[Report 1914] / Medical Officer of Health, Eccles Borough.

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BOROUGH OF ECCLES.

ANNUAL

REPORT

OF THE

Medical Officer of Health

AND

SCHOOL MEDICAL OFFICER

W. M. HAMILTON, M.D., D.P.H., J.P.

For the Year, 1914.

Issued by Order of the Health Committee

Eccles :

Bogg & Sons, Printers, 167, Church Street.

CONTENTS.

HEALTH COMMITTEE.

—o—

Municipal Year Ending 1915.

Chairman—Councillor R. EVANS.

Vice-Chairman—Alderman W. J. NUTTALL, J.P.

THE MAYOR (Councillor H. CORNER).

Alderman W. PEARSON.

„ T. THOMPSON, J.P.

Councillor W. T. ALEXANDER, J.P.

„ E. HALLSWORTH.

„ J. HEATON.

„ F. W. OGDEN.

Meetings of the Health Committee held monthly on the second Monday following the Council Meeting, in the Town Hall.

Annual Report of the Medical Officer of Health.

1914.

To the Chairman and Members of the Health Committee.

GENTLEMEN,

I have pleasure in submitting my Annual Report for the year ending December 31st, 1914. Good work continues to be done. The death-rate is slightly higher than last year (when we established a record), but it is considerably below the rate for the rest of the country. Last year the rate was 12·4 per 1000; this year it is 13·0. The rate for England and Wales was 13·6. Even so the rate is lower with the exception of last year and 1910 than it has been since 1876. Had it not been for the severe and inclement weather in November and December the rate would have been much lower, as the following table will shew:

January	15·7	July	7·07
February	13·8	August	11·4
March	8·9	September	8·9
April	8·4	October	10·3
May	11·1	November	14·04
June	12·8	December	18·4

One striking figure in connection with the death-rate is the large increase in fatal heart disease cases. These have increased from 51 to 68. The probable cause of this is the injurious effect of influenza on the heart. The zymotic death-rate (*i.e.*, deaths from Infectious Diseases) has fallen from 1·4 to ·99.

The birth-rate has fallen from 22·5 to 21·6 per 1000.

The Infantile Mortality has risen from 89 per 1000 registered births to 105—the same figure as for England and Wales. The causes of this are dealt with under Infantile Mortality, *vide in fra.*

Slow but steady progress is being made with the re-housing scheme for the South-East Eccles Area.

The Dairies, Cowsheds and Milkshops have been thoroughly and systematically inspected and many improvements carried out.

The Sewage Farm continues to work well. A Report from the Farm Manager is included in the Report.

The Common Lodging Houses have been kept under constant supervision, and also the Houses Let in Lodgings. Considerable overcrowding has been found, and has been dealt with.

It is a matter for deep regret that, owing to sickness, the Committee has temporarily lost the assistance of Mr. Alderman Nuttall, the Vice-Chairman. For many years his sound common sense and business ability have been invaluable. We trust that he will soon be with us again.

I have again to thank Mr. Laskey (Chief Sanitary Inspector), and am grateful to Mr. Knowles and Mr. Hulse, both of whom have done their work conscientiously and well, and are trustworthy and loyal to the Committee.

I beg to thank the Chairman and the Members of the Committee for the uniform assistance and support they have given me.

I am, Gentlemen,

Yours obediently,

W. M. HAMILTON,

M.D., M.Ch., B.A.O., D.P.H.,

&c., &c.

SECTION I.

Trade, &c., of the District.

The Borough of Eccles is situate four miles West of Manchester. It extends from the Gilda Brook, the Boundary of the Royal Borough of Salford, westward for about two and three quarter miles. It is bounded on the West by Chat Moss, and on the South by the Manchester Ship Canal.

The area of the Borough is 2,058 acres, and the population according to the last census, 41,944—now estimated at 43,300.

The substratum rock is mainly red sandstone, considerable patches of the boulder clay remain in places. In the Peel Green or West end of the Borough—in Barton Road by the Bridgewater Canal and by the side of the Ship Canal are found beds of drift sand. At Monton Green and Slack Lane, coal is found six feet from the surface, being overlaid by the boulder clay.

Ship Canal.—No complaints as to the state of the Ship Canal were received during the year.

Open Spaces.—The Recreation Grounds have been used to a great and increasing extent by the public. The provision of music weekly in each ground has been a great inducement to keep the people in the open air.

Trade and Manufactures.—The cotton and iron trades provide the principal industries of the Borough, but there are also silk mills, metallurgical works, and other industries.

Water Supply.—This is from the Manchester Corporation, and is excellent.

SECTION II.

STATISTICAL SUMMARY, 1914.

POPULATION estimated to the middle of the year, 1914	43,300
BIRTHS—Males, 482; Females, 456 (after allowing for inward and outward transfers)	938
ANNUAL RATE of BIRTHS per 1,000 of population ...	21·6
DEATHS Registered in the Borough — Males, 319; Females, 286	605
ANNUAL DEATH-RATE per 1,000 of the population, after deducting the Deaths belonging to out-districts, and adding Deaths of residents occurring outside district...	13·09
ZYMOTIC DEATH-RATE	·99
INFANTILE MORTALITY (per 1,000 Births)	105
EXCESS of REGISTERED BIRTHS over DEATHS (corrected)	371
DENSITY.—The Mean Density of the Borough per acre is equal to	21·03

Persons per acre:—In Barton Ward, 23·7; Eccles Ward, 58·1; Irwell Ward, 30·1; Monton & Park Ward, 12·5; Patricroft Ward, 41·2; Winton Ward, 12·3.

	ACRES.
AREA :—The total Area of the Borough of Eccles ...	2,058
RATEABLE VALUE for District Rate purposes ...	£189,981
NETT VALUE of a PENNY RATE	£706

ENGLAND AND WALES, 1914.

BIRTH RATE	23·6
DEATH RATE (corrected)	13·6
INFANTILE MORTALITY (per 1,000 Births)	105

SECTION III.

Vital Statistics.

ESTIMATED POPULATION.—The census returns taken in April 1911, show that the population at that date was 41,944.

Table shewing Acreage, Number of Houses, and Population of the various Wards at Census, and estimated at the end of June, 1914.

Ward.	Acreage.	Census 1911. Dwelling-houses. Inhabited.	Uninhabit'd	Total	Population. Males	Females.	Total.	Estimated June 1914 Dwelling-houses. Inhabited.	Uninhabit'd	Total	Population
BARTON	382½	1949	85	2034	4319	4394	8713	2166	14	2180	9092
ECCLES	108½	1418	92	1510	2924	3165	6089	1497	16	1513	6312
IRWELL	182	1221	46	1267	2637	2737	5374	1255	25	1280	5480
MONTON and PARK	531	1458	135	1593	2723	3705	6428	1622	43	1665	6771
PATRICROFT ...	175½	1459	84	1543	3572	3652	7224	1534	9	1543	7237
WINTON ...	678½	1839	60	1899	3931	4185	8116	1858	41	1899	8408
TOTALS FOR THE BOROUGH	2058	9344	502	9846	20106	21838	41944	9932	*148	10080	43300

* Of this number 40 are "closed" houses.

BIRTHS.—The number of births registered in the Borough during the year was 938, as against 971 for 1913. Of these 482 were males, and 456 females; this gives a Birth rate of **21·6** per 1,000 of the population, as against 22·5 for 1913, 22·4 for 1912; and 22·2 for 1911. There were 29 illegitimate births, being 3·09 per cent of the total number of births.

DEATHS.—Of the 605 deaths registered as having occurred within the Borough, 319 were males, and 286 females; of these 84 were of persons belonging to outside districts. *(see Table).* Forty-six deaths occurred in Institutions in Manchester, Salford, and other places outside the Borough. After correcting for the above, the death-rate for the year was **13·09** per 1000, of the population, as against 12·4 for 1913.

Table of Births and Deaths belonging to various Wards.

Ward.	Total Deaths.	Death rate per 1,000.	Uncor'd No. of Births.	Birth rate per 1,000.
Barton	127	13·9	232	25·5
Eccles	92	14·5	141	22·3
Irwell	81	14·7	116	22·8
Monton & Park ...	62	9·1	79	11·6
Patricroft	95	13·1	157	21·6
Winton	110	13·08	211	25·09
Totals for the Borough	567	13·09	936	21·6

I append the following table showing the mortality rates of England and Wales, and in the 242 towns, as compared with those of this Borough.

VITAL STATISTICS IN ENGLAND AND WALES (1914).

Birth Rate, Death Rate and Infantile Mortality during the Year 1914

(Provisional Figures).

	Annual rate per 1000 living.			Deaths under one year to 1000 Births.
	Births.	Deaths. Crude.	Deaths. Standardized.*	
England and Wales	23·6	13·9	13·6	105
97 Great Towns (including London)	24·9	14·6	14·9	113
145 Smaller Towns	23·6	12·8	12·9	104
England and Wales, less the 242 Towns ...	21·9	13·3	12·2	93
London	24·6	14·4	14·4	103
**Eccles.....	**21·6**	**13·7**	**13·09**	**105**

*The standardized death rates (formerly called corrected death rates) are the rates which would have been recorded had the sex and age constitution of the populations of the several areas been identical with that of England and Wales as enumerated in 1901. A description of the method of standardizing these death rates is to be found in the Registrar General's Annual Report for 1911, p. xxix.

As before stated 84 deaths of persons from outside districts occurred within the Borough. The following indicates the localities to which they belong ;—

Stretford	27	Swinton	27
Urmston	6	Manchester ...	4
Worsley	3	Irlam	3
Walkden	4	Cadishead	3
Flixton	2	Salford	2
Bristol	1	Tyldesley	1
Birkenhead... ..	1		—
		Total	84

Forty-six deaths belonging to this Borough occurred in outside districts and these were transferred from the following :—

Manchester ...	11	Salford	19
Swinton	4	Barton-upon-Irwell	3
Blackpool	2	Kendal	1
Wigan	1	Wardle	1
Warrington ...	1	Little Hulton ...	1
Lancaster	1	Burley-in-Wharfdale	1
			—
		Total	46

Mortality in Age Groups :—

Deaths under one year	99
do. 1 year and under 2 years	29
do. 2 years and under 5 years	20
do. 5 years and under 15 years ...	24
do. 15 years and under 25 years ...	23
do. 25 years and under 45 years ...	73
do. 45 years and under 65 years ...	134
do. over 65 years...	165
	567

Infantile Mortality :—

The total number of deaths under one year belonging to the Borough was 99. This gives an infantile rate of 105 per 1000 births, as compared with 89 for 1913 and 98 for 1912.

*Zymotic Death-Rate :—

The number of deaths due to the principal zymotic diseases was 43. This gives a rate of ·99 per 1000 of population, as compared with 1·4 for 1913.

Scarlet Fever.—One death was due to this disease.

* Small-Pox, Measles, Scarlet Fever, Diphtheria, Whooping Cough, Fever—(Typhus, Typhoid, and Continued) and Diarrhœa.

Measles.—No deaths were due to this disease.

Enteric Fever.—Three deaths.

Diphtheria and Croup.—Seven deaths, as compared with five for 1913.

Diarrhœa.—There were 23 deaths from this disease, compared with 39 for 1913.

Whooping Cough.—There were nine deaths from this disease.

Acute Lung Diseases.—Bronchitis, and all forms of Pneumonia.—The deaths from these diseases numbered 92; giving a death rate of 2·2 per 1,000, as compared with 2·3 for 1913.

Influenza.—There was one death from this disease.

Phthisis.—47 deaths were attributed to this disease, the death rate from which was equal to 1·1 per 1,000, as compared with ·76 in 1913.

Cancer.—36 deaths were attributed to this disease, the death rate from which was equal to ·8.

Other Tubercular Diseases.—The deaths from these diseases numbered 10, giving a death rate of ·2 per 1,000, against ·16 for last year.

Total Deaths & Death Rates from all causes. Children under 5 years of age. Zymotic and Pulmonary Diseases For the Years 1876–1914.

Year.	Total Deaths	Rate per 1000	Zymotic Diseases	Rate per 1000	Deaths under 5	Rate per cent.	Phthisis	Rate per 1000	Acute Chest Diseases	Rate per 1000.
1876	423	25·4	66	3·9	158	37·5	53	3·1	100	6·0
1877	440	22·7	89	4·6	175	40·0	46	2·3	84	4·3
1878	443	22·2	68	3·4	196	44·2	49	2·4	90	4·5
1879	396	19·2	28	1·3	177	43·8	60	2·9	116	5·6
1880	437	20·5	87	4·0	176	43·7	59	2·7	96	4·5
5 years average	427	22·0	67	3·4	176	41·	53		97	4·9
1881	383	17·4	56	2·5	155	40·4	66	3·0	70	3·1
1882	434	19·0	59	2·5	190	49·0	46	2·0	113	4·9
1883	371	15·7	53	2·2	173	47·0	45	1·9	90	3·8
1884	399	16·4	83	3·4	181	45·0	41	1·6	87	3·5
1885	419	16·6	54	2·1	157	37·0	46	1·8	91	3·6
5 years average	401	17·0	61	2·5	171	43·6	48	2·0	90	3·7
1886	419	16·1	47	1·8	186	44·1	40	1·5	93	3·5
1887	475	17·8	90	3·3	219	42·6	41	1·5	127	4·7
1888	437	15·9	54	1·9	183	41·8	49	1·7	100	3·6
1889	465	16·4	79	2·7	213	45·8	49	1·7	93	3·2
1890	603	20·8	50	1·7	218	36·1	50	1·7	142	4·9
5 years average	479	17·4	64	2·2	203	42·0	45	1·6	111	3·9
1891	683	22·3	94	3·1	292	42·7	43	1·4	143	4·7
1892	554	18·1	35	1·1	205	37·0	50	1·6	93	3·0
1893	608	18·6	82	2·5	247	40·6	39	1·2	113	3·5
1894	443	13·0	49	1·4	183	41·3	47	1·4	74	2·3
1895	552	16·2	104	3·1	239	41·4	54	1·6	97	2·9
5 years average	568	17·6	72	2·2	233	40·6	45	1·4	104	3·2
1896	551	15·7	104	3·0	221	40·1	50	1·4	76	2·2
1897	580	16·7	94	2·7	248	42·7	56	1·6	115	3·3
1898	573	16·6	114	3·2	232	40·0	44	1·2	95	2·7
1899	600	16·7	127	3·5	215	35·8	46	1·2	98	2·7
1900	619	17·0	91	2·5	220	35·5	38	1·0	107	2·9
5 years average	585	16·5	86	3·0	227	38·8	47	1·3	98	2·7
1901	570	16·5	94	2·7	217	38·0	43	1·2	94	2·7
1902	553	15·8	79	2·2	182	32·9	29	·8	90	2·5
1903	527	14·8	59	1·6	181	34·3	33	·92	94	2·6
1904	542	14·8	63	1·7	211	38·9	39	1·0	87	2·3
1905	511	13·4	42	1·1	177	32·6	35	·92	95	2·5
5 years average	540	15·0	67	2·0	193	35·3	35	·96	92	2·5
1906	534	13·8	47	1·2	189	35·3	43	1·1	94	2·4
1907	585	15·0	59	1·5	193	30·3	39	1·0	115	2·9
1908	558	13·9	62	1·5	196	35·1	30	·75	117	2·9
1909	568	13·6	28	·67	158	27·9	46	1·1	111	2·6
1910	545	12·8	58	1·3	179	32·8	25	·58	96	2·2
5 years average	558	13·8	50	1·2	183	32·2	36	·90	106	2·6
1911	582	13·7	74	1·7	159	22·3	43	1·0	74	1·7
1912	580	13·6	69	1·6	164	28·2	53	1·2	104	2·4
1913	536	12·4	62	1·4	151	28·2	33	·76	101	2·3
1914	567	13·09	43	·99	1·8	26·1	47	1·1	92	2·2

Borough of Eccles.

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Vital Statistics of whole district during 1914, and previous years.

Year.	Population estimated to middle of each year.	Births.			Total Deaths Registered in the District.		Transferable Deaths.		Nett Deaths belonging to the District.			
		Uncorrected Number.	Nett.						Under One Year of Age.		At all Ages.	
			Number	Rate	Number	Rate	of non-residents registered in the District.	of residents not registered in the District.	Number	Rate per 1000 nett Births.	Number	Rate.
1	2	3	4	5	6	7	8	9	10	11	12	13
1909 ...	41500	993	.....	.....	606	14·6	74	36	110	110	568	13·6
1910 ...	42500	963	.....	.....	586	13·7	80	39	117	121	545	12·8
1911 ...	42200	940	935	22·1	605	14·3	81	58	108	115	582	13·7
1912 ...	42500	964	952	22·4	620	14·5	83	43	93	98	580	13·6
1913 ...	43000	973	971	22·5	577	13·4	94	53	87	89	536	12·4
1914 ...	43300	936	938	21·6	605	13·7	84	46	99	105	567	13·09

Area of District in acres 2,058
Total population at all ages 41,944
Number of Inhabited Houses 9344
Average number of persons per house ..... 4·5

} At Census, of 1911.

The Union Workhouse is situate within the Borough.

BOROUGH OF ECCLES.

Causes of, and ages at Death during the Year 1914.

