A 12.8
New York, N. Y	5,620,048	1,166	10.8	C 10.5	13.1	C 12.3
Norfolk, Va Oakland, Calif	115,777 216,361	25	11.3		20.0	
Oakland, Calif	216, 361 191, 601	39 46	9.4 12.5	A 12.1 C 12.1	12.8 19.6	A 9.8 C 11.4
Omaha, NebrPhiladelphia, Pa	1,823,158	443	12.7	3 14.5	14.4	3 14.6
Pitteburgh .	588, 193	179	15.9	C 15.2	15.6	C 13.5
Portland, Oreg. Providence, R. I. Richmond, Va. Rochester, N. Y. St. Louis, Mo.	258, 288	49	9.9	C 10.8	12.2	C 1.9
Providence, R. I	237, 595	62	, 13.6	C 13.2 C 13.5	12.9 16.2	C 6.7 C 6.8
Richmond, Va	171,667 295,750	37 52	11.2 9.2	C 13.5 C 9.8	5.8	C 14.5
Rt Louis Mo	772,897	184	12.4	C 11.4	14.7	C 13.1
st. Paul, Minn Salt Lake City, Utah San Francisco, Calif.	231,680	47	10.4	C 14.3	8.5	C 15.6
Salt Lake City, Utah	118,110	25	11.0	A 13.2	12.0	C 7.6
San Francisco, Caul	506, 676 315, 652	128 59	13. 2 9. 7	C 15.1 A 8.6	9.4 8.5	A 12.6
Inokana Wash	104, 204	31	15.5	A 8.6 C 9.5	6.5	C 0.0
Spokane, Wash pringfield, Mass yracusz, N. Y	129,338	29	11.7		20.7	
Syracuse, N. Y	171,647	36	10.9	C 13.8	5.6	C 15.6
Polodo Onio	243, 164	59 34	12.7 14.9	A 13.3 A 20.1	16.9 30.6	A 13.5 A 15.9
Washington D C	119, 289 437, 571	119	14.9	A 15.6	5.0	A 10.5
Trenton, N. J. Washington, D. C. Wilmington, Del.	110, 168	34	16.1	C 7.2	17.6	
worcester, mass	179,754	53	15.4	C 11.7	15.1	C 17.5
Yonkers, N. Y	100, 176	15	7.8	A 11.5	13.3	A 18.8
Youngstown, Ohio	132, 358	32	12.6		18.8	

Summary of information received by telegraph from industrial insurance companies for week ended Nov. 20, 1920.

Policies in force	45, 212, 203
Number of death claims	
Death claims per 1,000 policies in force, annual rate	8. 5

Annual rates per 1,000 population.
 "A" Indicates data for the corresponding week of the years 1913 to 1917, inclusive. "C" indicates data for the corresponding week of the year 1919.
 Data are based on statistics of 1915, 1916, and 1917.

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.

UNITED STATES.

CURRENT STATE SUMMARIES.

Telegraphic Reports for Week Ended Nov. 27, 1920.

These reports are preliminary and the figures are subject to change when later returns are received by the State health officers.

ALABAMA.		CONNECTICUT.	
Ca	ses.	C	ases.
Diphtheria	22	Cerebrospinal meningitis	. 2
Hookworm	29	Chicken pox	. 39
Poliomyelitis	1	Diphtheria:	
Scarlet fever.		Bridgeport	. 12
Smallpox	8	Bristol	
Tetanus	1	Hartford	. 8
Tuberculosis	_	New Britain	
Typhoid fever		New Haven	. 16
1 ypnoru tever	14	Scattering	. 38
		Dysentery (bacillary)	. 1
ARKANSAS.		Influenza	. 28
Chicken pox	5	Measles:	
Diphtheria	28	Putnam (city)	. 31
Influenza		Scattering	. 28
Malaria		Mumps	. 19
Measles.		Pneumonia (lobar)	. 16
	7	Poliomyelitis	. 1
Pellagra	11	Scarlet fever:	
Scarlet fever		Bridgeport	. 14
Smallpox	3	Meriden (city)	. 12
Trachoma	2	New Haven.	. 14
Tuberculosis	12	Scattering	. 54
Typhoid fever	10	Septic sore throat	. 1
Whooping cough	17	Tuberculesis (all forms)	. 46
		Typhoid fever	. 5
CALIFORNIA.		Whooping cough	
Califolina,			
Cerebrospinal meningitis	1	DELAWARE.	
Influenza	7	Cerebrospinal meningitis—Wilmington	. 2
Smallpox:	•	Chicken pox	
Fullerton	15	Diphtheria	. 6
Lompoc	19	Measles	
		Pneumonia	. 5
Orange	8	Scarlet fever	
Richmond	17	Smallpox	. 2
Sacramento	10	Tuberculesis:	
San Diego County	11	Wilmington	
San Francisco	37	Scattering	
Scattering	72	Typhoid fever	
Typhoid fever	6	Whooping cough	. 18
	(20	99\	

FLORIDA.	INDIANA.
Cases	Cases.
Cerebrospinal meningitis.	
Diphtheria	
Influenza	•
Malaria	· · ·
Scarlet fever	1
Smallpox	
Typhoid fever	
GEORGIA.	Cerebrospinal meningitis—Decorah
	Diphtheria
Cerebrospinal meningitis	
Chicken pox	
Dengue	1 -
Diphtheria55)
Dysentery (amebic)	
Dysentery (bacillary)	Scattering 65
Hookworm	KANSAS.
Influenza. 13 Malaria. 34	
	Cerebrospinal meningitis 1
Measles 9 Mumps 2	Chicken pox
Paratyphoid fever.	Diphtheria
Pneumonia. 9	Influenza
Poliomyelitis. 1	Leprosy 1
Scarlet fever. 23	Measles
Septic sore throat	Mumps 5 Pellagra 1
Smallpox. 25	Pneumonia. 22
Tuberculosis (pulmonary)	Poliomyelitis 1
Typhoid fever	Scarlet fever. 182
Whooping cough	Smallpox. 34
	Trachoma 1
ILLINOIS.	Tuberculosis 13
	Typhoid fever 23
Cerebrospinal meningitis:	Whooping cough
Chicago	
	LOUISIANA.
Diphtheria: Chicago	Cerebrospinal maningitis
East St. Louis. 10	Diphtheria
Elgin. 9	Scarlet fever. 15
Germantown9	Smallpox. 11
Scattering	
Influenza	MAINE.
Lethargic encephalitis - Kankakee 1	Chicken pox. 18
Pneumonia	Diphtheria. 15
Poliomyelitis:	Influenta. 13
Alten 1	Measles
Chicago 1	Mumps
Cobden1	Pneumonia. 2
Crawford County-Montgomery Township. 1	Peliomyclitis—Sanford 1
Herrin	Scarlet fever
Madison County—Leef Township. 1 White Hall 1	Septic sere throat
VV 11100 121001	Smallpox4
Scarlet fever: Chicago	Tuberculosis. 7
East Peorit. 10	Typheid fever
Springfield 45	Whooping cough
Scattering 92	MARYLAND.
Smallpox:	MANILAND.
Gillespie	Cerebrospinal meningitis
Carrent Land	Cerebrospinal meningitis. 1 Chicken pox. 57
Olmey 12	Chicken pox. 57
Olney 12 Virginia 18 Scattering 53	Chicken pox. 57 Diphtheria 96

MARYLAND—continued.	ases.	NEBRASKA—continued.	
		Poliomyelitis:	ases
Influenza			
Malaria		Bancroft	•
Mumps		Filley	. 10
Ophthalmia neonatorumPellagra		Smalipox.	. 3
Pneumonia (all forms)		Tuberculosis	. 2
Poliomyelitis		Typhoid fever	• :
Scables.		Whooping cough	• }
Scarlet fever		whooping cough	• '
Septic sore throat	- 1	NEW JERSEY.	
Smallpox			
Tuberculosis		Chicken pox	. 173
Typhoid fever		Diphtheria	. 234
Vincent's angina		Influenza	. 13
Whooping cough		Malaria	. 1
whooping congu		Measles	. 71
MASSACHUSETTS.	1	Pneumonia.	
Anthrax	1	Scarlet fever	. 127
Cerebrospinal meningitis	ī	Typhoid fever	7
Chicken pox	Ξ.	Whooping cough	. 109
Conjunctivitis (suppurative)	3	NEW MEXICO.	
Diphtheria	169	m.,	
German measles.	4	Chicken pox	. 20
Influenza	18	Conjunctivitis	. 2
Malaria	2	Diphtheria	
Measles	337	German measles	
Mumps	32	Influenza	
Ophthalmia neonatorum	27	Measles	
Pneumonia (lobar)	81	Mumps	
Poliomyelitis	7	Pneumonia	
Scarlet fever	157	Scarlet fever.	
Septic sore threat	2	Smallpox	
Trachoma	1	Tuberculosis	
Tuberculosis (all forms)	156	Typhoid fever	. 8
Typhoid fever	17	Whooping cough	. 5
Whooping cough	102	NEW YORK.	
MINNESOTA.		(Exclusive of New York City.)	1
		Cerebrospinal meningitis:	·
Poliomyelitis	3	Little Falls.	. 1
Smallpox:		Newburgh	
Shorburne County—	10	Diphtheria	
Santiago Township	10 16	Influenza	
Scattering	10	Lethargic encephalitis	
MISSISSIPPI.	- :-	Measles	758
Diphtheria	46	Pneumonia	
Scarlet fever	24	Poliomyelitis:	
Smallpox	3	Endicott	1
Typhoid fever	6	Jamestown	1
	1	Scarlet fever	265
MONTANA.		Smallpox	2
Diphtheria	4	Typhoid fever	29
Poliomyelitis—Corvallis			247
Scarlet fever	1	Whooping cough	
_ =	1 21		
Smallpox	20	Whooping cough	
SmallpoxTyphoid fever		NORTH CAROLINA. Chicken pox	43
Typhoid fever	20	NORTH CAROLINA. Chicken pox	
Typhoid fever	20 9	NORTH CAROLINA. Chicken pox. Diphtheria. German measles.	102 2
Typhoid fever NEBRASKA. Chicken pox	20	NORTH CAROLINA. Chicken pox. Diphtheria. German measles. Measles.	102
Typhoid fever	20 9 51	NORTH CAROLINA. Chicken pox. Diphtheria. German measles. Measles. Poliomyelitis.	102 2 49 2
Typhoid fever	20 9 51 14	NORTH CAROLINA. Chicken pox. Diphtheria German measles. Measles. Poliomyclitis Searlet fever.	102 2 49 2 56
Typhoid fever NEBRASKA, Chicken pox Diphtheria: Omaha Scattering	20 9 51 14 19	NORTH CAROLINA. Chicken pox. Diphtheria German measles Measles. Poliomyelitis Searlet fever. Septie sore throat	102 2 49 2 56 7
Typhoid fever NEBRASKA. Chicken pox. Diphtheria: Omaha. Scattering Influenza.	20 9 51 14 19 4	NORTH CAROLINA. Chicken pox. Diphtheria. German measles Measles. Poliomyelitis Searlet fever Septie sore throat Smallpox.	102 2 49 2 56 7 28
Typhoid fever NEBRASKA, Chicken pox Diphtheria: Omaha Scattering	20 9 51 14 19	NORTH CAROLINA. Chicken pox. Diphtheria German measles Measles. Poliomyelitis Searlet fever. Septie sore throat	102 2 49 2 56 7 28 19

ощо.

WASHINGTON—continued.

Cas Cas	ses.	wasantoron continuou.	ses.
Smallpox—Williams County	92	Mumps	3
ondipos winding councy :		Pneumonia	
SOUTH DAKOTA.		Scarlet fever.	32
	_	Smallpox	119
Chicken pox	5	Tuberculosis	1
Diphtheria	23	Typhoid fever	5
Influenza	1	Whooping cough.	7
Measles	26	The state of the s	•
Pneumonia	6	WEST VIRGINIA.	
Scarlet fever	14	Diphtheria:	
Smallpox	32	Wheeling.	18
Tuberculosis	2	Scattering	
Typhoid fever	1	Measles.	
		Searlet fever.	13
TEXAS.		Smallpox:	
G I I I I I I		Sistersville	13
Cerebrospinal meningitis	10	Weston	
Chicken pox		Scattering	
2 1p.101101111111111111111111111111111111	116	Typhoid fever.	
Influenza	19	Typhote Rever	•
Measles	13	wisconsin.	
Pneumonia	19	Milwaukee:	
Scarlet fever	33	Cerebrospinal meningitis	1
Smallpox	28	Chicken pox	14
Typhoid fever	13	Diphtheria	96
VERMONT.		Influenza.	1
		Measles	7
Chicken pox	34	Scarlet fever.	39
Diphtheria	8	Smallpox.	16
Measles	8	Tuberculosis	15
Mumps	28	Whooping cough	6
Pneumonia	2	Scattering:	v
Searlet fever	16	_ =	100
Smallpox	7	Chicken pox	72
Typhoid fever	1	Diphtheria.	
Whooping cough	37	German measles.	1 24
VIRGINIA.		Influenza.	
		Measles	74 3
Smallpox-Lec County	4	Poliomyelitis	99
Washington.		Scarlet fever	
		Smallpox	
Chicken pox	75	Trachoma	6
Diphtheria	43	Tuterculosis	18
German measles	1	Typhoid fever	100
Measles	24	Whooping cough	120
	n.		
District of Columbia and Kentucky	Ke	eports for Week Ended Nov. 20, 1920	•
DISTRICT OF COLUMBIA.		KENTUCKY—continued.	
Cap		Ca	ses.
Chicken box	26	Mumps	
Dinhtheria	38	Ophthalmia neonatorum	1
Influenza	4	Pneumonia	
Measles	15	Poliomyelitis—Grant County	2
Scarlet fever	16	Scarlet fever:	
Smallpox	1	Campbell County	9
Tuberculosis	23	Jefferson County	11
Typhoid fever	2	Scattering	16
Whooping cough	20	Septic sore throat	3
	1	Smallpox:	
KENTUCKY.	1	Daviess County	11
Chicken pox	11	Scattering	13
Diphtheria:	1	Tonsillitis	4
Allen County	9	Trachoma	7
Jefferson County	31	Tuberculosis	13
	58	Typhoid fever	23
Influenza	29	Whooping cough	7

SUMMARY OF CASES REPORTED MONTHLY BY STATES.

