[Report 1895] / Medical Officer of Health, Halifax County Borough.

Contributors

Halifax (England). County Borough Council. nb2008024085

Publication/Creation

1895

Persistent URL

https://wellcomecollection.org/works/eqskfxcd

License and attribution

You have permission to make copies of this work under a Creative Commons, Attribution license.

This licence permits unrestricted use, distribution, and reproduction in any medium, provided the original author and source are credited. See the Legal Code for further information.

Image source should be attributed as specified in the full catalogue record. If no source is given the image should be attributed to Wellcome Collection.



County Borough



of Halifax

HEALTH DEPARTMENT.

Report

OF THE

MEDICAL OFFICER OF HEALTH,

TOGETHER WITH THE REPORTS OF THE

SANITARY INSPECTOR

AND

THE BOROUGH ANALYST,

FOR THE

Year ending December 31st, 1895.

Balifar:

WHITLEY & BOOTH, PRINTERS, ETC., CROWN STREET.

1896

Digitized by the Internet Archive in 2017 with funding from Wellcome Library

County Bosough



of Halifax.

HEALTH DEPARTMENT.

Report

OF THE

MEDICAL OFFICER OF HEALTH,

TOGETHER WITH THE REPORTS OF THE

SANITARY INSPECTOR

AND

THE BOROUGH ANALYST,

FOR THE

Year ending December 31st, 1893.

malifar:

WHITLEY & BOOTH, PRINTERS, ETC., CROWN STREET.

1896.

Staff of the Bealth Department.

Chief Sanitary Inspector. DAVID TRAVIS.

> Meat Inspector. JOHN M. CARNIE.

Assistant Sanitary Inspectors.

JAMES ARCHBELL

JOSEPH THOMPSON.

A. E. BOTTOMLEY.

J. E. FIRTH.

Bour Inspectors.

WILLIAM PARKER.

WALTER SEED,

foreman Scavenger. NATHAN GARSIDE.

Chief Clerk. JOHN WM. JACKSON.

Assistant Clerks.

HERBERT REED. HARRY WILSON.

Matron of the Borough Hospital. MISS ROBISON.

Disinfector.

T. W. BOOTH.

Dorter.

HENRY VICKERMAN.

Medical Officer of Bealth, and Superintendent of the Infectious Diseases Hospital.

D. AINLEY, M.R.C.S., L.R.C.P., &c.

Members of the Bealth Committee, 1895-96.

Mayor.

Mr. COUNCILLOR G. H. SMITH.

Chairman.

Mr. ALDERMAN JOHN PATCHETT.

Vice=Chairman.

Mr. COUNCILLOR NAYLOR.

Mr.	ALDERMAN	COE, J.P.,	Mr.	Councillor	W. C. F. SMITH,
,, (Councillor	CROSSLAND, J.P.,	,,	**	WEST-SYMES,
,,	,,	DODD,	,,	,,	TAYLOR,
,,	,,	FARNELL,	,,	**	WHITLEY, J.P.,
,,	,,	HEY,	,,	"	WHITAKER.

The Committee meets every alternate Wednesday, at 5-0 p.m., at the Town Hall.

County Borough of Balifax.

Report of the Wedical Officer of Health

FOR THE 52 WEEKS ENDED DEC. 28th, 1895.

To the Chairman and Members of the Health Committee.

GENTLEMEN,

For the twenty-third time I have the honour of presenting to you my Report on the Health of the Borough for the above-named period.

For those who have not time, and may be others who have not the inclination to wade through a lot of figures, I will summarise some of the results in a few sentences, and also insert a Table showing our position among the 33 largest towns, in respect to their Vital and Mortal Statistics.

Population 93813—		1894.	1893.	1892.
Births 2186—birth-rate 23:3		22.9	 24.5	 25.8
Deaths 1803—death-rate 19.2		16.3	 17.2	 19.5
Zymotic deaths 122—Zymotic de	ath-			
rate 1.3		0.9	 1.7	 1.5
Deaths from diseases of the respira	tory			
organs (excluding phthisis) 396		297	 321	 490
Deaths from phthisis 185				

				_				-	_	-				_	_	_	_	_	_		_	_	_	_	_	_	_		_	_
1895.	pour	Hate per of Uncerti	20.02	0.7	i :	9.1	0.00	1.1	9:	9.0	4.8	1.6	3.1	0.00	1:0	3.0	0.3	1.5	9 03	1.9	60	3.6	00	5.0	0.7	0.0	1.0	÷ C	8.0	1:1
year 18	nder	Deaths Children n I year of to I,000 Bi	182	166	134	104	178	143	179	518	183	190	503	180	174	210	212	203	190	142	236	248	158	158	203	101	100	189	180	186
the y		Diarrho	12,593 8,993	3,600	649	104	47	171	199	134	615	156	370	197	105	821	246	80123	152	211	272	291	47	222	100	616	721	958	113	198
during		Fever.	2,115 1,486	609	24:	14	200	21	15	17	81	56	33	18	4	187	53	66	26.99	30	53	61	9	16	40	0 0	40	135	15	48
Towns di		Whoopin Cough	3,888	1,483	686	24.0	86	45	250	22 10	171	53	200	200	4	372	67	250	54	54	75	20	500	23	100	112	11	63	62	29
	.ai	Diphther	3,735	2,316	200	200	10	34	920	2 5	183	19	35	9	45	120	16	108	26	43	6	00	15	14	020	50	000	ōœ	19	55
English	Ver.	Scarlet Fe	1,883	829	3 4 1	10	- 01	16	00 kg	0 00	127	10	16	10 8	16	144	83	169	15	55	00	4	19	2	3:	99	00	33	14	67
largest	*8	səlsaəK	5,623	2,632	101	97	77	00	47	40	136	27	35	-1	- 00	359	124	509	86	25	323	47	12	6	200	101	707	10	28	141
the la	.xe	od-Ilsm2	120	55	a :	::	: :	:	:	: :	00	:		, or	0 ;	13	1	01	:00	:		1	:		:	:				:
Jo	In	Deaths fr Princips Zymotic dis	29,957 18,413	11,544	151	209	171	295	377	362	1,721	291	577	195	959	2,016	530	1,950	393	585	710	423	119	122	0000	1,002	1,000	481	251	520
Thirty-three	1,000	Principal Nymotic Diseases.	8.0	5.6	00 10	8.7	1.5	1.3	4:24	4.9	101	2.7	99	91 9	4.6	4.0	4.5	1.00	0.00	3.9	9.9	9.0	1.3	0.10	010	1.7	700	0 00	5.6	5.3
-5000 h	Rate per Living.	Deaths.	20.7	19.8	14.4	18-9	20.1	18.1	18.5	18.3	20.3	19.3	17-2	19.0	19.5	8.83	94.0	25.5	9 9	23.4	24.3	23.9	16.9	19.3	19.9	20.02	0.02	20.3	9.61	20.2
ics of	Annual	Births.	31.3	30.5	25.55	9 22 2	28.7	58.9	34.3	25.4	32.4	31.8	30.8	2.62	30.7	36.9	35.9	23.7	927.5	32.1	30.08	33.4	21.7	23.4	26.1	21.6	0.4.0	25.1	34.6	31.5
Statist		Suffred	218,165 131,228	86,937	1,658	2,525	3,108	4,109	2,826	1,767	10,048	2,066	3,333	1,539	9.003	14,469	2,852	13,205	3,091	9,395	3,093	2,684	1,675	1,805	4,485	8,083	0,994	4,504	1,872	4,229
Mortal		Births.	330,896 197,181	133,715	2,896	3,057	9,508	6,579	5,321	3,231	16,026	3,398	5,954	6,718	3,938	18,525	3,921	17,624	3,873	3,189	3,899	3,753	2,150	2,103	5,890	12,479	516,11	4.819	3,306	6,437
Vital and	po uo 982.	Estimate Population To sibbim	10,591,530 ns 6,199,184	4,392,346	249,473 114,923	119,604	89.096	228,139	155,637	87,008	496,751	107,127	193,839	100 070	107,469	503,967	119,337	524,865	141 079	99,591	127,615	112,638	99,482	93,813	220,384	395,546	342,768	127,722	95,871	207,021
			Towns	:	: :			: :	:		: :	:		:	:	: :	:	-				:	:	:	:	:	:	:	: :	Tyne
Analysis of the		TOWNS.	33 Towns 32 Provincial Towns	London	West Ham Croydon	Brighton	Portsmouth Plymouth	Bristol	Cardiff	Swansea	Birmingham	Norwich	Leicester	Nottingham	Birkenhead	Liverpool	Bolton	Manchester	Saltord	Burnley	Blackburn	Preston	Huddersfield	Halifax	Bradford	Leeds	Sheffield	Hull	Gateshead	Newcastle-on-Tyne
				I		_		H	0	120	H	4	I			1	H	-	110	Щ	H	I	H	H	1	-10	ΩF	ЦО	20	Z

Population.—The Borough is divided into Twelve Wards, and the following are the Areas and Estimated Population of the Divisions in the middle of 1895.

WAR	DS.		Acres.	Population.	Number of Persons to an Acre.
Southowram	***		777	7349	9
SKIRCOAT		,	513	7774	15
East			191	8540	44
South			296	8510	28
Kingston			238	7069	29
West			86	9576	• 111
Pellon			241	7643	31
CENTRAL			82	8837	107
North			168	7716	45
Northowram			582	6853	11
OVENDEN			531	6840	12
Illingworth			4504	7106	1
TOTAL			8209	93813	11

Births.—The number of births registered within the Borough during the 52 weeks ended December 28th, 1895, is 2,186, composed of 1,157 males and 1,029 females, giving a birth-rate of 23.3. This is only an increase of 0.5 upon the rate of 1894, which was the lowest on record, and 3.4 below the mean rate of the preceding ten years, 1885-94, see Table on page 25 51 births are returned as illegitimate, against 73 in each of the two preceding years. This number is 2.3 per cent. of the total births, against 3.2, 3.4, 3.6, and 3.4 in the four previous years. Whatever we may think about the diminution of the birth-rate generally, the gradual reduction of the illegitimate births must be regarded with satisfaction.

In the 33 large towns dealt with in the Registrar-General's Weekly Returns the mean birth-rate in 1895 is 31.3 per 1000 of the estimated population, and ranges from 21.7 in Huddersfield, 25.3 in Croydon, and 25.6 in Brighton, to 35.1 in Sunderland, 35.4 in Wolverhampton, 35.9 in Salford, and 36.9 in Liverpool.

TABLE SHOWING NUMBER OF BIRTHS AND BIRTH-RATES IN EACH QUARTER OF 1895.

1	1895.	Males.	Females.	Total.	Birth-rate per 1000 living.
1st Qua	rter	 317	258	575	24.5
2nd	,,	 279	247	526	22.4
3rd	"	 297	274	571	24.3
4th	,,	 264	250	514	21.9

Our very low birth-rate—so much below the average of other towns with the exception of Huddersfield-has been the subject of so much comment and speculation that I have tried to find out some likely cause. I am not sure that I have succeeded, but the following Table shows that the percentage of persons living between the ages of 20 and 40 years of both sexes have gradually increased from 1871 to 1891, and yet the number of births have very considerably diminished. At the census of 1891 there were 13,665 persons of both sexes, between the ages of 20 and 40, more than in 1871, and yet the births for the former year were 318 less than the latter. Or to put it another way, a population in 1871 of 65,510 gave 2,478 births, while a population in 1891 of 89,832 only yielded 2,160. We must also remember that the decrease did not stay in 1891. A birth-rate in that year of 26'o per thousand has further fallen to 22.8 in 1894, and only reached 23'3 in 1895. I have not the information before me of the relative marriage rates of the above periods, but I should say that the probabilities are that a postponed marriage age, coupled with a desire to have smaller families than our forefathers had, account for the greater part of this declension.

These figures are worth the consideration of the School Board in their provision for elementary education.

Census Periods.	Population.	Between 20 and 40 Years of Age.	Percentage to the whole Population of the Ages 20-40.	Birth-rate whole Population	Number of Births.
1871 {	м. 31117 г. 34393	м. 9672 г. 11373	м. 31·1 г. 33·1	} 38.0	2478
1881 {	м. 25195 г. 28843	м. 9251 г. 11247	м. 36·7 г. 39·0	31.7	2338
1891 {	м. 41921 г. 47911	м. 15993 г. 18717	м. 38·1 г. 39·1	} 26.0	2160

Deaths.—The deaths registered within the Borough, which had been 1,642, 1,591, and 1,522 in the three preceding years, rose in 1895 to 1,803, comprising 926 males and 877 females. The death-rate is equal to 19.3 per 1000, against 19.5, 17.3, and 16.3 respectively in the three years 1892-94, and is 1.5 below the mean rate for the ten years 1885-94.

In the 33 large towns dealt with by the Registrar-General in his Weekly Returns the death-rate in 1895 equalled 20.7 per 1000, and exceeded by 1.2 the rate in Halifax. Among these large towns the rates ranged from 14.4 in Croydon, 16.7 in Derby, 16.9 in Huddersfield, 17.2 in Leicester, and 17.8 in Portsmouth, to 24.3 in Blackburn, 24.4 in Wolverhampton, 25.2 in Manchester, 25.6 in Salford, and 28.8 in Liverpool.

TABLE SHOWING DEATH RATES PER THOUSAND OF THE POPULATION IN EACH QUARTER FROM THE FOLLOWING DISEASES:—

1895.	Zymotic Diseases.	Consumption.	Lung Diseases excluding Consumption.	From all Causes.
First Quarter	1.1	2.3	7.2	24.9*
Second Quarter	0.5	2.4	3.3	18.2
Third Quarter	1.8	1.4	2.0	15.6
Fourth Quarter	1.5	1.7	4.2	18.0
Whole Year	1.28	1.97	4.22	19.21

^{*} The increased mortality of the First Quarter is due to the continued low temperature and its effect on lung diseases of January and February, to which further reference is made in the text. See also Chart.