Causes of Death.	Nett Deaths at the subjoined ages of Residents whether occurring within or without the District.									Total Deaths whether of "Residents" or "Non-Residents" in Institutions in the District.
	All Ages	Under 1 year	1 and under 2	2 and under 5	5 and under 15	15 and under 25	25 and under 45	45 and under 65	65 and upwards	
1	2	3	4	5	6	7	8	9	10	11
All causes { Certified	567	99	29	20	24	23	73	134	165	46
All causes { Uncertified	.....	.....	.....	.....	.....	.....	.....	.....	.....	
Enteric Fever	3	.....	.....	.....	.....	3	.....	.....	.....	
Small-pox	.....	.....	.....	.....	.....	.....	.....	.....	.....	
Measles	.....	.....	.....	.....	.....	.....	.....	.....	.....	
Scarlet Fever	1	.....	.....	.....	1	.....	.....	.....	.....	
Whooping Cough	9	6	2	1	.....	.....	.....	.....	.....	
Diphtheria and Croup	7	.....	2	2	3	.....	.....	.....	.....	
Influenza	1	.....	.....	.....	.....	.....	.....	1	.....	
Erysipelas	2	.....	.....	.....	.....	.....	.....	2	.....	
Phthisis (Pulmonary Tuberculosis)	47	.....	1	.....	2	6	23	14	1	6
Tuberculous Meningitis	1	.....	.....	1	.....	.....	.....	.....	.....	
Other tuberculous diseases	9	1	2	1	.....	2	.....	3	.....	
Cancer, malignant disease	36	.....	.....	.....	.....	.....	8	18	10	2
Rheumatic Fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	
Meningitis	4	3	.....	.....	.....	.....	1	.....	.....	
Organic heart disease	68	.....	1	.....	3	1	8	29	26	11
Bronchitis	52	10	3	1	.....	.....	.....	14	24	5
Pneumonia (all forms)	40	11	4	6	2	.....	5	7	5	1
Other diseases of the respiratory organs	6	.....	.....	.....	.....	.....	2	3	1	
Diarrhœa and Enteritis	23	7	7	1	2	1	.....	3	2	
Appendicitis and Typhlitis	3	.....	.....	.....	.....	2	.....	.....	1	
Cirrhosis of liver	8	.....	.....	.....	.....	.....	1	2	5	
Alcoholism	.....	.....	.....	.....	.....	.....	.....	.....	.....	
Nephritis and Bright's Disease	13	.....	.....	.....	.....	1	3	2	7	
Puerperal Fever	.....	.....	.....	.....	.....	.....	.....	.....	.....	
Other accidents and diseases of Pregnancy and Parturition	3	2	.....	.....	.....	.....	1	.....	.....	
Congenital Debility and Malformation, including Premature Birth	29	29	.....	.....	.....	.....	.....	.....	.....	1
Violent Deaths, excluding Suicide	19	1	.....	2	5	3	6	1	1	4
Suicides	3	.....	.....	.....	.....	1	1	1	.....	
Other Defined Diseases	180	29	7	5	6	3	14	34	82	16
Diseases ill-defined or unknown	.....	.....	.....	.....	.....	.....	.....	.....	.....	
Totals	567	99	29	20	24	23	73	134	165	46
SUB-ENTRIES included in above figures-										
Cerebro-spinal meningitis	1	.....	.....	.....	.....	.....	1	.....	.....	
Poliomyelitis	.....	.....	.....	.....	.....	.....	.....	.....	.....	

SECTION IV.

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RECORD OF INFECTIOUS DISEASES.

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The total number of cases notified during the year was 527 (exclusive of Measles and Whooping Cough cases) compared with 298 for the year 1913.

Diseases.	1905		1906.		1907.		1908.		1909.		1910.		1911.		1912.		1913.		1914.	
	Cases Notified.	Deaths.	Cases Notified.	Deaths.	Cases Notified.	Deaths.	Cases Notified.	Deaths.	Cases Notified.	Deaths.	Cases Notified.	Deaths.	Cases Notified.	Deaths.	Cases Notified.	Deaths.	Cases Notified.	Deaths.	Cases Notified.	Deaths.
Small-Pox	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
Scarlet Fever	134	6	208	5	186	5	180	7	171	4	58	1	127	2	82	1	65	1	249	1
Diphtheria	30	6	28	5	33	8	30	3	53	8	27	2	32	4	26	4	33	5	60	7
Membranous Croup ...	.....	.....	1	.....	.....	.....	2	2	.....	.....	.....	.....	.....	.....	1	1	.....	.....	4	.....
Enteric Fever	17	4	22	4	13	3	13	4	22	4	180	21	12	3	14	4	9	2	8	3
Puerperal Fever ...	2	.....	1	.....	1	.....	.....	.....	2	.....	2	1	3	1	2	2	5	2	3	.....
Measles	.....	16	.....	3	.....	5	.....	18	.....	1	.....	13	.....	7	.....	29	.....	11	.....	.....
Whooping Cough ...	.....	6	.....	.....	.....	24	.....	15	.....	2	.....	13	.....	1	.....	26	.....	4	73	9
Diarrhœa and Dysentery	.....	4	.....	30	.....	14	.....	12	.....	9	.....	8	.....	54	.....	8	.....	39	.....	23
Erysipelas	27	1	9	2	20	1	7	.....	14	.....	22	1	14	.....	20	1	22	1	26	2
Continued Fever ...	1	.....	.....	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....
Acute Poliomyelitis ...	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	4	.....	2	.....	.....	.....
Cerebro Spinal Fever.	.....	.....	.....	.....	1	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	.....	1	1
Ophthalmia Neonatorum	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	1	.....	2	.....	2	.....	2	.....	7	.....
Tuberculosis (All Forms)	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	160	30	169	57
Total	211	43	269	49	254	60	231	62	262	28	290	60	190	72	151	77	298	95	613	113

Monthly Return of Notification of Infectious Diseases.

1914	Scarlet Fever	Diphtheria & Membranous Croup	Enteric Fever	Puerperal Fever	Erysipelas	Ophthalmia Neonatorum	Acute Poliomyelitis	Tuberculosis (All Forms)	Cerebro Spinal Fever.	Totals.
January ...	4	4	2	...	1	...	...	15	...	26
February...	9	1	4	...	1	...	...	19	...	34
March ...	12	5	...	...	3	2	...	13	...	35
April ...	15	2	...	2	...	...	...	11	...	30
May ...	16	3	...	...	2	...	...	26	...	47
June ...	23	9	...	...	5	3	...	13	...	53
July ...	21	6	...	...	3	...	...	13	...	43
August ...	13	4	...	...	2	1	...	8	...	28
September.	27	9	...	...	5	...	...	16	1	58
October ..	43	7	...	...	2	...	...	13	...	65
November .	44	4	2	1	2	...	...	11	...	64
December .	22	10	...	...	...	1	...	11	...	44
Totals ...	249	64	8	3	26	7	...	169	1	527

Included in the above figures is a case of Scarlet Fever which was later notified to be suffering from Diphtheria.

Borough of Eccles.

Cases of Infectious Disease Notified during the year 1914.

Notifiable Disease.	Number of Cases Notified. At Ages.—Years.								Total Cases Notified in each locality.							Total cases removed to Hospital.	Deaths in Hospital of Patients removed from this District.
	At all Ages	Under 1 Year.	1 and under 5	5 and under 15	15 and under 25	25 and under 45	45 and under 65	65 and upwards.	Barton Ward	Eccles Ward	Irwell Ward	Monton Ward	Patricroft Wd	Winton Ward	Total		
Small-pox	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
Cholera	...	...	..	...	...	...	...	...	..	...	...	...	...	...	...	...	...
Diphtheria (including Membranous Croup)	64	...	19	38	6	1	..	..	21	7	3	7	7	19	64	37	4
Erysipelas	26	1	1	3	3	5	12	1	8	6	1	1	5	5	26	...	...
Scarlet Fever	249	1	36	182	23	7	...	...	70	38	27	25	50	39	249	63	1
Typhus Fever	..	..	...	...	...	...	...	...	...	..	...	...	...	...	...	...	...
Enteric Fever	8	...	...	2	...	6	...	...	...	...	2	2	...	4	8	8	2
Relapsing Fever	...	...	...	...	...	...	...	...	..	..	...	...	...	...	...	..	...
Continued Fever... ...	..	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
Puerperal Fever	3	...	...	...	...	3	...	...	...	1	...	...	1	1	3	2	...
Cerebro-spinal Meningitis	1	...	...	...	...	1	...	...		1	...	..	...	...	1	...	...
Poliomyelitis	...	..	...	...	...	...	...	..	...	...	...	...	...	...	...	...	...
Pulmonary Tuberculosis ..	129	1	5	28	18	55	21	1	27	24	16	10	25	27	129	...	...
Other forms of Do.	40	1	7	15	8	6	3	...	9	12	3	3	7	6	40	...	...
Ophthalmia Neonatorum.	7	7	...	...	...	...	...	...	4	...	1	...	1	1	7	...	...
Totals	527	11	68	268	58	84	36	2	139	89	53	48	96	102	527	110	7

Isolation Hospital—Ladywell Sanatorium, Salford. Total available beds 26.

Distribution of Infectious Diseases into Wards.

Diseases.	Barton		Eccles		Irwell.		Monton and Park		Patricroft		Winton.		Total.	
	Total Notified	Total Deaths.	Total Notified.	Total Deaths.	Total Notified	Total Deaths.	Total Notified.	Total Deaths.	Total Notified.	Total Deaths.	Total Notified.	Total Deaths.	Cases Notified	Deaths
Small-Pox	...	...	...	...	...	...	...	...	...	...	...	...	...	...
Scarlet Fever	70	1	38	...	27	...	25	...	50	...	39	...	249	1
Diphtheria and Membranous Croup...	21	4	7	...	3	1	7	...	7	1	19	1	64	7
Enteric Fever	...	...	...	...	2	2	2	1	...	...	4	...	8	3
Puerperal Fever	...	...	1	...	...	...	...	...	1	...	1	...	3	...
Measles	1	...	4	...	8	...	...	...	...	...	...	...	13	...
Whooping Cough	10	4	27	2	21	...	2	...	12	...	1	3	73	9
Diarrhœa and Dysentery.	...	7	...	7	...	3	...	1	...	1	...	4	...	23
Erysipelas	8	...	6	1	1	...	1	...	5	...	5	1	26	2
Acute Poliomyelitis ...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
Continued Fever	...	...	...	...	...	...	...	...	...	...	...	...	...	...
Tuberculosis (Pulmonary)	27	9	24	8	16	8	10	3	25	6	27	13	129	47
Tuberculosis (other than Pulmonary	9	2	12	1	3	2	3	1	7	3	6	1	40	10
Cerebro Spinal Fever...	...	...	1	1	...	...	...	...	...	...	...	...	1	1
Ophthalmia Neonatorum	4	...	...	...	1	...	...	...	1	...	1	...	7	...
Total	150	27	120	20	82	16	50	6	108	11	103	23	613	103

Included in the above is a case of Scarlet Fever which was later notified to be suffering from Diphtheria.

Amount of Hospital Isolation of Infectious Diseases.—There were 110 cases of infectious diseases removed to hospital, being 30·7 per cent of the total number ot cases notified.*

Scarlet Fever—cases notified	249,	removed	63,	per centage	25·3
Diphtheria and Membranous Croup	do.	64,	do.	37,	do.	57·8
Enteric fever	do.	8,	do.	8,	do.	100
Puerperal fever	do.	3,	do.	2,	do.	66·6
Erysipelas	do.	26,	do.	—	do.	—
Acute Poliomyelitis	do.	—	do.	—	do.	—
Cerebro Spinal Fever	do.	1,	do.	—	do.	—
Ophthalmia Neonatorum	do.	7,	do.	—	do.	—

In 1913, 29·5 per cent of notified cases were removed ; 32·4 per cent in 1912, 22·6 per cent in 1911.

* Omitting Tuberculosis, Measles and Whooping Cough cases.

SECTION V.

Phthisis and other Tubercular Diseases.

Very great progress has been made in the battle against this disease. Since compulsory notification was introduced in 1913, the Health Authority has been placed in a position to deal with these cases. For many years the Society of Medical Officers of Health and the Sanitary Institute, at its Annual Congresses, advocated this measure. It was at first considered a fad, but now, thanks to a more enlightened Board, it is a fact. The most promising factor in our battle against Tuberculosis is the great interest now being taken in Housing. We have been spending public money in rectifying, through the School Medical Service, diseases in children caused by the insanitary condition of their homes; these will continue to be a public charge until their homes are made healthy. The housing question is at the root of the treatment and prevention of this disease. The present unsuitable housing not only predisposes to infection by inducing a low standard of health in individuals, but also affords every facility for the spread of infection. This has been recognised by the Chairman of the Health Committee and by the Members of the Property Inspection Committee. They realise that it is a waste of money and altogether absurd to spend money in sending cases to Sanatoria, and after treatment to let them return to dark, ill-ventilated and insanitary houses. For this reason we are pursuing a most energetic system of re-housing in the most congested area in our Borough. The number of cases of Pulmonary Tuberculosis, as is shown in the subjoined tables, is in direct proportion to the rooms in the house.

Since the discovery of Tubercle Bacilli by Professor Kock, great progress has been made in the control of this disease, as the following tables will show:—

Vienna	from	6·8	in	1881	to	3·36	in 1901 and	2·37 in 1912.
Petrograd	„	5·49	„		„	3·12	„	2·87 „
Glasgow	„	3·11	„		„	1·76	„	1·76 „
Edinburgh	„	2·12	„		„	1·61	„	1·08 „
Melbourne	„	2·33	„		„	1·39	„	1·04 „

PULMONARY TUBERCULOSIS.

Death-rate per 1000 living.

Cities	1881-85	1901-05	1912
London	2·22	1·60	1·35
Dublin	3·46	3·09	2·45
Belfast	3·82	3·07	2·05
Toronto	2·03	1·74	...
Paris	4·41	3·90	3·32
Amsterdam ...	2·38	1·44	1·22
Copenhagen ...	2·73	1·44	1·37

The following enquiries are made :—

1. *Particulars of Patient.*

Name Age Sex

Localisation of the Disease

Whether Poor Law (P), Hospital (H), Medical Practitioners' (M), or School (S) case

Address

(i.) If in a Poor Law Institution, Hospital, Private Residence, or otherwise Address of Patient

Any other Address to be visited

(ii.) Changes of Address, where to

If to another Medical Officer of Health's District, name thereof, and date when particulars sent to that M.O.H., including particulars of Medical History.

2. *Personal and Family History.*

Number in family adults lodgers children

Ages

Previous History of Patient and Family History

3. *Diagnosis.*

Localisation

Symptoms

Verification of the Notification : Method

Bacteriological Examination of sputum or other method of diagnosis :

Dates

Results

Probable predisposing causes of infectivity

Probable sources of infection

Nutrition

Occupation

Other particulars of diagnosis and personal particulars

4. *Environment.*

(i.) At Home
Accommodation ?
Cleanliness ?
General surroundings ?
Adequacy ?
Sleeping accommodation ?
Other details ?
(ii.) At work ?

5. *Visits following Notification.*

By whom visited, with dates
Instructions given to Patients and Relatives ? Card of "Instruction" left ?
Inquiries made ? Give reference to enquiry, paper, &c., containing records
Does notifying practitioner continue to act ?
Consultation with Medical Practitioner ? Dates, details
Any other Tuberculosis cases discovered ? Reference to records.
If Patient in an Institution, any visits paid to usual residence ? Action taken ? Reference to records
Any other details of visits ?
Co-operation with Charitable Agencies ?

6. *Personal Hygiene of Patient and Precautionary Measures.*

(i.) At house
Disinfection of rooms and bedrooms ?
Removal of overcrowding ?
Separate sleeping accommodation provided for Patient ?
Cleansing of premises ?
Disposal of infective articles or materials ?
Removal of any other conditions favouring infection or re-infection ?
Spit-bottles or other appliances provided ?
Any Out-Relief granted by the Poor Law Guardians ?
(ii.) At work
Occupation continued or changed ?
Any preventive measures ?
(iii.) Institutional
If sent to Poor Law Institution, Sanatorium, or other Isolation treatment, where and whether in or out-patient ? Dates
Reference to records
(iv.) Any other measures taken

(v.) If residence changed
Disinfection of old residence ?
Dates Details Reference to records

7. *Results.*

As to recovery ? Occupation resumed or changed ?
Reference to later records ?

8. *General Treatment, etc.*

Date

Sputum cups and Izal handkerchiefs are supplied to each case treated at home. The appended leaflet is given to each patient. Frequent disinfection is carried out. All scholars in the elementary schools are excluded and re-examined every three months. All contacts from houses in which there is a case of Pulmonary Tuberculosis are examined. In several cases the Committee have granted supplies of milk and other nourishments to the poor people. The Sanatorium benefit provided by the Insurance Act is now adequate.

The consumptive himself must be educated to cover his mouth while coughing and to burn his sputum. Handkerchiefs and sputum cups are supplied by the Committee. The patient can take no precautions while he is asleep, therefore every consumptive should have a bed, and better still, a room to himself, and he should have the bedroom windows open. It is often stated that the night air is injurious; it is only so on account of the previous night's air. Therefore open the window and let the bad air out.

All cases excluded by the School Medical Officer are followed up and periodically examined every three months. Many of these have been cured.

The following leaflet is handed to each case of Phthisis and explained by the visiting Inspector :—

BOROUGH OF ECCLES.

INSTRUCTIONS TO PERSONS SUFFERING FROM CONSUMPTION.

I.—It has been abundantly proved that "Phthisis' or "Consumption" is an infectious disease, and is infectious by means of the sputum.

II.—The way in which Phthisis is usually spread from one person to another by means of the sputum is as follows :—

(*a*) A consumptive patient coughs up a quantity of sputum, in which are enormous numbers of the specific germs ;

(*b*) The sputum lodges where it is spat on, and there dries ;

(*c*) When dried, the sputum is usually pulverised and floats in the air as dust;

(*d*) The germs contained in the sputum, though dried, are still living, and able to infect the air in which they are suspended;

(*e*) The infected air when breathed is liable to cause phthisis. This is more particularly true of people who are already suffering from phthisis and whose recovery is thus prevented.

III.—Great care must therefore be used, so that the sputum is not discharged on any spot or into any substance on which it can be dried and subsequently broken into dust.

It must, therefore, not be discharged on the floor or walls of any living room, workshop, meeting room, theatre, or other confined place in which people assemble. It must not be discharged into a pocket handkerchief carried in the usual manner, since it readily dries in such a situation, so that not only are the clothes infected, but, when the pocket handkerchief is again used, a cloud of infective dust is scattered around you.

IV.—There are various ways in which this danger may be avoided.

At home you should spit into a piece of paper or clean rag, carefully clean your mouth with it, and then throw the soiled rag or paper on the back of the fire.

If there is no fire you should spit into a cup containing water, which must be emptied once a day into the drains outside the house, and then thoroughly cleansed with boiling water before being again used.