The following summary of monthly State reports is published weekly and covers only those States from which reports are received during the current week:

State.	Cerebrospinal meningitis.	Diphtheria.	Influenza.	Malaria.	Measles.	Pellagra.	Poliomyelitis.	Scarlet fever.	Smallpox.	Typhoid fever.
October, 19?0. Alabama. Arizona Indiana Maryland Minnesota. Mississippi New Jersey North Dakota. Oregon Rhode Island South Carolina. Washington	9 2 4 2 14 1	265 15 378 302 371 543 740 195 49 91 516	13. 122 7 585 37 24 4 30 26	21 16,015 10	7 76 65 49 25 67 104 55 87 24 14	323	3 11 7 4 13	88 16 563 197 267 281 326 26 69 47 20 144	36 1 211 389 56 127 20 184	78 15 132 164 98 212 88 43 21 10 41 73

RECIPROCAL NOTIFICATION.

Minnesota—October, 1920.

Cases of communicable diseases referred during October, 1920, to other State health departments by the Department of Health of the State of Minnesota.

	, T	
Disease and locality of notification.	Referred to health authority of—	Why referred.
Diphtheria: East Grand Forks, Polk County.	Grand Forks, N. Dak	Patient works in Grand Forks, N. Dak.
Typhoid fever: Wilton Township,	Libby, Lincoln County, Mont	Patient lived at Libby 3 weeks previ-
Beltrami County. Turtle River Town- ship, Beltrami	Forest River, Walsh County, N. Dak.	ous to first symptoms. Patient associated with another typhoid patient in Forest River.
County. Saum, Beltrami	do	Patient did threshing on farms near
County. Detroit, Becker County.	Colgate, Steele County, N. Dak	Forest River. Patient worked with threshing crew near Colgate.
Bricelyn, Faribault	Elsie, Perkins County, Nebr	Patient worked on farm near Elsie 3 weeks previous to first symptoms.
County. Minneapolis, Henne- pin County.	Roberts, St. Croix County, Wis	
Do	Vienna, Clark County, S. Dak Bordett, Alberta, Canada	Patient contracted typhoid at Vienna. Patient did farming at Bordett 3 weeks
Milaca, Mille Lacs County.	Traill County, N. Dak	weeks previous to mist symptoms.
Little Falls, Morri-	Gardner, Cass County, N. Dak	Patient worked on farm at Gardner.
son County. Worthington, Nobles County.	Lenox, Taylor County, Iowa	Patient left for Lenox with typhoid.
Do	do	Do. Specimen examined at Duluth posi-
Duluth, St. Louis County.	New Rockford, Eddy County, N. Dak.	tive.
Tuberculosis: Mayo Clinic, Rochester, Olmsted	Stuttgart, Arkansas County, Ark	15 advanced, 12 moderately advanced, 1 stage of disease not given, 3 appar- ently arrestod cases left Mayo Clinic
County. Do Do	Elk River, Clearwater County, Idaho.	for homes.
Do	Chicago, Cook County, III	
Do	Ganton, Fulton County, Ill	
Do Do		
Do	Chrinda, Page County, Iowa	
Do	Sioux City, Woodbury County, Iowa.	
Do Do		
Do	Avoca, Pottawattamie County, Iowa	
Do	Hampton, Franklin County, Iowa	
D0	Cedar Falls, Black Hawk County, Iowa	

Cases of communicable diseases referred during October, 1920, to other State health departments by the Department of Health of the State of Minnesota—Continued.

Disease and locality of notification.	Referred to health department of—	Why referred.
Tuberculosis—Contd. Mayo Clinic, Rochester, Olmsted County.	Webster City, Hamilton County, Iowa	
Do Do Do	Detroit, Wayne County, Mich	
Do Do	Lena, Arthur County, Nebr Las Cruces, Dona Ana County, N. Mex. Manfred, Wells County, N. Dak	
Do Do Do	Akron, Summit County, Ohio	
Do Pokegama Sanita- rium, Pine County.	Wash. Webster, Burnett County, Wis Fullerton, Ontario, Canada West Colorado Springs, El Paso	3 improved, 2 unimproved cases left. Pokerama Sanitarium for homes.
Do	Leiters Ford, Fulton County, Ind Savage, Richland County, Ment Fargo, Cass County, N. Dak New Richmond, St. Croix County,	Toacgama Samearium for nomes.
Oronoco Sanitarium, Rochester, Olm- sted County.	Wis. Corral Coulce, Mont	1 advanced and 1 improved case left Oronoco Sanitarium for homes.
Do Minnesota State Şanitarium, Cass	Marinette, Marinette County, Wis Youngwood, Westmoreland County, Pa.	Left for home unimproved.
County. Riverside Sanato- rium, Yellow Medicine County.	Niagara, Marinette County, Wis	Left for home as an improved case.

ANTHRAX.

Washington-October, 1920.

During October, 1920, one case of anthrax was reported in Washington.

CEREBROSPINAL MENINGITIS.

City Reports for Week Ended Nov. 13, 1920.

The column headed "Average cases" gives the average number of cases reported during the corresponding week of the years 1915 to 1919, inclusive. In instances in which the information is not available for the full five years, the average includes from one to four years.

	Aver-	1920			Aver-	1929	
Place.	age cases.	Cases.	Deaths.	Place.	age cases.	Cases.	Deaths.
California: Oakland Sacramento San Bernardino San Francisco Santa Bartara Connecticut: New Britain Illinois: Chicazo Danville Massachusetts: Adams Brockton Lynn Michican: Flint Port Huron	0 (1) 0 1 0 0	1 1 1 1 1 1 1	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Minnesota: Duluth Missouri: Kan-as City. New Jer-ey: Orange. New York: New York: Rhode Island: Providence. Texas: Beaumont. Dallas. Virginia: Richmond.	(¹) (¹) 0 4 (¹) (¹)	1 1 1 6 1	2 1 1 1

DENGUE.

Alabama and Georgia.

During October, 1920, 45 cases of dengue were reported in Alabama. During the week ended November 13, 1920, 19 cases were reported at Savannah, Ga.

DIPHTHERIA.

See Telegraphic weekly reports from States, p. 2922; Monthly summaries by States, p. 2926; and Weekly reports from cities, p. 2935.

INFLUENZA.

City Reports for Week Ended Nov. 13, 1920.

Place.	Cases.	Deaths.	Place.	Cases.	Deaths.
Alabama:			Missouri:	-	
Mobile	1	2	Joplin	1	İ
Arkansas:		.	Kansas City	2	
Hot Springs	1		St. Louis	4	
California:	•		Montana:	-	
Los Angeles	2		Montana: Missoula	1	1
San Francisco	4	• • • • • • • • • • • • • • • • • • • •	New Hampshire:		
Santa Barbara		i	Keene	1	
		1	Now Topogra		
Vallejo	_	1	New Jersey: Trenton	4	l
Connecticut: Hartford	1		New York:	4	
Hartiord	5		Binghamton		ł
New Britain	5		Bingnamton	2	
Georgia:	_		Buffalo	2	
Atlanta	2		Jamestown		
Columbus	2		New York	28	
Illinois:	_		Ohio:		
Chicago	7	2	Cincinnati	1	
Indiana:	1		Cleveland	2	2
Indianapolis		2	Oklahoma:		
Marion	1		Tulsa	2	
Kansas:	•		Pennsylvania:		
Parsons	3		Philadelphia		1
Kentucky.			South Carolina:		-
Covington	1		Spartanburg		1
Maryland:		1	Mannaggae !		_
Baltimore	1	2	Memphis	1	
Cumberland	8	-	Nashville.		1
Massachusetts:			Texas:		-
Boston	5		Dallas	8	1
Cambridge			Virginia:	-	•
Methuen	î		Lynchburg	1	
Quincy		• • • • • • • • • • • • • • • • • • • •	Washington:	- 1	• • • • • • • • •
Michigan:			Spokane.	1	
Detroit	2		Wisconsin:	- 1	
Dest Off			Kenosha	1	
			денозно	- 1	

LEPROSY.

Indianapolis, Ind., and West Orange, N. J.

During October, 1920, a case of leprosy was reported at West Orange, N. J., in the person of T. M., white, male, aged 30, a native of Greece. The disease was diagnosed clinically October 26 as tuber-cular leprosy. The patient escaped.

During November, 1920, a case of leprosy was reported at Indianapolis, Ind., in the person of R. B., white, male, aged 45, a Spanish-American War veteran, who was in the Philippines two years beginning in 1899. The disease was diagnosed clinically November 8 and verified bacteriologically November 15, 1920, as maculoanesthetic leprosy. The patient is quarantined at his home.

LETHARGIC ENCEPHALITIS.

Illinois, Maryland, and Oregon.

During October, 1920, one case of lethargic encephalitis was reported in Maryland, and one case in Oregon. During the week ended November 6, 1920, one case was reported at Portland, Oreg., and during the week ended November 13, 1920, one case was reported at Evanston, Ill.

MALARIA.

City Reports for Week Ended Nov. 13, 1920.

Place.	Cases.	Deaths.	Place.	Cases.	Deaths.
Alabama: Birmingham Arkansas: North Little Rock California: Sacramento. San Francisco Georgia: Atlanta. Savannah	1 1 3 2	2 1	Louisiann: New Orleans South Carolina: Charleston. Tennessee: Memphis. Texas: Beaumont. Dallas. Waco.	3	1

MEASLES.

See Telegraphic weekly reports from States, p. 2922; Monthly summaries by States, p. 2926; and Weekly reports from cities, p. 2935.

PELLAGRA.
City Reports for Week Ended Nov. 13, 1920.

Place.	Cases.	Deaths.	Place.	Cases.	Deaths.
Alabama: Montgomery Massachusetts: Newburyport North Carolina: Raleigh	1	1	Tennessee: Memphis. Nashville. Texas: Dallas.	2 1	1 1 1

PLAGUE.

Human Cases of Plague Reported.

Place.	Period covered.	Cases.	Deaths.	Remarks.
Florida:	1920.	••		
Pensacola	May 31 to Aug. 31 Sept. 1 to Nov. 27	10 0	0	
Louisiana: New Orleans	1919. Oct. 22 to Dec. 31	12	4	
	1920. Jan. 1 to Apr. 30 May 1 to Aug. 31 Sept. 1 to Nov. 27	0 7 0	0 3 0	
Texas: Beaumont	June 19 to Aug. 20	14	5	
Galveston	Aug. 21 to Nov. 27	0 16	0 10	
	Oct. 21 to Nov. 13 Nov. 14	0 1	0	
Port Arthur	Nov. 15–27 July 7	0 1	0	From Galvesten.

PLAGUE—Continued.

Plague-Infected Rodents.

Place.	Period covered.	Rodents found plague infected.	
Florida: Pensacola	June 28 to Sept. 19. Sept. 20 to Nov. 27.	31 0	
Louisiana: New Orleans.	1919. November and December	308	
	1920. January to October . Nov. 1-17. Nov. 18. Nov. 19. Nov. 20-29. Nov. 30.	266 0 1 1 0	
Texas: Beaumont Galveston.	July 1 to Oct. 25. Oct. 26 to Nov. 27. June 21 to Nov. 9.	123 0 61	
Port Arthur	Nov. 10-23 Nov. 24 Nov. 29 Nov. 30 Oct. 25.		

PNEUMONIA (ALL FORMS).

City Reports for Week Ended Nov. 13, 1920.

Place.	Cases.	Deaths.	Place.	Cases.	Deaths.
Alabama:			Illinois—Continued.		
Birmingham	1	5	Jacksonville	· .	2
Mobile		1	La Salle		í
Montgomery	•		Oak Park		
	-		Dak Fark		3
Arizona:	ł		Peoria	·····i	ა
Tucson		1		1	· · · · · · · · · · · · · · · · · · ·
California:	i		Indiana:		i
Berkeley	.	1	Evansville		
Los Angeles	. 14	4	Fort Wayne		2
Oakland	. 1	5	Gary		1
Oakland Pasadena		1	Gary Hammond	1	,
Riverside	1	2	HuntingtonIndianapolis	<i>.</i>	1
Sacramento		l ī	Indianapolis		8
		. <u> </u>	Kokomo		3
San DiegoSan Francisco	6	7	La Fayette South Bend	1	
Santa Barbara		j	South Rend	•	i
Colorado:		-	Terre Haute		តំ តំ
	i	4	Kansas:		•
Colorado Springs		1 3	Kansas City	4	
Pueblo		1			· · · · · · · · · · · · · · · · · · ·
Connecticut:			Parsons	2	
Bridgeport	4	5	Topeka	2	
		3	Kentucky:	_	
Manchester			Covington	1	
New Britain	l	2 3	Louisville	4	4
New Haven		3	Louisiana:		
New London		1	Baton Rouge	1	1
Norwalk		ī	New Orleans		. 8
Waterbury			Maine:		
District of Columbia:		· ·	Lewiston		1
Washington	1 1	15	Maryland:		
Georgia:	1	10	Baltimore	24	9
Atlanta	2	15	Cumberland	3	•
Columbus		10	Massachusetts:	- 1	
		4	Boston	22	14
Savannah		4			11
Aurora	1		Brockton		2
Illinois:	ا ۔۔۔ ا		Cambridge		2
Chicago	135	30	Chelsea		2
Elgin	1	1	Clinton	1	
Evanston	1		Easthampton	1	
Freeport	2	1	Everett	1	

PNEUMONIA (ALL FORMS)—Continued.

City Reports for Week Ended Nov. 13, 1920—Continued.