Infant Mortality.—Of the 1,803 deaths in the Borough in 1895, 354 were of infants under one year of age, being an increase of 62 on the previous year, but a decrease of 40 on the year 1893.

Infantile Mortality measured by the proportion of deaths under one year to registered births was equal to 158, against 173, 174, and 137 in the three preceding years 1892-3-4. and a decrease of 2 on the mean rate for the ten years 1885-94. The Illegitimate rate was 460 per 1000 births, and all died under one year of age. In the 33 large towns the rate of Infantile Mortality last year averaged 182 per 1000 births, and exceeded the rate in Halifax by 24. The Yorkshire County Boroughs stand as follows: Leeds 191, Bradford 203, Sheffield 197, Hull 205, and Huddersfield 158. Like our own town, each has an increase upon the year 1894.

TABLE SHOWING RATES OF MORTALITY OF CHILDREN UNDER ONE YEAR OF AGE FROM CHIEF INFANTILE DISEASES PER THOUSAND BIRTHS, AND RATE PER CENT. OF TOTAL DEATHS.

		1895.	
Diseases.	Total Deaths.	Rate per 1000 Births.	Rate per cent. of total Deaths at all Ages.
From all causes	351	160.5	19.4
Lung Diseases	48	21.9	2.6
Marasmus, Wasting Diseases	34	15.5	. 1.8
Premature Birth, Inanition	94	43.0	5.2
Diarrhœa	27	12:3	1.4
Whooping Cough	8	3.6	0.4
Convulsions	56	25.6	3.1
Scrofula, Tuberculosis	6	2.7	0.3
Dentition	9	4.1	0.4

Mortality at Groups of Ages.—The 1,805 deaths in Halifax last year included 530 of children under 5 years of age or 28.8 per cent. of the total deaths; between the ages of 5 and 15 years, 60 deaths occurred, or 3.3 per cent.; between 15 and 25 years, 97 deaths took place, or 5.4 per cent.; 554 between 25 and 60 years, or 30.7 per cent; and at 60 years of age and upwards, 562, or 31.1 per cent.

In Table 2 are given the rates of Mortality that prevailed in 1895 among the persons estimated to be living in each of the above-mentioned age periods as shown by the Census of 1891. In the same Table are inserted similar rates of Mortality in previous years for comparison. The death-rate of children under 5 years of age, which had been 54.0, 62.0, and 50.7 per 1000 living at those ages in the years 1892-3 and 4, rose in 1895 to 56.5, and is 4.2 above the mean rate at those ages during the ten years 1885-94. The rate of Mortality at the next age-period 15-25 years was equal to 58 per 1000, which was 1 o above the rates of 1894, and also above the mean of the decade 1885-94. Among persons aged 25-60 years the rate was 17.3, against 13.6, 10.7, and 14.5 in the three preceding years. Among persons aged upwards of 60 years the rate of Mortality was equal to 92.9 per 1000, the mean for the last decennium being 87.2.

Causes of Death: Zymotic Diseases.—The 1,805 deaths in Halifax during 1895 included 122 which were referred to the principal zymotic diseases, against 127, 157, and 81 in the three preceding years. These 122 deaths are equal to 6.7 per cent. of the total deaths, and to an annual rate of 1.3 per 1000 of the population, against 1.51, 1.7, and 0.9 in the years 1892-3-4. In the

ten years 1885-94 the mean zymotic death rate in Halifax was 1.42. It may be mentioned in this connection that the zymotic rate in the 33 large towns in 1895 averaged 2.8 per 1000, while the rate in 32 provincial towns was equal to 3.0 per 1000, in both cases considerably higher than Halifax.

Small=pox. — In the middle of December, 1894, a sudden outbreak consisting of three cases of small-pox occurred, and at the beginning of the year 1895 the whole of these were in our Hospital; I am very glad to say, however, that the prompt manner these were treated—by isolation, re-vaccination, and disinfection—no other cases followed, and this immunity has extended throughout the year.

Measles.—This infantile malady has been quiet during the year, deaths occurring in only four Wards out of the twelve, namely 2 in Ovenden, 4 in Illingworth, 2 in Southowram and 1 in South. The total for the year is 9, against 39, 64, 5 and 32 in the preceding four years. The average for the ten years 1885-94 is 34.

Scarlet Fever.—During the year under notice 52 cases of scarlet fever have been notified to the Health Department, which is considerably the lowest number on record, the four previous years being 429, 256, 150 and 114 respectively. The case mortality 6 in 52, is rather above the previous year, which was 4 in 114. The deaths in the four preceding years were 36, 7, 3 and 4 respectively. (See Tables B and 8, page 33.)

Diphtheria.—29 cases of this complaint have been notified during the year, against 42 in 1894; the deaths in the latter period were 11, and for the former 12. Although

the number notified has been considerably less the mortality per cent. has been higher. In 1894 it was 26.2, in 1895 41.3.

Whooping Cough.—24 deaths were recorded of this disease in 1895, against 58, 9, 32 and 21 in the preceding four years. The mean of the ten years 1885-94 is 23-6.

Fever. — This term includes typhus, enteric and simple continued and ill-defined forms of fever, to which 16 deaths are referred, against 5 in the previous year and 12 in 1893. The average for the last ten years is 12.7. The percentage of deaths to notified cases is 26.3 which is very much higher than the two preceding years, which were 17.4 and 9.6 respectively.

Diarrhæa, including Dysentery, caused 53 deaths during 1895, against 16, 13, 2, 38 and 4 in the preceding five years respectively. The mean for the ten years 1885-94 is 17.4. It is well known that the mortality of diarrhæa usually occurs during the months of July and August, depending as it would seem on the higher temperature of those months; but the summer of 1895 was exceptional in this respect. During the two months just named we had only 2 deaths from diarrhæa, while in September and the early part of October 48 deaths were recorded. It is the increase in the deaths from this disease caused by the abnormal climatic conditions of September that raises our zymotic death-rate above that of 1894. Further observations on this subject will be found in the remarks on the meteorology of 1895.

Respiratory Diseases.—Under this heading are included bronchitis, pneumonia, and pleurisy, which

together tabulate 396 deaths, being an increase on 1894 of 99. The numbers for the four preceding years were 499, 490, 321, and 297 respectively. The higher rates which prevailed in 1891-2 were due to the epidemic of influenza which in so many cases proved fatal by subsequent or concurrent attacks of pneumonia. See also remarks on the winter of 1895.

Phthisis or pulmonary consumption caused 185 deaths, against 168, 134, 135, and 141 in the preceding four years. Among the other causes of death in 1895, one each was referred to erysipelas and pyæmia and 175 to heart disease. I pointed out last year that the deaths from heart disease is a constantly increasing factor, and this year's Report confirms it. The figures for the three previous years are 117, 128, and 163.

The deaths referred to different forms of violence within the Borough are 38, against 49, 45, 39, and 39 in the preceding four years. These 38 deaths are equal to 2.1 per cent. of the total deaths from all causes and to a rate of 0.40 per thousand of the estimated population. (For details see Table 4.)

During the year 1895, 96 deaths were registered on the authority of the Coroner's Certificate, being inquest cases. These are equal to 5.3 per cent. of the total deaths, against 5.1 in the previous year and 3.5 in the year 1893.

The causes of 37 of the deaths in Halifax last year were not certified by a registered medical practitioner or by the Borough Coroner. The proportion of uncertified deaths is equal to 2.0 per cent. of the total deaths, against

5'1, 5'5, 4'5, 4'3, and 4'5 in the preceding five years. This is a gratifying improvement and the reward of continuous efforts of many years.

Influenza. - 37 deaths are recorded as being caused by this disease, against 30, 19, 15, and 22 in the years 1891-2-3-4. As in former years so also in this, the deaths are not distributed equally over the year, but occur chiefly in the winter or spring months. In the year under notice the disease broke out in the middle of February and had reached its maximum in the second week of March in which month, out of the total of 37 deaths, 28 were registered. Its decline was then rapid, and it had disappeared in an epidemic form by the end of April. In Table A is seen the distribution of deaths in the Wards of the Borough. There is no marked incidence in any part; Ovenden alone is exempt. The deaths at the higher ageperiods come out again as in former years. Out of a total of 37 deaths, 16 occurred between the ages of 25 and 60; the same number also took place at the ages of 60 and upwards. As in previous years, hand-bills with full instructions were freely distributed throughout the town, and, I believe, rendered good service.

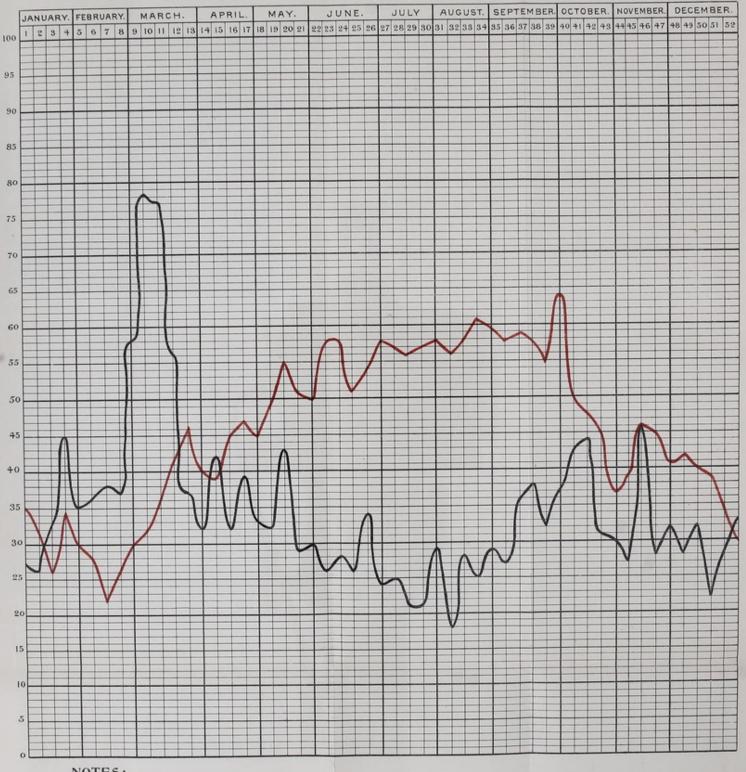
The Borough Fever & Small=pox Hospitals.—
On reference to Table 6, page 31, it will be found that on January 1st 3 patients suffering from small-pox were the only inmates of the Hospitals. 71 patients have been admitted during the year: 39 of typhoid fever, 25 of scarlet fever, and 7 others. The total deaths numbered 11, and 5 remained in the Hospital on Dec. 31st. The death-rate per cent. of cases admitted during the year is 14.8, the mean for the last 23 years being 13.65. The case mortality would be considerably reduced if we could have the patients at an earlier stage of the disease; some

have died on the day of admission and others on the second day, but we are hoping that as the advantages of the Hospital become more known and appreciated the objections will pass away, patients will be sent sooner, and the Staff will have a better chance of showing of what they are capable. It does not take much skill to put a screen round a bed and then send for the porter to remove the corpse to the Mortuary. (For the proportion of patients sent into Hospital to those notified see Table B.)

In my last Report I had the pleasure of stating that you had decided to furnish the newly-erected Nurses' Homes, and I am now pleased to write that the appointments have been carried out with taste and generosity, and for the greater part of the year the Staff has been in the undisputed and happy enjoyment of them, and I know they gratefully appreciate the comforts which you have provided them.

The changes in the *personnel* of the Staff have been few during the year; one nurse has left to be married and her place filled by a new one. The present Staff consists of four nurses, four servants, one porter, and Miss Robison, the matron, who has occupied her present post for six years to the entire satisfaction of the Committee.

The religious needs of the patients have been generously attended to, as in former years, by the visits of the Rev. W. L. Stock, Curate-in-Charge of the Caddy Field Mission, in whose district the Hospital is situate, and also by Mr. Hartley, one of the town Missionaries. To both these gentlemen the thanks of the Committee are due for their gratuitous and much appreciated ministrations.

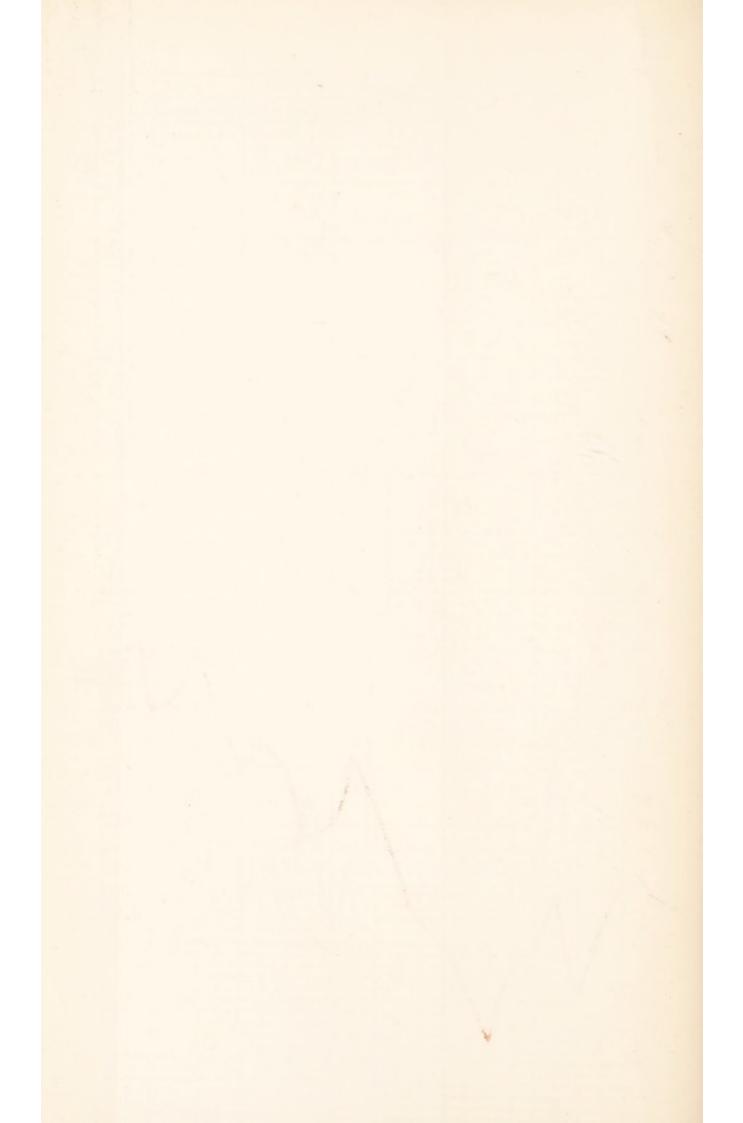


NOTES:

Black = Curve of Deaths.