Outside the home you should carry a number of pieces of soft tissue paper, preferably oiled, and when you must spit use one of these, folding it after use so that the sputum is right in the centre of it, when it will not dirty the pocket. Use one pocket for the unused papers and another for those which have been used.

Or you may carry a pocket spittoon charged with moistened blotting paper. This may be readily obtained at any chemist's, or made. It is essential that the lid should fit tight. and that the spittoon should be kept clean.

V.—All persons who have a chronic cough and spit should carry out the above precautions, and it is also advisable that they consult their medical attendant without delay.

VI.—Consumptives should not kiss on the lips.

The eating utensils which they have used should be at once thoroughly cleansed before further use.

VII.—If these precautions are strictly observed a consumptive person

runs no risk whatever of infecting others, and adds considerably to his own chances of recovery.

VIII.—The sleeping room of a consumptive should be kept rigorously clean. If, by any chance, the pillows or bed clothes have been soiled with sputum they should be at once disinfected by steam, or washed with boiling water.

Dust should not be allowed to accumulate anywhere in the bedroom. The room should be kept well aired and the bedroom window should, whenever possible, be kept slightly open.

IX.—Persons who have contracted consumption, or who have a family history of the disease, should not live or sleep in a room which is damp, crowded, badly lighted, or badly ventilated.

The patient should have a bed for his own use and as far as possible should have the use of a separate room.

X.—It will often happen when a consumptive person's attention is first called to these rules that a considerable amount of infective dust will have collected in the rooms which he has occupied. These must be carefully disinfected.

Articles, including wearing apparel, carpets, hangings, bed clothes and mattresses, which admit to such treatment, will be disinfected by the Corporation free of charge. Articles which admit of washing with boiling water may be so washed. Other articles, as well as the floor, walls and ceiling, should be thoroughly cleaned down with a disinfectant, and the Corporation will do this work if requested. Where the work is done by the householder, directions will be given in each instance of the precise degree and kind of disinfection necessary.

Having once got the rooms quite clean, it becomes easy, though necessary, to keep them so. In order to effect this, the floors and skirtings of rooms used by consumptive persons should be thoroughly cleansed with soap and water at least once a week, and at all times the rooms should be kept free from dust. It is always desirable in dusting a room to moisten the floor with tea leaves or otherwise, and to use a damp duster to other parts of the room. In this way one makes sure of not scattering infectious dust in the air of the room. This is especially necessary in a room occupied by a consumptive whose lungs are, moreover, likely to be injured by the dust left in the room.

XI.—The walls ought to be rubbed down with dough every three months.

XII.—Consumptives should not borrow or use books obtained from circulating or public libraries.

XIII.—The most essential thing in preventing the spread of this disease, and in aiding the recovery of the consumptive person, is extreme cleanliness in his person and in the living and sleeping rooms used by him, with special attention to the points mentioned in this paper.

The safety of your family and of your workmates, as well as your own chances of recovery, depend on your following these rules.

Disinfectants may be obtained at the Town Hall, Eccles, between the hours of 12 and 1 o'clock mid-day and 5 and 5-30 o'clock p.m.

Every effort is made to make the enquiries as confidential as possible. In the case of domestic servants no visit is paid, but the patient is asked to call and see the Medical Officer. The same course is followed in the case of school teachers.

The following extract from Dr. Newsholme's Report is of extreme value :—

Significance of Tubercle Bacilli in Sputum.

As is well known, delay in diagnosing pulmonary tuberculosis until tubercle bacilli can be demonstrated in the sputum often implies unfortunate consequences for the patient: and it is not suggested that primary reliance in the diagnosis of this disease should be placed on the discovery of tubercle bacilli in the sputum. With the general organisation of consultative arrangements under tuberculosis schemes early diagnosis before tubercle bacilli are found in the sputum will become less uncommon than at present. At present the danger is in another direction. A large proportion of cases of pulmonary tuberculosis when notified are suffering from advanced disease. Late notification is due in the main to the patient's delay in obtaining medical advice. In a large number of cases, however, there has been medical delay in recognising the disease. In these instances, recourse to examination of sputum would have ensured much earlier and more satisfactory treatment. In other instances a single negative result from examination of sputum has been accepted as negativing the diagnosis of tuberculosis, and the patient has continued to be treated for bronchitis or some other non-tuberculous disease.

Classification of cases of pulmonary tuberculosis should be based on whether or not, after repeated examination of sputum, tubercle bacilli have been found at any stage of the patient's illness. In the records to be issued by the Board, this will be made the basis of the primary classification of all cases treated in connection with official schemes.

This classification is of importance from the public health standpoint, and for purposes of treatment and of prognosis. A patient

showing large numbers of tubercle bacilli in his sputum is more likely than other patients to spread infection; and his treatment in a hospital is desirable unless his family circumstances render infection unlikely. Such hospital treatment is especially desirable if the patient has not previously been trained in a sanatorium. The importance in relation to prognosis of the presence of tubercle bacilli in the sputum is illustrated by facts given by Dr. Forbes in his annual report for Brighton during 1913. In this report he analysis the after-history of sanatorium treated sases four years after leaving the institution. The cases comprised 384 in whose sputum tubercle bacilli were found and 148 in whose sputum it was not found. Of the former, 14 per cent., and of the latter, 55 per cent., were alive at the end of four years. This example confirms experience of other observers who have classified results of treatment on the same basis.

Infectivity of Pulmonary Tuberculosis.

The Royal College of Physicians recently passed the following resolution:

> That in view of the exaggerated fear of the infectivity of pulmonary tuberculosis entertained by the public, the consequent unnecessary disabilities imposed upon sufferers from the disease, and the opposition raised in many places to the establishment of institutions for its detection and treatment, a reassuring statement with regard to the degree of danger attaching to contact and communication with tuberculous persons be prepared by the College and issued in its name at an early date.

A Committee was appointed, consisting of Sir Seymour Sharkey, Drs. Habershon, Sandwith, Fremantle, and C. J. Martin, and the report of this Committee, which was approved by the College, is given below. It is inserted here as likely to be useful to medical officers of health. It embodies the chief facts on the strength of which the machinery for the administrative control of tuberculosis, now forming a large part of the work of the medical department of the Board and of medical officers of health, has been initiated.

Report on the Infectivity of Tuberculosis.

1. Tuberculosis is an acquired disease, but certain constitutional types may be inherited which render the patient specially susceptible to infection, and there is reason to think that such susceptibility is an inherited character.

2. The infective agent is the tubercle bacillus. This may be contai ned in the various discharges and excreta of the patient, and

especially in the sputum of those suffering from pulmonary tuberculosis. No discharge is infective unless it contains the tubercle bacillus.

3. Cases of tuberculosis of bones, glands, and internal organs from which there is no discharge or which do not furnish any excretion, and cases of arrested pulmonary tuberculosis, have never been proved to be infectious.

(By arrest is here meant that all the symptoms and physical signs of activity have disappeared, and the sputum has either ceased or no longer contains tubercle bacilli.)

4 The means by which tubercle bacilli may enter the body are:—

(*a*) *By inoculation* through a wound or abrasion of the skin. This has occasionally occurred to workers in laboratories, *post-mortem* attendants, and others dealing with tuberculous material, and is presumably the way in which lupus is acquired.

(*b*) *By inhalation.*—Susceptible animals are readily infected by the inhalation of air containing tubercle bacilli, whether in droplets or suspended as fine dust, but in the spread of the disease among human beings the latter appears to be the most important means of infection. The sputum or other discharges, whether on soiled handkerchiefs, linen, garments, or elsewhere, when dried, may become pulverized, and in this condition may be readily dispersed in the air of a room. That droplets of sputum are less important agents of infection is suggested by the fact that the incidence of consumption upon the staff, nurses, and others engaged in hospitals for the treatment of tuberculous disease, where all discharges are carefully disposed of, is not above the average in the general population.

(*c*) *By swallowing.* – Dust infected by the tubercle bacillus may be conveyed to food and so enter the alimentary canal; or infection may occur more directly in the act of kissing, or by consumptive and healthy persons using the same food utensils. As about 10 per cent. of the milk supplied to large cities contains tubercle bacilli derived from infected cows, this avenue of infection is particularly important in the case of children. The bovine tubercle bacillus is more commonly responsible for tuberculosis in young children than in adults, but the proportion of cases due to it varies very much in different localities.

(*d*) There is no evidence that tuberculosis can be conveyed to others either by the breath alone, or by emanations from patients, or by their garments, unless soiled by dried sputum or discharges.

5. The spread of tuberculosis is favoured by uncleanliness, overcrowding, and imperfect ventilation, and is hindered by the opposite conditions. Experience in hospitals and other institutions where the following precautionary measures have been thoroughly carried out indicates that by such measures the risk of infection is reduced to a minimum, namely:

(*a*) The careful disposal and disinfection of the sputum and other discharges.

(*b*) The disinfection or destruction of soiled handkerchiefs, clothes, and linen.

(*c*) The removal of dust by frequent moist cleansing of the floors, walls, &c., of the rooms.

(*d*) The supply of abundant air space and free ventilation with fresh air.

No risk is incurred by living in the immediate neighbourhood of institutions for the treatment of tuberculosis which are properly conducted.

During the year there were 169 cases—129 Pulmonary and 40 other forms—of Tuberculosis, notified. These cases were notified under Forms A, B and C. No notifications were received under Form D.

Form A refers to cases notified by medical practitioners practicing within the District.

Form B refers to cases notified by School Medical Inspectors.

Form C refers to cases notified by Medical Officers of Poor Law Institutions and Sanatoriums.

Form D refers to discharges from Hospitals and Sanatoriums.

The following particulars refer to the Pulmonary Cases only :—

101	cases were	notified under	Form A.
15	do.	do.	Form B.
13	do.	do.	Form C.
129			

They were resident at the time of notification from the following :—

112	were from	Private Dwelling Houses.
4	do.	Dwelling Houses and Shops.
2	do.	Common Lodging Houses.
2	do.	St. Joseph's Home.
9	do.	Union Workhouse.
129	Total.	

REFERRED TO IN WARDS.

	No.	Deaths.
Barton	27	5
Irwell	16	5
Eccles	24	6
Monton	10	3
Winton	27	7
Patricroft	25	3
Total ...	129	29

The deaths refer to those cases notified during the year.

The age incidence of the cases is as follows :—

Age.	Males.	Females.
Under 1	—	1
1 to 5	3	2
5 ,, 10	7	9
10 ,, 15	11	1
15 ,, 25	12	6
25 ,, 45	24	31
45 ,, 65	15	6
65 and over	1	—
Total ...	73	56

Of the total number of cases 29 died, giving a percentage of 22·4 and a death rate of ·67 per 1,000 of the population.

Of the cases referred to—

1	has removed to	Morecambe.
1	do.	Irlam.
1	do.	Llangollen.
1	do.	Southport.
1	do.	Earlstown.
1	do.	Weaste.

1 has joined the Military Forces.
3 reported cured.
4 disease not active.

OCCUPATIONS OF PERSONS SUFFERING FROM PULMONARY TUBERCULOSIS.

Textile Trades—				
	Warper	...	...	2
	Weaver	...	...	2
	Packer	...	...	1
	Sweeper	...	...	1
	Operative	...	...	1
	Winder	...	...	1
	Overlooker	...	...	1
	Reeler	...	...	1
	Dyer	...	...	1
	Spinner	...	...	1—12 Total.
Engineering and Metal Trade—				
	Firemen	...	...	2
	Brass Turner	...	...	1
	Forgeman	...	...	1
	Steel Grinder	...	...	1
	Crane Driver	...	...	1
	Turner	...	...	1
	Steel Hammer Fitter		...	1— 8 Total.
Building and Transport Trade—				
	Coach Painter	...	...	1
	Warehousemen	...	...	3
	Out-porters	...	...	2— 6 Total.
Clerical—				
	Insurance Agent	...	...	1
	Buyer	...	...	1
	Clerks	...	...	5
	Typist	...	...	1— 8 Total.
Food Service and Shops, &c.—				
	Shop Assistants	...	...	2
	Bacon Roller	...	...	1
	Pork Butcher	...	...	1
	Servants	...	...	3
	Charwomen	...	...	3
	Hawker	...	...	1—11 Total.

Clothing Trades—

Machinist	2	
Umbrella Maker	1—	3 Total.

Miscellaneous—

Scholars	31	
At Home	23	
Miller	2	
No Occupation	2	
Labourers	16	
Medical Practitioner... ...	1	
Gold Beater	1	
Laundress	1	
Police Constable	1	
Miner	1	
Nurse	1	
Tram Guard	1—	81 Total.

129 Total.

The following are particulars relating to 112 of the cases (the cases referred to are those notified from private dwelling houses).

No. in family.	Bedrooms.					Total.
	2	3	4	5	6	
1	1	.....	.....	....	.....	1
2	4	2	.....	.....	.....	6
3	8	4	.....	.....	.....	12
4	12	9	2	.....	.....	23
5	14	9	2	1	1	27
6	5	7	.....	1	.....	13
7	1	4	1	1	.....	7
8	5	7	1	....	.....	13
9	2	3	1	.....	.....	6
10	.....	1	.....	.....	.....	1
11	.....	2	.....	.....	.....	2
12	.....	1	.....	.....	.....	1
13	.....	.....	.....	.....	.....	—
14	.....	.....	.....	.....	.....	—
15	... ...	.....	.....	.....	.....	—
Total.....	52	49	7	3	1	112

It will thus be seen that the incidence of cases is in direct ratio to the number of bedrooms.

The following cases were notified from the same addresses :—

Case No.	Relative or not.
223 and 296	Father and daughter.
180, 186 and 239	Mother and two sons.
167 and 201	Father and daughter.
193 and 279	No relative.
216 and 301	Sisters.

Particulars showing typical cases of the prevalence of the disease in some families.

Case No.	Relatives.	
	Died.	Living.
180	Great uncle, two brothers and grand parents (mother's side)	
176	Patient's sister and mother	
185	Uncle (mother's side) and cousin	
207	Brother, first husband, first husband's mother	First husband's brother
216	Aunt, two cousins (father's side), father	
220	Father and patient's sister	
235	Two children and sister-in-law	
239	Father and mother, and two of patient's children	Two children
251	Mother and grandmother	
315	Brother and mother	

Devitilising Diseases, &c., which occurred prior to Notification of Cases of Pulmonary Tuberculosis.

Pneumonia (forms of)	19
Colds	18
Bronchitis	12
Pleurisy	8
Delicate from birth	7
Influenza...	6
Poverty	5
Hæmorrhage	3
Accidents...	2
Rheumatism	2
Confinement	2

Gastritis ...	2
Abscesses	1
Dropsy ...	1
Heart trouble	1
Measles ...	1
Shock ...	1
Asthma ...	1
Anæmia ...	1
Drink ...	1
Enteric Fever	1
Fistula ...	1
Tubercular Cervical Glands ...	1
Rickets ...	1
Diarrhœa	1
Appendicitis	1
Not known	29
Total ...	129

Tuberculosis (other Forms).

There have been 40 cases of Tuberculosis (other than Pulmonary) notified during the year.

The following are the particulars :—

30	cases	were notified under	Form A
8	,,	,,	,, B
2	,,	,,	,, C
40			

They were notified from the following Wards :—

	Notified.	Died.
Barton	9	1
Eccles	12	—
Irwell.....	3	—
Monton	3	—
Patricroft	7	1
Winton	6	—
	40	2

and the age incidence of the cases was :—

	Males.	Females.
Under 1	1	—
1 to 5	4	3
5 to 10	4	2

10 to 15	3	6
15 to 25	2	6
25 to 45	3	3
45 to 65	2	1
65 and over	—	—
	19	21

One case notified during the year has since been reported cured.

The localisation of the disease in the cases notified was :—

Neck Glands	12
Peritoneum	5
Hip	3
Abdomen	2
Cervical Glands	2
Cutis—Arm	2
Lupus—Right Leg	1
Left Hip Joint	1
Cutis—Face	1
Cutis—Nose	1
Abdomen and Meninges	1
Wrist Bone	1
Synovitis	1
Iliac Bone	1
Cutis—Hand	1
Left Kidney	1
Ribs	1
Phalanx—Thumb	1
Bowels	1
Middle Ear—Right and Left	1
Total	40

SECTION VI.

Measles.

During the year we have been practically free from this disease. Only 13 cases have occurred, as against 142 for last year, and 478 for 1912. Four cases occurred in a Common Lodging House in King Street. I tried to get these isolated in the Sanatorium and in the Workhouse but could not. They were isolated in the Lodging House and kept under daily supervision. No further case developed. In November a case was notified from one of our largest Schools in the most populous district of the Borough. With the consent of the Chairman I excluded all the susceptible children in the class for five days, from the 9th to the 14th day. No further case developed. The exclusions only applied to those in the same class who had not had measles; those in the other classes were allowed to continue their work except, of course, they were related to the first case. All cases are visited and a warning notice given to the parent. The essential policy in dealing with Measles is to act promptly when the first case occurs so as not to allow the resulting "crop" to develope.

The control of measles is extremely difficult; but combined effort including all the following lines of action promises the greatest measure of success attainable with our present knowledge of the disease.

Similar remarks apply to whooping cough, which is also included in the following suggestions. The notification of measles necessitates also the notification of German measles, owing to the difficulty in distinguishing the two diseases.

1. The duty of notifying measles, German measles, and whooping cough occurring in any given family should be imposed on the doctor who is called in to attend the patient.

   This duty should be subject to the limitation that only the first patient who is attended by him and is suffering from either of these diseases is to be notified; no subsequent case in the same family to be notified during the next two months.

2. The head of every family should have imposed on him or her the duty of notifying to the medical officer of health when he is aware of or has reason to suspect the occurrence of any of the diseases known as measles, German measles, or whooping cough in any member of the family.

In this connection may be mentioned the following clause contained in the Manchester Local Act.

Any parent or guardian having personal charge of a child in attendance at a school who is aware of, or has reason to suspect, the occurrence of any of the diseases known as measles, German measles, or whooping cough in any member of the family, and who fails forthwith to notify such occurrence to the head teacher of the school shall be liable to a penalty not exceeding twenty shillings.