Place.	Cases.	Deaths.	Place.	Cases.	Deaths.
Massachusetts—Continued.			New York—Continued.		
Massachusetts—Continued. Fail River	1	4	Buffalo	10	5
Haverhill	1		Conoes	1	
Holyoke	2.		Ithaca		1
Lawrence	1		Jamestown	5 2	1
Lowell	1	n. 3 · 2	Lackawanna Lockport	í	
LynnMalden	2	·····i	Widdletown	1	
Maiden	1	1	Middletown	2	i
Mediord	1	1 1 1 1 1 1 E	Newburgh	ĩ	
Methuen New Bedford	3	3	New York	216	92
Newton	3		Peekskill	3	l
Peabody		1	Poughkeepsie	1	1
Pittsfield	2	. 2	Rochester	6	
Plymouth		1	Rome	3	
Quincy		1	Saratoga Springs Schenectady	2	1
Southbridge	1	. 1	Schenectady	3	
SouthbridgeSpringfield	4	1	Syracuse	8	5 2 1
Taunton			Troy	.3	2
Watertown	1	1 6	Yonkers	1	1
Worcester	. 2		North Carolina: Durham		1
Michigan:	. 39	22	Wilmington		1
Detroit Flint	. 39	1	North Dakota:		•
Grand Rapids	3		Grand Forks	3	
Highland Park	ĭ		Ohio:	,	
Kalamazoo	ž	2	Alliance		1
Kalamazoo	1		Chillicothe		2 2
Pontiac	2	3	Cincinnati	2	2
Port Huron	1	1	Cleveland	11	17
Saginaw	1	1	Columbus	3	4
Sault Stc. Marie	1	1	Cleveland Columbus Dayton Ironton	1	•••••
Minnesota:			Ironton	1	1
Duluth	1	4	Lancaster	4	• • • • • • • • • • • • • • • • • • • •
Hibbing Minneapolis St. Paul	4	3	Maisucid		
Milineapons		4	Middletown New Philadelphia	i	
Missouri:		3	Sandusky		i
Independence	1	2	Springfield		ī
Kansas City		. 7	Titlin	1	
Qt Charles	1 1	1	Toledo	1	3
St. Joseph		3	Oregon:		
Montana:			Portland	••	3
Butte		1	l'ennsylvania:		
Great Falls	1	1	Philadelphia	33	45
Missoula	1	. 1	Rhode Island:		2
Nebraska:		. 5	Providence		. 2
Omaha		Э	South Carolina: Charleston		1
Nevada:	1		Spartanburg		î
Reno			Tennessee:		•
Manchester		1	Memphis		3
New Jersey:		-	Nashville	1	Ğ
Atlantic City	1		Texas:	-	_
Bayonne	ī		Beaumont		1
Relleville	2		Dallas	1	1
Bloomfield	4		Fort Worth Galveston San Angelo Waco		1 1 1
Fort ()range	1		Galveston		1
Elizabeth		1	San Angelo	· · · · · · · · · · ·	1
Gloueester	2		Waco		1
Hackensack	3	2	Utah:	1	2
Harrison	1		Salt Lake City		2
Hoboken Jersey City	1	3	Vermont:		1
Jersey City	5	i	Rutland	1	
Kearny Morristown	1	3	Virginia:	1	
Newark	34	8	Norfolk	î	3
Orange	3	îl	West Virginia:	. •	
Passaic	١	î	West Virginia: Huntington		1
Paterson	2		Morgantown	1	
Perth Amboy		i	Morgantown		4
Plainfield		2 3	Wisconsin:		i
Trenton	12	3	Green Bay		2
New York:		- 1	Kenosha		1
Albany	9		Milwaukee	8	11
Auburn	1		Racine		2
Binghamton	4				l
-		į	i		

POLIOMYELITIS (INFANTILE PARALYSIS).

City Reports for Week Ended Nov. 13, 1920.

The column headed "Average cases" gives the average number of cases reported during the corresponding week of the years 1915 to 1919, inclusive. In instances in which the information is not available for the full five years, the average includes from one to four years.

Place.	A ver- age cases.	1920			Aver-	1920	
		Cases.	Deaths.	Place.	age cases.	Cases.	Deaths.
Alabama: Birmingham California: Los Angeles San Diego Santa Barbara Hilinois: Chicago Maryland: Baltimore Massachusetts: Boston Danvers Leominster Salem Waltham	² 1 (³) (³) 0	1 1 1 2 1 4 2 1 1 1 1 2	i	Michigan: Detroit. Flint. Saginaw Minnesota: St. Paul Missouri: St. Louis. New York: New York North Dakota: Fargo. Rhode Island: East Providence Wisconsin: Eau Claire.	(¹) 0 0 (¹) 3	1 2 1 1 1 13 1	2

RABIES IN ANIMALS.

Memphis, Tenn.—Week Ended Nov. 13, 1920.

During the week ended November 13, 1920, one case of rabies in animals was reported at Memphis, Tenn.

SCARLET FEVER.

See Telegraphic weekly reports from States, p. 2922; Monthly summaries by States, p. 2926; and Weekly reports from cities, p. 2935.

SMALLPOX.

City Reports for Week Ended Nov. 13, 1920.

The column headed "A verage cases" gives the average number of cases reported during the corresponding week of the years 1915 to 1919, inclusive. In instances in which the information is not available for the full five years, the average includes from one to four years.

Place	Aver-	1920		Place	Aver-	1920	
	age cases.	Cases.	Deaths.	r race	age cases.	Cases.	Deaths.
Alabama: Birmingham California: Berkeley Oakland Pasadena Sacramento San Diego San Francisco Santa Cruz	(1) 0 0 0 0 0 (1) 0	1 2 5 1 3 1 5		Colorado: Denver Pueblo. Georgia: Atlanta Idaho: Boise Illinois: Bloomington Chicago	11 1 1 1	7 1 2 6 - 4 3	

¹ Average less than 1.

A verage less than 1.
 Excluding 1916 and 1917, epidemic years.
 Excluding 1916, average less than 1.

SMALLPOX—Continued.

City Reports for Week Ended Nov. 13, 1920—Continued.

Illinois—Continued. Fast St. Louis. 0 2 Fast St. Louis. 0 1 Cevanston. 0 1 Cond. Park. 0 1 Canton. (1) 15 Canton. (1) 16 Canton. (1)		Aver-	19	20		Aver-	19	920
Fast St. Louis	Place.		Cases.	Deaths.	Place.		Cases.	Deaths
Evanston								
Oak Park 0 1 Ohio: Akron 3 19 Indiana: Indianapolis 2 5 Canton (1) 15 Marion 0 1 Cleveland 12 7 Mishawaka 0 4 Dayton 2 1 South Bend 0 12 Findlay (1) 1 Terre Haute 0 6 Middletown 0 1 Iowa: 1 Ccdar Rapids 0 2 Triffin 0 1 Cdar Rapids 0 2 Triffin 0 4 Oklahoma: 1 1 Oklahoma: 1 1 Oregon: 1 1 Indianas: 1 Oregon: 1 1 Indianas: 1 Oregon: 1 Indianas: 1 <td< td=""><td></td><td></td><td></td><td></td><td>Fargo</td><td>(1)</td><td></td><td></td></td<>					Fargo	(1)		
Rockford	Evanston		1		Grand Forks		4	
Indiana:	Oak Park		1			١ .	٠.,	
Indianapolis		0	2					
Marion 0 1 Cleveland 12 7 Mishawaka 0 4 Dayton 2 1 South Bend 0 12 Findlay (1) 1 Terre Haute 0 6 Middletown 0 1 Cowa: 0 2 Tindlay (1) 1 Clinton 0 9 Oklahoma 0 4 Clinton 0 9 Oklahoma: 0 4 Dubuque (1) 8 Oklahoma: 1 1 Kansas: 0 10 New Orleans 1 Oregon: 1 Louisiana: 0 10 South Dakota: 1 New Orleans 1 1 Maine: 1 Uth: South Dakota:	Indiana:	1 -			Canton	(3)		
Mishawaka	Indianapolis	2	5				3	
South Bend.				[<i>-</i>				•••••
Terre Haute	Mishawaka				Dayton			
Iowa Cedar Rapids	South Bend				Findlay		1	••••••
Ccdar Rapids		1 0	. 6					•••••
Clinton					Springheid		Ī	
Dubuque						U	4	
Kansas City	Clinton					_		
New Orleans 10		(')	8			1	1.5	•••••
Detroit						• • • • • • •	1	
New Orleans		10	1	• • • • • • • •				5,79
Maine: James of the property of the pr		ا م				10	8	•••••
Lewiston		0	10					
Michigan:		1 1				יט	3	•••••
Detroit					Utan:		0.5	
Sault Ste. Marie.		ا ما		1	Sait Lake City	2	20	•••••
Minnesota:	Detroit		8	•••••	vermont:		٠.	,
Duluth		0	7			U		•••••
Minneapolis. 10 47 Seattle 6 13 St. Paul 14 8 Spokane 13 25 Tacoma (1) 1 Missouri:		اما			washington:			
St. Paul								• • • • • • • •
Winona 0 5 Tacoma (1) 1				• • • • • • • •				•••••
Yakima				•••••			20	•••••
Independence		0	9	• • • • • • • •	Volcimo		1	•••••
Kansas City 13 15 Bluefield 1 1 St. Louis (') 1 Wisconsin: Green Bay (1) 5 Great Falls 0 2 Marinette 1 3 Missoula 0 7 Missuke 4 21 Nebraska: I. Incoln 3 1 Sheboygan (1) 1 Omaha 20 2 Sheboygan 12 12 Bluefield 1 1 Wisconsin: Green Bay (1) 5 Madison (1) 2 Marinette 1 3 Missuke 4 21 Racine (1) 1 Sheboygan 12 12 Comaha 20 2 12 Comaha 1 Sheboygan 12 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1 Comaha 1						- 1		•••••
St. Louis				• • • • • • •			1	
Montana:				• • • • • • • •		- 1		
Billings		(')		•••••		as l	5	
Great Falls			1		Medicon	X -		******
Missoula 0 7 Milwaukee 4 21 Nebraska: Racine (1) 1 Lincoln 3 1 Sheboygan 12 Omaha 20 2	Creet Falls			• • • • • • • •		(V)	2	•••••
Nebraska: 3 1 Racine				• • • • • • • • • • • • • • • • • • • •				
Lincoln		0	•					******
Omaha	T incoln	9	1			(7)		•••••
				•••••	DLODO'S GAIL	•••••	16	• • • • • • •
		20	- 4		l			
Reno. 0 2		ا ما	9					

¹ Average less than 1.

TETANUS.

City Reports for Week Ended Nov. 13, 1920.

Place.	Cases.	Deaths.	Place.	Cases.	Deaths.
California: Sacramento. Connecticut: Manchester Georgia: Savannah Illinois: Chicago. Massachusetts: Danvers. Michigan: Cadillac.	1	1 1 2 1	Minnesota: Minneapolis. New York: New York North Carolina: Winston-Salem Ohio: Cincinnati Pennsylvania: Philadelphia Texas: Beaumont.	1	1 1 1

TUBERCULOSIS.

See Telegraphic weekly reports from States, p. 2922, and Weekly reports from cities, p. 2935.

TYPHOID FEVER.

City Reports for Week Ended Nov. 13, 1920.

The column headed "Average cases" gives the average number of cases reported during the corresponding week of the years 1915 to 1919, inclusive. In instances in which the information is not available for the full five years, the average includes from one to four years.

Place	Aver-	1	1920	Place.	Aver-	19	920
Place.	age cases.	Cases.	Deaths.	riace.	age cases.	Cases.	Deaths.
Alabama:				Minnesota:			
Birmingham	5	4	1	Minneapolis	2	1	l
Mobile	2	i		St. Cloud	1	3	
Montgomery	(1)	1		St. Paul	(1)	4	
Arkansas:	1		l	Missouri: Kansas City		١,	1
Fort Smith		1		St. Joseph	(¹)	2	
Los Angeles	3	4	1	St. Louis.	7	2	1
Pasadena	0	i		Montana:			
Santa Cruz	0	1		Billings	0	1	1
Colorado:	_		1	Missoula	0	1	ļ
Pueblo Connecticut:	0	3		Nebraska: Omaha	(1)	1	1
Hartford	2	1	2	Nevada:	(-)	•	1 -
New Haven.	ĩ	, 2	1	Reno	1	2	l
Norwich	Ō	1	1	New Hampshire:			
District of Columbia: Washington			1	Keene	0	1	ļ
Washington	8	4.		Manchester	(1)	1	1
Relaware: Wilmington	41	1	2	Portsmouth New Jersey:	(9)	1,	ļ
Georgia:	(1)		•	Atlantic City	(1)	1	
Atlanta	2	2	1	Hoboken	(i)	î.	
Eavannah	· Ō	3	1	Jersey City	0	1	
Illinois [.]			i	Morristown	(1)	1	ļ .
Alton	0	3		New Mexico:			I
Chicago	14	4		Albuquerque New York:	2	4	
Decatur	(1)	i		Albany	2	1	İ
DecaturElgin	(1)	2		Buffalo	4		i
Kankakee	```0	1		Elmira	0	1	
Kewanee	0	1		Ithaca	(1)	4	
Mattoon	1	1		Jamestown	0	2 24	
Indiana: Elkhart	0		1	New York North Tonawanda	(1)	1	
Evansville	(1)	1	î	Schenectady	- 8 1	î	
Fort Wayne	`′3	î	l	Syracuse	(i) (i)	1	
Hammond	0	1		North Carolina:	1	_	
HuntingtonIndianapolis	0	1		Durham	6	1	-
Richmond	4	1	i	Ohio:		1	
Iowa:	• • • • • • • • • •		1	Alliance	ol	2	1
Cedar Rapids	1	1		Ashtabula	0	1	ī
Kansas:	-	_		Canton	(1)	2	
Kansas City	0	1		Cleveland	4	11	1
Kentucky:				Columbus Lancaster	2 0	3	·····i
CovingtonLexington	0	1	•••••	Mansfield	ŏ	2	
Louisiana:	- 1	-	-	Marion		21	
New Orleans	4	3		Newark	1	1	
Maine:				Toledo	4	2	· · · · · · · · ·
Auburn		1	•••••	Oklahoma:	!	1	
Lewiston	•••••	1		Oklahoma City Tulsa	1	3	• • • • • • • •
Baltimore	12	3	1	Oregon:		٠	••••••
Cumberland	2	2		Portland	2	2	
Massachusetts:	-			Pennsylvania:			
Boston.	4	6		Philadelphia	10	5	
Fall River	4	1		South Carolina:		2	
Lawrence	(1)	1	•••••	Charleston Tennessee:	(1)	- 2	•••••
Pittsfield	ō	3		Knoxville	(1)	1	1
Michigan:	- 1			Memphis	(1)	4	-
Ann Arbor	(1)	2		Nashville	4	2	1
Detroit	6	3	2	Texas:	اہ	1	
Grand Rapids	2	1	·····i	Beaumont	0	1	• • • • • •
Holland Kalamazoo	(1)			Utah:	ا د	* 1	• • • • • • •
Muskegon	()	2	·····i	Salt Lake City	1	1	
PontiacSaginaw	(1)	- 1	i	Vermont:	- 1	- 1	
I Untiac	(-) 1.		3. 1	Rutland	01	1	

¹ Average less than 1.