 $Red = Curve \ of \ Temperature.$

The Numbers in the Column on the left hand give, in the case of the Black curve, the Weekly Number of Deaths. In the case of the Red, they give the Mean Temperature of the Week as deduced from the readings of the Maximum and Minimum Thermometers to the nearest degree.



The Meteorology of the year and its influence on the Death-rate.— The greater part of the increase in the number of deaths for 1895 over its predecessor may be accounted for by the effect of the unusually low temperature in the first quarter of the year, and also of the abnormal heat and dryness in the month of September. I would call your attention to the chart which is appended showing the direct relation of cause and effect between a falling barometer and the death-rate.

The figures as given by Mr. Glaisher, of the Royal Observatory, in his first quarterly Report for 1895, are very significant. He says-"The most remarkable feature of the very severe period from January 27th to February 18th was the long succession of very low night temperatures, and so far as I know such a series of 23 consecutive low night temperatures is unprecedented." The three lowest in the Table are all shown on the same day, February 8th. The lowest of all was Hereford, which was 1°6 below zero, and Halifax closely follows with 1°0 below zero, and Mr. Glaisher adds that the temperature at Hereford on the day in question was the lowest he had ever had to report during the 50 years he had furnished the Returns. It has been suspected by some persons for a long time that Halifax was not only a cold place, but very much colder than neighbouring towns, and the records for the first quarter of 1895 seem to corroborate this idea, for we find that the mean of the 33 days above referred to was at Bradford 22'3, Hull 20'5, and Leeds 23'2, while Halifax was as low as 14.8, in fact there were only two lower, viz. Salisbury 14.0 and Barnet 14.1. A look at the chart will show that although the rise of the mortality is immediate the effects of the low temperature go on accumulating for weeks after the extreme cold has passed away, in fact the

death-rate had not fallen to its normal until the end of March.

As the lungs are the chief citadel attacked by cold the following figures giving the number of deaths at six groups of ages show the age-periods which suffered most, and it comes out as it has always that up to 30 years of age cold has not much effect on the mortality; but after that period the rise is gradual and progressive; so that of the increase of 72 deaths from bronchitis in 1895 at all ages over 1894, 56 of them were of persons aged 60 and upwards.

TABLE SHOWING THE INCREASE IN THE NUMBER OF DEATHS FROM LUNG DISEASES AT THE HIGHER AGE-PERIODS IN 1895.

	All Causes.	0-1.	1-5.	5-15.	15-25.	25-60.	60 and upwards.
Bronchitis	185	34	20	2		45	84
1895	257	31	14	1	4	67	140
Pneumonia	108	26	22	2	4	37	17
1895	140	17	31	4	4	61	23

These observations do not hold good with regard to pneumonia, as a glance at the figures will show, for although there is an increase of 32 deaths at all ages over 1894, only 6 of them were of persons aged 60 and upwards, but 24 occurred between the ages of 25 and 60.

If the cold wave of the first quarter of the year was unprecedented, equally so were the climatic conditions of the month of September, and to these we ascribe the 48 deaths from diarrhoea that occurred in that month and the first fortnight in October. These conditions consist of a high barometric pressure, continued high atmospheric temperature, excessive diurnal range, diminished rainfall, and low wind velocity. A glance at the accompanying Table, prepared by Mr. Whiteley, will enable one to see that most of these conditions were present during the period above referred to. The barometric pressure stood at the high average of 29.45 inches; the mean thermometer recorded 57.8 degrees; the diurnal range averaged 16.2 degrees, and during the last week in September was as high as 20.8 degrees; the mean moisture per cent. was 78.0, and the wind velocity was very low. The rainfall was 1'42 inches, and for three weeks practically nil. The highest recorded temperature in the shade for the period we are considering was in the fourth week of September, viz. 78.7, and the lowest 38.0 on the 22nd.

A study of these figures show that the meteorology of the year is closely allied to the mortality, and the question naturally arises, can we do anything to mitigate the effects of either extremes of heat or cold? It is obvious that the latter is largely a personal matter, and will depend on the "comfort" (using the term in a wide sense) which the people can command. But the former may be regarded somewhat differently, for the diseases which accompany a high atmospheric temperature—chiefly bowel disorders—are supposed to have a microbic origin, and are largely aggravated by insanitary conditions. It is our business then to see that we have no such insanitary conditions in our midst in which specific germs can be generated and disease spread.

						_	_			_				_			_	_
Wind Velocity.	8.0	1.4	9.0	9.0	2.0	2.0	9.0	9.0	2.0	9.0	7.0	9.0		2.0	1.3	0,2	8.0	11
Rainfall.	Inches.	2.31	3.00	90.9	11-	9	2.81	53	2.74	ò	-34	1.45		2.58	5.04	2.02	3.34	10
Mean Humidity.	100=Saturation 75.3	74.1	73.0	7.4.4			0.08		00	4	83.0	0		9	CA	9.82	4	G
Mean Temperature of Month.	04	57.3	1-	50	1.99	9.09	54.4	58.1	51.1	53.1	49.4	24.8		53.7	0.16	53.8	57.1	00
Monthly Range of Temperature	39.4	30.7					22.0		25.3					31.7	35.0	26.2	26.4	7
Lowest Temperature during Month.	40.9	47.0	47.0	46.5			45.0				9.98			41.1	45.0	41.8	49.5	9
Highest Temperature during Month.	00	7.77	9	4			0.79		64.3	20.3	63.7	7.87		CA	1-	0.89	10	HC.
Range to Temperature	0 04	14.0	4	0.1	11.4	13.4	19.5	12.1			12.3			9.11	13.5	12.1	13.6	4
Mean Lowest Temperature	49.2	52.1	51.7	8.09	51.5	6.49	8.09	52.9			8.04			49.1	7.19	49.4	51.4	00
Highest Temperature Mean.	61.7	1.99	1.99	63.1			60.3		2.19	9.69	58.1	6.99		2.09	64.6	9.19	65.0	c
Mean Barometrical Pressure at 32°.	Inches. 29.345	805.62	29.507	29.140	29.213	29.310	29.506	29.173	29.246	29.152	29.550	29.447		29.268	29.526	29.321	29.253	
	:	:	:	:	:	:	-	;	:	:	:	:		1892	1893		895	
	July. 1892		1894	,, 1895	Aug. 1892		1894	,, 1895	Sept. 1892			,, 1895	Means for	3rd Quarter,				33

BAROMETRICAL READINGS TAKEN AT THE PUBLIC LIBRARY, BELLE VUE, BY MR. WHITELEY.

(1.) The first column of figures gives the readings of the Barometer reduced to monthly means and to the Standard Temperature of 32°. About '700 must be added to bring them up to the readings taken at Sea Level.
(2.) The second column shows the mean temperature during the day; the third column the mean of the night.
(3.) The eighth column gives the mean temperature of the month at all hours; these numbers are deduced by combining the readings of the Max. Min. and Dry Bulb Thermometers.

Bacteriological Apparatus.—During the year you kindly allowed me to fit up a Bacteriological Laboratory in order by cultivation of the various baccilli to confirm or otherwise the cases notified. To this end I sent out circulars to the medical profession informing them of my willingness to make cultivations at any time, and also offering to provide autitoxin gratis to any medical man who notified a case. A number of the profession in the town availed themselves of this offer, and some satisfactory work has been done; but I am sorry to say that I think more ought to have been done, and I hope that this will be the case in the future.

Taking the three principal or common zymotic diseases in their relation to one or other of the methods of house sanitation in operation in the Borough, it is found as one would have expected from the following Table that 1.5 per cent. of cases occurred in houses having old middensteads, while the Goux system gave 0.74 per cent. and the water-closet system 0.38 per cent., or, to put it in other words, a very much larger percentage of zymotic cases are found in connection with houses with midden-steads than of the other two systems in general use in the town. This result will only encourage us to continue the practice of past years in reducing the former as much as possible. The approximate numbers at the present time are, old middens 712, W.C.'s 4,200, and Goux (pail) closets 14,000.

TABLE SHOWING THE SANITARY CONDITIONS AND PROBABLE CAUSES OF THE NOTIFIED CASES OF THREE PRINCIPAL ZYMOTIC DISEASES.

	ed.	Drai	nage	Venti	lation				A	Prol	pable ned (3.
Diseases.	Number of Cases notified.	Good	Bad	Good	Bad	Old Midden.	Goux Closet.	Water Closet.	From a Cold.	From a previous Case in the same House or School.	From Defective Drains.	Contracted from House,	No Trace.
Scarlet Fever Deaths, 6	52	46	6	52		8	34	5	3	16	6	M: .	27
Typhoid Fever Deaths, 16	58	39	19	58		1	49	6	7	7	19	12	13
Diphtheria Deaths, 12	29	18	11	29		2	21	5	1	2	12	1	13
Total	139	103	36	139		11	104	16	11	25	37	13	53
Total Deaths, 34													

Lodging Houses.—Although the lodging houses are not under the Health Committee at the request of the Watch Committee I accompanied Sergeant Osborne, the Lodging House Inspector, and Mr. Travis, Chief Sanitary Inspector, in a thorough survey of every registered house, and gave a detailed report to the Watch Committee, which I find has been acted upon in the closing of some of the houses and the improving of others.

Midsummer Fair—In order to see that no infectious disease was brought and left in the town by these peripatetics, 52 vans were inspected on the fair ground by Mr.

Travis and myself and found entirely free from such diseases.

Congress.—In September last Alderman Coe, J.P., with the Chief Inspector and myself, represented our town at the Congress of the British Institute of Public Health at Hull. A full report of the proceedings was presented to you shortly afterwards and printed and circulated through the Members of the Council.

Sanitary Legislation in 1895.—Political parties were so unsettled during the year under notice that very little time was found for useful Sanitary Measures. The Bill introduced by Mr. Asquith, however, escaped the fate of many others, and the Factory and Workshops Act became law, and thereby remedies many defects of former Acts The benefits are mostly on the side of the workers. The provisions of the Act are in full operation in the hands of the Inspectors.

Water Supply.—Although this important matter is not strictly under the direction of the Health Committee, yet it is so closely allied to the well-being of the town that it cannot entirely ignore it. Several cases of lead poisoning were brought to the knowledge of the Sanitary Officers during the year, and on enquiry were found to be caused by the long length of lead pipe connecting the house supply to the mains. During the year samples of water have been taken not only from the Reservoirs but also from the chief tributaries with a view of ascertaining the amount of acidity in each case. For this purpose Dr. Houston, representing the Local Government Board, accompanied Mr. Paskin, the Waterworks Engineer, and myself. During the two days we went over a large portion of our watersheds, and Dr. Houston took away with him

samples for analysis; his report however is not yet to hand. The duplicate samples which we also took were submitted to our Borough Analyst, and his report was before you in September last. As a matter of fact, it was found that the amount of acidity was in proportion to the amount of contact the water had with "peat," and in the case of the flat land where the water moved slowly the reaction was very marked. I believe it has since been stated that this action of the peat on water is due to the presence of a microbe.

The obvious lesson taught by this condition of the water is the discontinuance of the use of all lead pipes as far as possible.

Following my Report is the one by the Chief Sanitary Inspector, and also the Annual Report of the Borough Analyst, from a perusal of which I think you will see that no section of the Health Department is being neglected.

Thanking you, as in the past, for much help and sympathy in the work.

I am, Gentlemen,

Your obedient Servant,

D. AINLEY,

Medical Officer of Health.

TABLE OF POPULATION, BIRTHS, AND OF NEW CASES OF INFECTIOUS SICKNESS, COMING TO THE KNOWLEDGE OF THE MEDICAL OFFICER OF HEALTH,

DURING THE YEAR 1894, IN THE URBAN SANITARY DISTRICT OF THE BOROUGH OF HALIFAX;

CLASSIFIED ACCORDING TO DISEASES, AGES, AND LOCALITIES.

New Cases of Sickness in each Locality coming to the knowledge of the Medical Officer of Health. POPULATION AT ALL AGES, Number of such cases Removed from their Homes in the Several Localities for Treatment in Isolation Hospital. 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 3 4 5 6 7 8 9 10 11 12 13 Census 1891. (b.) (a.) (c.) (d.) Ovenden Ward -6469 6800 181 Northowram Ward 6699 150 17 North Ward 7416 7694 174 Central Ward 8658 8911 207 3 West Ward 9017 9324 186 South Ward 8085 8353 160 East Ward 8417 8572 153 Southowram Ward (H) 7042 7342 195 Skircoat Ward -7232 7587 180 14 Pellon Ward -7575 196 6 Kingston Ward -6732 6904 Illingworth Ward 6969 7100133 Workhouse 26 Infirmary Borough Hospital TOTALS 89832 92861 2128 16 114 43 - 52 3 _ 16 32 15

The Notification of Infectious Diseases has been compulsory in the District since 1882.

The Isolation Hospital used by the sick of the District is marked (\aleph) and is situate in Southowram Ward.