3. The head teacher of every school should transmit to the medical officer of health all intimations of these infectious diseases or of suspected cases of these diseases, furnished to him by parents or guardians of children in attendance at the school or by school attendance officers or other persons, except the medical officer of health.

4. It should be the duty of the sanitary authority to arrange for such visits to be made to each house in which a case or suspected case of these diseases has been notified as are necessary to ascertain the nature of the disease, to insure adequate attendance on the patient and the best available means of isolation.

5. In order that the last-named duty may be fulfilled, each sanitary authority should be empowered to employ such additional medical or nursing assistance as is required with a view to the treatment of persons affected with these diseases and to the prevention of their spread.

The obligation of medical notification of first cases seen by a doctor is proposed, notwithstanding past failures of compulsory notification of all cases of measles and whooping cough, because without it the duty of notification by parents cannot be rendered effective; and in view of the fact that it is now proposed that this notification of first cases seen by doctors shall be made part of an efficient machinery of domiciliary supervision by health visitors, nurses, &c.

The following Measles Leaflet is left after visitation at each house:

BOROUGH OF ECCLES.

MEASLES.

This Disease is again prevalent in the Borough, and already several deaths have occurred from it.

There are more deaths every year from Measles than from Scarlet Fever. The disease is most fatal in the Winter and Spring, owing to the neglect and carelessness of the

parents in allowing the child to run about out of doors before or after the rash, under the mistaken idea that the disease is not dangerous.

Put the child at once to bed, and take the same care and precautions as you would with Scarlet Fever, and you may save your children.

MEASLES IS A FEVER.

The disease begins like a cold in the head, with dry cough, running from the nose and eyes. The child is poorly and slightly feverish at night. After four days the rash comes out, generally first on the face or behind the ears. The rash remains out three or four days, and then fades. Usually, as the rash fades, the cough gets worse, and this is the most frequent time for complications such as Bronchitis, Pneumonia, and other Chest Diseases, DUE TO COLD, to develope. The child should be kept in bed until the cough has disappeared. If the eyes are very red, keep the child in the dark.

Isolate the child as soon as the early symptoms—cough, running at the nose and eyes, feverishness—are perceived. The disease is most infectious during this stage, but it is also infectious for fourteen days after the rash has appeared; therefore isolation must be continued for that period, and the other children, if any in the house, kept away from Day and Sunday Schools. The contagium is given off from the skin and breath, and clings persistently to clothes, hence the disease is spread more by contact of one child with another than by air. The mortality in this disease is directly proportionate to the age of the child; the older the child the better chance it has of recovery.

Bronchitis, Pneumonia, Croup, Diarrhœa, a liability to Consumption, Inflammation o the Kidneys, even in mild cases, follow on the disease, if the child is not protected by

BEING KEPT WARM IN BED.

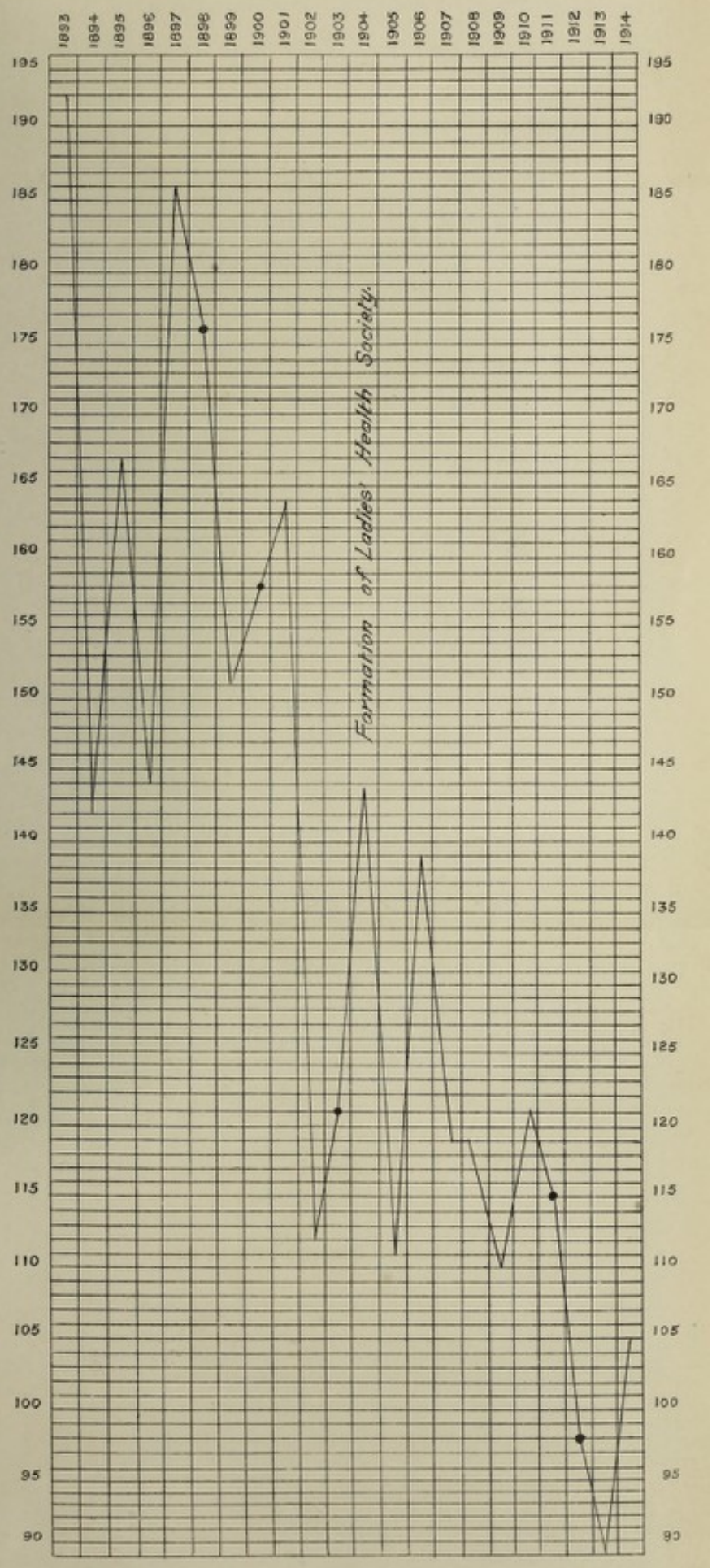
Issued by Order of the Health Committee,

Town Hall,
Eccles.

W. M. HAMILTON, M.D., D.P.H.,
Medical Officer of Health.

Chart shewing Infantile Mortality

— From 1893 = 1914. —



SECTION VII.

Whooping Cough.

There were 9 deaths from this disease. At the present time a rather severe epedemic of this disease is raging. Dr. Newsholme says:—"As in measles, the difficulty of ensuring the notification of the earlier cases of whooping cough in the absence of medical attendance is very great, and in consequence a sanitary authority is much hampered in attempting to prevent its spread. The remarks as to the most promising lines of action made under the heading of measles apply also to this disease

If the *bacillus pertussis* described by Bordet and Gengou be accepted as the cause of whooping cough, it is significant that the expectoration contains very few of these bacilli after the first fourteen days of illness. The complications, such as pneumonia, which subsequently supervene are due to invasion by other bacilli and streptococci. The observation as to the rarity of the specific bacillus in the expectoration after the first fortnight of the attack gives some support to the opinion, held by some as the result of clinical experience, that the disease is not infectious in its later stages. In New York, where arrangements have recently been made for hospital provision for whooping cough, it is proposed to discharge uncomplicated cases from hospital when this period of maximum infectivity is over. In practical experience in this country, whooping cough frequently remains unrecognised during the first ten or fourteen days of the attack."

SECTION VIII.

Infantile Mortality.

The Borough of Eccles is fortunate in the possession of a most efficient and energetic Ladies' Health Society (whose Report is given below). The infantile death rate has risen from 89 to 105. Following on the circular from the Local Government Board the policy of the Society has been altered. Only young children are received at the weekly meetings, these babes are weighed and inspected. The Medical Officer of Health keeps the baby clinic under supervision and visits frequently.

The following circulars have been issued by the Board of Education and the Local Government Board:—

MATERNITY AND CHILD WELFARE.

Sir,

I am directed by the Local Government Board to state that an estimate has been laid before Parliament for a grant to be distributed by the Board in aid of the expenditure of local authorities and voluntary agencies in respect of institutions or other provision for maternity and child welfare.

This grant, if voted by Parliament, will be made in aid of expenditure in respect of clinics, dispensaries or other institutions primarily concerned with the provision of medical and surgical advice and treatment, as well as in respect of the salaries of health visitors and other officers engaged for this work.

The Local Government Board have in recent years devoted considerable attention to questions connected with infant welfare and they have observed with much satisfaction that efforts have been made by many local authorities and voluntary agencies to deal with the matter. These efforts have undoubtedly helped to secure improved conditions for children and have played an important part in the campaign for the reduction of infantile mortality.

It is evident from the Reports issued by the Medical Department of the Board and those of many Medical Officers of Health that more extended and systematic measures than have hitherto been generally adopted are necessary, and it is hoped that the grant of assistance from the Exchequer will stimulate those local authorities who have not yet taken action to give the matter their earnest consideration and will encourage those already engaged in work to develop it still further.

Up to the present local authorities, in their infant welfare work, have concerned themselves more especially with the child in its first year of life; the matter is, however, one which needs to be dealt with on a more comprehensive basis and it is clearly desirable that there should be continuity in dealing with the whole period from before birth until the time when the child is entered upon a school register, *i.e.*, the register of a public elementary school, nursery school, crèche, day nursery, school for mothers, or other school.

Extension of the existing work is accordingly needed in two directions; on the one hand it is necessary that measures should be taken for securing improved ante-natal and natal conditions, and on the other, provision should be made for continuing the work in relation to children beyond the first year of life.

The accompanying memorandum, which has been prepared by the Board's Medical Officer with a view to assisting the formulation of schemes or extending the work already undertaken, sets forth in outline the matters needing consideration in the preparation of a comprehensive scheme. It will be seen that the memorandum contemplates that medical advice and where necessary, treatment, should be continuously and systematically available for expectant mothers and for children till they are entered on a school register, and that arrangements should be made for home visitation throughout this period.

The work of home visitation is one to which the Board attach very great importance and in promoting schemes on the lines laid down in the accompanying statement the first step should be the appointment of an adequate staff of Health Visitors.

It will be desirable, at all events in the case of the larger urban authorities, to provide consultation centres which may fitly be termed Maternity Centres, to which expectant mothers and mothers with infants and little children may be referred for advice and treatment; the operation of these Maternity Centres will be rendered most effective if co-operation is secured with the midwives of the district and with any local hospital having a maternity department.

It will be necessary to arrange for a medical officer to be in charge of such a Centre and for the attendance at the Centre of members of the staff engaged in home visiting. Careful records, for which the medical officer should be responsible, will need to be kept, and in regard to children the records should be in such a form that they may subsequently be available for the information of the School Medical Officer when the child is entered at a school.

For the rural and smaller urban areas the Board think it will generally be found desirable to develop a county organisation, but in all

cases the county work should be intimately related with that of the local sanitary authority, and on the other hand any work separately undertaken by a sanitary authority should be co-ordinated with the county scheme.

It is not expected that all local authorities will be able at once to initiate complete schemes, but it is important that any partial arrangements that may be made shall be such as can ultimately form part of a more extended organisation.

Subject to the estimate now before Parliament being accepted by Parliament, the Board will be willing to consider applications for grants in respect of any work falling within the scope of the scheme outlined in the memorandum accompanying this letter; the grants will normally amount to one-half the approved expenditure on any of these purposes, but may be less if the Board so decide.

Grants to institutions of the nature of Schools for Mothers, the object of which is primarily educational, which provide training and instruction for mothers in the care and management of infants and little children, and which may include systematic classes, or home visiting, or infant consultations (the provision of specific medical and surgical advice and treatment, if any, being only incidental), will be administered by the Board of Education. Any cases of doubt or difficulty will be investigated by a Joint Committee of Officers of the two Boards, which will include women Medical Officers.

In sending a copy of this circular to voluntary agencies engaged in infant welfare work, the Board will state that applications for grants in respect of voluntary work may be made by a voluntary agency either directly or through a local authority.

The grant now presented to Parliament will be appropriated in aid of the expenditure of the half-year ended 30th September, 1914, and applications for grants should be accompanied by an account of the work undertaken by the authority, and by a detailed statement of the expenditure incurred, certified by the officer of the local authority in charge of the accounts.

I am to add that the Board will be happy to afford advice and assistance to local authorities in the initiation of schemes or the extension of existing schemes.

I am, Sir,

Your obedient servant,

H. C. MONRO,

Secretary.

MATERNITY AND CHILD WELFARE.

A complete scheme would comprise the following elements, each of which will, in this connection, be organised in its direct bearing on infantile health.

1. Arrangements for the local supervision of Midwives.

2. Arrangements for—

   Ante-Natal.

   (1) An Ante-natal Clinic for expectant mothers.

   (2) The home visiting of expectant mothers.

   (3) A Maternity Hospital or beds at a hospital, in which complicated cases of pregnancy can receive treatment.

3. Arrangements for—

   Natal.

   (1) Such assistance as may be needed to ensure the mother having skilled and prompt attendance during confinement at home.

   (2) The confinement of sick women, including women having contracted pelvis or suffering from any other condition involving danger to the mother or infant, at a hospital.

4. Arrangements for—

   (1) The treatment in a hospital of complications arising after parturition, whether in the mother or in the infant.

   Post-Natal.

   (2) The provision of systematic advice and treatment for infants at a Baby Clinic or Infant Dispensary.

   (3) The continuance of these Clinics and Dispensaries, so as to be available for children up to the age when they are entered on a school register, *i.e.*, the register of a Public Elementary School, Nursery School, Crèche, Day Nursery, School for Mothers or other school.

   (4) The systematic home visitation of infants and of children not on a school register as above defined.

As regards the supervision of midwives the Borough has no control: the work is done, and well done, by the County Council.

2. (3) The provision of a Maternity Hospital is quite impossible but we have the advantage of the use of St. Mary's Hospital, Manchester.

3. This is attended to by the Insurance Committee.

4. (1) These cases are attended to.

(2) Vide supra.

(3) I disagree *in toto* with this suggestion. It is not the duty of the Corporation or of the State to take over the responsibility of the parent in the welfare of the child.

The Infantile Mortality for the year was 105.

Taken month by month it was:—

January	75	July	93
February	142	August	86
March	101	September	66
April	82	October	75
May	89	November	196
June	45	December	194

It will thus be seen that were it not for the severe weather in the last two months our rate for Infantile would have been 86.

The question, "Is Infantile Mortality a Class Disease?" is worthy of consideration.

Dr. Robertson, of Birmingham, states definitely that infant mortality is a class mortality, and he exhibits a map of the city of Birmingham which shows that the mortality in the central areas is considerably more than double what it is in the suburbs. He states that he is sure that the main causes of the differences are not that the housing conditions are much worse, nor the conditions of poverty greater, or that drunkenness and vice are more prevalent in the slum areas, but that the mothers in these areas suffer from a greater ignorance as to what constitutes healthy and reasonable conditions for their babies than do the mothers in the suburban ring. To guard against misapprehension, he admits that housing, poverty, drink and vice do play an important part in the production of infant mortality, but not the most important part.

Dr. H. W. Porter, attributes the higher mortality among the slum-born infants to poverty of the parents. He does not ignore other factors in the problem, such as ignorance, carelessness, environment, etc., but he finds that where the fathers' weekly wages are under £1 the mortality is much higher than among infants whose fathers' wages are over that amount; and that in both classes of infants the mortality is

considerably less among those entirely breast-fed than among those who are partially or wholly hand-fed. He also points to variations in the mother's milk, dependent upon her feeding, and to corresponding variations in the increase in the infant's weight, a most important point.

It would appear that a high infant mortality is associated with a wide group of conditions—poverty, insufficient or inappropriate food, parental neglect and ignorance—in fact, all the conditions which are found in the degraded section of the population. The high death-rates observed among infants in this class of the population are found also among those of older age in the same class.

The Health Committee makes an allowance to the Ladies' Health Society for the provision of dried milk, with excellent results. Dried milk has many advantages. It can be kept without decomposition, it is easily handled and the strength of it can be varied easily by the addition of more or less water.

Professor Sheridan Delépine, in a very valuable contribution to the Local Government Board, discusses in detail the bacteriology of samples of dried milk, which he obtained from two factories. He came to the conclusion that milk dried over heated cylinders is more pure bacteriologically than milk dried by spraying in a current of hot air; and he believes that, although, during the process of drying, the micro-organisms of the original milk are largely destroyed, yet, before the completion of the process, the nearly sterile dried milk tends to become re-contaminated. The effect of this is that dried milk, as it reaches the consumer, is not free from micro-organisms—although a considerable total reduction has been effected on the numbers of organisms originally present in the fresh milk. Professor Delépine points out that much of this re-contamination is preventible, and he considers that 100 organisms per gramme of dried milk could be attained as a standard. It was interesting to find that the B. Tuberculosis was not destroyed, but only modified, *i.e.*, it became less virulent, after passing into the milk through the process of drying. As we might expect, while B. Coli and organisms of that group, were destroyed, yet the sporing intestinal organisms and bacilli of the types included under the term of bacillus mesentericus, survived the drying and the heat.

The result of it all is this: in dried milk we have a very valuable food, which is not likely to cause illness, and especially diarrhœa, in young children.

HOW INFANTS SHOULD BE FED.

The instructions given below are only to be acted on when no directions have been given by a medical man.

1. Infants should be *fed at the breast alone for a period of not less than six months or more than ten months.* Any other form of milk should not be given, except on the advice of a medical man.

2. Infants should have the breast during the first three months, not oftener than every two hours during the day, and every four hours during the night. At the end of three months they should be suckled at longer intervals. When they are fretful or suffer from indigestion, it will often be found that they are being overfed, and diminishing their diet will put them right.