TYPHOID FEVER—Continued.

City Reports for Week Ended Nov. 13, 1920—Continued.

Place.	Aver-	. 1	920	Place	Aver-	19	020
	age cases.	Cases.	Deaths.	Place.	age cases.	Cases.	Deaths.
Virginia: Alexandria. Petersburg. Richmond. Roanoko. Washington: Seattle. West Virginia: Bluefield.	1 1 2 (1) 2 0	1 1 1 1 2		West Virginia—Contd. Charleston Morgantown Parkersburg Wheeling Wisconsin: Janesville Racine	0 1 0 (1)	1 1 1 2 3	2

¹ Average less than 1.

YELLOW FEVER.

Immigration Hospital, San Francisco, Calif.

One death from yellow fever occurred at the San Francisco Immigration Hospital, November 16, 1920. The patient was taken from the American steamship *Curacao*, six days out from Mazatlan, Mexico, where he had boarded the vessel.

The source of the infection is not definitely determined, but the vessel had recently touched at various Mexican ports, some of which are known to be infected.

DIPHTHERIA, MEASLES, SCARLET FEVER, AND TUBERCULOSIS.

City Reports for Week Ended Nov. 13, 1920.

	Popula- tion as of July 1, 1917	Total deaths	Diph	theria.	Mea	ısles.		rlet er.		ber- osis.
City.	(estimated by U. S. Census Bureau).	from all causes.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Aberdeen, Wash Adams, Mass Akron, Ohio Alameda, Calif Albany, N. Y Albuquerque, N. Mex Alexandria, Va Alliance, Ohio Alton, Ill Amesbury, Mass Anaconda, Mont Ann Arbor, Mich Anniston, Ala Arlington, Mass Asbury Park, N. J Ashtabula, Ohio Atchison, Kans Atlanta, Ga Atlanta, Ga Atlanta, Ga Atlanta, Ga Atlanta, Ga Atlantor, Mes Auburn, Me Auburn, Me Auburn, Me Autora, Ill Baltimore, Md Bangor, Me	14, 406 93, 604 28, 433 106, 632 14, 509 17, 959 19, 581 23, 783 10, 200 10, 631 15, 041 14, 326	2 35 8 3 1 5 11 2 3 3 11 2 5 77 8 5 11 77 10 176	88 88 11 36 3 3 4 4 20 11	2	13 22 25 55 5 	· · · · · · · · · · · · · · · · · · ·	1 2 3 10 1 2 2 5 9 1 1 1 8 2 2		2 1 4 2 1 3 3	3 1 1 4 2 1 1 13

	Popula- tion as of July 1, 1917	Total deaths	1 -	theria.	Mea	asles.		arlet ver.		ber- osis.
City.	(estimated by U. S. Census Bureau).	from all causes	Cases.	Desths.	Cases.	Deaths.	Cases.	Deaths.	Casea.	Deaths.
Barberton, Ohio	14, 187	6	i							
Baton Rouge, La Bayonne, N. J Beacon, N. Y Beatrice, Nebr Beaumont, Tex Belleville, N. J Raloit Wie	17,544 72,204	5	1 4		3		1 2		2	
Beacon, N. Y.	11,674 10,437	1 3					•••••			
Beaumont, Tex	28,801	12								
Belleville, N. J	12,797 18,547		1	ļ			 -		1	•••••
Ponton Horbor Mich	11,099	2								
Berkeley, Call	60, 427 13, 892	16 4	1	ļ	6		4		2	2
Beverly, Mass. Billings, Mont. Binghamton, N. Y. Birmingham, Ala Bloomfield, N. J.	22, 128	*4	i							
Billings, Mont	15, 123 54, 864	5 15	1		11 49		3		•••••	•••••
Birmingham, Ala	54,864 189,716	46	13		1		4		4	6
Bloomington, Ill.	19,013 27,462	2	4		1		3		1	•••••
Blogmington, Ill. Blogmington, Ind. Blogmington, Ind. Blogs, Jdaho.	11,661	3.					1 3			1
Boise, Idaho	16, 123 35, 951	2	8 1		3				•••••	•••••
Boston, Mass	35, 951 767, 813	189 2	33		14	1	26 1	1	37	15
Brazii, Ind. Bridgeport, Conn. Bristol, Conn. Brockton, Mass. Brookline, Mass.	10,472 124,724 16,318	;36	8	l:::::	1		5		3	3
Bristol, Conn	16,318	3 12	2						3	•••••
Brookline, Mass	69, 152 33, 526	6	3				2 2		1	•••••
Brunswick, Ga	10,984 475,781	123	106		61	;-	···ii	····i	1 28	1 9
Burlington, Iowa		7	100	ļ <u>'</u> .			2		20	
Burlington, Vt	21,802 44,057	19	ļ		 54	• • • • • •	ĩ	• • • • • • • • • • • • • • • • • • • •	····5	1 6
Cadillac, Mich	10 158	4								
Cambridge, Mass	114, 293	26 17	7	····i	3 2	•••••	5	•••••	4	4
Brookime, Mass. Brunswick, Ga. Buflalo, N. Y Burlington, Iowa. Burlington, Vt. Butte, Mon\$ Cadillac, Mich Cambridge, Mass. Canton, Ohio. Cedar Rapids, Iowa.	38,033		li	i			7			• • • • • • • • • • • • • • • • • • •
Chanute, Kans	12,968	2 20	4	i	•••••		i	•••••	•••••	
Charleston, W. Va	31,060	•••••		.	5					.
Chanitte, Kans. Chraleston, S. C. Charleston, W. Va. Charlotte, N. C. Chelsea, Mass. Cheyenne, Wyo. Chicago, Ill Chicopee, Mass. Chiflicothe, Ohio. Cincinnati, Ohio. Clavaland, Ohio.	31,060 40,759 46,405 111,320	. 5 11	6		9 10		2		1	•••••
Cheyenne, Wyo	111,320	1								· · · · · · · ·
Chicago, III	2,517,201 29,950 15,625 414,248	542 4	333 14	31	74	1	151	1	121	39 1
Chillicothe, Ohio	15,625	5	1				6		<u>.</u>	
Cincinnati, Ohio	414,248 692,259	104	29 44	3	24	····i'	17 83	····i	15	8 15
Clinton, Mass	1 13 075	2			23		1			•••••
Cohoes, N. Y	18,331 25,292 38,965	5 4	6	• • • • • • •	91					· · · · · •
Colinton, Mass Coffeeyville, Kans. Cochoes, N. Y Colorado Springs, Colo Columbia, S. C	38,965	11	2		5		4		5	. 2
Columbia, S. C	35, 165 26, 306		3				3			
Columbus, Ga	220. 135 I	56 3	33 1	• • • • • •	1		9 2	•••••	3	5
Covington, Ky	31,838 59,623	. 8	1	•••••			4			
Covington, Ky Cranston, R. I	26,773 11,443	6	1	•••••	•••••	•••••	····i-	•••••	•••••	•••••
Crawfordsville, Ind	26,686	8	3	···i			ĩ		i	•••••
Danware Mace	129, 738 10, 037	37	13 1	2		•••••	3		4 1	3
Danville, Ill	32,969	4					i			
Danville, Ill	20, 183 128, 939	31	3 11		3		7		1 2	
Decatur, Ill	41,483 [11	2	i	2					
Denver, Colo	10,618 268,439	74	···i8	···i	53		1 3			···ii
Dedham, Mass Denver, Colo. Des Moines, Iowa Detroit, Mich Dover, N. H.	.104,052 619,648 13,276		9				12			
Detroit, Mich	619,648 13,276	188	131	5	9		89		18	14
//////////////////////////////////////	- 40.096 I.		3				4			
Duluth, Minn	97,077	19	27				2		1]	. 3

¹ Population Apr. 15, 1910.

	Popula- tion as of July 1, 1917	Total deaths	1	theria.	Моя	sles.		riet er.		iber- osis.
City.	(estimated by U.S. Census Bureau).	from all causes.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Durham, N. C.	26, 160	3	4				3			
East Chicago, Ind East Cleveland, Ohio	26, 160 30, 286 13, 864	6	ļ			•••••	3	•••••	····i	, 1
Easthampton, Mass	10,656		3							
East Orange, N. J East Providence, R. I	43,761 18,485	10	13		1		····i			133
East Providence, R. I East St. Louis, Ill Eau Claire, Wis	77,31 2 18,887	14	3 2 3		•••••		5 2	····i	1	2
Elgin. III. Elizabeth, N. J. Elkhart, Ind. Elmira, N. Y. El Paso, Tex. Elwood, Ind.	28,502	9			2					
Elizabeth, N. J Elkhart, Ind	88,830 22,273	3	13		2	• • • • •	5	•••••	6	7,2
Elmira, N. Y	38, 27 2 69, 149	14 33 2		2				•••••		1
Elwood, Ind	t 11.028	2								,
Englewood, N. J Eugene, Oreg.	12,603 14,257	3 7	2	····í	10			37 3 - 5	1	
Englewood, N. J. Eugene, Oreg. Eureka, Calif. Evanston, III. Evansville, Ind	15,142 29,304	- 11			•••••		1 5	•••••	1	1
Evansville, Ind	76,981	. 19	3 12							14.55
Everett, Mass Fairmont, W. Va Fall River, Mass Fargo, N. Dak Findlay, Ohio.	40, 160 16, 111	12	12 3 5			•••••	1	•••••	1	
Fall River, Mass	129,828 17,872	34	6	1	6	1	4 2		5	3
Findlay, Ohio.	1 14,858	4	1							
Fiint, Mich Fond du Lac, Wis Fort Scott, Kans	57,386 21,486	19	8	•••••	•••••	•••••	12	2		
Fort Scott, Kans.	10, 564 29, 390	6	16	i						
Fort Smith, Ark	78,014	18	6 3	•••••	···i		1			2
Fort Worth, Tex	109,597 10,959	12	9. 1	•••••		•••••	1	1		
Fort Scott, Kans. Fort Smith, Ark. Fort Wayne, Ind. Fort Worth, Tex. Fostoria, Ohio Frankfort, Ind. Freeport, Ill. Fremont, Nebr. Fremont Ohio	10, 103	2 0 9					1			
Fremont Nebr	19,844 10,080	9	1	•••••			•••••			
Fremont, Ohio.	11,034 24,629	4 2					1	•••••		
Galesburg, III. Galveston, Tex Gardner, Mass	42,650 17,534	3 9 6						.,,		
Gardner, Mass Gary, Ind	17,534 56,000	6 12	1 6	•••••	•••••		1		2	2 2
Geneva, N. Y. Glens Falls, N. Y.	13,915						i		i	1
Grand Forks, N. Dak	17, 160 16, 342 152, 861	4 6 0 42	10		1					
Grand Rapids, Mich	152,861 1 13,948	42 6	31	2	2		7 3	1	3	3
Granlay Colo	11,942	õ			2					•••••
Greenfield, Mass	30,017 12,251	2	1		2		3			•••••
Greenwich, Conn	19,594 17,412	6 0 7 2 8 8	5	2					1	•
Green Bay, Wis. Greenfield, Mass. Greenwich, Conn. Hackensack, N. J. Hammond, Ind	27,016	5	3				3		1 2	i
	17,345 112,831	45	10 20				7		4	2
Hartford, Conn	112,831 49,180 17,550 33,859	9	3	•••••	-		2		4	1
Hibbing, Minn	33,859	i	10		i		į į		2	
High Point, N. C	13, 439 78, 324	18	1 3				1			····i
High Point, N. C. Hoboken, N. J. Holland, Mich Holyoke, Mass.	13,459 66,503	5 13	3 1	1	-		····i		i	1
	17,690	8 5	3				ī			····i
Huntington, Ind	10,982 47,686	12	••••	·····	·····	·····	6		2	1
Hutchinson, Kans	21,461 11,964	6	10 2				8			•••••
Indianapolis, Ind	283,622	76	12	···i	1		23	···i	8	7
	14,079 15,095	5	3		1 3	·····	2			•••••
Ironwood, Mich. Irvington, N. J.	15,095 16,710 12,448		1 2				2		3	•••••
Ithaca. N. Y.	16,017	5			:::::1:			1	i	•••••
Jacksonville, Ill	15,506	10]			······l·		.		l	· · · · · •

¹ Population Apr. 15, 1910.

		Popula- tion as o July 1, 191	7 deaths	1 -	theria.	Mea	isles.	Sca	rlet ver.	Tu cul	ber- osis.
8	City.	(estimate by U. S. Census Bureau).	all causes.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Jamestown, Janesville. W Jefferson Cit, Jersey City, Joplin, Mo Kalamazoo, J Kankakee, J	N. Y, Mo, Mo, Mo, Mich	37, 43 14, 41 13,71: 312,540 33,400 50,408	3 1 7 1 8 18 5	15 26 3 1		1		4 2 4		1 12	
Kearny, N. J Keene, N. H Kenosha, Wi Kewanee, Ill	S	24,325 10,725 32,833 13,667	64 4 2 8 5	14 22 3 6 1 2	2	20	i	6 17 4 5 3	1	12 4 2 1 1 2	5 1 1 1 1
Lawrence, K	N. Y. Ind. hio. ans. ass. , Kans. Mass	13,477	5 8	1 1 2 2 3		1		3 1 2 11 3 5		1 3	1 21 2
Lincoln, Nebi Little Rock, Lockport, N. Logansport, I Long Beach, Lorsin, Ohio	Ark. Y Ind Calif.	46,957 58,716 20,028 21,338 29,163	17 10 4 4 13	1 8 4 2 53	1 1 1	17	1	9 1 2 1		1 1 60	1 17
	Calif. y Lich A Conn N H Vis In In In In In In In In In I		72 26 4 4 20 8 8 1 22	53 21 16 10 1 4	1	57 1 1		13 3 4 1		10 6 1 2	1
Managetta M	Visn. iioiioiio	10 252	3 6 7 1	1 3 1 1 4 3		1		3			
Middletown, I Middletown, (Milwaukee, W Minneapolis, I	N. Y Ohio Vis Minn	15,890 16,384 445,008 373,448	5 25 3 82 55 2	54 2 1 4 62 24	`4 2	3 20 2 1		3 6 6 1 1 1 23 26	1	8 1 2 1 1 14 26	i
Missoula, Mon Mobile, Ala Monmouth, ll Monroe, La	it	19,075 59,201 10,346 13,698	2 3 18 4 0 1 8 5 9	3 9 2		5 .		1 .		1	i,
Moundsville, Mount Vernor Muncie, Ind	l, 17. I	13,410 11,513 37,991 25,653	2 9 13	2 9	i.	2		1 7			

Population Apr. 15, 1910.