IN THE	g. Deaths of Infants under		1	-	.3 167	1	-	_	1	.0 149	1	1	_	1	-	1	1	
BIRTHS, DEATHS, AND INFANT MORTALITY IN THE ROUGH OF HALIFAX, 1880-1895.	Rate per 1000 living	Births. Deaths		_						28.4 21.0								
DEATHS, AND INFANT OF HALIFAX, 1880-1895.	The state of	Dearins.	1632	1589	1519	1491	1786	1508	1775	1660	1571	1667	1827	1877	1642	1591	1522	1803
THS, DEATH	17-10	Direns.	2454	2338	2247	2162	2262	2231	2255	2249	2282	2192	2277	2160	2169	2254	2128	2186
0		ropulation.	72987	73845	74713	75591	76479	77325	78287	79207	80138	81080	82034	83109	84097	92000	92800	93813
TABLE 1.—POPULATION, B			:	:	:	:	:	:	:	:	:	:	:	:	:	:	:	:
TABL	*	rears	1880	1881	1882	1883	1884	1885		1887	1888	1889	1890	1891	1892	1893	1894	5681

JIFAX,		60 and upwards.	72.9	2.17	74.2	90.1	85.5	83.3	92.4	88-5	93.8	84.5	94.3	9.96	89.3	75.6	74.9	95.6	
н оғ нл	roup.	25-60.	:		13.7	14.0	16.3	14.7	14.9	16.2	13.0	15.3	17.5	16.4	13.6	10.7	14.5	17.3	
IN GROUPS OF AGES IN THE BOROUGH OF HALIFAX, 1880-1895.	Death-Rate per 1000 living in each group.	15-25.	:	:	2.0	2.9	5.3	5.5	0.9	0.9	3.9	4.6	0.9	9.9	4.4	3.0	8.4	5.8	
S OF AGES IN 7	ath-Rate per 100	5-15.	:	:	4.3	5.1	5.5	4.9	5.3	4.0	3.6	3.2	4.3	4.3	3.9	2.1	5.6	2.1	
GROUPS OF	De	0.5.	70.3	0.89	62.9	49.6	0.02	50.3	68.5	54.8	55.4	2.69	59.1	63.3	54.0	62.0	2.09	2.99	
		All Ages.	22.4	21.5	20.3	19.7	23.4	19.2	22.7	21.0	19.6	9.03	22.3	22.6	19.5	17:2	16.3	19.5	
TABLE 2.—DEATH RATES			:	:	:	:	:	:	:	:	:	:	:	:	:	:	:		
TABLE 2	Years		:	:	::	:	:	:	:	:	:	:	:	:	::	::	***		
			1880	1881	1882	1883	1884	1885	1886	1887	1888	1889	1890	1891	1892	1893	1894	1895	

FROM ZYMOTIC DISEASES IN THE BOROUGH OF HALIFAX, 1880-1895.	Principal Death-rate Zymotic Diseases. These Diseases.		169 9:10		93 1.24	62.0 09			175 2.22		94 1.16		04 1.27	159 1.91	_		81 0.9	21 1.29	
пен	-	_	7 -	-			1		1		-	-	1	_	_	1		1	
BORO	Diarrhea and Dysentery	00	9 0	0	25	00	38	20	38	23	14	16	13	G1	-	38	*	53	
THE	Enteric Defined Fever. Fever.				:	5	67	63	67	:	7	3	1	::		::		:	
SES IN		25	67 6	21.	57	26	22	12	13	12	6	22	13	22	-	12	5	-17	
DISEAS	Typhus.				1	1	1	1	1	:	:	:	1	:	:	:	:	:	
MOTIC DI 1880-1895.	Diphtheria Whooping Typhus.		07	17	11	1-	33	12	11	11	35	ଟୀ	15	58	6	32	21	24	
FROM ZY	Diphtheria		4 -	4	63	:0	8	7	16	9	3	-	12	2	14	18	11	12	
SATHS 1	Scarlet Fever.		44	102	21	6	28	32	6	33	21	1	24	36	1-	3	4	9	
VING DI	Measles.	;	eT	0	11	1	57	:	85	14	10	70	25	39	64	5	32	6	
3.—SHOWING DEATHS	Small-pox.		: '	0	:	:	:	1	:	::	1	1	:	:	19	33	4	:	
TABLE	Years.	4 4 4	1880	1881	1882		1884				1888	6881				1893			

TABLE 4.—DEATHS	FROM THE 52	VARIOUS CAUSES AT SIX GROWERS ENDING DECEMBER 28TH, 1896.	CAUSES A	AT SIX GROUPS R 28TH, 1896.	GROU 1896.	IPS OI	OF AGES,	s,	
			* 11.4	Under 5	years.	1	20 21	05 60	60 and
			All Ages.	0-1.	1-5.	.01-0	10-20.		upwards.
All Causes			1810	351	186	09	100	556	557
Small Pox	:	:	: <	: c	:	:	:	:	:
Measles Scarlet Fever	: :		9	۹ :	- 4	:-	:-	: :	: :
	:			:	00	00		::	:
Whooping Cough	:	:	24	00	16	:	::		
Typhus	:	:	: 5	:	:-	:		::	:
Enteric Fever	::	:	91 -	:		:	4	-	
Simple and undefined Fever	:	: ::		::0	10	:	:		:
Diarrhea, Dysentery			C	7.7	70	:	::	-	9
Simple Cholera	:	:	73	_	:	:	:	1	
Venereal Affections	:	: ::	:	:	:	:	:		:
Erysipelas	:	:		:	:	:	:	- ,	
Pyemia, Septicemia	:		-		:	:	:	- 0	::
Puerperal Fever	:		67	:	:	:	:	.71	::
1	:		67	27	:	:		::	:
		:	•	:	:	:	:	:	: '
					:	:	:	4	1
Rheumatic Fever, Rheumatism of	of Heart		00 1	:	:	:	.77	:	
Rheumatism	:	: ::	7	:	: 0	:	-	4	อา
Rickets	:			77	77	. (:	::	::
Cancer	:	::			:	00.0	:	42	30
Tabes Mesenterica, Marasmus	:			34	6	· 03		:	
Tubercular Meningitis	:			-	14	4	- 00	00 1	: ;
Phthisis	:	:		23 6	4	oc 6	36	97	16
Scrofula, Tuberculosis	:	:	58	9	4	200	000	7 1	:
Other Constitutional Diseases	:				23	20	27	17	6

-		110	717	200		:	37	94		140	140	23	::	1		6	-	101	10	00	5		4	6	,	:	:-	,	4		::	:	-	4 -	٦,	٦,	ĭ	: :	91 (
:		: -	7 .	16	:		37	86	3	6.7	70	19	c7	22		-	-	1 0	CI C	00	2	:	15		: 00	- 0	,	:	4	::	-	:	10		1	4.		-	16
:		:	:	:	:	::	00	13	,	: "	# 0	3	-	7					* 0	7	-	:	2	1	-		:	: "	I	:	:	-		: -	1	:	77 -	1	2
:		:	: -		-	67	3	7.0	6	, ,-	-	4		-		2			+	:	***	:	67			:	:	: •	- ,	I	:	1			:-	1	:	:	
1		:	:	:	:	6	7	5	9	17	1.1	31	::	_	5	7	4	-	,	:	67		2			:	:		::	5	:	:			::	:	::	: '	-
94	7		:	:	: 1	96	00	1		31	111	11	::	::	6	c7	14		-	-	5	:	00			:	: -	,	:		:		100,000		:	:		:	77
95	7	113	277	40	- !	29	100	201	00	557		140	00	9	14	14	20	35.	10	13	18	::	28	c3	6	-	. 6	1 5	10	9	1	67	9	er;	200	0	# 0	71	37
:		:	:	:	:		:	:			:	:	:	:	:		:		:	:	:	:	:	:			:	:	:	:	:	:			:		:	:	-
:				:	:		7	ee.			:	:		:		:																							
•							System	b Disease			•										m .			:				:	:	:	:	:			:	:	:	:	-
:	:			:	:	:	ervous	, Heart	:			:		System	:	itis	::				e Syste	:	:		:		tem			:	:	:	cribed	:	:	:	:	:	
tion	n						and I	System						iratory		arying				.,	ngestiv	, dec.	stem	System		Systen	ary Sys	500	67				not desi			had	near		
, Inani	ormatio	Decay		:	:		f Brain	nlatory	:	:		:		I Kesp	:	ninsy, I	:	:		T 17 J	I the L	pathics	ary Sys	rative a	ldbirth	motive	rument	ntusion	TOTOMOTO,	::			ise or n			deseril	delicar.	:	-
e Birth	al Malfe	Senile				SIIIS	seases o	of Circ		00	19.	100		seases o		at-Q		00	Avi, I fo	200000	seases o	of Lynn	of Urin	of Gene	of Chi	of Loco	of Integ	and Co	Coold	i Scalus		n.	otherw			or not	oanspe	campaga	
Premature Birth, Inanition	Congenital Malformation	Old Age, Senile Decay	Anonley	Eniloney	Conculsi	Convuisions	Other Diseases of Brain and Nervous	Diseases of Circulatory System, Hear	Croup	Bronchitis	Phenmonia	Plouvion	T reurisy	Uther Diseases of Kespiratory System	Dentition	Sore Throat—Quinsy, Laryingitis	Enteritis	Peritonitis	Diseases of Liver	Othon Die	Uther Diseases of the Digestive System	Diseases of Lympathics, &c.	Diseases	Diseases of Generative System	Accidents of Childbirth	Diseases of Locomotive System	Diseases of Integumentary System	Fractions and Contusions	Prime and Soulds	Durins and	Drowning	Suffocation	Accident, otherwise or not described	Poison	Drowning	Otherwise or not described	All other canses	Induction	THIRDENESS
																												,	40	iei	oio	Je	7	əp	io Oio	ing	S		

TABLE 5.—SHOWING WHETHER MOTHERS OF CHILDREN WHO HAVE DIED UNDER FIVE YEARS OF AGE IN 1895 WORK OUT, OR ARE ENGAGED AT HOME.

WARD	S.		At Home.	Work Out.
OVENDEN			42	
NORTHOWRAM			33	4
NORTH			31	13
CENTRAL			52	3
WEST			34	2
SOUTH			32	1
EAST			31	5
SOUTHOWRAM			49	2
SKIRCOAT			31	
PELLON			45	4
KINGSTON			34	
ILLINGWORTH		:.	34	3
WORKHOUSE			2	3
INFIRMARY			4	1
HOSPITAL				
		-		
			*454	41
Total, 1894			418	42
,, 1893			453	47

^{*} The particulars of 35 deaths in addition to the above were not given.

TABLE 6.—SHOWING THE NUMBER OF CASES ADMITTED INTO THE BOROUGH INFECTIOUS DISEASES HOSPITALS DURING THE YEAR 1895.

	Small-pox.	Typhoid.	Scarlatina.	Others.	Total.
Cases remaining in Hospital Jan. 1st, 1895	3				3
Cases admitted during the year		39	25	7	71
Total	3	39	25	7	74
Recoveries	3	32	22	6	63
Deaths		7	3	1	11
Cases remaining in Hospital Dec. 31st, 1895		4	1		5

TABLE 7.--SHOWING THE NUMBER OF CASES ADMITTED SINCE OPENING, AND TOTAL DEATHS AND RATE PER CENT.

	Small-pox.	Typhus.	Typhoid.	Fever.	Scarlatina.	Others.	Total.
Number of Cases admitted since the opening	682	29	527	62	510	109	1919
Number of Deaths since the opening	71	14	116	8	41	12	262

Percentage of Deaths from all causes to whole number of Cases admitted since the opening

13.65

	-1		
	Total.	26 54 4 10 2 2	96 178 188 199 199 199 199 199 199 199 199 19
100	Dec.	1 : : : : 9	711 9 9 8 9 8 9 8 9 4 9 9 9 9 9 9 9 9 9 9 9
R 1895.	Nov.	e 6 : : : :	8 2 3 3 4 5 6 3 5 6 6 8 6 8 6 8 6 8 6 8 6 8 6 8 6 8 6 8
E YEAR	Oct.	24 : :	x 9 m m m m m m m m m m m m m m m m m m
G THE	Sept.	2 : - 2 : :	9 8 8 9 1 8 4 8 4 8 5 9
DURING	Aug.	eo eo : : : :	940000000 : mur-
	July.	:: 1: 6	010000000000000000000000000000000000000
BOROUGH	June.	-2-2-:	7997147847801 010
THE THE	May.	44 :1 : :	00104000000404
STS IN	April.	:- :- :	8940148918884
INQUESTS	March.	cz co = ; ; ;	6 1 1 1 2 2 4 2 4 2 5 5 5 5 5 5 5 5 5 5 5 5 5 5
/ING 1	Feb.	: :	e - 21 - 8 ≈ 4 6 € ; 6 6 2
SHOW.	Jan.	1 : : : :	113 12 13 14 13 14 15 15 15 15 15 15 15 15 15 15 15 15 15
TABLE 7SHOWING II	Verdicts.	Accidental Deaths Natural Causes Found Drowned Suicide by various means Other Verdicts Murder	Total 1895 1894 1895 1895 1897 1889 1889 1888 1885 1885 1885 1885

TABLE 8.—SHOWING THE NUMBER OF ZYMOTIC DISEASES
NOTIFIED BY MEDICAL PRACTITIONERS IN EACH
WARD OF THE BOROUGH, FOR THE YEAR ENDING
DEC. 31st, 1895, AND THE RATE PER CENT. OF
POPULATION AND THE COMPARISON WITH THE
SIX PREVIOUS YEARS.