3. The mother should, in order to supply wholesome milk to her child, partake only of plain and wholesome food, avoiding absolutely alcoholic stimulants, condiments, etc, and should lead a healthful life. If she suffer from sore nipples, they should be washed with warm water after every time the child has been fed, and glycerine or methylated spirit should then be applied to them.

4. When from want of milk or other absolutely necessary cause, a mother c annot suckle her infant, she should feed it on fresh cow's milk prepared thus :—

(*a*) *Diet up to age of* 6 *weeks.* Half a pint of good fresh milk and one pint of water, with a small teaspoonful of white sugar, should be mixed and boiled, and then placed in a clean jug, covered with a clean cloth. Four tablespoonfuls of this should be placed in the feeding bottle each time it is used ; and after each time the child has been fed, the bottle should be most thoroughly cleaned. The infant should not be fed oftener than every two hours during the day, and every four hours during the night.

(*b*) *Diet for a Child* 6 *weeks to* 3 *months old.* The milk may be gradually made stronger until one pint of cow's milk is added to one pint of water, and boiled and treated as above. The amount at each feeding should be increased until eight tablespoonfuls are put into each bottle ; the intervals between the meals being also increased.

(*c*) *Diet for Child* 3 *to* 6 *months old.* The strength of the milk may be increased until two pints of cow's milk are mixed with one pint of water, boiled and treated as above. About eight tablespoonfuls should be given at each meal. The quantity however and the interval between the meals are to be increased as occasion requires, but it is necessary always to bear in mind the danger of overfeeding.

N.B.—Up to the age of six months no other food than milk should be used. On no account should bread and water "Pobbies," or other solids be given.

(*d*) The bottle used should be that known as the "boat"-shaped bottle. Bottles having a tube cannot be efficiently cleansed. The bottle should be cleaned with water containing bi-carbonate of soda, the teat should be turned inside out and also cleansed.

5. Table showing how much an Infant should be given at a time and how often.

	How often in Day.	How often in Night.	How much.	Strength.
From Birth to Four Weeks Old	Every 2 Hours.	Every 4 Hours.	4 tablespoonfuls.	One-third Milk.
From Four to Eight Weeks Old	Every 2½ Hours.	Ditto.	6 tablespoonfuls.	One-half Milk.
	Increasing gradually.			
From Three to Six Months Old	Every 3 Hours.	Twice.	8 to 16 tablespoonfuls.	Two thirds Milk to pure Milk.
From Seven to Twelve Months Old	Five meals a day—Three of 12 tablespoonfuls of Pure Milk and Two of 12 tablespoonfuls of Milk thickened with baked flour, bread, or prepared food, and boiled.			

Diet for a Child from 12 to 18 Months old.

First meal, 7 a m.—Bread and milk, or oatmeal or hominy porridge, with plenty of milk.
Second meal, 11 a.m.—Twelve tablespoonfuls of milk.
Third meal, 1-30 p.m.—Bread crumbs and gravy, or a lightly-boiled egg and bread and butter.
Fourth meal, 5-30 p.m.—Bread and milk.
Fifth meal —Milk to drink.

All Milk should be sweetened with sugar (milk sugar if possible).

6. When condensed milk is used, mothers should be careful to get only the best brands, and the unsweetened milk should be preferred. They should carefully examine the labels on the milk tins, as, by the Sale of Food and Drugs Act, all condensed milk not made from whole milk must have attached the words "*Machine-made milk*," or the words "*skimmed milk*" in legible characters.

7. Infants should not be placed on the floor, as they are thus exposed to draughts and infectious dirt.

8. They should be warmly clothed, but not with many clothes. Their clothing should not fit tight about the body, but cling loosely, so as to give free play to the lungs. The limbs should be covered equally with the body. Flannel should be worn next the skin.

9. Mothers are strongly warned against giving children teething powders, or soothing medicines to send them to sleep.

10. When an infant continues to suffer from indigestion or Diarrhœa, in spite of every care in feeding, the mother should consult a medical man, who will advise her how to act.

11. It cannot be too strongly impressed upon mothers that young infants can be much more easily prevented from disease by careful dieting and management than they can be cured when disease actually occurs.

Copies of this leaflet can be obtained at the Health Office, Town Hall.

W. M. HAMILTON, M.D.

Town Hall, Eccles.

BOROUGH OF ECCLES.

Infant Mortality during the Year 1914.

Nett Deaths from stated causes at various Ages under 1 Year of Age.

Causes of Death.	Under 1 week.	1-2 weeks.	2-3 weeks.	3-4 weeks.	Total under 1 month.	1-3 months.	3-6 months.	6-9 months.	9-12 months.	Total Deaths under 1 year.
All causes { Certified	19	6	11	5	41	17	17	11	13	99
All causes { Uncertified	...	...	...	...	.....	...	...	...	...	.....
Small-pox	...	...	...	...	.....	...	...	...	...	.....
Chicken-pox	...	...	...	...	.....	...	...	...	...	.....
Measles	...	...	...	...	.....	...	...	...	...	.....
Scarlet Fever	...	...	...	...	.....	...	...	...	...	.....
Whooping-cough	...	...	..	...	.....	1	1	1	3	6
Diphtheria and Croup	...	...	...	...	.....	...	...	...	...	.....
Erysipelas	...	...	...	...	.....	...	...	...	...	.....
Tuberculous Meningitis	...	...	...	..	.....	...	...	...	...	.....
Abdominal Tuberculosis	...	...	...	...	.....	...	...	1	.	1
Other Tuberculous Diseases	...	...	...	...	.....	...	...	...	.	.....
Meningitis (*not Tuberculous*)	...	...	...	...	.. ..	..	1	...	2	3
Convulsions	...	...	...	...	3	1	2	2	...	8
Laryngitis	...	..	...	...	.....	...	...	...	...	.....
Bronchitis	...	...	..	...	...	2	3	1	2	10
Pneumonia (all forms)	...	...	...	...	.....	3	3	1	4	11
Diarrhœa	...	...	...	...	.....	1	...	1	...	2
Enteritis	...	...	...	...	.....	1	3	...	1	5
Gastritis	...	...	..	...	2	5	1	...	1	9
Syphilis	...	...	...	...	.....	...	...	...	...	.....
Rickets	...	...	...	...	.....	...	...	1	.	1
Suffocation, overlying	...	...	...	1	.....	...	...	...	...	1
Injury at birth	...	...	...	1	.....	...	1	...	...	2
Atelectasis	...	...	...	2	.....	...	...	...	...	2
Congenital Malformations	...	...	3	...	3	...	...	1	...	4
Premature birth	...	...	...	9	3	...	1	13	...	...	...	...	13
Atrophy, Debility and Marasmus	...	2	1	4	3	10	2	...	...	...	12
Other causes	...	...	2	1	1	...	4	1	2	2	...	9
Totals		19	6	11	5	41	17	17	11	13	99

Nett Births in year { Legitimate, 909 / Illegitimate, 29 } Nett Deaths in year { Legitimate, 95 / Illegitimate, 4 }

SECTION IX.

ECCLES LADIES' HEALTH SOCIETY.

1914.

President :

MRS. NANSON.

Hon. Treasurer :

MRS. WILLIAMS.

Hon. Secretary :

MRS. MELLOR.

Deputy Hon. Secretary :

MRS. SIDLEY.

Superintendents of Mothers' Meeting :

MRS. GIBBONS. MRS. COACKLEY.

Superintendents of Health Visitors :

MISS RAWSON. MRS. HODGE.

Bank Manager :

MRS. COACKLEY.

Assistant Bank Manager :

MISS SIDDALL.

Sales Manager :

MRS. DAVENPORT.

Committee :

THE MAYORESS (MRS. CORNER) *ex-officio.*

MRS. BIRLEY
MRS. GARDNER.
MRS. ORR.
MRS. PRATT.
MISS THIRZA POTTS, M.A.
MRS. SCOTT FORBES.
MRS. SMITH.
MRS. VALLANCE.
MRS. WALKER.

Executive :

ALL THE OFFICERS.

Eccles Ladies Health Society.

Tenth Annual Report, 1914.

The Eccles Ladies Health Society has pleasure in presenting its Tenth Annual Report. The statistics with regard to the Infant Mortality rate are as follows:—

Statistics.

	1913.	1914.
No. of births registered	971	936
Birth rate per 1000	22·5	21·5
No. of deaths under one year	87	98
Infant mortality rate per 1000 reg. births	89	105·8

Women's Emergency League.

The usual routine of work has been observed during the year with one addition, namely, that after war was declared, the Society invited the women of Eccles and District to form a register of voluntary helpers, under the title of the "Women's Emergency League." There was a good response to the appeal, many promised to help with the free meals to necessitous school children, others to provide dinners for invalids, a great number volunteered to work for the Red Cross Society; to visit under the direction of the Distress and Relief Committee and the Civic Guild of Help, to interest themselves in soldiers' and sailors' families, etc., and several who offered clerical help were of great assistance at the Town Hall.

The number of visits paid during the year by the Health Visitors respectively is as follows:—

Mrs. Holland (Eccles District)	6901
Mrs. Irlam (Patricroft and Barton)	8187
Total	15088

Mothers' Meeting.

The resignation of Mrs. Gibbons as superintendent of the weekly meeting for mothers was received in April with much regret. Mrs. Coackley has most ably undertaken the management of the meetings since then, and reports that there are 117 names on the register with an average attendance of 71·2. Thanks are due to the matron of the Eye Hospital, to Mrs. Beeley, Mrs. Field-Till, Mrs. Stirrup, Miss Dickens,

Mrs. Worsley, Mrs. Wilkinson, Nurse Golland, Miss Reid (School Nurse), Mr. Kirkland, and several members of the Committee for addresses at the meetings on various interesting subjects. The meeting was visited in June by Dr. Janet Lane Claypon, of the Local Government Board.

School for Mothers.

It has been felt by the Committee for some time, that these meetings, although extremely successful from the point of view of numbers, were not fulfilling the object of a Society which exists ostensibly for the purpose of looking after the health of mothers and infants. Therefore, it has been decided to disband the weekly meeting in its present form and to substitute for it a "School for Mothers" or "Mothers' and Babies' Welcome," to which only expectant mothers and mothers with infants are invited. The babies will be weighed every alternate week, and addresses will be given by a trained nurse on subjects relating to the health and care of infants and mothers. This has been done with the consent of the Health Committee, and the Medical Officer of Health (Dr. Hamilton) has kindly signified his intention of attending the meetings periodically. These meetings will be held in the Co-operative Small Hall on Wednesday afternoons.

Picnic.

A Picnic to Southport in July was much enjoyed by a number of mothers. Several members of the Committee entertained the women in their gardens during the summer months, and the Christmas tea party was as successful and as largely attended as ever. Seven prizes for perfect attendance and four for one absence only during the year were given at Christmas.

Supply of Milk and Glaxo.

Milk to the value of £13 19s. 8d. has been given to necessitous families. The distribution of Glaxo has been handed over by the Health Committee to the Ladies Committee, with a grant of £25 towards the cost thereof. The sum of £56 has been spent on this food, of which £22 3s. 4d. has been refunded by the sale of the food to the mothers. This leaves a deficit of £8 16s. 8d., which is covered by an extra grant of £25 for this year from the Health Committee.

Clothing.

Sales of materials (flannel, calico, shirting, print, wool, &c.), have been effected to value of £20 9s. 9d. during the year.

Savings Bank.

With regard to the Savings Bank there have been 798 transactions. The bank account has been closed, as it was found to be little used this year after the outbreak of war. Our thanks are due to Mrs. Coackley and Miss Siddall for their management of this item.

Changes in Committee.

Owing to her removal from the district, Mrs. Birley has resigned her membership of the Committee. We are very sorry to lose her, as she always took a keen interest in the work of the Society, filling for some time the office of Hon. Treasurer. Mrs. Hughes and Mrs. Parkinson have accepted invitations to join the Committee.

The Eccles Ladies' Health Society is affiliated to the National League for Physical Education and Improvement, and to the National Union of Women Workers, and is also represented on the Barton Board of Guardians, Eccles Civic Guild of Help, the Education Committee and the District Nursing Association.

JANET C. SIDLEY,
Deputy Hon. Secretary.

SECTION X.

School Medical Inspection.

Members of the Committee:—Councillor R. Evans, Chairman; Alderman Thompson; Councillors Ogden, Grindle, J.P., Forbes, J.P.; Mrs. Ogden, Miss Potts, M.A.; R. H. Robinson, Esq., C.C., G. H. Anderson, Esq., Rev. R. Pratt, M.A., Rev. C. Chronnell.

During the year a very large amount of School work was carried out as will be seen from the accompanying tables.

It is gratifying to report that the interest taken by parents is on the increase, 1,055 parents were present at the examinations as compared with 959 for the previous year. It is a great assistance to the Medical Inspector to have the parent present so that he may learn the life-history of the child and may be in a position to know in the case of epidemics of measles, diphtheria, scarlet fever and other infectious diseases which are the susceptible children; which children are to be excluded; which to be watched, and what measures are necessary to be taken to stop the epidemic.

Included in the defects were: 78 dirty heads, 36 body lice, 344 enlarged tonsils, 21 adenoids, 25 external eye disease, 121 defective sight, 10 ear disease, 22 rickets, 81 malnutrition, 16 phthisis, and 5 dull and backward.

Eight parents were summoned before the Committee for not carrying out the instructions given to them for treatment. The procedure is as follows:—The parents are notified of the day and hour on which the examination will take place and are invited to attend. If the parent does not attend she is informed by letter of the defect in the child and treatment advised. In the case of defects of teeth, tonsils, adenoids, rickets, non-infectious skin diseases, &c., the child is re-examined in a month on the occasion of my next visit to the School. In cases of ringworm, impetigo, scabies, ophthalmia, tuberculosis, verminous heads and bodies, and suspicious sore throats, the child is excluded and followed-up by the School Nurse, who I may state has done most excellent work. These cases are not allowed to return to School until certified by me to be cured. Cases of scabies, impetigo, verminous heads and bodies and ophthalmia are examined every Saturday morning at the Health Office. Cases of tuberculosis are examined and weighed

every three months and the results recorded. In this connection I am pleased to report that two cases, both girls, of undoubted incipient phthisis were sent to the Crossley Sanatorium by the Health Committee and both have been absolutely cured thus saving two useful lives. Medical Inspection is a measure of great importance for the future of the race. Minor defects in the child often lead to most serious and debilitating conditions in the adult.

Cases summoned to meet the School Medical Officer at the Town Hall for the year ending December, 1914.

Total number of cases.	Number cured.	Improved.	No change.	No appearance.	Number of parents present.
197	59	83	9	46	98

Diseased teeth, adenoids, enlarged tonsils, malnutrition, measles and whooping cough are prolific breeders of tuberculosis. With the exception of measles all these conditions are preventible. Primarily education fitness is the object of Medical Inspection but a far more important object, especially in view of the present devastating war with its enormous wastage of men, is to ensure physical fitness and build up a strong race of men. The dictum of the Latin poet—"Mens sana in corpore sano"—will remain true to all time.

As regards dental caries I regret to report that the condition of the teeth is very bad. When the war is over I shall suggest to the Committee the advisability of making arrangements for dental treatment. Meanwhile each "leaver" is questioned as to whether a tooth brush is used, how frequently, and the great influence of frequent and systematic cleansing of the teeth is impressed on them. The following card is given to each child in this group:—

BOROUGH OF ECCLES.

SCHOOL MEDICAL INSPECTION.

HOW TO SAVE YOUR TEETH.

I. Clean them all over every morning and night.

Brush them in all directions, both up and down and across, and use plenty of water.

II. Go to Bed with clean teeth.

Teeth decay because food is allowed to collect on them and go sour. Teeth decay most when you are asleep.

III. Use Bi-carbonate of Soda as a Tooth Powder.

A little soap applied to a Tooth Brush is also an excellent way of cleansing the teeth.

IV. Keep your Tooth Brush in a draughty place.

It is important that a Tooth Brush should be kept clean and DRY.

Never neglect to have decayed teeth attended to EARLY.

Results of Bad Teeth:

They poison the system, causing bad breath, poor complexion, anæmia, and internal inflammations.

W. M. HAMILTON, M.D., D.P.H.,
School Medical Officer.

It is astonishing how little the bad results of carious teeth are understood or appreciated. This condition is so well described in the last report of Sir George Newman, that I think it only right to the Council to quote it:—

Secondary Results of Dental Disease.

"Whilst there is not lacking a recognition of the prevalence of dental disease in school children and the importance of reducing it, it may be doubted whether there is any adequate appreciation of the sequelæ of dental sepsis in terms of resulting disease. This after all is the main issue. A little toothache, one or two decayed teeth, or a lessened number of teeth would be a relatively trivial matter if that were all. The gravamen of dental defect is its secondary result. Dental sepsis is associated with four factors: (1) tooth caries, (2) periodental inflammation (or as it is more commonly designated, pyorrhœa alveolaris), (3) the sepsis due to dead teeth or other irregularities and abnormalities of the denture, (4) the collection of tartar and muco-purulent matter, and what has been called "germ-carbo-hydrate stagnation." Obviously these factors vary in operation not only generally but in each affected individual. The degree of sepsis also varies within wide limits, but in some measure it is extremely prevalent among school children as among adults. Its presence is often unrecognised, particularly in the form of pyorrhœa, but even when present only in slight degree it may be a cause of grave subsequent disease. All dental sepsis may be infective, and the ill-effects depend more upon the amount of infection by toxins taken into the blood stream than upon the gross amount of toxin formed at the seat of dental defect. In other words the secondary results of dental disease are due more to the prolonged absorption of toxins by the circulation than the "swallowing of pus" manufactured in the mouth. Both means of poisoning, however, are operative.