	Popula- tion as of July 1, 1917	Total deaths	Diph	theria.	Mea	sles.		rlet /er.		ber- osis
City.	(estimated by U. S. Census Bureau).	from all causes.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Muscatine, Iowa. Muskegon, Mich. Muskoeee, Okla. Nashville, Tenn. Newark, N. J. Newark, Ohio. New Bedford, Mass. New British, Conn. New British, Conn. New British, Conn. New British, N. J. Newburgh, N. Y. Newburgh, N. Y.	17,713 27,434 47,173	0 18	_{ii}	ļ	ļ	ļ	1 5 3 2			
Muskogee, Okla	47,173	1	3	i	2		3			
Nashville, Tenn	118, 136 418, 789 30, 317	49 91	12 28	·····	6	·····	21	·····	3 22	3 10
Newark, Ohio.	30,317	5	1				21 2 2 2		1	1777
New Bedford, Mass	121,622 55,385	24 19	117	1	2	•••••	9	·"i	7	ï
New Brunswick, N. J.	25, 855 29, 893		i					<u>*</u>		,
Newburgh, N. Y	15 901	6	1		•••••	• • • • • • •		·····		,,,
Newburyport, Mass New Haven, Conn	152, 275 21, 199 377, 010 10, 133	39	15		i		24		5	4
New London, Conn	21, 199	6 125	10	2	1 27	• • • • •	4		17	
New Philadelphia, Ohio	10, 133						ŝ	. ,		
New Haven, Comn New London, Conn New Vorleans, I a. New Philadelphia, Ohio Newport, R. 1 Newton, Mass New York, N. Y Niserar Falls, N. Y Norlolk, Va. North Adams, Mass. Northampton, Mass. North Attleboro, Mass North Little Rock, Ark North Tonawanda, N. Y Norwalk, Conn. Norwich, Conn.	30, 585 44, 343	5 11		•••••	48		2		•••••	
New York, N. Y	5,737,492 38,466 91,148	1,128	361	21	39	i	138 27	4	302	¥ 83
Niagara Falls, N. Y	38,466 01 148	13	14 8	1	1	• • • • • •	27 1	•••••	·····2	1
North Adams, Mass	1 22,019	4			4					
North Attleboro Mass	20,006 11,248	10 3	1	•••••	1	•••••	• • • • • •	,	•••••	•••••
North Little Rock, Ark	11,248 15,515 14,060	2	1				i			
North Tonawanda, N. Y	14,060 27,332	1 6	5	•••••		• • • • • •		•••••	····i	
Norwich, Conn.	21,923	5	1							
Norwood, Ohio	23, 269	4	11			•••••	10	•••••	1 4	3
Norwich, Conn. Norwood, Ohio. Oakland, Calif. Oak Park, Ill. Oklahoma City, Okla. Olean, N. Y. Omaha, Nebr. Orance, N. J. Oshkosh, Wis. Paducah, Ky. Parkersbure, W. Va. Parsons, Kans. Passadema, Calif. Passaic, N. J. Paterson, N. J. Paterson, N. J. Pawtucket. R. I. Peabody, Mass.	206, 405 27, 816 97, 588	42 12	2		1		5			
Oklahoma City, Okla	97,588	14	26		<u>2</u>		1		2	3 1
Omaha, Nebr	16,927 177,777	8 26	13		2		7			1 1
Orange, N. J.	33,636	5 7	6			•••••	1		3	1
Paducah, Ky	33,636 36,549 25,178		11				2 2			
Parkersburg, W. Va	21,059	5	3 8	1		•••••	1			
Pasadena, Calif.	15,952 49,620	····ii	2	,					i	2
Passaic, N. J.	74,478 140,512 60,666	11	4 9		2		5 7	1	13	
Pawtucket, R. I.	60,666	18	6	3			í 1			····· <u>2</u>
Peabody, Mass	18,785 (5 0	2				1		•••••	
Pekin, Ill	19,034 10,973		2				3			
Peoria, III	10,973 72,184 42,646	17 11	15 7	····2	1 5		15 2		••••	2
Pawtucket, R. I Peabody, Mass. Peckskill, N. Y Pekin, Ill. Peoria, Ill. Perth Amboy, N. J Petersburg, Va. Philadelphia, Pa. Philadelphia, Pa. Phillipsburg, N. J Picua, Ohio. Pittsfield, Mass. Plainfield, N. J Plattsburg, N. Y Plymouth, Mass. Pontiac, Mich. Port Chester, N. Y Port Huron, Mich. Portland, Me.	25 817 1	9	4				2		1	····i
Philadelphia, Pa	1 735 514	437 1	95	7	7		149	1	76	34
Piqua, Ohio	15,879 14,275 39,678	2							ī]	1
Pittsfield, Mass	39,678	13	7 3	···· <u>·</u>	23		1 5		2	3
Plattsburg, N. Y.	24,330 13,111	13 2 3		2						
Plymouth, Mass	14.001	3 15	4				9			1
Port Chester, N. Y.	18,006 16,727	4	3						···i	
Port Huron, Mich	1 18,863	11			1 9		;-	•••••	2	•••••
Portland, Me Portland, Oreg	1 18, 863 64, 720 308, 399 30, 786	10 37	6	1	9		1 9		····2	3
Portland, Mee Portland, Oreg Poughkeepsie, N. Y. Providence, R. I. Pueblo, Colo.	30,786 - 259,895	10 58	1 20	····i	18		ا٠٠٠ــــا		4	17
Pueblo, Colo.	56,084	12	11	i	10		2	::::::	2	2
Quincy, Mass	39,022	9 14	8	2					3	
Quincy, Mass. Racine, Wis. Rahway, N. J. Raleigh, N. C. Redwing, Minn	47, 465 10, 361	3 1		4	::::::		6		1	•••••
Raleigh, N. C.	10,361 20,274 10,158	15	7		19		····i			2
Reno, Nev	15 514 1	i			::::::		i	::::::	:::::	•••••
Reno, Nev	25,080	8	5		l		اا		2	····i

¹ Population Apr. 15, 1910.

² Pulmonary tuberculosis only.

	Popula- tion as of July 1, 1917	Total deaths	Diph	theria.	Mea	asics.	Ser	arlet ver.	Tu	ber- osis.
City.	(estimated by U. S. Census Bureau).	from all ; causes.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Richmond, Va	158,702 20,496	52 9 18	32	1			3			7
Roanoke, Va. Rochester, N. Y	46,282 264,714 56,739	18 50 14 5	17 102 3		1		3 6 3	i	1 9	4
Rock Island, Ill	29, 452 12, 673	5					2		i	2
Rome, Ga	15,607 24,259 15,038	4	2		13		3		2	
Sacramento, Calif. Saginaw, Mich	68, 984 56, 469 10, 498	34 16 4	1 2 5	2			····i		1 1 1	6
St. Cloud, Minn	12,013 86,498 768,630	22 169	5		i		1 5			
St. Louis, Mo St. Paul, Minn Salem, Mass	768, 630 252, 465 49, 346	48	169 25 2	10	2		29 8		28 8 2 1	12 2
Salt Lake City, Utah	121,623 1 10,321 17,616	30 10 10			64	1	2		<u>1</u> <u>i</u>	3 3 2
San Diego, Calif	56,412 20,226	24 3 1					1		5	4
San Francisco, Calif	11,217 471,023 39,810	141	24 2	4	2		11 2		30	13
Santa Cruz, Calif Saratoga Springs, N. Y	15,360 15,150 13,839	13 4 3				•••••	1		•••••	i
Saugus, Mass	10,210 14,130 69,250	4 36	6				3 11 1		2	 2
Schenectady, N. Y	103,774 366,445 28,907 16,887	18	6 22 1		4 2 1		1 11	1	8	•••••
Sioux Falls, S. Dak	16,887 88,618	7 22	3 5				2 3 2 5		3	1 2 1
South Bend, Ind	70, 967 14, 465 21, 985	12 6 8	6						3	
Spokane, Wash	157, 656 62, 623 108, 668	9 23	10 1 4		2 8		9 1 19		····i	<u>ż</u>
Springfield, Ohio	157,656 62,623 108,668 52,296 28,259 1 10,198	21 12	8 1		7 -		1		i	•••••
Superior, Wis. Syracuse, N. Y	47, 167 158, 559 117, 446 36, 610	10 49	5 24 3		10		4 13		7	i
Taunton, Mass	36,610 67,331	7 13	4 5	i	6		1 2 6			i
Tiffin, Ohio	67,331 12,9 ;2 202,010 49,533 14,090	2 48 6	59 2	1	40		12 5		5	1 1
Traversé City, Mich Trenton, N. J	14,090 113,974 14,413	7 33	1		22		1 2 2		8	1 2
Troy, N. Y	78,094 17,324 32,507	18 17	27		7		<u>î</u>		3	3 6
Vallejo, Calif	13,803 13,805	2					3			•••••
Richmond, Va. Riverside, Calif. Roanoke, Va. Rockkord, III. Rock Sland, III. Rock Sland, III. Rocky Mount, N. C. Rome, Ga. Rome, N. Y. Rutland, Vt. Saginaw, Mich. St. Charles, Mo. St. Cloud, Minn. St. Joseph, Mo. St. Cloud, Minn. St. Joseph, Mo. St. Paul, Minn. Salem, Mass. Salt Lake City, Utah. San Bernardino, Calif. San Diego, Calif. San Diego, Calif. San Bernardino, Calif. San Jose, Calif. San Jose, Calif. Santord, Me. San Francisco, Calif. Santord, Me. San Francisco, Calif. Santa Barbara, Calif. S	15,954 34,015 12,947	12							2	i
Waltham, Mass Washington, D. C. Waterbury, Conn Watertown, M. S. Watertown, M. S.	31,011 369,282	9 106 21	30	1	4 6 1		23 1		18	9
Waterbury, Conn Watertown, Mass Watertown, N. Y Wausau, Wis	31,011 369,282 89,201 15,188 30,404 19,666	21 2					1			······
Wausau, Wis	19,666 i	5 1			••••••	1				•••••

¹ Population Apr. 15, 1910.

	Popula- tion as of July 1, 1917	Total deaths	Diph	theria.	Mea	sles.		rlet er.		ber- osis.
City.	(estimated by U. S. Census Bureau).	from all causes.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.	Cases.	Deaths.
Westfield, Mass West Hoboken, N. J. West New York, N. J. West Orange, N. J. Wheeling, W. Va. White Plains, N. Y. Wilmington, Del. Wilmington, N. C. Winona, Minn Winston-Salem, N. C. Wintrop, Mass. Woburn, Mass. Worcester, Mass. Yonkers, N. Y. Zanesville, Ohio.	44, 386 19, 613 13, 964 43, 657 23, 331 95, 369 30, 400 1 18, 583 33, 136 13, 105 16, 076 166, 106	55 11 22 17 5 19 13 14 1 3 42 18 12	1 6 2 22 6 4 2 6 12 2	1	1		1 7 3 2 12 2 2		2 1 1 1 5	2 3 3

¹ Population Apr. 15, 1910.

FOREIGN AND INSULAR.

CHILE.

Typhus Fever-Concepcion.

On October 13, 1920, 34 cases of typhus fever were reported under treatment at Concepcion, Chile. Six cases were reported during the week ended October 18 in the local jail. The prevalence of typhus fever was stated October 22, 1920, to be increasing.

CUBA.

Communicable Diseases—Habana.

Communicable diseases have been notified at Habana as follows:

1.7		. 1	Nov. 1-	10, 1920.	Remaining under
	Disease.		New cases.	Deaths.	treatment Nov. 10, 1920.
crebrospinal meningitis					
)iphtheria			· 3		1
)iphtheria eprosy falaria.			3 1 59 27		1: 1 9: 3:

¹ From the interior, 52; from abroad. 1.
2 From the interior, 32; from abroad, 3.

INDO-CHINA.

Cholera-Plague-Smallpox-June, 1920.

During the month of June, 1920, cholera, plague, and smallpox were reported in Indo-China as follows:

Cholera.—Provinces of Anam, Cambodia, Cochin-China, and Tonkin: Cases, 292; fatalities, 201 (foreign 1 fatal case); during the corresponding period in 1919, cases 871, fatalities 663, of which 2 cases with 1 death were of foreigners.

Plague.—Provinces, Anam, Cambodia, Cochin-China, Kwang-Chow-Wan: Cases, 72; fatalities, 63; corresponding period of 1919, cases, 105; fatalities, 79.

Smallpox.—Provinces, Anam, Cambodia, Cochin-China, and Tonkin: Cases, 318; fatalities, 220; during the same period, 1919, cases, 82; fatalities, 23.

Influenza-June, 1920.

During the month of June, 1920, 392 cases of influenza, with 63 fatalities, were reported in Indo-China. During the corresponding period of 1919, 2 cases were reported. The occurrence of influenza during June, 1920, was reported in the Provinces of Anam, Cochin-China, and Tonkin.

(2942)

JAMAICA.

Infectious Disease Reported Present.1

During the week ended October 30, 1920, 382 cases of alastrim, or Kaffir pox, were reported present in the island of Jamaica.

SWITZERLAND.

Lethargic Encephalitis-January-June, 1920.

During the first six months of 1920 there were reported 960 cases of lethargic encephalitis in Switzerland.

VIRGIN ISLANDS.

Contagious Diseases—October, 1920.

The occurrence of contagious diseases in the Virgin Islands during the month of October, 1920, has been reported as follows:

	Cases.	Remarks.
In St. Thomas and St. John: Chancroid. Chicken pox. Gonorrhea. Malaria. Syphilis. Tuberculosis. Uncinariasis. In St. Croix Chancroid. Dysentery. Filariasis. Gonorrhea. Pellagra Schistosomiasis Syphilis. Tetanus. Trachoma Uncinariasis.	3 3 4 1 14 2 16 1 1 5 2 2 2 3 3 1 1 1 1	2 imported. St. John. 1 imported; 1 St. John. Imported. 6 imported.