	Small-pox.	Cholera.	Typhus Fever.	Enteric Fever.	Scarlet Fever.	Continued Fever.	Puerperal Fever.	Diphtheria.	Relapsed Fever.	Total.	Rate per centage of Population.
Ovenden				5	1		1	7		14	0.20
Northowram				3	4			3		10	0.14
North				6	:	1		2		9	0.11
CENTRAL				3	10	1	1	1		16	0.18
West		···		5	4			4		13	0.13
South				5	7			2		14	0.16
East				3	2		1			6	0.7
Southowram				13						13	0.17
SKIRCOAT				6	4			3		13	0.16
Pellon				2	3	1		2		8	0.10
Kingston				2	5		1	1		9	0.12
Illingworth				5	12			4		21	0.29
Total, 1895 ,, 1894 ,, 1893 ,, 1892 ,, 1891	16 346 159	 5 	1	58 52 69 56 99	52 114 150 256 429	3 3 5 9 14	4 6 6 4 5	29 43 57 71 23	 2 2	146 234 638 558 573	0·15 0·25
,, 1890 ,, 1889	2			67 94	100000000000000000000000000000000000000	8	8	62 31	1 3	476 302	
		PUI	BLIC	INS	TITU	JTIO	NS.				
Workhouse Infirmary				3	2			2		7 2	

TABLE 9.—DEATHS OCCURRING WITHIN THE DIVISION OR DISTRICT AMONG PERSONS NOT BELONG-ING THERETO:—

The following	g are inclu	nded i	in the Infirm	nary :—	
SOWERBY					 3
NORTHOWRAN	1	•••			 1
MIDGLEY				,	 1
STANSFIELD					 1
SKIRCOAT (R.S	S.D.)				 1
SOYLAND					 1
LIGHTCLIFFE					 1
LUDDENDEN					 2
NEWCASTLE		•••	•••		 1
RIPPONDEN					 1
HIPPERHOLME	l				 1
WARLEY					 1
SOUTHOWRAM	(R.S.D.)				 1
THORNTON	**				 1
SIDDAL (R.S.D.)				 1
QUEENSBURY		•••	•••		 1
TODMORDEN					 1
SOWERBY BRI	DGE		•••		 1
	Total				 21
The follo	wing is in	clude	d in Hospita	ıl :—	
QUEENSBURY					 1

TABLE OF DEATHS IN THE BOROUGH OF HALIFAX SANITARY DISTRICT, CLASSIFIED ACCORDING TO DISEASES, AGES, AND LOCALITIES, AND SHOWING ALSO THE POPULATION OF SUCH LOCALITIES, AND THE BIRTHS THEREIN DURING THE FIFTY-TWO WEEKS ENDING DECEMBER 287H, 1895.

	1	ages		BIR	THS.	-3.		1 2	MOST		FROM .)	Morra	LETY	FROM	SUBJO	INED (CAUSE	S, DIS	TINGU	виги	DEAT	HS O	г Сип	DRES	UNDE	n Frv	в Үкл	(RS 0)	Agg		
omes or Localities topted for the purpose these Statistics; Pub is Institutions being hown as separate Localities.		re Population at all 1895	Males.	Females.	Total.	Illegitimate.	Birth Bate per	At all Ages.	c. Under I year.	9 I and under 5.	2 5 and under 15.	o 15 and under 25.	6 25 and under 00.	60 and upwards	11 1	Small-pox.	21 Measles.	Scarlatina.	9 Diphtheria.	Croup (not spasmodic.	Whooping Cough,	Contin	1 Enterie or Typhoid.	O Doubtful 33	Dysentery.	S Cholera.	B Rheumstie Fever.	Rrysipelas.	S Pyermia.	9 Fever.	78 Agea.	88 Phthisis.	S Paramonia, and Piraniay.	S Heart Discase.	Influenza.	25 Injuries.	S Other Diseases.	Total.
renden Ward .	. 6	840	113	80	193	6	28-2	109	26	18	6	7	24	28	Under 5		2		3	1	1				4						***	11	5 17				26	44
orthowram Ward .	6	853	100	82	182	1	26.5	129	32	15	8	7	36	31	Under 5				2						5							15	10	11			31	48
orth Ward .	. 7	716	96	86	182	8	23.5	134	35	16	4	3	51	25	Under 5				1		4			1	6			1				13	6 24	13	1		39 32 27	81 51 83
ntral Ward .	8	837	105	97	202	2	22.8	167	37	19	9	8	50	44	Under 5	-		1		2					4			-				2	11 33	19		2	36 37	58
st Ward .	9	576	93	84	177	1	18:4	147	25	11	4	12	41	54	Under 5						1		3		ï			1	***			2	10	13	1		21 50	36
ath Ward	. 8	510	92	80	172	3	2012	177	22	11	4	6	63	71	Under 5		1	1							3						***	1 13	6	22		3	21	33
st Ward	8	540	61	60	121	Ď	14:1	142	29	8	4	8	42	51	Under 5						-				2							10	10	15		5	60 24 38	144 36 106
thowram Ward .	. 7	349	110	101	211	3	28-7	133	36	17	4	9	31	36	Under 5		.2				4		1		10						***	1	5	11	1		29 35	53
ircoat Ward .	. 7	774	97	88	185		23-7	95	23	8	1	4	25	34	Under 5					1	5				3							10	5				17	31
llon Ward .	. 7	643	107	88	195	5	25.9	143	37	13	2	12	37	42	Under 5				1	2	2				3	1			**		-	1 12	8	11			27 32 47	64 50 93
agston Ward	. 7	069	95	91	186	3	26.3	99	23	11	1	4	28	32	Under 5						1				1		-					1 10	8	13	9		22	33
ngworth Ward .	7	106	75	78	153	4	21.0	123	23	17	3	4	33	43	Under 5		4	1	1		4				2	***						1 16	5	1 14	1 2	1	20	40
orkhouse .			13	14	27	10		116	5	1	1	2	49	58	Under 5												***				-	4 24	31	8			2 46	6
firmary	1							78	1	10	8	8	39	12	Under 5				1										***			7	2	11		5	4 36	12
rough Hospital .	-				***			11		1	1	3	5	1	Under 5			1 2					7		111												30	10
TOTAL	93	813	1157	029	2186	51	23:3	1803	354	176	60	. 97	554	562	Under 5		9	4 2	9 3	6 2	24		1 15	1	44 9	1 1	3	1		2		15 170	91	1 174	3 35	5 20	317	532
eaths occurring o					n or	Dis	trict								Under 5															1000			-					
aths occurring w	ithin	n the	Div	ision	or	Dis	triet	-							Under 5																							

^{* 926} Males and 877 Females

TABLE OF POPULATION, BIRTHS, AND OF NEW CASES OF INFECTIOUS SICKNESS, COMING TO THE KNOWLEDGE OF THE MEDICAL OFFICER OF HEALTH, (B) DURING THE YEAR 1895, IN THE COUNTY BOROUGH OF HALIFAX; CLASSIFIED ACCORDING TO DISEASES, AGES, AND LOCALITIES.

			POPULATI	ON AT ALL		Ni	w Ca	SE2S 02	SICK	SESS I	N EACI	L OFF	CER O	F HEA	TO T	HE KN	OWLED	GE	Nu	MBER	OF SU LOCAL	CH CA	ses Ri	REATE	D FROM	M THE	IR HO	MES IN	THE	Seve	RAL
NAMES OF LOCAL	LITIES ad	opted		Posterior		1	2	3	4	5	6	7	8	9	10	11	12	13	1	2	3	4	5	6	7	8	9	10	11	12	1:
for the purpose of the Public Institutions b	eing sho	wn as	Census 1891.	to middle	Registered Births.				80		1	EVER	8.									10		-	EVER	_	-			-	
separate localities.			1001.	of 1895.		pox.	tina.	heria	rano	*	od.	led	100	ral	4	elas.	6		pox.	ina.	eria,	anon	-	. 4			Tie at	- 2	las.		
(a.)			(b.)	(c.)	(d,)	Small-pox.	Scarlatina	Diphtheria	Membranous Group.	Typhus.	Enteric or Typhoid.	Continued	Relapsing.	Puerperal	Cholera	Erysipelas	Mensles		Small-pox.	Scarlatin	Diphtheria	Membrano Croup.	Typhus.	Enteric o Typhoid.	Continue	Relapsing.	Puerpen	Cholera.	Erysipela	Measles.	
Ovenden Ward			6469	6840	193		1	7			5			1										3							
Northowram Ward			6463	6853	182		4	3			3									1				2							
North Ward			7416	7716	182		·	2			6	1									***			4							
Central Ward	***		8658	8837	202		10	1			3	1		1						6				4	1						
West Ward			9017	9576	177	***	2	2			2									1											
South Ward			8085	8510	172		7	1			3										2										100
East Ward			8417	8540	121		2				3			1				,		1				1							
Southowram Ward	(H)		7042	7349	211						13													8							
Skircoat Ward			7232	7774	185		4	3			6									3				4							
Pellon Ward			7332	7643	195		3	2			2	1								1				2	1						
Kingston Ward	***		6732	7069	186		5	1			2			1																	
llingworth Ward	3		6969	7106	153		12	4			5									4				3							**
Workhouse					27 .		2	2			3						2			2	2			3					***	2	
Infirmary				***				1			2										1			1				***	***		
Borough Hospital																											***		***	***	**
Totals			89832	93813	2186			- vic																							
AVARDS	***		00032	93813	2186	***	52	29			58	3	***	4			2			19	5	***		35	2					2	

The Notification of Infectious Diseases has been compulsory in the District since 1882.

The Isolation Hospital used by the sick of the District is marked (H) and is situate in Southowram Ward.



County Borough of Balifax.

THE

Sanitary Inspector's Report

FOR THE

Year ending 31st December, 1895.

To the Chairman and Members of the Health Committee.

GENTLEMEN,

I have the pleasure to submit for your consideration, my Twenty-first Annual Report on the operations of the Health Department for the year ending December 31st, 1895.

Town Hall, Halifax, January, 1896.

HEALTH DEPARTMENT.

Summary of Work done.

Total number of Visits made by the District Inspectors	37789
Total number of Visits to Houses	10343
Number of Visits to Houses with reference to Defective Drainage	4380
Number of Visits to Houses with reference to Cleanliness, Overcrowding, &c	774
Number of Visits to Houses with reference to Infectious Diseases	584
Rooms Disinfected	267
Cases removed to the Hospital	71
Infectious Diseases reported	146
Nuisances reported	3755
Nuisances abated	3726
Notices served	1180
Letters served (referring to Nuisances, &c	424
Summonses taken out	1
Smoke observations taken	821
Old Ashpits abolished	. 1
Old Ashpits altered to Goux System	56
Goux Closets registered	347

It must be remembered that many nuisances are frequently included under one notice, and therefore, the number of nuisances represent considerably more than the number of notices.

Removal of Nulsances.

At the commencement of the year 420 complaints remained on the books and in course of removal, since then 3755 have been registered and 3726 removed, leaving at the close of the year 449 to be dealt with. The following table shows the nature of nuisances registered, together with a comparison of the previous year's figures:

Nature of Nuisances.	No. Reg. during 1895.	No. Reg. during 1894.
Defective Sink Drains	476	526
,, Yard or Private Street Drains	. 292	268
,, Cellar Drains	227	308
,, Spout Drains	. 18	18
,, Fall Pipes	192	157_
,, Street Drains	93	75
" Roofing	45	18
" Urinals	23	21
Bath and Lavatory Waste Pipes connected to W.C. Soil Pipes	41	219
Drains not efficiently Trapped	. 179	616
Sink Drains requiring Disconnecting .	91	190
Drain Traps requiring Air Grates	2	9
Nuisances from Want of Drains	58	54
" Water in Cellar	83	41
,, Stagnant Water	3	1
,, Smoke	20	14
,, Poultry	9	8
" Pigeons	4	8

NUISANCES—Continued.

Nature of Nuisances.		No. Reg. during 1895.	No. Reg. during 1894.
Nuisances from Swine		9	8
Houses Overcrowded		31	62
" Unfit for Habitation		8	4
" Require Cleansing		77	123
Offensive Accumulations		100	87
,, Ashpits and Privies		43	40
,, Goux Closets		134	168
,, Ashes Tubs		161	91
" Middensteads …		9	30
" Ashes Tub Places		2	1
,, Water Closets		214	267
Privies requiring Limewashing		150	250
Ashpits and Privies requiring Reconstruct	tion	66	90
,, in a dilapidated state		49	56
" requiring proper door	's	113	83
Insufficient Privy Accommodation		31	65
Bad Smells		11	8
Cowsheds requiring Limewashing		155	92
" " Drainage		2	
Miscellaneous		534	287
Total		3755	4363

The above lists do not include work carried out after mere verbal notice.

Bakehouses.

There are at present in the Borough 74 Wheatbread Bakers including Confectioners, 13 Bakers of Oatbread, 9 Muffin Bakers, and 2 Pie Makers. The Bakehouses have been regularly inspected and found to be generally in a satisfactory condition.

Milkshops.

The requirements of the said Act with reference to Milkshops have also been carried out.

Disinfectants.

25 tons of Disinfecting Powder in 4-lb. bags have been given to persons applying at the Health Office, and 130 gallons of Disinfecting Fluid in 6 and 8-oz. bottles where cases of infectious diseases existed. 20 tons of Powder used for disinfecting about gullies when emptied.

Night Scavenging.

At the commencement of the year there were no reports of ashpits that required cleansing. During the year 43 complaints have been registered and attended to, thus leaving the books again clear. The number of complaints registered show an increase of 3 on the previous year.

The following Table shows the number of Ashpits cleansed during the year, and the number of loads of manure and rubbish collected.

Month.	Number of Ashpits Emptied.	Loads of Soil.	Loads of Rubbish.	Total Number of Loads.
January	 347	80	288	368
February	 95	42	151	193
March	 644	180	481	661
April	 330	107	243	350
May	 471	48	285	333
June	 431	74	260	334
July	 544	96	238	334
August	 153	61	147	208
September	 493	84	250	334
October	 543	24	269	293
November	 134	72	200	272
December	 511	128	255	383
Total	 4696	996	3067	4063

The total number of Ashpits cleansed during the year is 4,696, as against 5,466 in the previous year. 56 ashpits with privies have been altered to the Goux System, I abolished, and ashes tubs supplied in the places of 5 dry ashpits. The above includes Ovenden and Illingworth Wards.

TABLE SHOWING THE NUMBER OF ASHPITS WITHIN THE BOROUGH, DECEMBER 31st, 1895.

The Borough is divided into six Districts, each District including two Wards.