What are these possible secondary results? First, because earliest, there are the oral conditions resulting from dental sepsis—inflammation pyorrhœa, ulceration of the gums, possibly abscess in the jaw sometimes with necrosis; inflammatory enlargement of the submaxillary and cervical glands may occur and even tuberculous infection may be started in this way. Then, secondly, there is general malaise—tiredness, lassitude, depression, in fact a toxic neurasthenia. Thirdly, there is a group of microbic intoxications which in some cases may lead to joint affections. Fourthly, there are various forms of anæmia. Fifthly, there are the mysterious and remote sequelæ of dental diseases which leave their mark on the skin (acne, urticaria, eczema), affect the eyes (recurring iritis) or ears, and in children pre-disposed to nervous disorders, such as epilepsy or hysteria, aggravate the malady or lead to more frequent attacks. Lastly, there is a great group of alimentary toxœmias or gastro-intestinal conditions. Dyspepsia, in childhood and still more in later life, is often due to insufficient or diseased dentures, and malnutrition is akin to this condition. It will be understood that these sequelæ do not necessarily manifest themselves during school life.

This is, it will be admitted a formidable category of disease to arise from what is apparently a simple and unimportant origin.

Defective Sight and External Eye Disease.

During the year 229 cases of defective sight have been dealt with, and 29 cases of squint. The early treatment of this condition is of the utmost importance. All cases found are strongly advised to seek treatment at the Eye Hospital. The Committee has provided glasses in 19 cases, in all of which the parents were not able to afford to pay for the glasses. It is impossible to teach a child who cannot see; all education is through the eyes and ears. The teachers have given great assistance in this condition. They have referred and submitted to me many children who could not see writing on the blackboard (some could not see the board itself). (2) Many who strain and crave to see and those who hold the book or sewing nearer to the eyes than other children, and (3) those who suffer from headache and show signs of fatigue.

Every child before receiving glasses is examined for refraction at the Eye Hospital.

The most frequent of external eye diseases is Blephoritis The exciting causes of this disease are Measles and Scarlet Fever, more especially the former. In every case of this disease there has been found a history of measles. These cases are very chronic in duration. They are referred to the family doctor if in a position to pay for treatment, if not they are recommended to the Hospital and in all cases are followed up by the School Nurse.

The Feeding of School Children.

Education (Provision of Meals) Act, 1914.

This Act was adopted by the Council in September, 1914, and three feeding centres were established, viz :—Eccles Parish School (East end of the Borough), Green Lane (Centre), and Beech Street (West end of the Borough). Breakfasts and dinners are provided at the three centres. A nutritious food necessitates a proper amount of proteid, fat and carbo-hydrate. A child from 3-5 years requires ·4 of the food of a man at ordinary work: from 6-9 years, ·5, and from 10-13 years, ·6. According to Atwater a child of 5 requires 48 grammes proteid, 30 of fat, and 200 carbo-hydrate. This scale is well fulfilled in the dietary we are giving our children. It is a striking fact how much the physique of children improves when they start work—owing probably to the increased income. The best food for breakfast for children is oatmeal porridge, and if to this is added milk, margarine or treacle, a diet is provided which has proteid, fat and carbo-hydrate in almost equal proportion. If a change is wanted wheat-meal porridge is nourishing and wholesome and is by many (including the writer) preferred. Once a child gets accustomed to porridge for breakfast it prefers it to any other food.

Dried peas, beans and lentils are the cheepest forms of proteid obtainable but are seldom used as the women do not know how to cook them. Soups and stews largely thickened with the above-mentioned vegetables make the best food for a child's dinner. Milk puddings or suet dumplings should be added to give variety. Crust should be added to cleanse the teeth.

It is quite impossible to include fruit in a "free meal" dietary. For years I have insisted on the supreme importance of fruit in relation to good health and have insisted on our lack of this food. The people in this country do not eat anything like the proper quantity of fruit. In this edible you get the citrates, malates and tarbrates; a large portion of which are converted into carbonate of potash in the blood; in addition to which they are natural purgatives and mouth cleaners.

As it is impossible to train the present women and grown-up girls, the teaching must start with elder girls at the elementary schools; they must be taught general house-keeping and how to spend money to the best advantage. For this porpose cookery should be made a compulsory class for elder girls, and they should have to attend it for at least two years, so that the information given to them may have been repeated sufficiently often for most of it to stay in their heads. The class must not be simply a cookery class where the girls are taught how to prepare certain dishes, but it must be a regular housewifery class where the

girls are taught to think of house-keeping by the week, and not by the day, and how to lay out money on food to the best advantage. They must also be taught what foods are most suitable for very young children, and what for elder ones, and how best to feed children so as to help to prevent decay of the teeth; what classes of food go best together, and how they should be cooked so as to obtain the most possible nourishment out of them and to make them palatable and digestible.

If the feeding of children is attended to on some such lines fewer weakly people amongst the lower classes should be found, with consequent improvement in the physique of the nation at large.

The dietory provided is as follows:—

Meals are varied from day to day. Breakfasts are as follows:—

Monday .....Bread, margarine and jam. Cocoa.
Tuesday ..... Bread and milk.
Wednesday ...Bread, margarine and jam. Cocoa.
Thursday.....Porridge. Bread and margarine.
Friday .....Bread and milk.

Dinners are as follows:—

Monday .....Lentil soup and suet puddings.
Tuesday .....Potato hash and beans.
Wednesday ...Scotch broth and green peas.
Thursday.....Hot pot and beans.
Friday .....Fish and potatoes. Rice pudding.
Saturday .....Stewed meat, boiled potatoes. Milk pudding.

The food is of good nutritive value. It is well cooked and cleanly served. A most important item has been the addition of margarine to the ration on Mondays and Wednesdays. Cocoa contains approximately 45% fat, 1·2% theobromin, and proteid 13%. Butter contains 89% of fat, with a small amount of casein. The fatty acids in butter are:—volatile butyric, caproic, caprylic and capric, non-volatile stearic, palentic and oleic. It will thus be seen that this addition increases very much the heat giving of the diet. The centres are visited by the Medical Officer and the preparation and serving of the meals inspected.

In connection with feeding the following facts are of interest, especially in time of war:—

Potatoes cooked in their skins: The loss is very trifling.

Potatoes peeled and soaked in water for several hours, as is often done: The loss of nitrogenous material is about 50 per cent. and of mineral matter 40 per cent.

Potatoes peeled and boiled at once lose about 8 per cent. proteid matter and 19 per cent. mineral matter and about 30 per cent. of starch.

Carrots cut into small pieces lose about 30 per cent. total food material present ; sugar lost by boiling equals 1lb. per bushel of carrots.

Cabbage boiled loses one-third total food material present, especially ash and mineral matter.

Vegetables steamed lose only one-third of the material that is lost by boiling.

Total number of meals provided since 21st September, 1914, when feeding was inaugurated :—

Breakfasts	(5 days per week) ...	13,560
Dinners	(6 days per week) ...	17,385
	Total ...	30,945

The improvement in the nutrition and physique of the children fed is very marked. It is very gratifying to be able to report this improvement. The Centres are under the supervision of the School Medical Officer who visits them frequently, inspects the food, its preparation and the method of serving it, and reports on its nutritive value and quality.

The Board of Education have issued the following Regulations, to come into force on April 1st next, under which grants are payable to local education authorities in respect of the provision of meals for children attending public elementary schools in England and Wales :—

1. Grants are payable by the Board of Education to local education authorities during each financial year commencing on April 1st in respect of the provision of meals for children attending public elementary schools, under the Education 'Provision of Meals' Acts, 1906 and 1914.

2. The grant payable in a financial year will be based on the work done and the payments made by the Local Education Authority during the previous financial year.

3. Where, in the Board's opinion, the arrangements made for the provision of meals are adequate, and their working is efficient, the grant will be paid at a rate of one-half of the expenditure, in other cases the Board may either pay at a lower rate or withhold the grant.

4. In distributing the grant the Board will take into consideration :

(*a*) the extent to which the work is co-ordinated with that of the school medical service ;

(*b*) the care exercised in the selection of the children for admission to the meals ;

(*c*) the sufficiency and suitability of the dietary ;

(*d*) the extent to which attention is given to the educational aspect of the work ;

(*e*) the suitability of the accommodation and equipment and the efficiency of the service and supervision of the meals;

(*f*) the completeness of the arrangements made for ascertaining and recording the effect of the meals on the physical and mental condition of the children;

(*g*) the economical administration of the work.

5. The Board will require to receive as soon as possible in each financial year a statement in an approved form of the arrangements made and the expenditure actually incurred in respect of the provision of meals during the previous financial year.

6. The Board may disregard any items of expenditure which, in their opinion, should not be taken into account for the purpose of the grant, and if any question arises as to the interpretation of these Regulations the decision of the Board shall be final.

Tonsils and Adenoids.

This condition of throat and nasal passages is very frequently found in the Schools in this Borough. 365 cases have been discovered during the year. All these cases have been advised to secure treatment. It is a matter of great difficulty to get the parent to realise how very important the treatment of this condition is. We have no powers to insist on the operative treatment of this condition. The function of the normal healthy tonsil is to act as a phagocyte, *i.e.*, to prevent the entrance of infectious and injurious bacilli into the air passages and thus into the general system. Children with enlarged tonsils are especially liable to contract scarlet fever, diphtheria and consumption. The evils traceable to this condition are retarded growth, dullness and intellectual backwardness, malnutrition and anaemia, flat chest with prominent superficial veins, shallow breathing with consequent deficient aeration of the blood, liability to respiratory diseases, cold, bronchitis, phthisis, &c. These cases are almost invariably mouth breathers, having an open mouth and a dull, heavy look. The speech is nasal and indistinct. Many of these cases are temporary and are found on subsequent examination to have resolved and disappeared shewing that the condition was not one of permanent hypertrophy. When there is a history of previous liability to colds or sore throats the advisability of operative treatment comes into consideration.

These cases are carefully watched; they are examined month after month and if the increasing narrowness of breathing appears to increase pressure is brought to bear on the parent to have the lymphoid tissue removed. Many of the parents manifest disinclination of, and dread of

the operation. I invariably point out that an operation bringing such important results is attended with practically no danger and that my own child had been greatly improved by the operation.

Many of the teachers at my suggestion have instituted handkerchief drills; teaching the children the proper use of the handkerchief, to keep the nasal passages open. I consider this a matter of very great importance as a training and education in proper breathing, thus to expand the chest and favour physical development.

Closure of Schools and Individual Exclusions.

During the year there were 1188 individual exclusions of children suffering from infectious diseases and contacts. The principal zymotic disease has been scarlet fever—a disease which has been prevalent in all the surrounding towns and especially in the neighbouring city of Manchester.

Sanitary improvements have been carried out in Monton Memorial School and in Patricroft National School. The trough closets have been converted into separate flush closets. To this the Health Committee has made a contribution of £2/10/0 per closet.

In the case of "leavers" (12—14) the examination includes:—nutrition, heart, lungs, throat, nose, ears, eyesight and cleanliness. Enquiries are made as to the future of the child; what employment it is going to follow; for example—whether having a trade, going into an office, serving apprentice to dressmaking or millinery, or going into the mill. One of the most fertile causes of unemployment is the practice of letting the boys go as errand boys, newspaper-sellers, or milk boys. I take every opportunity of impressing on the parents (if present) and on the boys that they must learn a trade if they wish to become useful citizens. The temptation to get an immediate return from the child in the wage of five or six shillings a week comes in the employment of milk or errand boys, is apt to bear weight with the careless parent. We have many of these. Many parents think that their responsibility for the child ends with its school life; that they have done sufficient in bringing the child into the world and feeding it (and in many cases only partially clothing it), during its school life.

Open-Air School.

For months the Committee has devoted a great amount of time and thought to the provision of an open-air school. A most suitable site has been obtained in the Winton Recreation Ground. The site is suitable in every way—air, light, sunshine and drainage are perfect.

The scheme is to provide education, rest, food and care for children suffering from debility, anaemia and malnutrition. The children to be

selected by the School Medical Officer on medical grounds. The ordinary school curriculum will be modified, there will be a mid-day rest and good feeding. In addition to the cases enumerated above phthisis "contacts" (all of whom are periodically examined) will be included. Instead of fixed desks trestle tables will be provided.

Many other details might be mentioned, but as the scheme is still incomplete it will be advisable to defer particulars to my next Report. We expect to have the school equipped and in full swing by the summer.

Following-up.

The following results of "following-up" are of interest. Of the 76 cases of verminous heads discovered during the year at Medical Inspection 75 have been treated, of whom 63 are cured and 12 improved. Of the 229 cases of defective sight discovered 213 have been treated, of whom 200 are cured. By this is meant that they have either secured glasses or been treated at the Eye Hospital. In the case of external eye disease 46 out of the 49 cases discovered have been treated. This success is gratifying, and is largely due to the process of "following-up."

Table of Verminous Conditions.

School number.	Number examined.	Clean.	Nits.	Verminous.	% Clean.	% Nits.	% Verminous.
1	215	197	18	—	91·6	8·3	—
	80	63	17	—	78·7	21·2	—
1a	148	114	32	2	77·0	21·6	1·3
	144	96	41	7	66·6	28·4	4·8
	147	105	33	9	71·4	22·4	6·1
2	90	49	34	7	54·4	37·7	7·7
	46	31	10	5	67·3	21·7	10·8
3	179	137	37	5	76·5	20·6	2·7
	70	48	20	2	68·5	28·6	2·9
4a	108	96	12	—	88·8	11·1	—
5	139	116	21	2	83·4	15·1	1·4
	48	44	4	—	91·6	8·3	—
6	120	102	17	1	85·0	14·1	·8
7	150	100	35	15	66·6	23·3	10·0
	76	60	8	8	78·9	10·5	10·5
9	68	50	17	1	73·5	25·0	1·4
	37	20	14	3	54·0	37·8	8·1
10	161	117	38	6	72·9	23·8	3·2
	96	69	24	3	71·8	25·0	3·2
11	84	57	25	1	67·8	29·8	1·2
	40	29	7	4	72·5	17·5	10·0
13	199	143	46	10	71·8	23·1	5·1
	116	83	24	9	71·5	20·5	7·7
14	110	65	41	4	59·0	37·2	3·6
	51	39	11	1	76·4	21·5	1·9
15	147	101	43	3	68·5	29·2	2·1
	96	69	25	2	71·8	26·1	2·1
	92	68	21	3	73·9	22·8	3 2
16	78	65	10	3	83·3	12·8	3·8

N.B.—This Table refers to girls only.

Treatment of Defects of Children during 1914.

CONDITION.	Number of Defects found for which treatment was necessary.			Number of Defects for which no report is available.	Number of Defects treated.	Results of Treatment.				Per cent treated.
	Previous.	This year.	Total.			Cured.	Improved or under treatment.	No change.	Left.	
Dirty head	18	76	94	—	75	63	12	5	14	70.9
Dirty body	8	56	64	6	51	42	9	—	7	79·6
Nose and throat	—	236	236	55	93	68	25	52	36	39·4
External eye disease	5	44	49	2	46	35	11	—	1	93·8
Skin	5	87	92	7	79	68	11	—	6	85·8
Vision and squint ..	64	229	293	—	213	200	13	39	41	72·7
Hearing & otorrhœa	4	35	39	11	23	15	8	2	3	59·0
Bronchitis.....	7	32	39	7	30	28	2	—	2	76·9
Miscellaneous	1	32	33	4	27	25	2	1	1	81·8

TABLE I.

Number of Children Inspected 1st January, 1914, to 31st December, 1914.

A.—"CODE" GROUPS.

——	Entrants						Leavers.				
	Age 3	Age 4	Age 5	Age 6	Other Ages	Total	Age 12	Age 13	Age 14	Total	Grand Total.
Boys	149	153	137	39	6	484	213	166	1	380	865
Girls	128	148	145	50	11	482	223	173	2	398	879
Totals ...	277	301	282	89	17	966	436	339	3	778	1744

B.—GROUPS OTHER THAN "CODE."

	Special Cases.	Re-examinations.
Boys	174	194
Girls	206	273
Totals.....	380	467

TABLE III. Numerical Return of all Exceptional Children in the Area.

—		—	Boys.	Girls.	Total.
Blind (including partially blind).		Attending Public Elementary Schools.			
		Attending Certified Schools for the Blind.			
		Not at School.....			
Deaf and Dumb (including partially deaf).		Attending Public Elementary Schools.	1	—	1
		Attending Certified Schools for the Deaf.			
		Not at School.....			
Mentally Deficient.	Feeble Minded.	Attending Public Elementary Schools.			
		Attending Certified Schools for Mentally Defective Children.	2	—	2
		Not at School.....	2	2	4
	Imbeciles.	At School.....			
		Not at School.....	1†		
	Idiots.	—			
Epileptics.		Attending Public Elementary Schools.	1	1	2
		Attending Certified Schools for Epileptics.			
		Not at School.....	1†		
Physically Defective.	Pulmonary Tuber-culosis.	Attending Public Elementary Schools.			
		Attending Certified Schools for Physically Defective Children.			
		Not at School.....	18	15	33
	Other forms of Tuber-culosis.	Attending Public Elementary Schools.	10	7	17
		Attending Certified Schools for Physically Defective Children.			
		Not at School.....	7	6	13
	Cripples other than Tuber-cular.	Attending Public Elementary Schools.			
		Attending Certified Schools for Physically Defective Children.			
		Not at School.....			
Dull or Backward.*		Retarded 2 years.....			
		Retarded 3 years.....	2	3	7

*Judged according to age and standard. †Same boy.

Summary of work of School Nurse for year ending 1914.