CHOLERA, PLAGUE, SMALLPOX, TYPHUS FEVER, AND YELLOW FEVER.

Reports Received During Week Ended Dec. 3, 1920.a

CHOLERA.

Place.	Date.	Cases.	Deaths.	Remarks.	:
Indo-China	Aug. 22-28 Aug. 22-8ept. 4 Sept. 26-Oct. 2	11 12 1	7 12	June 1-30, 1920: Cases, deaths, 201.	292;

a From medical officers of the Public Health Service, American consuls, and other sources.

¹ Public Health Reports, Sept. 3, 1920, p. 2132; Sept. 24, 1920, p. 2298; Oct. 15, 1920, p. 2491; Oct. 29, 1920, p. 2603; Nov. 19, 1920, p. 2814.

Reports Received During Week Ended Dec. 3, 1920—Continued.

	PLAGUE.					
Place.	Date.	Cases.	Deaths.	Remarks.		
Azores:			10			
St. Michaels	Oct. 16-Nov. 5	56	19			
Bahia Ceylon:	Sept. 26-Oct. 2		1			
Colombo	Oct. 10-16	9	5			
GuayaquilIndo-China	Oct. 16-31	3	2	June 1-39, 1929: cases, 72; deaths,		
Mesopotamia: Bagdad	Sept. 1-30	1				
Mexico: Vera Cruz		ļ		Nov. 8-14, 2 plague-infected rodents found. Last human		
		<u> </u>	<u> </u>	case, July 20, 1920.		
	SMAI	LLPOX.				
AustriaGratz	July 11-28	5		July 11-28, 1920: Cases, 13.		
Vienna Bolivia:	do	1				
La PazBrazil:	Sept. 1-30	7	3			
Bahia	Sept. 26-Oct. 2 Sept. 19-18	47	13			
Ontario— Hamilton	Nov. 14-20	4				
Kingston Toronto.	Nov. 14-20 Oct. 31-Nov. 6 Nov. 7-13	6 3		·		
Ceylon: Colombo	Oct. 10-16	6	1	·		
Cuba: Antilla	Oct. 26-Nov. 1	1		For port of Preston.		
Do	Nov. 9-15 May 23-June 26	345	36			
Ecuador: Guayaquil	Oct. 1-31	6	1			
Egypt: Cairo	Aug. 16-19 July 26-Sept. 4 do	2 55		Additional cases, May 26-June		
BerlinGreat Britain:		1		17, 1920: 42, at Duisbourg.		
Glasgow	Oct. 24-30do	50	1	Reported from Middleton, 6 miles		
Haiti: Port au Prince	Nov. 1-7	45		from Manchester.		
Indo-China		· · · · · · · · · · · · · · · · · · ·		June 1-30, 1920: cases, 318, deaths, 220.		
Liberia: Monrovia Madeira:	Nov. 13			Present.		
Funchal Mexico:	Oct. 31-Nov. 6		2			
Chihuahua Guadalajara	Nov. 8-14 Oct. 1-30	1 1	1			
Persia: Teheran Portugal:	June 6	• • • • • • •		Present.		
OportoSpain:	Nov. 1-6	1				
Barcelona	Oct. 21-27		1	July-September, 1920; Cases, 17.		
MalagaValencia	Oct. 24-30	1		July-September, 1920: Cases, 17. Sept. 1-30, 1920: Deaths, 6.		
TYPHUS FEVER.						
Bolivia:						
La Paz	Sept. 1-30	7	9			
Concepcion	Oct. 13 Apr. 25-June 26	34 540	79	Increasing; 6 cases in jail.		

Reports Received During Week Ended Dec. 3, 1920-Continued.

TYPHUS FEVER-Continued.

Place.	Date.	Cases.	Deaths.	Remarks.
Egypt: Cairo	Aug. 6-19	36	17	July 18-Sept. 28, 1920: Cases, 1
Perlin	July 25-31	2		of these, 3 among interne Russians.
Great Britain: Belfast Do	Oct. 24–30 Oct. 31–Nov. 6	4	2	
Hungary: Budapest Italy:	June 14-20	1	ļ	
Trieste	Oct. 4-10 Oct. 24-30	41 34	1 1	
San Luis Potosi Portugal:	Nov. 7-13	. 1		grand processing the state of t
Oporto Do South Africa:	Oct. 24-30 Oct. 31-Nov. 6	2 1	1	
Port Elizabeth	Sept. 27-Oct. 2	1		41 1
	YELLOW	FEVE	R.	
Mexico: Vera Cruz	Nov. 15-21	. 9	4	
On vessel: S. S. Curacao	Nov. 16	1	1	San Francisco, from Mexica ports, 6 days out from Mazatlar

Reports Received from June 26 to Nov. 26, 1920.

CHOLERA.

Place.	Date.	Cases.	Deaths.	Remarks.
Brazil: Rio de Janeiro	June 27-July 3		1	
'hina:	June 21-vary o		_	. *
Amoy	June 20-Aug. 14		12	
Antung			1	
Canton		5	4	
Changsha		137	50	Aug. 15-21: Present. Oct. 3-4
			1.319	
Chungking Do			5,322	Sept. 18: Present. Oct. 3-9. Pres
Dairen		4	1	ent and in vicinity.
Foochow			•	Present.
		12	5	Tresent.
Hankow		12	J	Your 1010 Cases 603 On Eas
Harbin		1	1	Year 1919: Cases, 603. On Eas ern Chinese R. R. line.
Hongkong	Aug. 8-14	1 1	-	other stations, same line, 19
	1			cases.
	G4 10 05		4	Several cases reported at Na
Nanking	Sept. 12-25	1	6	
Shanghai	Aug. 2-29	1	U	ported prevalent among Ch
	1	1 1		ported prevalent among or
	į .	1 1		nese, Aug. 30. Sept. 8, 1920: Cases, 13,00 deaths, 5,000 (estimated). Au 1-Oct. 7, 1920: Cases, 24,53
hosen (Korea)				docths 5 000 (actimated) An
Chemulpo	Aug. 1-Oct. 7	24	21	deaths, 5,000 (estimated). Au
Chinnampo	Aug. 1-26	34	23	1-Oct. 7, 1920: Cases, 24,53
Fusan	Aug. 1-Oct. 7	684	493	deaths, 12,549.
Gensan				
Mokpo	Aug. 1-Sept. 30	28	18	
Scoul		1,032	792	
alicia:	1 -			l ·
Buczacz	Oct. 18			Present.
	1	i 1		l
Patras	July 26-Aug. 1 Aug. 2-8			Present in surrounding country
Zonto	Ang 2-8			Present.

Reports Received from June 26 to Nov. 26, 1920—Continued.

CHOLERA—Continued.

Place.	Date.	Cases.	Deaths.	Remarks.
India]	Apr. 11-May 22, 1920: Deaths 7,549. May 30-June 26, 1920: Deaths, 3,710. June 27-July 10, 1920: Deaths, 1,711.
Bombay	May 2-June 26	85		7,549. May 30-June 26, 1920
Do	June 27-Sept. 18	105	68	Deaths, 3,710. June 27-July 10,
CalcuttaDo	May 2-June 26 June 27-Sept. 18 May 2-June 24 July 18-Oct. 2 May 2-June 26 July 11-Oct. 9	439 188	423 181	1920: Deaths, 1,711.
Madras	May 2-June 26	20		
Do			2	
Rangoon	June 27-Sept. 18	22	16	
RangoonIndo-China	.l			. 1920: Jan.—Cases, 40; deaths, 24
Saigon Do	Apr.23-June13 July 26-Sept. 5	13	94 5	
Japan: Kobe	June 14-27	36	24	•
Do	June 28-Oct. 17	409	223	Kobe, June 6-13, 34 cases. Moji, June 6-12, 10 cases. Kochi, June 6-12, 1 case. Hiroshima,
Do Nagasaki Do	June 28-Oct. 17 June 21-27	7	1	June 6-12, 1 case. Hiroshima.
Do	June 28-July 18	34	13	June 0-12, 6 cases.
Osaka	I June 8	····· <u></u>		Present.
Taiwan Island	May 22-June 20 July 11-Oct. 10	60	33	1
Do	July 11-0ct. 10	1,414	553	1
West Java—		1	I	1
Batavia	Apr. 30-June 3	6	2	June 4-17: Present.
Philippine Islands	June 25-Aug. 12	3		
Philippine Islands				May 9-June 26, 1920: Cases, 16;
Manila	May 9-June 26	5	1	deaths, 12. June 27-July 17,
Do Provinces—	June 27-Sept. 25	5		May 9-June 26, 1920: Cases, 16; deaths, 12. June 27-July 17, 1920: Cases, 63; deaths, 31. July 25-31: Cases, 57; deaths, 48.
Albay	May 9-15	2	1	July 20-51. Cabas, or, acadas, 10.
Batangas	June 27-July 3	ī	1	į.
Bohol	do	ĩ	1	[
Cagayan Do	May 9-June 26	11	1 19	
Do	June 27-Aug. 21	41	14	1
Cavite Iloilo	Sept. 5-11 June 27-July 17	1 3	1	
Isat eia	Tuly 11_31	13	14	
Laguna	July 11-31 July 4-10 July 11-17	8		
Misamis	July 11-17	ă	2	
Nueva Viscaya	July 25–31	49	42	
Pangasinan	July 4-Aug. 7	7	5	1
Tarlac	Sept. 12-18	1	1	}
Warsaw	Oct. 28	1	1	Case occurred in employee on river boat plying between Warsaw and Lanzig.
Russia		•••••	·····	Reported prevalent in southern Russia, June 4, 1920.
Grodno	Oct. 18 June 20		 	Present.
Sehastopol (district) Simferopol	June 20	• • • • • • • •	 -	Reported increasing.
Simieropoi		••••••	•••••	JanJune, 1920: Cases, 1,262; deaths, 584. South Russia, Government of Tauride.
Vilnaliam:	Sept. 28	40		Oct. 18: Present.
Bankok	Apr. 25-June 26 June 26-Sept. 4	542 61	343 26	
traits Settlements: Singaporeumatra:	July 18-Sept. 14	25	24	
Medan	Aug. 20-Sept. 3	1	1	On local steamship. From Sin-
urkey:	Dec. 24	1		gapore. Asiatic Turkey.
Amassia. Kaiseri.	Pec. 22.	1		Do.
Karassi	Jan. 3	î		Do.
Karassi. Mamuret-ul-Aziz	1'ec. 31	1	1	Do.
PandermaRodosto	DecJan	16	6	The state of the s
Kodosto	Pec. 29	1	····· <u>·</u> ·	European Turkey.
Smyrnan vessel:	Dec. 22	3	2	Asiatic Turkey.
S. S. Keketticut Steamship (local)	Aug. 2	1 1	i	U. S. S.: At Shanghai. At Medan, island of Sumatra.

Reports Received from June 26 to Nov. 26, 1920—Continued.

PLAGUE.

Place.	Date.	Cases.	Deaths.	Remarks.
Algeria:				Comt. 1. 20. 1000. Comm. 0. Joseph
Algiers	i			Sept. 1-30, 1920: Cases, 3; deaths,
Azores:		ŀ		1 2
St. Michaels	Oct. 4-20	35	12	Oct. 4, 1920: 5 suspect cases iso-
Do	Nov. 10-16	25	8	gada Oct 1-31 1920: Cases
		l.	1	Oct. 4, 1920: 5 suspect cases iso- lated vicinity of Ponta Del- gada. Oct. 1-31, 1920: Cases, 76; deaths, 27. To Nov. 16: Cases, 110; deaths, 38.
Donto Dolos do	0-4 1 00	١.	i	Cases, 110; deaths, 38.
Ponta Delgada Brazil:	Oct. 1-26	2		
Bahia	Apr. 25-May 22	10	10	
Do	June 27-Oct. 28	12	5	1 ;
Pernambuco Do	May 3-9 June 28-Aug. 15	32	16	
Porto Alegre	June 27-Aug. 21		2	
British East Africa				Apr. 1-30, 1920: Cases, 22; deaths,
Kisumu Do	Apr. 25-June 26 July 11-Sept. 4	14 10	12	9.
Mombasa	Apr. 25-June 26	104	5 39	Present.
Mombasa Do	June 27-Aug. 28 Apr. 25-June 10	113	72	
Nairobi	Apr. 25-June 10	14	8	
Ceylon: Colombo	May 25-June 12	7	2	
Do	June 27-Oct. 2	36	32	
Chile				Mar. 1-May 31, 1920: Cases, 15; deaths, 2. Plague reported in
			l - 1	deaths, 2. Plague reported in
	•			Departments of Tacna and Tarata.
Antologasta	May 17-June 20	5		Mar. 1-May 31, 1920: Cases, 7;
Do	July 5-Oct. 9	3		deaths, 1.
Iquique China:	Mar. 1-May 31	8	1	
Amoy	June 20-Sept. 18		8	
Hongkong	Apr. 4-June 26	90	70	
Do Ecuador:	June 27-Aug. 21	26	23	
Guayaquil	Aug. 16-Sept. 30	9	1	,
Egypt				Jan. 1-Oct. 14, 1920: Cases, 430;
Cities— Alexandria	June 18-Oct. 9	13	7	deaths, 251.
Port Said	Aug. 2-Sept. 26	3		
Suez	May 13-June 8	12	6	3 cases pneumonic.
Provinces—	July 3-Aug. 4	4	3	
Assiout	May 15-June 5	7	4	
Do	May 15-June 5 July 2-Sept. 13 July 7-10	7 2	ĩ l	
Beni-SouefFayoum	July 7-10	2	1	
Garbieh	June 5do	1		
Do	July 1-Oct. 11	21	17	4.5
Girgeh	Sept. 22	1	1	Pneumonic.
Mariut	May 18 May 18-June 8	1 19	22	
Do	July 3-9	1	2	•
Minieh Do	May 15	2	1	Septicemic.
iume	July 13 Sept. 21	1 4	·····2	
reat Britain:	DCP0. 21	- 1	- 1	
Liverpool	June 20-26	1	1	
Freece:	Aug. 19-Oct. 14	3	2	
Chies	Oct. 14	i	2	
Dante	July 22	2		
Kavalla	July 5-Oct. 3	4 2		Ammovimotolm 00 sees Sent 0
Pireus	Aug. 21	12	·····i	Approximately 20 cases Sept. 9.
Saloniki	Sept. 25-Oct. 8	4	.	
ndia				Apr. 18-June 26, 1920; Cases, 12,476; deaths, 9,961. June 27-
Bombay	Apr. 18-June 26	170. 59	135 46	12,476; deaths, 9,961. June 27-
Calcutta	May 2-June 12	26	19	Sept. 25, 1920: Cases, 29,743; deaths, 22,604.
Karachi	June 27-Oct. 25 May 2-June 12 May 9-Oct. 9	79	72	
Madras Presidency	do	8,017	5,731	
RangoonDo	June 27-Sept. 25	120 243	202	.7
DU	лине 21-аерь. 2 0!	243 1	202	

Reports Received from June 26 to Nov. 26, 1920—Continued.