Districts.	Wards.	Ashpits with Privies.	Dry Ashpits.
1	Northowram and North	 63	54
2	Ovenden and Illingworth	 485	32
3	Central and East	 54	105
4	West and South	 36	232
5	Skircoat and Southowram	 63	50
6	Pellon and Kingston	 11	36
	Total	712	509

Goux Scavenging.

The following Table shows the number of closet tubs and loads of ashes collected during the year.

	Month		Number of Closet Tubs Collected.	Loads of Ashes Collected.
January			 3 9059	1363
February			 38179	1265
March		•••	 39367	1714
April			 38204	1561
May			 41466	1599
June			 37598	1209
July			 42264	1252
August			 41248	1001
September			 38544	1054
October			 41870	1307
November			 39637	1399
December			 40542	1515
Tota	ıl		 477978	16239

The above represents 22,761 loads of night soil (each load containing 21 closet tubs) as against 22,509 and 16,239 and 16,767 loads of ashes respectively for the preceding year.

The number of additional closets registered is 347, being a decrease of 56 on the number registered during the year 1894.

Goux Scavenging.

The following Table shows the number of Goux Closet Tubs registered each year since the commencement of the Goux System.

7	ear.	Number of Closet Tubs.	Number Registered during each year.
1871		 1109	1109 in 15 months
1872		 1895	786
1873		2440	545
1874		 2820	380
1875		 3088	268
1876		 3316	228
1877		 3769	453
1878		 4277	508
1879		 4853	576
1880		 5071	218
1881		 5552	481
1882		 6057	505
1883		 6506	449
1884	***	 7405	899
1885		 8049	644
1886		 8727	678
1887		 9327	600
1888		 9831	504
1889		 10446	615
1890		 11098	652
1891		 11644	546
1892		 12063	419
1893		 13047	984
1894		13450	403
1895		 13797	347

During the year 214 closets have been erected in connection with new property, and 101 have been altered from the old system, 14 substituted for water closets, and 18 added where the accommodation was previously insufficient.

Birks Hall Tips.

TABLE SHOWING THE NUMBER OF LOADS OF ASHES
AND RUBBISH TIPPED DURING THE YEAR.

Na	ames.		Number of Loads.
Goux Department		 	17213
Gasworks Department		 	6000
Electric Light Committe	ee	 	400
Private Firms		 	11600
Total		 	35213

Tables showing the number of loads of ashes and rubbish tipped during the year.

Cousin Lane Tip.

Name.	Number of Loads.
Goux Department	 243
This Tip was closed April 10th, 1895.	

Mozley Tip.

Name.	Number of Loads.
Goux Department	883

Streets Scavenging.

The subjoined Table gives at a glance the work done in this Department, with the previous year's figures.

	1895.	1894.
Number of Streets Swept	26921	29800
Area in yards	40346623	42625306
Number of Streets Watered	10055	5382
Loads of Water used for that purpose	10965	5969
Loads of Sweepings gathered	4926	5184
Loads of Snow removed from the		
Streets	14331	1215
Number of Gullies emptied .	133784	153411
Number of Street Drains flushed	709	1006

During the year 320 loads of garbage have been removed from fishmongers, fried fish shops, and green-grocers.

				_	-				
T	1895	26921	10055	10965	4926	33784	14331	709	
DEPARTMENT	1894	29800	5382	5969	5184	534111	1215	1006	
EPAR	1893	30700	7822	8648	6571	440191	8444	2211	
THIS I	1892	27019	8016	8057	4832	200041	14564	1822	
THE AMOUNT OF WORK DONE IN THIS FROM 1882 TO 1895.	1891	28869	5404	6598	5102	226111	291	1278	
DONI	1890	28244	5337	2289	6882	001031	884	523	
WORK	1889		8620	6255 12442	4574	898521	972	306	
T OF W	1888	25901	4157		4609	19992	8031	789	
S82 T	1887	24234	3858	5430	4855	74512	2843	943	
THE AMOUN	1886	20621	3592	4798	4471	68094	29200	302	
THE	1885	22457	5814	7023	4546	74080	:	130	
HOWS	1884	22320	5008	6561	5695	87317	617	:	
LE SE	1882 1883	20878	4141	5671	6247	39422	1274	-:	
TAB	1882	20661	3294	4139	4848	35996	5151	:	
THE FOLLOWING TABLE SHOWS		sets swept	" watered 3294 4141	r used	ngsgathered	ies emptied	v removed reets	•	
THE FO.		Number of Streets swept 20661 20878 22320 22457 20621 24234 25901 27149		Loads of Water used	Loads of Sweepings gathered 4848 6247	Number of Gullies emptied 35996 39422 87317 74080 68094 74512 76661 89852 100103 122611 120004 144019 153411 133784	Loads of Snow removed from the Streets	Drains flushed	
		Z		T	Ĭ	Z	Ä	Ö	

ANALYSIS OF REFUSE COLLECTED IN THE BOROUGH OF HALIFAX FOR THE YEAR 1895.

			Number of Loads.
From Wet and Dry Ashpits			4063
From Ashes Tubs			16239
From Goux Closet Tubs			22761
Sweepings gathered from the Streets from Gullies	and R	efuse	4926
Garbage Removed from Market Hall			1046
Horse Droppings from Streets			250
Garbage from Fried Fish Shops			320
Total Number of Loads			49605

Smoke Observations.

The following Table shows the number of smoke observations taken during the year, and the average number of minutes of dense smoke emitted

	Number of Observations taken.	Average Number of minutes of Dense Smoke emitted.
Number of Observations taken	821	
Number showing moderate Smoke or nil	} 353	
Number of Observations taken for a period of 60 minutes, each showing Dense Smoke) 468	
Average number of minutes of Dense Smoke emitted from Chimneys	}	2.74

Smoke Observations.

The following Table shows the number of observations taken, names of firms, and number of boilers working.

Name of Firm.	Address.	Number of Boilers working.	Number of Observa- tions taken.	Average number of minutes of Dense Smoke emitted.
Akroyd J. & Son	Bowling Dyke	3	6	0.8
,,	Range Lane	5	3	nil
Akroyd W	Lucy Street	1	5	nil
Akroyd & Ambler	New Brunswick Mill	1	6	3.0
Baldwin & Walker	West Croft Mill	2	2	2.0
Baldwin J. & J	Clark Bridge	5	10	2.6
Balme & Pritchard	Lister Lane stone chim-	2	1	1.0
,,		2	3	1.0
Bancroft A	ney Lister Street	1	3	03
Bancroft W	Fenton Estate	2	2	3.0
Barraclough J. & Sons	Boys' Mill stone chim-	1	8	nil
,,	V	2	8	2.2
Berry John	ney New bank	1	3	nil
Berry Bros	Hebble Lane	1	3	nil
Booth J. & Son	Lee Bridge	6	8	0.3
Bowman Bros	Lee Bank	2	8	0.5
Bradford & District	1, Lee Bank	4	7	0.5
Dyeing Co.	2, Lee Bank	6	7	0.4
,,	1, Old Lane	4	7	2.8
Burnley Building Society	Pellon Lane	6	9	3.0

17
SMOKE OBSERVATIONS—Continued.

Name of Firm.	Address.	Number of Boilers working.	Number of Observations ,taken.	Average number of Minutes of Dense Smoke emitted.
Butler James	Adelaide Street	1	4	2.2
Carter John & Co	Dunkirk Mills	1	3	3.0
Calder & Hebble Co	Engine House Lane	1	8	2.0
Calvert W. & Son	Illingworth Mills	2	6	1.3
Charnock G. & Sons	Pellon Lane	1	3	1.6
"	Charlestown Road	1	4	nil
Chambers James	Craven Edge Mills	1	2	0.2
Charlestown Brick and	Charlestown Road	1	4	nil
Tile Co Clayton & Murgatroyd	Lower Wade Street	4	9	4.5
Crabtree Joseph	Well Lane	2	4	nil
Crabtree T		2	7	2.7
Crossley J. and Sons	Mill Bank Bottom	1	3	0.6
Crossley J. & Sons, Ltd.	Dean Clough	4	3	1.3
,,	Old Lane	5	6	nil
,,	Office chimney	8	6	2.3
,,	Lee Bridge stone chim-	6	6	1.3
"	ney Lee Bridge brick chim-	6	5	nil
"	ney Range Royd	3	5	1.0
"	Dye House chimney	2	1	2.0
,,	Albion Mills	3	8	0.8
21	Hebble Mills	2	3	nil
Crossley & Porter Orphanage	Skircoat Moor	1	4	nil

18
SMOKE OBSERVATIONS—Continued.

Name of Firm.	Address.	Number of Boilers working.	Number of Observa- tions taken.	Average number of Minutes of Dense Smoke emitted.
Dawson Wm	Gaol Lane	 1	1	nil
Dyson J. & Sons	King Cross	 1	16	2.0
Drake J. & Co	Foundry Street	 1	4	0.5
Earnshaw A. & Sons	Grantham Road	 1	6	0.1
Farrar Jabez B	Lower Wade Street	2	6	2.6
,,	Well Lane	 1	9	2.2
Fleming Andrew	Grantham Road	 1	6	nil
Fleming, Birkby,	Hopwood Lane	 1	1	2 0
Goodall & Co. Fletcher Bros	Raglan Street	4	10	3.6
Foster W. H	Woolshops	 1	5	0.8
Goodall E	Farrar Mill Lane	 1	2	1.0
Green Joseph	Corporation Street	 1	5	nil
Greenwood James	West End Works	 1	4	1.7
Greenwood J	Cross Hills	 . 1	5	2.0
Hanson —	Hope Works	1	1	1.0
Harrison & Singleton	Horton Street	 1	5	0.2
Hartley & Sugden	Gibbet Street	 1	4	3.0
Hauson Samuel	Adelaide Street	 1	2	2.2
Hanson W	Jumples Mill	 2	4	nil
Halifax Industrial	Northgate	 1	4	nil
Society Halifax Workhouse	Gibbet Street	 1	2	0.5
Halifax Corporation	Gasworks	 4	1	nil

SMOKE OBSERVATIONS—Continued.

Name of Firm.	Address.	Number of Boilers working.	Number of Observa- tions taken.	Average number of Minutes of Dense Smoke emitted.
Halifax Corporation	Electric Light Works	3	6	nil
Halifax Flour Society	Bailey Hall	4	12	4.1
Haigh Allan	Winding Road	1	. 3	1.3
"	,, Foundry	1	2	2.5
Haxby & Sewell	Well Lane	1	2	2.5
leggingbottom	Hay's Mill	2	4	2.0
Hebden W. C.	Winding Road	1	7	nil
Helliwell & Sons	Ingram Street	1	6	nil
Hirst & Sons	Weymouth Street .	1	5	nil
Hitchen H.	Forest Mill	1	4	0.5
Hitchen John	Hall Street	1	1	nil
Highley N	Croft Mills	2	5	0.8
Howson J. M	Albert Street Mills	2	7	2.7
Horsfall Eli	Commercial Road	1	6	nil
Horsfall & Co	Pellon Lane	1	11	2.0
Holdsworth J. & Sons	Shaw Lodge Mills	10	11	7.0
Hollingrake & Clegg	Miall Street old chimney	3	11	1.6
,,	,, new ,,	3	9	1.4
Hoyle J. & T	Range Bank	4	6	nil
Hoyle Richard	Queen's Road	2	2	2.0
Hoyle Elkanah	Waterside No 1 chimney	1	6	0.6
,,	,, ,, 2 ,,	1	. 4	1.0

20

SMOKE OBSERVATIONS—Continued.

Name of Firm.	Address.	Number of Boilers working.	Number of Observa- tions taken.	Average number of Minutes of Dense Smoke emitted.
Howarth Greenwood	Pellon Lane	1	1	1.0
Huntriss Exors	Well Lane	. 2	9	6.5
Inman Bros	Hope Hall	. 1	5	0.4
Jagger Emma Sophia	West Parade	2	4	2.7
Knight J	Raglan Street	. 1	2	0.2
Law & Son	Square Road	. 1	4	1.2
Lees Thomas & Co	Spring Edge Works	. 1	7	0.1
Lumby, Son & Wood	New Bond Street	. 1	5	1.2
Mackrell J. E	Lower Wade Street .	. 1	3	1.3
Martin & Sons	Pellon Lane	. 3	4	0.5
Martin	Falcon Laundry .	1	5	nil
Maude & Turner	Gibbet Street .	1	5	2.0
McCrea H. C. & Co	Eastfield Works .	1	4	0.2
McNaught & Co	Hare Street .	1	3	2.3
Milner & Co	Raglan Street .	1	3	0.6
Morton J	Clipster Hall .	1	7	3.0
Morton J.	Siddal Lane .	. 1	4	2.0
Moore Z	Shaw Mill, Mixenden	1	4	2.5
Murgatroyd	Bottoms Mill .	1	1	1.0
Mellor S.	Corporation Street .	1	2	nil
Northern Engineering	High Level Works .	1	3	0.6
Co North Allen	Old Lane Dyeworks .	1	1	nil

SMOKE OBSERVATIONS—Continued.

Name of Firm.	Address.		Number of Boilers working.	Number of Observa- tions taken.	Average number of Minutes of Dense Smoke emitted.
Oakes John	Regent Works		1	8	0.3
Oates James	Ryburne Mill, stone		1	2	2.0
,,	D 1 1/11 1 1 1		1	5	7.8
Oates & Green	TT 1 C TO 1		1	4	1.7
,,	Ellen Royd		1	5	0.8
"	Beacon Road		1	6	6.5
Ordish John	Waterside		2	7	0.5
Parker & Co	Chapeltown		1	3	1.0
Parker J. & Sons	Horley Green Road		- 1	5	0.6
Pickles W	Steam Laundry		1	1	2.0
Priestley James	Ovenden		1	2	0.2
Pohlmann & Sons	Hall Street		1	2	1.5
Patchett Bros	Sedburgh Road, No.	1	1	9	2.0
,,	Sedburgh Road, No.	2	1	_ 9	2.6
Pulman A. & Sons	Chimney Mount Street		1	2	2.5
Rawson W. H	Old Lane		2	1	nil
Ramsden T. & Sons	Trinity Road		1	5	3.0
Robinson J. & Sons .	Lower Wade Street		1	2	nil
Robinson Enoch	Battinson Road		3	1	9.0
Robinson J	Prospect Mill		1	4	nil
Robinson Jesse & Sons	Royal Mills		2	4	2.2
Redman Cornelius	Pioneer Works		1	3	0.3

22

SMOKE OBSERVATIONS—Continued.