No. of Cases attended for Examination, Inspection, or seen by School Medical Officer.	No. of Cases followed up.			No of Cases examined for General Cleanliness.
	At Home	At School.	Total.	
3,698	1,225	1,013	2,238	2,441

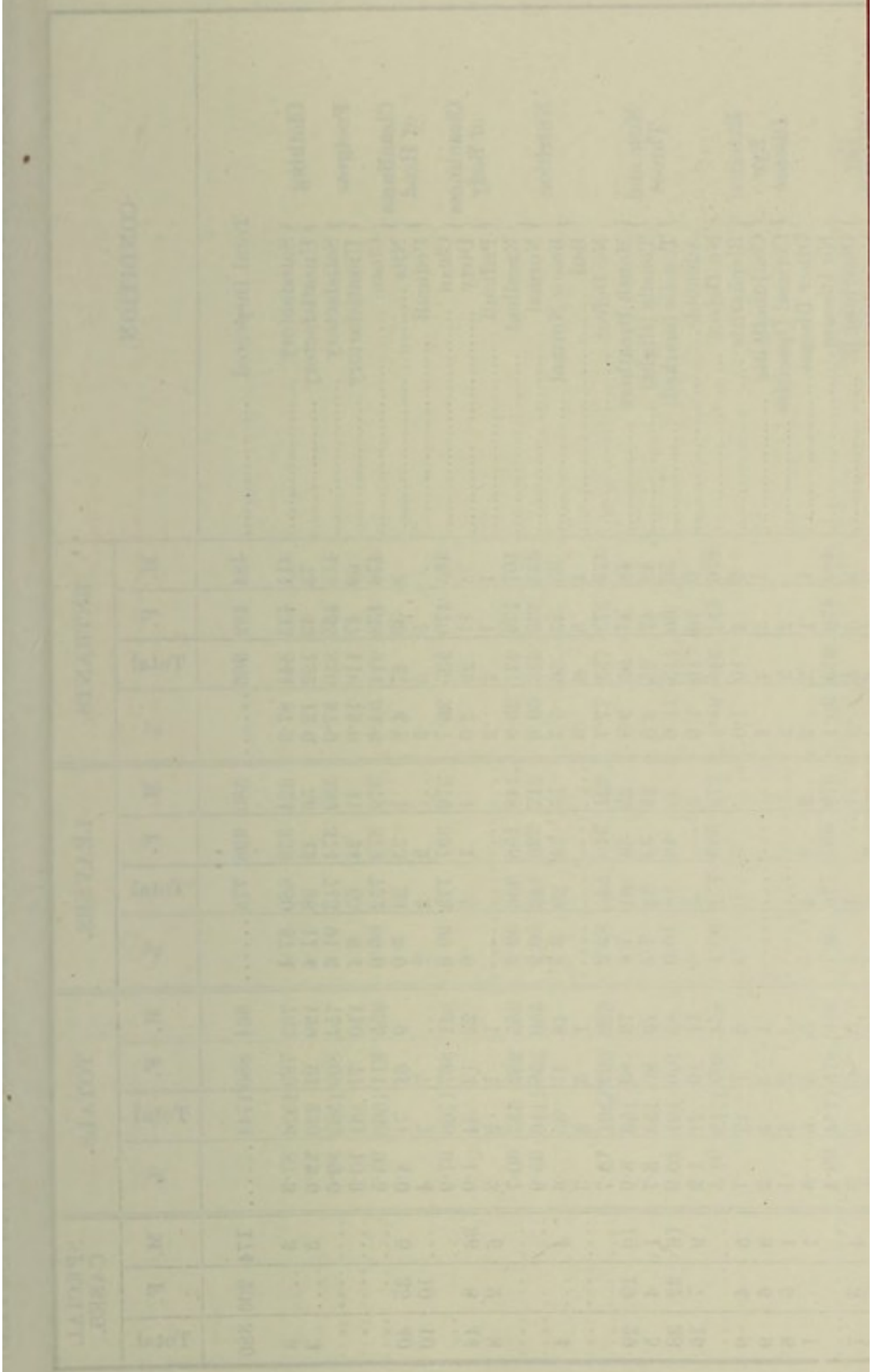


Table II.—RETURN SHOWING THE PHYSICAL CONDITION OF CHILDREN INSPECTED.

CONDITION.		ENTRANTS.				LEAVERS.				TOTALS.				SPECIAL CASES.		
		M.	F.	Total	%	M.	F.	Total	%	M.	F.	Total	%	M.	F.	Total
Total Inspected		484	482	966	.....	380	398	778	.....	864	880	1744	.....	174	206	380
Clothing	Satisfactory	411	433	844	87·3	324	356	680	87·4	735	789	1524	87·3	3	....	3
	Unsatisfactory	73	49	122	12·6	56	42	98	11·4	129	91	220	12·6	3	....	3
Footgear	Satisfactory	415	435	850	87·9	339	374	713	91·6	754	809	1563	89·6	...	...	...
	Unsatisfartory	69	47	116	12·0	41	24	65	8·4	110	71	181	10·3	...	...	...
Cleanliness of Head	Clean	476	438	914	94·6	379	373	752	96·6	855	811	1666	95·5	...	...	...
	Nits	8	39	47	4·8	1	23	24	3·0	9	62	71	4·0	5	35	40
	Pediculi	..	5	5	·5	....	2	2	·2	....	7	7	·4	...	10	10
Cleanliness of Body	Clean	465	470	935	96·7	376	397	773	99·3	841	867	1708	97·9	...	...	...
	Dirty	18	11	29	3·0	4	1	5	·6	22	12	34	1·9	36	8	44
	Pediculi	1	1	2	·2	.....	.....	.....	.....	1	1	2	·2	6	2	8
Nutrition	Excellent	107	124	231	23·9	148	158	306	39·3	355	282	537	30·7	...	...	...
	Normal	343	330	673	69·6	217	226	443	56·9	560	556	1116	63·9	...	...	...
	Below Normal	33	23	56	5·7	15	14	29	3·7	48	37	85	·8	4	...	4
	Bad	1	5	6	·6	.....	.....	.....	.....	1	5	6	·3	...	...	...
Nose and Throat	No Defect	378	373	751	77·7	321	319	640	82·2	699	692	1391	79·7	...	...	...
	Mouth Breathers	48	47	95	9·8	25	36	61	7·8	73	83	156	8·9	10	19	29
	Tonsils (slight)	48	47	95	9·8	25	33	58	7·4	73	80	153	8·7	1	4	5
	Tonsils (marked)	53	60	113	11·6	32	46	78	10·0	85	106	191	10·9	16	22	38
	Adenoids	6	10	16	1·6	5	....	5	·6	11	10	21	1·2	9	7	16
External Eye Disease	No Defect	476	472	948	98·1	378	393	771	99·1	854	865	1719	98·5	...	...	...
	Blepharitis	6	4	10	1·0	....	3	3	·3	6	7	13	·7	5	4	9
	Conjunctivitis	1	3	4	·4	.....	.....	.....	.....	1	3	4	·2	3	6	9
	Corneal Opacities	..	2	2	·2	.....	.....	.....	.....	....	2	2	·1	1	5	6
	Other Disease	1	1	2	·2	2	2	4	·5	3	3	6	·3	1	...	1
Ear Disease	No Disease	480	478	958	99·1	379	397	776	99·7	859	875	1734	99·4	..	..	..
	Otorrhœa R.	2	3	5	·5	1	....	1	·1	3	3	6	·3	4	3	7
	Otorrhœa L.	2	1	3	·3	....	1	1	·1	2	2	4	·2	1	2	3
	Other Disease	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
Teeth	Sound	367	380	747	77·3	290	322	612	78·6	657	702	1359	77·9	..	..	..
	Less than four decayed	36	35	71	7·3	38	27	65	8·3	74	62	136	7·7	....	..	..
	More than four decayed	81	67	148	15·3	52	49	101	12·9	133	116	249	14·2	5	4	9
	Oral Sepsis	16	7	23	2·3	6	14	20	2·5	22	21	43	2·4	1	....	1
Heart and Circulation	No Disease	484	479	963	99·6	376	393	769	98·8	860	872	1732	99·3	..	..	..
	Organic Disease	..	..	..	..	3	4	7	·8	3	4	7	·4	....	1	1
	Functional Disease	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
	Anæmia	..	3	3	·3	1	1	2	·2	1	4	5	·2	....	1	1
	Other Defect	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
Lungs	No Disease	463	469	932	96·4	376	398	774	99·4	839	867	1706	97·8	..	..	..
	Bronchitis and Bronchial Catarrh	16	6	22	2·2	....	....	....	.....	16	6	22	1·2	2	2	4
	Tuberculosis	3	4	7	·7	4	....	4	·5	7	4	11	·6	2	....	2
	Tuberculosis Suspected	1	2	3	·3	....	....	....	.....	1	2	3	·1	....	....	....
	Other Disease	1	1	2	·2	....	....	....	.....	1	1	2	·1	1	....	1
Nervous System	No Disease	482	481	963	99·6	379	397	776	99·7	861	878	1739	99·7	..	..	..
	Epilepsy	..	1	1	·1	1	....	1	·1	1	1	2	·1	..	....	....
	Chorea	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
	Other Disease	2	....	2	·2	....	1	1	·1	2	1	3	·1	1	....	1
Skin	No Disease	474	475	949	98·2	377	396	773	99·3	851	871	1722	98·7	..	..	..
	Ringworm (Head)	2	1	3	·3	....	....	....	.....	2	1	3	·1	7	8	15
	Ringworm (Body)	..	..	..	..	1	....	1	·1	1	....	1	·05	3	....	3
	Impetigo	1	1	2	·2	....	....	....	.....	1	1	2	·1	5	5	10
	Scabies	..	..	..	..	..	..	..	..	..	..	..	..	..	2	2
	Other Disease	7	5	12	1·2	2	2	4	·5	9	7	16	·9	24	24	48
Rickets	No Disease	468	476	944	97·7	380	398	778	100	848	874	1722	98·7	..	..	..
	Slight	10	3	13	1·3	....	....	....	.....	10	3	13	·7	....	....	....
	Marked	6	3	9	·9	....	....	....	.....	6	3	9	·5	....	....	....
Deformity	No Deformity	484	482	966	100	376	397	773	99·3	860	879	1739	99·7	....	..	..
	Deformity Present	..	..	..	..	4	1	5	·6	4	1	5	·2	1	2	3
Non-Pulmonary Tuberculosis	No Disease	482	481	963	99·6	380	396	776	99·7	862	877	1739	99·7	..	..	..
	Glandular	1	1	2	·2	....	2	2	·2	1	3	4	·2	1	1	2
	Bones and Joints	1	..	1	·1	....	....	....	.....	1	....	1	·05	....	....	....
	Other Disease	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
Speech	No Defect	483	482	965	99·8	379	398	777	99·8	862	880	1742	99·8	..	..	..
	Defective Articulation	..	..	..	..	1	....	1	·1	1	....	1	·05	1	1	2
	Stammering	1	....	1	·1	....	....	....	.....	1	....	1	·05	1	....	1
Mental Condition	Normal	483	479	962	99·5	379	398	777	99·8	862	877	1739	99·7	....	....	....
	Dull	1	3	4	·4	1	....	1	·1	2	3	5	·2	....	....	....
	Defective	..	..	..	..	..	..	..	..	..	..	..	..	....	1	1
Vision	Normal	..	..	..	..	338	348	686	88·1	338	348	686	88·1	..	..	..
	6/6 R.	..	..	..	..	20	21	41	5·2	20	21	41	5·2	13	8	21
	6/6 L.	..	..	..	..	6	11	17	2·1	6	11	17	2·1	5	3	8
	6/9 R.	..	..	..	..	4	6	10	1·2	4	6	10	1·2	6	3	9
	6/9 L.	..	..	..	..	6	9	15	1·9	6	9	15	1·9	2	6	8
	6/12 R.	..	..	..	..	3	13	16	2·0	3	13	16	2·0	6	10	16
	6/12 L.	..	..	..	..	10	15	25	3·2	10	15	25	3·2	8	14	22
	6/18 R.	..	..	..	..	9	7	16	2·0	9	7	16	2·0	2	8	10
	6/18 L.	..	..	..	..	8	6	14	1·7	8	6	14	1·7	9	8	17
	6/24 R.	..	..	..	..	5	3	8	1·0	5	3	8	1·0	3	9	12
	6/24 L.	..	..	..	..	8	4	12	1·6	8	4	12	1·6	4	7	11
	6/36 R.	..	..	..	..	1	2	3	·3	1	2	3	·3	1	5	6
	6/36 L.	..	..	..	..	1	2	3	·3	1	2	3	·3	2	5	7
	6/60 R.	..	..	..	..	1	....	1	·1	1	....	1	·1	1	....	1
	6/60 L.	..	..	..	..	2	1	3	·3	2	1	3	·3	2	....	2
	Squint	15	7	22	2·2	4	3	7	·8	19	10	29	1·6	3	6	9
Hearing (Whisper)	Normal	482	481	963	99·6	378	395	773	99·3	860	876	1736	99·5	....	....	....
	20 feet R.	1	....	1	·1	1	1	2	·2	2	1	3	·1	2	2	4
	20 feet L.	..	..	..	..	1	....	1	·1	1	....	1	·05	....	1	1
	10 feet R.	1	1	2	·2	1	....	1	·1	2	1	3	·1	2	....	2
	10 feet L.	1	1	2	·2	1	1	2	·2	2	2	4	·2	3	2	5
	5 feet R.	..	..	..	..	....	2	2	·2	....	2	2	·1	....	3	3
	5 feet L.	1	....	1	·1	....	2	2	·2	1	2	3	·1	1	....	1

SECTION XI.

BOROUGH OF ECCLES.

List of Streets and Back Passages Paved and Completed from January 1st, 1914, to December 31st, 1914.

Date of completion,	Name of Street.	Length in yards.
16th June, 1914	Hamilton Street	58
16th June, ,,	Lambton Street	58
7th Sept. ,,	Rooke Street	145⅔
18th Aug. ,,	Gilbert Street	210⅔
8th Oct. ,,	Berry Street...	29
3rd Nov. ,,	Lansdale Street	137⅓
10th Nov. ,,	Reginald Street	169⅓
16th Nov. ,,	Helen Street	155⅔
25th Nov. ,,	Thorpe Street	208⅔
17th Nov. ,,	Unicorn Street	85⅓
21st Sept. ,,	Stelfox Street	156⅔
23rd Dec. ,,	Harrison Street	258⅓
7th Dec. ,,	Bradburn Street (Passage No. 1)...	13
7th Dec. ,,	Bradburn Street (Passage No. 2)...	30
		1714⅔

Total length, 7 furlong 174⅔ yards.

Particulars of Houses erected from January 1st, 1914, to December 31st, 1914.

Barton Ward	44 Houses
Irwell Ward	5 Houses
Monton Ward	20 Houses
Eccles Ward	2 Houses
	71 Houses

(Particulars supplied by the Borough Surveyor.)

SECTION XII.

Return showing the number of Samples taken in the Borough of Eccles for the 12 months ended December 31st, 1914.

Number taken.	Description of sample.	Genuine.	Otherwise.	Particulars of Offence.
55	Milk	55	...	
15	Butter	14	1	Selling margarine as butter. Fined 5/- and costs.
7	Lard	7	...	
4	Beer	4	...	
2	Scotch Whisky ...	2	...	
2	Irish Whisky ...	2	...	
1	Rum	1	...	
1	Gin	1	...	
4	Vinegar	3	1	20% deficient in Acetic Acid. Fined £5 and costs.
3	Cocoa	3	...	
4	Coffee	4	...	
1	Potted Lobster ...	1	...	
1	Tin of Lobster ...	1	...	
4	Pepper	4	...	
5	Black Pepper ...	5	...	
4	Ground Ginger ...	4	...	
4	Ground Almonds...	4	...	
2	Salts of Tartar ...	2	...	
3	Cream of Tartar ...	3	...	
122	19	120	2	2

Kindly furnished by Superintendent Keys.

SECTION XIII.

The following Bacteriological Examinations were made for the Borough during the year 1914 at the Public Health Laboratory, York Place, Manchester.

Month.	Diphtheria.			Typhoid.			Human Tuberculosis. Sputum.			Tuberculosis. Milk.			Various Investigations.	
	+	—	Total.	+	—	Total.	+	—	Total.	+	—	Total.	Nature.	No. of samples
January	—	4	4	1	2	3	2	7	9					
February	1	2	3	2	2	4	4	7	11					
March	2	3	5	—	2	2	2	9	11					
April	1	1	2	—	—	—	2	4	6					
May...	2	2	4	—	1	1	7	7	14					
June...	2	6	8	—	—	—	4	3	7					
July	—	8	8	—	—	—	2	3	5					
August	—	1	1	—	3	3	—	5	5					
September	6	2	8	—	1	1	2	2	4				L.B. 7081. Fæces urine	2
October	3	7	10	—	2	2	2	3	5					
November	2	2	4	—	1	1	—	2	2					
December	2	6	8	—	2	2	—	7	7					
	21	44	65	3	16	19	27	59	86					2

Grand total, 172

SECTION XIV.

Annual Report of the Sewage Works Engineer and Manager for the year 1914.

GENTLEMEN,

I beg to submit to you the following Report of this Department for the year ended December 31st, 1914.

SEWAGE FLOW.—There has been but slight increase in the flow of sewage to the Works. Gaugings taken during February 2nd to 9th inclusive, gave an average dry weather flow of 1,507,000 gallons per day, as compared with 1,505,000 gallons during 1913. The trade effluent is turned into the sewers without any preliminary treatment.

PUMPING AND TREATMENT.—The pumping and treatment of the sewage has been carried on without intermission.

MACHINERY.—The boilers, engines, pumps, crushing plant, lighting plant, &c., have been maintained in good working condition.

DESTRUCTORS.—The Destructors have been in working operation during ten months of the year, and the steam required for pumping, &c., during that period has been generated by the refuse destroyed, with some small assistance of coke. The water evaporated during the same period was 2,419,920 gallons, and the calorific value of the refuse and fuel averaged 1·32 lbs. as against 1·35 lbs. in 1913, a decrease of ·03 lb. The refuse destroyed during the year averaged 26·75 tons per day of 24 hours, as against 26·6 tons in 1913.

The ashpit refuse, dry ashes, trade refuse, &c., collected in the Borough, amounted to 9,582 tons, 921 tons of this amount was carted to the tip, and 8,661 tons was destroyed during the year.

This work has been done at a cost of 1/4½ per ton for labour, and the total cost of refuse destroyed, including interest and sinking fund charges was 2/4¾.

The destructors were entirely reconstructed during the months of June and July, during which period firing operations were suspended with the exception of drying fires.

The bye-product from the destructors in the form of clinkers equalled 33 per cent. of the total refuse destroyed, and was disposed of as follows :—

2,183 tons laid in spray-fed filters.

704 tons used on roads, concreting, &c.

The tins, &c., are picked out and sold to the Central Hall Mission, Manchester, at 5/- per ton, and the broken glass (pale green cullet) is sold at 12/6 per ton, the receipts for the year from this source being £11/14/8.