PLAGUE—Continued.

Place.	Date.	Cases.	Deaths.	Remarks.
Indo-China				Jan. 1-31, 1920: Cases, 42; deaths
Saigon	May 10-June 13	9	2	40. Feb. 1-29, 1920; Cases, 41
D ₀	July 26-Aug. 15	5	4	deaths, 36. Mar. 1-31, 1920 Cases, 79; deaths, 70. Apr. 1- 30, 1920: Cases, 69; deaths, 63
				May 1-31, 1920: Cases, 87 deaths, 75.
Italy: Catania Java:	June 22-July 3	3	2	
East Java				Apr. 23-May 5, 1920: Cases, 7
West Java—			٠.,	deaths, 7. Apr. 15-June 16
Batavia	July 22-Sept. 23	116	16	deaths, 7. Apr. 15-June 16 1920: Cases, 8; deaths, 8. Aug 5-25, 1920: Cases, 4; deaths, 4 Surabaya Residency.
Bagdad	June 1-30	6	3	barasaya manadady.
Cerritos		15		State of San Luis Potosi. Pres
TampicoVera Cruz.		11	3 1	ent in vicinity.
Do		2		deaths 29 Corrected state
***************************************	July 10 32.	-	_	May 29-July 14, 1920: Cases, 49 deaths, 29. Corrected state ment: From outbreak in May to July 20, 1920—cases, 58
Dames				deaths, 36. Mar. 1-31, 1920: Cases, 46; deaths
PeruCallao	Mar. 1-Apr. 30	15	7	29. Apr. 1-30, 1920: Cases, 36
D ₀	Aug. 1-31	1		deaths, 13. In coastal depart
Lima (city)	Mar. 1-31	5	3	ments.
Do Lima (country)	Apr. 1-30 Mar. 1-31	1	4 1	·
Do Mollendo	Apr. 1-30 Mar. 1-31	1 13	9	
Paita	do	5	2	
Do	Apr. 1-30	2		
Salaverry		4	3	
San Pedro		6	1	
Trujillo—Salaverry		3 6	2 13	
Russia:	1	ľ	10	
Batum Siam:	•		• • • • • • • • • • • • • • • • • • • •	Prevalent.
Bangkok		8	5	
DoStraits Settlements:	June 28-Aug. 28	6	3	
Singapore Do	Apr. 25-June 19 July 11-Aug. 7	14 3	13 3	May 16-22, 1920: Cases, 2; deaths,
Syria: Beirut	June 30			Present.
Turkey: Constantinople	July 25-Aug. 21	7	6	
Uruguay: Montevideo	June 1-30	1	1	
	SMAL	LPOX.		
				· · · · · · · · · · · · · · · · · · ·
Algeria:				

		1	1	
Algeria:				
Departments—	36. 44 4	٠	1	Git
Algiers	May 11-Aug. 31	51		City of Algiers, Apr. 1-30, 1920:
Constantine	June 1-Aug. 31	18		1 case. July 1-Aug. 31, 1920:
Oran	May 11-Aug. 31	168		Cases, 4: deaths, 2.
Austria	1	l		May 30-June 26, 1920: Cases, 27.
Vienna	May 30-June 26	1	1	June 27-July 10, 1920: Cases, 22,
Azores:				
Ponta Delgada	July 17-Aug. 20	7		
St. Michaels	Aug. 21-27	i		From Madeira.
Bolivia:		•		210111 11111111111111111111111111111111
La Paz	May 2-June 30	10	8	
	July 1-Aug. 31	11	ទ័	
Do	July 1-Aug. 31	11	9	
Brazil:		_		
Bah <u>i</u> a	Apr. 25-June 26	5	5	
_ Do	June 27-Sept. 11	20	2]	
Pernambuco	Mar. 29-June 27	114	3	
Do	June 30-Sept. 19	210	4.	
Rio de Janeiro	Apr. 11-June 26	431	61	
Do	June 27-Aug. 21	45	91	
	,	1		

Reports Received from June 26 to Nov. 26, 1920—Continued.

SMALLPOX-Continued.

Place.	Date.	Cases.	Deaths.	· Remarks.
Brazil—Continued.				
Santos	Mar. 24-28	1		. '
. <u>D</u> o	July 25-Aug. 15		. 8	
Sao Paulo Do	June 21-27		$\begin{bmatrix} 1 \\ 2 \end{bmatrix}$	
British East Africa	June 27-Aug. 8		- 2	Mar. 1-31, 1920: Cases, 107. Apr
Mombasa	May 2-22	2	1	1-30, 1920: Cases, 69. Reported
Do	July 11-17	3		by native inspectors.
Nairobi	May 23-June 26	11		
Do	Aug. 1-21	5		5.0
Bulgaria: Sofia	Index 11 17	1	1	11.
Canada:	July 11-17	1	1	1
Alberta—	, ,		1	
Calgary	June 3-9	1		1:
Do	July 4-Oct. 9	6		
British Columbia—				
Vancouver	May 16-Aug. 28	4		
Manitoba—	Morr 20 June 5	3	1	
Winnipeg Do	May 29-June 5 Aug. 8-21	2		
New Brunswick—	11ug. 0-21	_		1
Bonaventura and Gaspe	Aug. 1-Oct. 31	2	1	l
Counties.			1	
Carleton County	Scpt. 19-25	1		
Gloucester County	May 31-June 26	5		
Do	Sept. 19-Oct. 9	3		i
Madawaska County	Oct. 31-Nov. 6 July 4-Aug. 21	1 7		İ
Queens County Restigouche County	July 4-Mug. 21	•		Sept. 26-Nov. 6, 1920; Cases, 4.
Campbellton	July 1-31	7		St pt. 20 1.01. 0, 1020. Cubts, 1.
Nova Scotia-	, ,			
Halifax	do	2		1
Sydney	May 31-June 26	2		1
Ontario-	T 0" 20	2	1	1
Cornwall	June 25-30	4		
Arthur.	July 11-Oct. 2			<u> </u>
Hamilton	June 13-Oct. 30	9	1	
Kingston	May 31-June 19	4	1	
Montreal	Oct. 24-30	1		
North Bay	June 23-2	1		
Do	July 11-Oct. 23	8		, , , , , ,
Ottawa	June 6-26	32		
Do Peterborough	June 27-Nov. 13 Apr. 18-July 31	187 33	1	
Prescott	July 11-17	1		
Do	Aug. 1-14	. . .		Present at Cardinal and Brock-
Sault Ste. Marie	Aug. 1-14 Oct. 24-30	1		villa .
Toronto	June 6-19	13		
Do	June 26-Nov. 6	31		
Windsor Prince Edward Island—	Aug. 22-Sept. 11	5		
Charlotte Town	Aug. 12-Oct. 13	2		
Quebec—	11 ug. 12 - Oct. 10	~		
Montreal	June 13-19	1	. 	
Do	July 4-Aug. 7	4		
Quebec	June 27-Oct. 2	9		
Saskatchewan—	T 00 00			
Moose Jaw	June 26–30	6		
Do	July 25-Sept -25 June 2-30	3 1		
Do	Oct. 3-30.	5		
Saskatoon	Sept. 5-Nov. 6	ğ		
ylon:		- 1		
Colombo	May 9 June 5	2		
Do	Aug. 29-Oct.2	35	5	
nile:	35 17-00			• : : : :
Antofagasta	May 17-23			1 case in interior.
nina Amov	May 2 Oct 0	4	19	
AmoyAntung	May 2 Oct. 9 May 9-June 13	3	3	
Do	June 21-27	ĭ		
Canton.	Sept. 1-30			Present.
Chungking	May 2-June 9			Do.
Do	July 11-Oct. 9			Do.
Dairen	Sept 28-Oct. 4			
Foochow	May 9-29. July 26-Oct. 2.			Do. Do.

Reports Received from June 26 to Nov. 26, 1920—Continued.

SMALLPOX-Continued.

Place.	Date.	Cases.	Deaths.	Remarks.
China-Continued.				
Hankow	June 20-26	. 2	l	
Harbin	Sept. 27-Oct. 3	1		Year 1919: Cases, 79. On East- ern Chinese R. R. line. At
Hongkong	Apr. 4-June	19	15	ern Chinese R. R. line. At
Do	June 27-July 17 July 19-Oct. 9	2	2	other stations, 109 cases. Present.
Mukden Nanking	May 0 Tuno 5	ļ		Do.
Do	May 9-June 5 July 4-Oct. 16			Do.
Tientsin	May 25-31	1 2		1
TientsinDo	June 16-29	2		1
Tsinanfu	May 9-15	. 1		
Chosen (Korea):	1		1	
Chemulpo	Mar. 1-June 30		40 8	1
Do	July 1-31	24	6	i
Do	Mar. 1–June 30 July 1–31. Mar. 1–June 30 July 1–31.	i	ľi	
Seoul	Mar. 1-June 30	358	86	
νο	July 1-31	15	6	
Colombia:	I .		· ·	
Barranquilla Santa Marta	May 13-July 3 May 31-Oct. 16			Epidemic.
Santa Marta Cuba:	May 31-Oct. 16			Present.
Antilla	Aug. 24-Oct. 23	3	l -	·
Habana	July 4.	l i		From steamship Frank Hennis,
	, , , , , , , , , , , , , , , , , , ,	1	l	from Jamaica. Arrived Santi-
	· ·		i .	l ago June 30, 1920.
Matanzas	Aug. 15-21	1	1	In vicinity, at Aguacate, Aug. 1-7, 1920: Cases, 12.
~	_		ł	1-7, 1920: Cases, 12.
Cyprus		• • • • • • • •		August, 1919: Cases, 242; deaths,
Czechoslovakia:			1	54.
_ Moravia	Feb. 1-2	68	l	
Danzig	Juno 20-July 17	9	2	
Egypt:			_	
A lovandria	May 14-June 29	53	19	•
Do	June 25-Sept. 30	13	. 4	
Cairo	Apr. 2-June 24	62	23	
Do. Cairo	Apr. 2-June 24 July 2-Aug. 5 Apr. 2-June 24	3 22	8	
Do	July 2–15	22	1	
France:	July 2-10	-	*	
Brest	May 15-31	1		
Cette	May 15–31 June 24–30		1	
Nice	June 1-30		1	
Paris	May 1-10	3		T-1-00 7 10 1000 G 200
Germany	• • • • • • • • • • • • • • • • • • • •		• • • • • • • • • • • • • • • • • • • •	Feb. 22-June 12, 1920: Cases, 720.
•				Feb. 22-June 12, 1920: Cases, 720. July 11-24 1920: Cases, 26; deaths, 6. Additional cases, June 13-July 10, 1920, 24; deaths, 2.
Great Britain:				•
Edinburgh	Aug. 29-Sept. 4	7	1	
GlasgowDo	May 25-June 26 July 4-Oct. 23	136	22	
Liverpool	July 18-Sept. 11	177	48	
London	June 13-July 19	14	• • • • • • • • • •	
London	Aug. 22-28	5		
Greece:				
Saloniki	May 31-June 27	4	1	
Do	July 25-Aug. 15	1	1	
Haiti		• • • • • • • •		Nov. 6, 1920: Approximately 35
Toomal	Nov. 6	1		cases. In vicinity.
Jacmel Port au Prince	Sept. 22	5	• • • • • • • • • •	in vicinity.
India	Lept. 22.			Apr. 11-May 22, 1920: Deaths,
				7.743 May 30-June 26, 1920
				Deaths, 3.864.
Bombay Do	Apr. 26-June 26	103	45	May 9-15, 1920: Cases, 26; deaths,
D0	Apr. 26-June 26 June 27-Sept. 4 May 2-June 12	49	11	11.
Calcutta Do	July 18-Sept. 18	101	93 8	
Vorachi	AUTY TO CODE, IA	15	12	
	May Q-Tuno 28			
Do	May 9-June 26	77	-41	
DoMadras	June 27-July 10	7 27	4 15	
Karachi	June 27-July 10	7 27 46	15 19	
Do	June 27-July 10 May 9. June 26 June 27-Oct.9 Apr. 25-June 26	7 27	4 15	July 1-31,1920: Cases,22; deaths,

Reports Received from June 26 to Nov. 26, 1920—Continued.