Name of Firm.	Address.	Number of Boilers working.	Number of Observa- tions taken.	Average number of Minutes of Dense Smoke emitted.
Sagar J. & Co	Water Lane	1	6	2.0
Scott Bros	Johnson Street	1	4	nil
Sheard Jonathan	Brackenbed Lane	1	3	nil
Smeeton G. F	Stoney Royd	3	8	2.2
Smith David	Woollen Mill, Siddal	1	8	1.3
Smith Thomas	Siddal Lane	1	7	0.4
Smith & Wilshaw	Kingston	1	1	nil
Smith G. F	Paragon Works	1	5	1.0
Smith B. G	Stannary Street	1	1	2.0
Soothill & Simpson	North Castle Street	1	2	0.2
Smithson Joseph	Park Print Works	2	8	4.8
,,	India Buildings	1	1	nil
Standeven & Eardshaw	Ladyship	3	4	2.2
Standard Screw Co	Dispensary Walk	1	4	1.5
Stead Bros	Hare Street	1	1	1.0
Stirk & Co.	Turney Street	1	2	nil
Stott Bros	Mount Street	1	1	nil
Sutcliffe J. & Sons	Range Bank	1	5	nil
Swan Bank Brick and	Swan Bank	1	7	0.5
Tile Co. Sykes Miles & Son	King Cross	1	15	0.6
Speak Paul	Mixenden Shed	1	4	nil
Taylor Josoph	Archer Street	1	3	0.3

23
SMOKE OBSERVATIONS—Continued.

Name of Firm.	Address,	Number of Boilers working.	Number of Observa- tions taken.	Average number of Minutes of Dense Smoke emitted.
Taylor & Hanson	North Bridge	 1	7	nil
Tetley & Co	Bradshaw Mill	2	5	1.0
Thompson Joseph	Adelaide Street	 1	4	3.2
Tillotson J. W.	Atlas Carpet Works	 2	11	7:3
Todd J. & Sons	Shay Lane Mills	 1	2	1.0
Turner Edwin	Dapper Mills	 3	3	1.6
Turner John	Bedford Street	 1	2	1.2
Ward J. W. & Son	Walnut Street	 5	5	2.2
Ward R, D	Hanson Lane, brick chimney	6	11	6.2
,,	Hanson Lane, stone	1	1	2.0
Wade Josiah	Hopwood Lane	 1	- 3	0.3
Walsh, Brearley and Eastburn	Beech Hill	 1	5	0.8
Wainwright E. M	Sun Works	 1	8	5.7
Whiteley J	Jubilee Works	 1	3	nil
Whitley S. & Co	Hanson Lane	 5	3	2.6
Whiteley J. & Sons	Brunswick Mills	 2	3	nil
Whitaker R. & Co. Ltd	Corporation Street	 1	5	nil
Willey R. C	Trafalgar Works	 6	16	2.9
Wood George	Pellon Lane	 1	2	1.0

TABLE SHOWING NUMBER OF PREMISES REQUIRING INSPECTION BY THE MEAT INSPECTOR, MR. JOHN HUTCHINSON.

Descripti	Description of Premises.				
Public Slaughterhouses					1
Private Slaughterhouses					4
Fish Curing Houses					5
Bakehouses and Confecti	oners				97
Cow Sheds		•••			86
Cattle Lairs					5
Potted Meat and Tripe I	Boiling 1	Houses			50
Fried Fish Shops					65
Milk Shops					86
Knackeries					1
Fat and Bone Boilers					3
Tot	tal				403

In addition to the above there are 142 persons registered for selling milk within the Borough but residing in the country.

TABLE SHOWING NUMBER OF VISITS MADE BY THE MEAT INSPECTOR.

	Description	on of Pre	emises.		Number of Visits.
Public Slaughter	rhouses			 	1365
Private Slaughte	erhouses			 	85
Fish Curing Ho	ases			 	240
Cow Sheds				 	388
Cattle Lairs				 	27
Fasting Sheds				 	1365
Knackeries				 	20
Potted Meat and	d Tripe I	Boiling I	Iouses	 	1272
Bakehouses and	Confecti	oners		 	2137
Milkshops and I	Dairies			 	2183
Fried Fish Shop	S			 	921
Others				 	63
	Т	otal		 	10066

TABLE SHOWING MEAT, FISH, FRUIT, &c., DESTROYED AS UNFIT FOR HUMAN FOOD.

	Kind of Foo	d Destroye	1.		Quantity in lbs.
Ten Carcase	s of Beef		***		4254
Eleven Carca	ases of Pigs				3230
Mutton					398
Veal					304
Fish			110		11014
Shell Fish					7395
Shrimps					252
Fruit					180
Rabbits			***		108
Nettles					350
Offal					280
				-	
	Total				27765

Three carcases of beef and one pig were suffering from tuberculosis, 4 pigs from jaundice, and two from pleuro-pneumonia.

THE FOLLOWING TABLE SHOWS THE POPULATION AND ACREAGE FOR EACH DISTRICT, WITH NAMES AND ADDRESSES OF INSPECTORS.

District	Population.	Area in Acres.	Name and Address of Inspectors.
1	23379	1481	J. Archbell, The Square.
2	27402	620	J. Thompson, 11, Melville Place.
3	23272	832	J. E. Firth, 7, Randolph Street.
4	19760	5276	A. E. Bottomley, Branch Office, Illingworth.
	93813	8209	

District No. 1.

INSPECTOR JAMES ARCHBELL.

Natur	e of De	efects.			Number of Defects.
Defective Sink Drains					135
,, Cellar Drain	3				52
Made-up Cellar and W	alled	Drains			5
Defective Yard and Pr	rivate	Street Dr	ains		95
,, Area Drains		•••			41
Untrapped Sink Drain	ıs		***		23
Drains to Disconnect					34
Defective Water Close	t Soil	Pipes			25
Made-up Water Close	ts				14
Defective Water Close	ets				44
Untrapped Bath and l	Lavato	ry Waste	Pipes		11
Bath and Lavatory V Pipes	Vaste	Pipes Co	nnected to	Soil	13
Defective Roofing					20
" Fall Pipes					11
" Troughing					26
,, Urinals					10
Water in Cellars					43
Offensive Poultry					2
" Pigeons					3
" Swine					4
" Swill Tubs					2

DISTRICT No. 1—Continued.

Nature of Defects.			Number of Defects.
Houses Overcrowded			26
Furnished Rooms Overcrowded			4
Offensive Accumulations			114
Ashpits requiring Re-construction			13
Disused Closets			10
Closets and Ash Tub Places requiring pro	oper Door	s	23
Insufficient Privy Accommodation			10
Bad Smells			27
Nuisances from Workshop Chimneys			16
Drains Tested			49
Smoke Observations taken			350
Houses requiring Limewashing			73
Furnished Rooms requiring Limewashing			21
Closets requiring Limewashing			22
Visits to Lodging Houses			23
,, Houses where Fever Cases exist	ed		80
Rooms Disinfected			47
Fever Cases removed to the Borough Fev	er Hospi	tal	18
Visits to Workshops			950
" Factories			34
Visits under the Shop Hours' Act			300
Samples purchased for Analysis			46

District No. 2.

INSPECTOR JOSEPH THOMPSON.

Nature of Defects.		Number of Defects.
Defective Sink Drains		36
,, ,, Pipes		52
,, Syphon Traps		51
Made-up Sink, Bath and Lavatory Pipes		73
,, Cellar Drains		32
,, Area Drains		12
Defective and Made-up Basement and Walled Dra	ins	86
Made-up Sink Drains		67
Defective Pan and other Closets		33
Made-up Water Closets		35
,, ,, Closet Drains		17
Defective Water Closet Soil Pipes		7
,, ,, ,, Cisterns		11
Untrapped Bath, Lavatory and Sink Waste Pipes		9
,, Yard and Sumpstone Drains		6
,, Cellar Drains		4
Defective and Broken Fall Pipes		36
Made-up Fall Pipes and Drains		63
Defective Bell Traps in Cellars and Wash Houses		11
Made-up Yard and Private Street Drains		34
Defective Yard Drains		14
Broken Pot and Iron Traps		9
Made up Disconnecting Traps		35
Defective Urinal Drains		7
Bath Pipes to Disconnect		9
Defective Connections to Traps		20

31
DISTRICT No. 2—Continued.

Nature o	of Defects.			Number of Defects.
Offensive Middensteads an	nd Accumul	ations		20
, Ashpits and Pri	vies			11
Defective Roofs				32
,, and Made-up Tr	roughing			71
Water in Cellars from Bur tive Flagging	st Water Pi	pes and	Defec-	20
Offensive Swine, Poultry a	and Rabbits			8
" Swill Tubs				2
Dilapidated Closets				11
Insufficient Water Supply	to Closets			6
Offensive Smells from Gas	Mains			3
Houses Overcrowded				3
Dirty Houses				6
Door off Closets				9
Dirty Closets				6
Drains Disconnected				38
Visits to Workshops				578
,, Factories				16
,, Under the Shop I	Hours Act			355
Rooms Disinfected				68
Fever Cases Removed to t	he Borough	Fever H	ospital	15
Smoke Observations taken				210
Visits to Vans occupied as	Dwellings			52
Drains Tested				60
Samples Purchased for An	alysis			46

District No. 3. INSPECTOR JAMES EDWARD FIRTH.

Nature of Defects.		Number of Defects.
Made-up and Leaky Sink Pipes		79
Defective Syphon Traps		38
,, Basement Drains		74
Made-up Cellar Drains		27
Defective and Made-up Water Closets		34
Untrapped Bath, Lavatory and Sink Waste P	ipes	9
" Urinal Waste Pipes		5
,, Sink Drains		15
,, and Stone-walled Cellar Drains		16
,, Drains in Wash Kitchens		4
Defective Connections to Drain Pipes		21
Broken Fall Pipes	***	28
Made-up Fall Pipe Drains		50
,, Troughing		45
Defective Bell Traps in Cellars		7
Made-up Yard and Area Drains		71
Broken Pot and Iron Traps		9
Disconnecting Traps without Grates		16
Drains disconnected		31
Offensive Urinals		11
Insufficient Water Supply to Closets		13

Nature of Defects.	Number of Defects.
Damp Houses from Defective Roofs and Soil against Walls of Houses Offensive Swine, Poultry, Pigeons and Rabbits	77
" Swill Tubs	4
Water in Cellars from Defective Drainage and Burst	
Water Pipes	38 4
Houses Overcrowded	11
Dirty Houses	41
,, Closets	85
Doors off Closets	42
Dilapidated Closets and Ashpits	16
Offensive Accumulations and Middensteads	32
Nuisances from Smoke	6
Defective and Made-up Street Gullies	45
Insufficient Privy Accommodation	6
Rooms Disinfected	83
Drains Tested	63
Visits to Workshops	333
,, Factories	108
,, Shops under the Shop Hours Act	570
" Furnished Rooms	76
Fever Cases Removed to the Borough Fever Hospital	17
Smoke Observations taken	200
Samples purchased for Analysis	35

OVENDEN AND ILLINGWORTH.

District No. 4.

INSPECTOR ALBERT EDWARD BOTTOMLEY.

Nate	ure of 1	Defects.		Number of Defects.
Defective and drawn	out Le	ead Syphon	Traps	 31
Made-up Drains				 50
Defective Drains				 24
Defective connections	s of Dr	ain Pipes		 30
" Bell Traps			,	 9
,, Fall Pipes				 16
,, Troughing				 36
Want of Drains				 23
Drains Disconnected				 48
Untrapped Drains				 65
Made-up Gullies				 22
Water in Cellars				 10
Dirty Closets				 18
,, Houses				 1
Damp Walls of Hous	es			 3
Offensive Middenstea	ds and	l Accumulat	tions	 28
" Swill Tubs				 7
Defective Water Clos	ets and	d Soil Pipes		 5

35
DISTRICT No. 4—Continued.

Nature of Defect.			Number of Defects.
Untrapped Sumpstones			18
Dilapidated Closets			22
Privies to convert			46
Defective Cellar Floor	***		1
Offensive Swine			6
,, Ashpits			25
Doors off Closets			23
Insufficient Privy Accommodation			15
Defective Pot Traps			5
" Roofs			2
Rooms Disinfected			69
Visits to Workshops			38
,, Factories			37
Smoke Observations taken			61
Drains Tested			35
Samples Purchased for Analysis	***		41
Cases Removed to the Fever Hospit	al		10
Notices Served		1.5	126

Ovenden and Illingworth.

TABLE SHOWING NUMBER OF PREMISES REQUIRING INSPECTION BY THE DISTRICT INSPECTOR, ALBERT EDWARD BOTTOMLEY.

Description of Premi	ses.	Number.	Number of Visits.
Private Slaughterhouses		5	198
Bakehouses and Confection	ners	2	23
Oat Bread Bakers		2	13
Fried Fish Shops		3	19
Cowsheds		200	751
Total		212	1004

Dairies and Cowsheds.

THE FOLLOWING TABLE SHOWS THE NUMBER OF DEFECTS IN CONNECTION WITH COWSHEDS.

Nature of Defects.						
		17				
		10				
	ş	8				
		10				
n		22				
		4				
		5				
		157				
		20				
	-					
	 m	n				

THE FOLLOWING TABLE SHOWS THE NUMBER OF ASHPITS CLEANSED DURING THE YEAR IN OVENDEN AND ILLINGWORTH WARDS.

(FORMERLY THE LOCAL BOARD DISTRICT OF OVENDEN.)

Мо	nth.		Number of Ashpits emptied.	Loads of Soil.	Loads of Rubbish.	Total Number of Loads.
January			137	76	180	256
February			56	42	127	169
March			218	105	158	263
April	***		218	100	158	258
May			79	29	155	184
June			64	. 25	92	117
July			244	90	121	211
August			133	48	119	167
September			120	57	135	192
October			62	15	133	148
November			104	56	179	235
December			213	97	131	228
Total		7.	1648	740	1688	2428

Streets Scavenging.

The following Table shows the work done in this Department:—

OVENDEN AND ILLINGWORTH DISTRICTS.

Number of Miles of Setting	 $5\frac{1}{2}$
Number of Miles of Macadamised Roads	 $16\frac{1}{2}$
Number of Streets Swept	 1199
Number of Loads of Sweepings gathered	 889
Number of Gullies emptied	 3510



TABLE SHOWING NUMBER OF VISITS MADE TO FACTORIES AND WORKSHOPS BY THE DISTRICT INSPECTORS.

District.	Number of Visits made to Factories.	Number of Visits made to Workshops.	Number of Visits under the Shop Hours Act.
1	34	950	300
2	16	578	355
3	108	333	570
4		38	37
	158	1899	1262

District No. 1.

INSPECTOR JAMES ARCHBELL.

Nature of Nuis	sances.		Number Registered.
In Factor	IES.		
Insufficient Privy Accommod	ation		2
Defective Water Closets			6
,, Drains			2
Want of Ventilation			1
In Worksh	ops.		
Insufficient Privy Accommoda	ation		1
Defective Water Closets			12
Want of Ventilation			10
Workrooms Overcrowded			5
,, requiring Limewas	hing		64
		_	
Total			103

District No. 2.
INSPECTOR JOSEPH THOMPSON.

Nature of Nuisances.			Number Registered.
In Factories.			
Rooms requiring Limewashing			3
In Workshops.			
Rooms requiring Limewashing	***		34
Insufficient Privy Accommodation			6
Defective Water Closets			4
Made-up Water Closets			2
Defective Drains		***	5
Bad Ventilation			5
Defective Roofs			4
Untrapped Drain			1
Broken Fall Pipes and Troughing			5
Closets in a dilapidated condition			2
Total			71

District No. 3.

1NSPECTOR JAMES EDWARD FIRTH.

Nature of Nuisances.		Number Registered.
In Factories.		
Insufficient Privy Accommodation		 1
Untrapped Water Closets		 6
Made-up Water Closet Drains		 4
Insufficient Water Supply to Closets		 4
Dangerous Roof		 1
In Workshops.		
Defective, Broken and Made-up Water C	losets	 11
Insufficient Privy Accommodation		 1
,, Ventilation		 1
Defective Roofs		 2
Workrooms requiring Limewashing		 30
,, Ventilation		 1
" Overcrowded		 2
Tota	ıl	 64

District No. 4.

INSPECTOR ALBERT EDWARD BOTTOMLEY.

Nature of Nuisances.		Number Registered.
In Factories.		
Offensive Closets	 	10
In Workshops.		
Workrooms requiring Limewashing	 	4
Total	 	14

Disinfection.

THE FOLLOWING TABLE SHOWS THE NUMBER AND DESCRIPTION OF THE ARTICLES DISINFECTED AT THE DISINFECTING HOUSE, STONEY ROYD, DURING THE YEAR.

	Description	of Articles.		Number of Articles.
Beds				 120
Mattresses				 167
Pillows				 230
Sheets			***	 68
Bolsters				 132
Blankets		***		 237
Counterpanes				 135
Bed Furniture				 2
Curtains				 1
Trousers				 5
Coats and Vest	ts			 24
Drawers				 4
Flannel Vests,	Dresses and	Petticoats		 33
Hose				 2
Dressing Gown	s and Shawl	s		18
Shirts				 8
Towels and Sto	ckings			 30
Jerseys				 2
Sundries				 12
Total				 1230

TABLE SHOWING THE NUMBER OF CASES OF INFECTIOUS DISEASES REMOVED TO THE BOROUGH FEVER HOSPITAL BY THE DISTRICT INSPECTORS, FOR THE YEAR 1895.

Wards.	Typhoid Fever.	Scarlet Fever.	Diph- theria.	Continued.	Measles.
Ovenden	3				
Northowram	2	1			
North	4				-2
Central	4	6		1	
West	3	3	2		2
South	1		3		
East	1	1			
Southowram	8				
Skircoat	4	3			
Pellon	2	1		1	
Kingston					
Illingworth	3	4			
Outside the Borough	3	5			
Total	38	24	5	2	2

TABLE SHOWING THE NUMBER OF INFECTED HOUSES VISITED BY THE DISTRICT INSPECTORS.

	Wards.			Enteric Fever.	Scarlet Fever.	Continued Fever.	Puerperal Fever.	Diphtheria	Total.
Ovenden				5	1		1	7	14
Northowram		/		3	4			3	10
North				6		1		2	9
Central		'.		3	10	1	1	1	16
West				5	4			4	13
South		***		5	7			2	14
East				3	2		1		6
Southowram				13					13
Skircoat				6	4			3	13
Pellon				2	3	1		2	8
Kingston				2	5		- 1	1	9
Illingworth				5	12			4	21
	Total		•••	58	52	3	4	29	146

Rooms Disinfected.

THE FOLLOWING TABLE SHOWS THE NUMBER OF ROOMS DISINFECTED BY THE DISTRICT INSPECTORS DURING THE YEAR.

	Wards.						
Illingworth	 			32			
Ovenden	 			29			
Northowram	 			23			
North	 			17			
Central	 			23			
West	 +1.0			24			
South	 			32			
Kingston	 			17			
Pellon	 			18			
East	 			13			
Southowram	 			17			
Skircoat	 			22			
Total	 			267			

Canal Boats.

During the year 59 Inspections have been made, and the Boats were found clean and in fair condition.

It has only been necessary in two cases to call the attention of the Owners and Captain to some contravention of the Act.

There has not been a single case of sickness or overcrowding on board, and in all cases where women and children were on board proper provision was made for the division of the sexes.

Of the 59 Boats inspected there were 10 with women and children on board and 7 with women.

All Boats inspected were free from bilge water, and ventilation very good. Proper provision had been made for the storage of water for domestic use.

No objection has been made at any time to my inspections.

Canal Boats, 1895.

Number	Number	Number	Number	Total.
of Boats	Registered	of Males on	of Females	
Inspected.	to carry.	Board.	on Board.	
59	268	93	19	112

Ages of Children found on Canal Boats.

Ages.	-0.51	Months.			,	YEARS					Total.
		4	2	3	4	5	7	8	11	12	T
Number		1	3	2	5	3	1	4	3	1	23

Legal Proceedings.

It is satisfactory to find that it has only been necessary to institute legal proceedings in one case for selling milk contrary to the provisions of the Food and Drugs Act. This case was ultimately withdrawn it having been found that a quantity of defendant's milk had been stolen and that quantity replaced with water to the extent of 12 per cent.

I am, Gentlemen,

Your obedient Servant,

DAVID TRAVIS,

Chief Sanitary Inspector.

County Borough of Balifar.

Report of the Public Analyst

FOR THE YEAR ENDED DECEMBER 31st, 1895.

To the Chairman and Members of the Health Committee of the County Borough of Halifax.

GENTLEMEN,

During the year 1895 I have analysed for your Committee 15 samples of water, and 190 samples of foods and drugs, the latter in compliance with the "Sale of Food and Drugs Acts, 1875 and 1879."

Of the waters examined, 9 samples were condemned and 6 were passed. One of the waters contained one-tenth of a grain of lead per gallon, and the others the usual polluting matters.

The following Table shows the nature and number of the foods and drugs analysed:--

1895. Quarter ending	Milk.	Butter.	Cheese.	Cream.	Margarine.	Pickles.	Ketchup.	Teas.	Coffees.	Mustard.	Ginger.	Soda Water.	Sweet Nitre.	Total.
Mar. 31st	41	4				4								49
June 30th	11	9	1	2								***		23
Sep. 30th	34							4	3	3			4	48
Dec. 31st	50	9			1		1		3		5	1		70
	136	22	1	2	1	4	1	4	6	3	5	1	4	190

Only 3 of the samples were adulterated, 13 were of doubtful genuineness, and the remaining 174 were genuine articles.

Milk.—The milks analysed formed about 71 % of the whole lot of articles examined. One contained 12 % of added water, and 10 were of doubtful genuineness, which may mean that either the milk was very poor in quality, or that an article good to begin with had been impoverished by the judicious addition of a small amount of water, or the abstractian of part of the cream. The first view was preferred, and where necessary was confirmed by having samples taken at the source for comparison. Upon the whole the quality of the milk for the past year has been decidedly good, both as regards quantity of fat and the amount of solids—phosphates, &c.—in solution. I have in former years referred to the monetary importance of the subject, pointing out that the lowering in quality of the article so little as 5 % means a loss of thousands of pounds a year to Halifax consumers, but the hygienic importance of a pure milk supply cannot be estimated, and I am glad to find an enlightened public opinion recognising the fact in the observations occasionally made from the Bench when we have had unfortunately to prosecute for adulteration of this article.

Soda Water.—Only one sample was examined—a syphon bottle—and it contained 2½ grains of bicarbonate of soda per pint instead of 30 grains, the amount required by the British Pharmacopæia. This is adulteration within the meaning of the Act, and it may prove inconvenient, and may moreover be injurious if such an article is prescribed by a medical man with the idea that it is of genuine quality. The manufacturer's plea is that the drink

is unpalatable with the full quantity of bicarbonate in. With this of course a Sanitary Authority has nothing to do, and either the full quantity ought to be present, or bottles ought to be labelled so as to show what quantity has been put in.

Other Articles.—A coffee contained 5 % of added chicory. Two butters and one coffee gave analytical results which placed them in the doubtful class, but the rest of the foods and drugs examined were of genuine quality, and it is a matter of great satisfaction to find that the figure for adulteration in this year is only 1.5 %, a figure which is unprecedentedly low as will be seen in the following comparison:—

	1885	1886	1887	1888	1889	1890	1891	1892	1893	1894	1895
Percentage of Adulterated Samples		9.3	15	1.8	2.9	11.4	6	3	5.4	6.7	1.5

I have the honour to be,

Gentlemen,

Your obedient Servant,

WILLIAM ACKROYD,

PUBLIC ANALYST.



CONTENTS.

MEDICAL OFFICER'S REPORT.	PAGE.
Staff of the Health Department	- 2
Members of Health Committee	3
Report—Summary	4-5
Population, Acreage of Wards, &c	6
Births	. 7
Do. compared with other towns	7
Do. in each quarter of the year	. 7
Do. remarks on the low rate	8
Deaths—General rate and in each quarter of the year	. 9
Infant Mortality	9-10
Chief Causes of Infant Mortality	10
Mortality at Groups of Ages	11
Causes of Death—Zymotic Diseases	11
Small-pox	12
Measles	12
Scarlet Fever	12
Diphtheria	12
Whooping Cough	13
Fever—Enteric, &c	13
Diarrhea and Dysentery	13
Respiratory Diseases	14
Bronchitis, Pneumonia, Phthisis, &c	15
Deaths from Violence	15
Do. Registered on Coroner's Certificate	15
Do. Uncertified	15
Influenza	- 15
Infectious Diseases Hospitals	15
The Meteorology of the year and its influence on the Death-rate	17
Bacteriology	21
Γable of three principal Zymotic Diseases	22
Lodging Houses	22
Midsummer Fair	22
Congress	-23

	PAGE.
Sanitary Legislation in 1895	- 23
Water Supply	23
Meteorological Table for the year 1895	- 25
Tables—(1) Population, Births, Deaths, and Infant Mortality	7
in the Borough, 1880-95	25
(2) Death-rate at six age-periods per 1000 living	- 26
(3) Deaths from Zymotic Diseases, 1880-95	27
	-28-29
(5) The Working-out of Mothers in relation to the	
Death-rate of Children under 5	30
(6) Statistics of the Borough Fever Hospital	- 31
(7) Inquests for the year 1895	32
(8) Zymotic Cases notified by Medical Practitioner	- 33
(9) Deaths of Persons in the Borough not belonging	
Local Government Tables A and B	95 96
Bocar Government Tables A and B	35-36
SANITARY INSPECTOR'S REPORT.	
O C.W. 1.1	
Summary of Work done	2
Removal of Nuisances	3-4
Bakehouses	- 5
Milkshops	5
Disinfectants	- 5
Night Scavenging	5
Number of Ashpits Cleansed	6-7
Goux Scavenging	8-9
	-10-11
Street Scavenging	12-13
Analysis of Refuse collected	14
Smoke Observations	15
	-16-23
Meat Inspection	24-25
Table showing quantity of Meat, Fish, Fruit, &c., destroyed	- 26
Population and Acreage of each District Inspector -	27
	28-29
,, No. 2—Joseph Thompson	30-31
	-32-33
,, No. 4—A. E. Bottomley	34-35
Dairies and Cowsheds Number and Condition -	97

	CONTE	NTS.			iii
					PAGE
Ovenden and Illingwo	ORTH DISTRI	CT—			
Ashpits Cleansed	-	-	-	-	38
Street Scavenging	_	-	-		- 39
Factories and Workshop	s—Visits ma	de	-	-	40
Do.	Defects	-	-		-41-44
Number of Articles Disi	infected	-	-	-	45
Do. Infectious Pa	atients remov	ved to Ho	spital -		- 46
Do. Infected Hou	ases Visited	-	-	-	47
Do. Rooms Disin	fected -	-	-		- 48
Canal Boats Inspections	-	-	-	-	49-50
Legal Proceedings -	-	-	-		- 51
		_			
REPORT OF BOROU	TH ANAL	YST -			- 1-3