Piace.	Date.	Cases.	Deaths.	Remarks.
Indo-China Saigon Do Italy:	May 10-June 13 Aug. 3-Sept. 5	12 1	3 1	Jan. 1-31, 1820: Cases, 410; deaths, 101. Feb. 1-29, 1820: Cases, 625; deaths, 119. Mar. 1-31, 1920: Cases, 782; deaths, 114. Apr. 1-30, 1920: Cases, 312: deaths, 25. May 1-31, 1920: Cases, 428; deaths, 61.
Catania	July 12-Oct. 3			City and Province, Sept. 18-26, 69 cases in district.
Genoa Do	May 17-23 June 14-27	12 20		In Province.
Do Messina	June 14-27 June 28-July 4 May 10-June 27	3 7	·····i	Province, May 10-June 27: Cases
Do	June 28-Oct. 3	14	3	168; deaths, 27. Province: Cases, 35; deaths, 3.
Milan Naples	Mar. i-May 31	3 7	5 3	
Palerino	May 23-June 20 May 11-Sept. 30 Sept. 25-Oct. 2	166	29	
Palermo Trieste Turin	Sept. 25-Oct. 2 June 28-Sept. 12	16 2	5	
Jamaica:	vanc zo copii iziti	-		
Kingston Japan:				Previous report "July 22—present," was erroneous.
Kobe	May 9-June 27	10	5	· ·
Do Taiwan Island	June 28-July 18 May 1-June 20 June 21-July 20	7 40	2 11	ŧ
Tokyo	June 21-July 20 Apr. 21-May 10	14 5	8	
Java: East Java—	Арг. 21-мау 10	,	•	
Surabaya	Sept. 5-11	1		
West Java Batavia	Apr. 16-June 17	94	26	Apr. 16-June 24, 1920: Cases, 56;
Do	July 9-Sept. 23	ii	5	deaths, 10. June 25-Eept. 23, 1920: Cases, 115; deaths, 28.
Jugo-Slavia				Feb. 1-June 23, 1920: Cases, 2,519; deaths, 561.
FunchalDo	June 20-26 July 18-Oct. 23	i	2	
Malta	May 1-June 30		1 3	
Manchuria: Múkden	May 2-8		1	,
Mesopotamia: Bagdad	July 1–31	1		
Mexico: Ciudad Juarez	Aug. 2-8.	1	,	
Gua lalajara	May 1-31	1		
DoLaredo	July 1–31 July 30	3 2		
Mazatlan	May 19-25		1	
Salina Cruz Do San Luis Potosi	June 1–30 Aug. 1–31	5 1	3 1	
San Luis Potosi	May 21-June 6 June 28-Oct. 30		1	
Tampico Newfoundland:	July 1-31		12 5	
Broad Cove	Sept. 4-10	` 1		
Ladle CoveSt. Johns	Sept. 11–17 June 5–11	6 3		Reported at 2 other localities.
Shoal Harbor	July 10-16	7		July 3-16: Present at 4 localities.
New Zealand: Dunedin	Aug. 10-Sept. 20	15		
Poland	Jan. 1-31			Jan. 1-31, 1920: Cases, 1,895; deaths, 301.
Porto Rico: Caguas	Aug. 9-15.	1,052 1	228	deaths, 301.
Portugal:	- 1	- 1		•
Lisbon	May 16-June 28 June 27-Oct. 16		8 26	
Portuguese East Africa: Inhambane. Lourenco Marques	Sept. 12–18 Sept. 12–25	1 6		June 1-Aug. 31, 1920: Deaths, 1.
Russia: Riga	Aug. 1-Sept. 23	3		- ,
Vladivostok Do.	Jan. 1-June 30 July 1-31	252 2	78	May, 1920: Cases, 5. June, 1920: Cases, 7.
Sierra Leone: Baktau.				
Freetown	Sept. 1–30do	3		

Antung.....

Eastern Chinese Railway...

Harbin.....

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

Reports Received from June 26 to Nov. 26, 1920—Continued.

SMALLPOX-Continued.

Place.	Date.	Cases.	Deaths.	Remarks.
Spain:	:	1		
Barcelona	May 19-June 12	.	. 4	
Do	June 18-Sept. 29 July 16-Oct. 2	-	20	
Malaga	July 10-000. 2			Aug. 1-31, 1920: Deaths, 3.
Malaga Orense, Province	Sept. 6			Present.
Valencia Do.	May 23-June 26 July 4-Oct. 2	15 11	3 3	
Vigo	May 31-June 26	l	4	l ·
Do	July 18-Oct. 2		10	
Straits Settlements:	3507 16 99	1		Received out of date.
Singapore Sweden:	May 16-22	1		i itecerved out of date.
Stockholm	Sept. 19-Oct. 9	. 4		
Switzerland:	36-0.15	7	İ	
GenevaSyria:	May 9-15	1 '		
Aleppo	Aug. 29-Sept. 4		ļ	In city and in Armenian orpha
	1	11	ļ	age.
runis: Tunis	May 25-June 27	6	5	1
Do	June 28-Oct. 24	42	18	
Turkey:		1		
Constantinople	May 16-June 19 June 23-Oct. 16	7		
Do Union of South Africa:	June 25-Oct. 10	. 10		
East London	Sept. 19-25	1		
Johannesburg	Mây 1-31 July 1-31	23		
Do On vessels:	July 1-31	15		1
S. S. Bradford	Nov. 4	1		At Vancouver. From Talar
S. S. Henry R. Mallory	Oct. 2	1		Peru, via ports in Chil Mexico, and Peru. Left Talai about 21 days previous to a rival at Vancouver. At Habana from Spanish por Vessel left Vigo, Spain, Sep 19.
	турни	S FEVE	R.	
Algeria:				
Departments— Algiers	Mon 11 \Ang 21	44		
Constantine	May 11-Aug. 31 May 21-Aug. 31 May 11-Aug. 31	20		
Oran	May 11-Aug. 31	352		T. 1. 1. 7 00 1000 G 01
ustria	Feb. 15-June 26	65	•••••	Feb. 15-June 26, 1920: Cases, 65
Vienna Belgium:	rev. 10-3 une 20			
Ghent	Sept. 11-Oct. 23	10	1	
Bermuda:	Oot 10 02	2		
Hamilton Bolivia:	Oct. 18-23			
La Paz	May 2-June 30		17	
Do	July 1-31		12	
Brazil: Ceara	Apr 25-Tune 12		4	
Do.	Apr. 25-June 12 July 11-24		2	
Sulgaria:				
Sofiahile	June 20-25	2		Mar. 1-June 30, 1920: Cases
ALIEU			• • • • • • • • • • • • • • • • • • • •	1,338, deaths, 244.
Antofagasta	July 5-11			Fresent.
Caleta Co osa	May 10-16 Mar. 8-June 28		2	
Concepcion	Mar. 8-June 28	31	39 13	
Coquimbo	June 29-Sept. 20 Aug. 8-Oct. 7	1	13	
Santiago	Mar. 1-June 30	47 0	86	Sept. 10: Cases, 183.
Valparaiso	May 2-Sept. 24		29	. =
hina:	Inly 12-Oct. 17	64	9	Report week ended July 31, 1920

July 12-Oct. 17...

Aug. 9-Sept. 28....

64

5

Report week ended July 31, 1920, not received.
At stations on line.
On Eastern Chinese Railroad line. Year 1919: Cases, 301.
At other stations on line, 789

cases.

Reports Received from June 26 to Nov. 26, 1920—Continued.

TYPHUS FEVER-Continued.

Place.	Date.	Cases	. Deaths.	Remarks.
Chosen (Korea):				
Chemulpo	June 1-30		3	
Seoul	. Mar. 1-Apr. 30	. 4	4 j 1	
Czechoslovakia		-]	Feb. 1-28, 1920: Cases, 88; deaths
_ Leipnik	Feb. 22-28	.] 1	. 1	. Quarantine station.
Danzig	June 20–26	.] i	i I	
Danzig Do	July 25-31	.] i	1	1
Egypt:		l	1	
Alexandria	May 7-June 24	. 338	86	
Do Cairo	June 25-Oct. 7	. 867		
μο	Apr. 2-June 24 July 9-29	72	51	
Port Said	Apr. 9-June 24	. 112	53	
Germany		.		. Feb. 22-Mar. 27, 1920: Cases, 23.
			1	Among troops, 4; among persons from Poland, 8. Mar. 28-
	į	1	1	June 26 1020 Cocco 08 July
		1		11-24, 1920: Cases, 2. Addi-
		1	i	tional cases, June 18-July 10.
Great Britain:	35 00 - 40		1	10.
Dublin	May 23-June 19 Oct. 16-22	3 23	1. 1	1
Do Dundee	July 4-10	1 7		•
Glaszow	May 30-June 5	1	i	
Queenstown	May 30–June 5 Aug. 1–7	i		
Greece:				
Athons	June 27-July 21		. 5	
Drama Patras	July 12–18. June 29–July 4	1	. i	
Pir rus.	June 29-July 5		: i	
Saloniki	Apr. 12-27	384	42	
Do	June 28-Oct. 10	133	57	1
Guatemala:	A 0 15	l	1 .	
Guatemala City Hungary	Aug. 9-15	·[. 1	Jan. 19-May 30, 1920: Cases, 54,
Budapest	Jan. 10-May 23	27		Jan. 15-may 30, 1920; Cases, 54.
taly:		1		ĺ
Catania	July 10-17	3		
Trieste	May 16-22	5		
apan:	June 13-Sept. 25	186	15	
Kobe	Aug. 17-23	7		
Nagasaki	May 25-June 27	2	1	
Do	Sept. 13-Oct. 16	4	1	
ugo-Slavia	• • • • • • • • • • • • • • • • • • • •			Feb. 1-June 23, 1929: Cases, 691;
ava:		i .	ł	deaths, 92.
East Java-		l	1	
Surabaya	June 10-16	1		
West Java—		_ :		1.
Batavia	May 28-June 30	5	1	
fesopotamia: Bagdad	Aug. 1-31	1		
Iexico:	21ug. 1-01	•		
Chihuahua	May 31-June 6		1	
Nogales	Aug. 9-14	2		
San Luis Potosi	June 8-July 8			Present.
oland	July 2-Aug. 15	• • • • • • • • • • • • • • • • • • • •	2	Sept. 19. Present.
Oland	•••••••••			Jan. 1-Mar. 31, 1920: Cases,87,910;
Warsaw				deaths, 19,733. Jan. 1-Feb. 29, 1920: Cases, 911; deaths, 117
				deaths, 117.
erbia				Mar. 14-Apr. 10, 1920: Cases, 181;
outure.			1	deaths, 117. Mar. 14-Apr. 10, 1920: Cases, 181; deaths, 23.
ortugal: Oporto	Ane 4 Tuno 94	1,2	6	
	Apr. 4-June 24 Aug. 1-Oct. 23	15	î	
ussia:	11ug. 1-00t. 20	' 1	- 1	
		84		•
Riga	June 25-Sept. 30			
Riga			• • • • • • • • • • • • • • • • • • • •	JanJune, 1920; Cases. 3.955:
Riga Simferopol Vilna	Sept. 28.	35		JanJune, 1920: Cases, 3,955; deaths, 500.
Riga Simferopol Vilna Vladivostok	Sept. 28 May 1–21	22	2	JanJune, 1920; Cases, 3,955; deaths, 500. Jan. 1-Apr. 30, 1920; Cases, 1,264;
Riga Simferopol Vilna Vladivostok. Do.	Sept. 28.		2 4	JanJune, 1920: Cases, 3,955; deaths, 500. Jan.1-Apr. 30, 1920: Cases, 1,264; deaths, 144.
Riga Simferopol Vilna Vladivostok Do.	Sept. 28 May 1-21 July 1-Aug. 31	22	4	JanJune, 1920: Cases, 3,955; deaths, 500. Jan. 1-Apr. 30, 1920: Cases, 1,264; deaths, 144.
Riga Simferopol Vilna Vladivostok Do Doin: Barcelona Madrid	Sept. 28 May 1–21	22		JanJune, 1923: Cases, 3,955; deaths, 500. Jan. 1-Apr. 30, 1920: Cases, 1,264; deaths, 144.
Riga Simferopol Vilna Vladivostok Do. Dain: Barcelona Madrid. vitzerland;	Sept. 28 May 1-21 July 1-Aug. 31	22	1	JanJune, 1920: Cases, 3,955; deaths, 500. Jan. 1-Apr. 30, 1920: Cases, 1,264; deaths, 144.

Reports Received from June 26 to Nov. 26, 1920—Continued.

TYPHUS FEVER-Continued.

Place.	Date.	Cases.	Deaths.	Remarks.					
Tunis: Tunis Do	. May 24–June 27 July 6–Aug. 31	36 1	18						
Turkey: Constantinople Do	. May 16-June 12 June 19-Oct. 9	27 25							
Venezuela: Maracaibo	. July 21–27		. 1						
YELLOW FEVER.									
Brazil: Bahia: Colombia:	. May 23-Juno 19	1							
Buenaventura	June 3	1	1						
GuatemalaLos Amates	Aug. 5-Sept. 1	10	3	Oct. 25, 1920: Present. Aug. 17: Present at several localities.					
QuiriguaVirginia	Aug. 9–15 Sept. 10	1		Present. Station on railway from Puerto Barrios to Guatemala City, 45 miles from Puerto Barrios.					
Mexico: Culiacan Empalme	Oct. 16	i	i	Present.					
Guaymas	Oct. 13.	<u>1</u>	i	Previously reported, 2 deaths; later information shows 1 death.					
Progreso	July 30	1 4	2	July 30-Aug. 18, 1920: Cases, 5; deaths, 3.					
Puerto Mexico	Aug. 24–27 Sept. 13	1	1	Case arrived Aug. 23 on s. s. Mel- chor Ocampo from Progreso. Previously reported P. H. R.,					
Tampico _ Do	Sept. 17	3	2	Previously reported P. H. R., Sept. 10, 1920.					
Tuxpam Vera Cruz. Do	Sept. 1	88	2 2 73	Aug. 26-Sept. 1, 1920: Cases, 5; deaths, 5. Oct. 21-27, 1920: Cases, 27. Aug. 26-Oct. 27,					
Yucatan State— Campeche	Oct. 13	1	1	Sept. 10, 1920. Aug. 26–Sept. 1, 1920: Cases, 5; deaths, 5. Oct. 21–27, 1920: Cases, 27. Aug. 26–Oct. 27, 1920: Cases, 112; deaths, 59. In sailor from s. s. Yumuri. The vessel left Vera Cruz Oct. 1 for Campeche and New Orleans.					
Hocoba Hunucma M erida	Sept. 8 Sept. 8-Oct. 11 Nov. 5	8 2 1	1	In interior. Do. From Hunuema.					
SotutaPeru	Sept. 8.	î	1	In interior. Mar. 1-31, 1920: Cases, 228. Apr. 1-20, 1920: Cases, 64.					
CallaoCatacaos	Apr. 1-30	1 14		1-20, 1920: Cases, 64. At quarantine station. From s. s. Huallaga.					
Do La Huaca	Apr. 1-30	9		s. s. Huanaga.					
Do	Apr. 1-30do Mar. 1-31	5 37 12							
Paita Do Piura.	do l	81 14							
PiuraDoSalitral	Apr. 1-30	1 4 2							
Sullana Do	do	9							
Salvador	June 20–26	1 6 49	1 2 17	Sept. 12-18, 1920: I case. Aug. 22- Oct. 11; 1920: Cases, 3; deaths, 1. Fatal cases were in Europeans.					
On vessels: S. S. Haraldshaug	Sept. 28	1	1	At Pensacola, Fla. From Puerto Barrios, Tampico, and Vera Cruz.					
S. S. Soestdijk S. S. Yumuri	Sept. 11 Oct. 13	1	1 1	At Quarantine, La. At Campeche. Vessel left Vera Cruz Oct. 1, 1920.					
		!							