Settling Tanks.—The settling tanks have been in operation the whole of the year. The detritus tanks were cleaned out weekly; the first two settling tanks every four weeks; and the other two every three months.

The average depth of sludge removed was five feet from the detritus tanks, four feet four inches from the first two settling tanks, and three feet from the other two.

The sludge has been used to raise low lying land on the site of the old tip to the level of the adjoining agricultural land.

Precipitation of Sewage.—Lime has been added to the sewage at the rate of from four to eight grains per gallon and after neutralisation in this way, alumino ferric has been added at the rate of two to four grains per gallon.

Contact Beds.—The four half-acre contact beds in operation are giving satisfactory results.

Spray-Fed Filter.—The spray-fed filter No. 1, of one acre, is giving satisfactory results, and with the contact beds, has been thoroughly cleansed and forked over five times.

Produce.—The produce grown on the farm consisted of cabbage, Italian rye-grass, and mangolds.

Farming Stock.—There are four horses working on the farm, and one cob, which is used for the disinfecting van, &c.

The receipts from farm produce, &c., realised £217.

Wages paid in this Department.

1	Engine Driver, Fitter, 35/- per wk. of 56 hrs. with overtime paid for at same rate.			
2	Enginemen, 30/4 per week each	,,	,,	,,
7	Destructor Firemen, 32/8 per week each	,,	,,	,,
2	Tankmen, 27/- per week of 6 days	,,	,,	,,
2	Teamsmen, 27/- per week of 6 days	,,	,,	,,
4	Farm Labourers, (average) 25/- per week of six days	,,	,,	
1	Clerk and Disinfector Attendant, 26/- per week	,,	,,	,,

Men employed on Capital Account are paid 6d. to 6½d. per hour according to the nature of the work.

Disinfector.—357 disinfections have been carried out during the year. The income was £187/8/6 and allocated as follows :—

Repairs, labour, &c., £108/3/6.
Profit, £79/5/0.

Extensions of Works.—The extensions carried out during the year have been as follows :—

No. 2 spray-fed filter has been partly constructed.
Suction gas pumping plant.
Sludge pumping plant.

Suction Gas Pumping Plant.—The erection of this plant, which consists of a gas producer, a gas engine of 120 B.H.P., a petrol driven starting engine of 6 B.H.P., two centrifugal pumps, 15" and 12" diameter, with a working capacity of 7,000 gallons of screened sewage per minute, was completed early in March, 1914. This plant is used as a stand by pumping plant and is brought into operation during times of heavy rainfall and also when the delivery of refuse at the destructors falls short of the amount required to keep the steam pumping plant running.

The fuel used for running the above plant is Welsh Anthracite Beans.

The following is the result of a test of a duration of eight hours on the 31st Augnst, 1914 :—

Duration of test	8 hours.
Revolutions per minute	380 to 385.
Coal consumed	420 lbs.
" "	52·5 lbs. per hour.

Average of eight sets of diagrams.

Indicated horse power	72·71
Brake Horse power	54·5
Coal consumed I.H.P. ...	·722 lbs.
" " B.H.P.	·964 lbs.

Price of Coal, 32/6 per ton.
" " 5·745 lbs. for one penny.
" " 5·966 B.H.P. for one penny per hour.
" " 7·96 I.H.P. " "
" " ·167 of a penny per B.H.P. per hour.
" " ·138 of a penny per I.H.P. per hour.

Califoric value of the coal—14,750 B.T.U. per lb.

The indicator diagrams were taken by Messrs. Browett & Lindley. The engine was running on normal conditions, about half load. The coal was carefully weighed by our own staff.

Sludge Pumping Plant.—The erection of this plant, which consists of a 6 B.H.P. oil engine and 5" centrifugal pump, was completed in November, 1914. This plant is erected at the discharge end of the 15" pipe carriers connected to the settling tanks, &c., and its duty is to lift the sludge flowing from the settling tanks into the sludge areas.

Monthly Record of Refuse Destroyed and Cost of Destruction.

MONTH.	Ashpit Refuse.			Dry Ashes.			Fish Offal.			Carted to Storage.			Carted from Storage.			Total Tons Destroyed.			Cost of Labour per month.		
1914.	Tns.	Cwts.	Qrs.	Tns.	Cwts.	Qrs.	Tns.	Cwts.	Qrs.	Tns.	Cwts.	Qrs.	Tns.	Cwts.	Qrs.	Tns.	Cwts.	Qrs.	£	s.	d.
January ...	9	10	3	800	4	1	6	5	0	58	15	2	18	0	0	834	0	0	59	10	1
February...	...	...	...	741	8	2	6	9	1	28	1	1	23	10	0	771	7	3	51	15	2
March ...	1	7	3	806	15	3	6	11	0	25	18	1	...	...	...	814	14	2	63	11	0
April ...	...	...	..	797	9	2	7	5	2	56	10	0	32	0	0	836	5	0	60	3	7
May ...	5	10	2	753	3	0	7	16	1	33	19	3	32	10	0	798	19	3	55	12	4
June ...	...	...	..	116	2	3	8	10	2	635	3	2	...	...	...	124	13	1	21	6	5
July ...	...	...	...	331	11	3	9	16	3	431	13	0	6	0	0	347	8	2	26	2	10
August ...	2	5	0	622	14	3	8	19	0	...	...	...	193	0	0	826	18	3	56	13	11
September	...	...	...	684	9	0	7	13	3	...	...	...	44	10	0	737	2	3	52	9	9
October ...	10	8	3	794	19	1	8	1	0	...	...	...	...	...	...	813	9	0	54	11	5
November.	...	...	...	786	15	1	7	13	3	...	...	...	...	...	...	794	9	0	48	12	0
December.	...	...	...	955	2	2	7	5	3	...	...	...	...	...	...	962	8	1	61	13	3
							TOTAL...			1270	1	1	349	10	0	8661	16	2	£612	1	9

Annual cost in labour of destroying the refuse, including cleaning out boiler flues, &c., is 1/4½ per ton.

The rainfall during 1914 upon the Eccles Corporation Sewage Works, as registered by the rain gauge on the Settling Tanks, which is fixed at an altitude of 74 feet above sea level, has been as under :—

Month. 1914	Rainfall per Month.	Days on which over ·01 fell.	Greatest fall.
January	1·630	11	·560
February ...	1·740	14	·510
March	4·040	26	·640
April	0·955	11	·285
May.....	2·140	15	·450
June.....	1·725	11	·480
July	3·220	17	1·020
August	2·555	14	·800
September ...	2·810	10	·800
October	2·150	11	·850
November ...	5·270	18	·920
December ...	5·030	21	1·020
Total	33·265	179	

The following Table gives the annual rainfall for the last ten years :

Year.	Rainfall.	Year.	Rainfall.
1904	26·450	1909	35·091
1905	27·103	1910	34·590
1906	32·425	1911	26·395
1907	31·798	1912	40·035
1908	30·314	1913	25·300

Effluents from Treatment of Sewage.

	Description of Sample.	Oxidizable Organic matter. Oxygen absorbed 4 hours test. Grains per gall.	Method of Treatment.	Remarks.
	Eccles Corporation. Mar. 11th, 1914, 3 p.m. Snow and thaw early part of day.	0·53	Precipitation tanks Single contact continuous filters, and humus tanks.	Brown ochrey turbid liquid. Ochrey sediment. Slight smell.
	Eccles Corporation. July 1st, 1914, 3-15 p.m Fine weather.	0·72	do.	Light brown clear liquid. Much ochrey sediment Faint smell.
	Eccles Corporation Oct. 5th, 1914, 3-45 p.m. Fine weather.	0·44	do.	Light brown liquid. Ochrey sediment. No smell.

(Signed), FRANK SCUDDER F.I.C.,
For SIR HENRY ROSCOE,
Mersey and Irwell Joint Rivers Committee.

Results of Treatment ascertained in the Laboratory at the Sewage Works.

Description of Sample.	Oxidizable Organic matter. Oxygen absorbed. 4 hours test. Grains per gallon.	Albuminoid Ammonia.	Suspended solids Grains per gallon.
Eccles Sewage (average).....	6·22	2·84	55·3
Settling Tank Effluent (average).....	2·35	———	5·5
Effluent from Contact Beds (average).....	·574	———	———
Effluent from Spray-Fed Filters (average)	·546	———	———
Final Effluent from Sedimentation Tanks (average) ...	·509	·342	———

The oxygen absorption test gives a purification of 91·9 per cent.

The albuminoid ammonia test gives a purification of 88·0 per cent.

The percentage of settlement by precipitation of suspended solids in settling tanks is 90·1 per cent.

GEORGE W. WILLIS,
ENGINEER & MANAGER.

Sewage and Destructor Works, Eccles.

BOROUGH OF ECCLES.

Report of the

Chief Sanitary Inspector,

Year ended December 31st, 1914.

SECTION XV.

Report of the Chief Sanitary Inspector.

STAFF.

Chief Inspector	C. W. LASKEY.
Assistant Inspector	E. T. KNOWLES.
Second Assistant Inspector	G. V. HULSE.
**Clerk*	T. P. HARDMAN.
Junior Clerk	J. CRABTREE.
Disinfector	W. CROMPTON.

* Joined the R.A.M.C. shortly after the outbreak of the war.

To the Chairman and Members of the Health Committee.

GENTLEMEN,

I beg to submit my report of the work done by the staff during the year ended December 31st, 1914.

The work under the Housing Acts is being steadily continued, and many improvements in housing conditions are being obtained.

There is, unfortunately, a considerable shortage of houses, especially such as are suitable for persons of the working class. Houses of a rental of about 5/- to 6/- weekly are in great demand.

The work arising out of the visitation of all cases of Phthisis continues to increase, and there has been much success in making arrangements for a regular periodical disinfection of infected rooms.

The generally good sanitary condition of the Borough is, I think, being maintained; very few complaints of nuisances have been received at the office.

I am glad to be able to refer to the steady progress being made in the matter of street paving, but we still lack the power to require the paving of unpaved yards.

The erection of the new offices for the staff is rapidly approaching completion and it is expected that we shall commence to use them early in the new year.

I desire again to place upon record my appreciation of all the assistance rendered by each member of my staff. Time and care are freely given to the work of the department, and their duties are discharged with such zeal as would be expected having regard to their sustained interest in the work.

I am, Gentlemen,

Yours obediently,

C. W. LASKEY.

Housing of the Working Classes Act, 1890.

Continued progress is being made with the scheme for dealing with what is known as the South-East Eccles Area. Several lots of property have been purchased, and three lots of previously "closed" houses have been demolished. This area contains 283 houses, shops and other buildings, and 6 portions of land not occupied by buildings, and the population affected totals 1026.

Housing and Town Planning Act, 1909.

In addition to the above, the work under the Housing and Town Planning Act, 1909, has been continued, and, during the year, 595 new inspections have been made. In every instance something was required to make the house reasonably fit for human habitation, and lists of defects were prepared and, after submission to your Committee, were forwarded to the owners or agents concerned.

Of the houses so inspected 284 have been made right without the necessity for the issue of Closing Orders and the majority of the others are still in process of repair.

Since the work was commenced in 1911 the total dealt with is as follows :—

Years 1911-14 inclusive.	No. of houses inspected	No. not reasonably fit for human habitation.	No. of dwelling houses in which defects were remedied without Closing Orders.	No. still in course of repair.	Action deferred.	No. made fit after closing.	No. still closed.	No. demolished.
Totals	1559	1531	815	361	220	60	33	42

The following is a list of houses demolished during the year :—

171, 173 Trafford Road.
23-33 College Croft—and property closed in 1894, situate at the rear.
1 Fox Street. (Since re-built).
15 King Street.
23, 25 Bradburn Street.
169-177 Liverpool Road.

The following have been added to adjoining houses :—

60 Barton Lane.
1 Back Barlow's Buildings.
6 River View.
1 Back King William Street.
1, 3, 5, 7 Back Chapel Street.

The character and number of defects reported upon during the year were as follows:—

HOUSING, TOWN PLANNING, &c., ACT, 1909.

Character and Number of Defects Found.

	1914	1913	1912	1911
Windows not made to open sufficiently ...	1163	145	487	396
Want of cleansing and limewashing of walls and ceilings	547	107	170	230
Defective floors and pavements	901	237	378	194
Defective plastering of walls and ceilings ...	351	111	174	204
Defective roofs	247	107	103	128
Defective paving of yards and passages ...	416	151	52	90
Defective brickwork of houses, closets, &c. ...	234	59	190	63
Defective eaves gutters	87	38	55	44
Want of sash cords	126	11	15	43
Rain water pipes connected directly to drains	118	13	23	34
Defective slopstones	170	31	82	46
Defective ashbin places	7	8	3	26
Defective window frames	71	114	6	24
Dampness in house premises	494	153	118	23
Defective gullies	34	22	27	22
Defective slopstone waste pipes	63	26	29	21
Defective rain water pipes	70	29	19	20
Defective and choked drains	43	16	14	19
Various defects in water closets	173	62	49	19
Defective brickwork around waste pipes ...	64	15	42	16
Defective ashbins	36	12	19	16
Defective W.C. accommodation	—	3	6	17
Want of ventilation in dwelling-houses ...	164	25	20	13
Want of light in dwelling-houses	78	31	24	12
Defective privy pits	—	—	2	15
Want of eaves gutters and rain water pipes ...	9	7	3	9
Defective stairs	43	15	32	6
Want of slopstones	—	—	1	7
Defective slopwater closets	19	22	—	5
Want of window sills	68	83	—	—
Houses require pointing...	54	126	—	—
Defective brickwork of boiler	140	—	—	—
Dirty dwelling-houses	7	—	—	—
Accumulations of rubbish, &c.	8	—	—	—
Slopstone wastepipe connected to drain ...	—	1	—	—
Very small rooms	17	13	—	—
Miscellaneous causes	601	258	138	62

It must be understood that these items are all *additional* to those referred to in the tabulated list of nuisances which were discovered as the result of general inspection and visits re cases of all infectious disease, and were dealt with under the Public Health Act, 1875.

I venture to reproduce the following which appeared in my Report for 1913:—

> In many instances there is considerable delay and difficulty in getting the work proceeded with, due to inability on the part of the owner to provide the money sufficient to pay for the extensive repairs and alterations required. In such cases, some arrangement by which the Corporaton could carry out the work and spread repayment of the cost over say five years, would be a great boon.
>
> While many owners have only themselves to blame for the present condition of their properties, it is also true that negligent and destructive tenants have contributed largely to bad housing conditions. In order to deal with such tenants the present cumbersome and costly method of serving "notice," "notice of intention to apply for ejectment order," and "application for ejectment order," accompanied as they are by costs and further loss of rent, should be re-placed by some machinery much more summary.
>
> Tenants who are dirty, destructive and non-payers of rent, only aggravate the housing question, and for these some speedier and more effective measures than those referred to should be devised and put into operation,
>
> In a large number of the cottages in this Borough there is an entire absence of provision for storing food-stuffs. Larders are unknown, and food of every description has to be kept in the sculleries, or in unventilated and dark cupboards. In many cases these latter are also absent.
>
> Another source of discomfort is the want of proper accommodation for dealing with the family washing. In a large number of houses with two rooms downstairs, the wash-boiler is in the scullery or back room, and, in many instances, the staircase communicates with this room. The result is that on wash days the steam freely escapes into the bedrooms above.
>
> These are defects in construction which cannot well be remedied in most of the existing houses, but in all newly erected houses proper provision in these matters should be insisted upon.

The number and nature of Statutory Notices served under the Act were as follows:—

64 notices to execute work, Sec. 15 (3).
6 notices of intention to inspect premises, Sec. 15 (2).
15 representations made, Sec. 17 (2).
6 Closing Orders, Sec. 17 (2).
40 notices determining closing orders, Sec. 17 (6).

In three cases proceedings were instituted against tenants who failed to comply with the Statutory notices to quit "closed" premises. In every case their removal was subsequently effected, and the costs were borne by the Corporation.

There are very few empty houses of any kind in the Borough at the present moment and these displaced tenants have had great difficulty in obtaining houses.

During the two years ended December 31st, 1914, only 134 houses were built, and there is an undoubted shortage in the supply of cottages suitable for housing persons of the working class.

At the present moment there is no indication of any improvement in this respect.

Privy Conversions.—Eight privies were converted into water closets, leaving *twenty* still to be dealt with. Of the latter, five cannot be dealt with at the present time owing to the want of proper sewering. If converted they would have to be drained into cesspools.

Pail Closets.—At one large works the pail closets were substituted by proper water closets. There are eighteen still in use at a works where it is at present impossible to provide water closets owing to the want of a sewer low enough for the purpose of draining them.

Earth Closets.—For the same reason there are eight cottages where "Moules," earth closets, are installed.

Latrines and Trough Closets.—Two ranges of trough closets and one of latrines at two Public Elementary Schools were substituted by proper pedestal water closets separately flushed.

Slop-water Flushed Closets.—Fifteen of these imperfect forms of closets were re-placed by proper pedestal closets flushed by Town's water. At the present time it is estimated that about 215 slop closets still exist here. It is hoped that your Committee's offer to contribute at at the rate of 25/- per slop closet properly converted, will have the effect of greatly reducing the number of these very insanitary conveniences.

The total amount of money contributed by the Corporation in respect of water closet provision is £4,620. Of this sum, £228/15/0 has been contributed in respect of closets other than privies.

The situation of the privies and ashpits still remaining is as follows:

Ward.	Privies	Ashpits
BARTON	9	6
ECCLES	—	1
IRWELL...	4	2
MONTON...	3	15
WINTON...	4	—
Totals	20	24

In Patricroft Ward every house is now provided with water closet and ashbin.

Streets.	No. of privies.	No. of houses served.
Abbey Grove	1	1
*Beech Street	4	8
Brackley Road	1	1
Enfield Street	3	6
Irwell Avenue	1	1
Irwell Park	2	4
Liverpool Road	6	8
Monton Green	1	1
The Grove	1	1
Totals	20	31

* These privies have been the subject of Police Court proceedings.

House Refuse Storage.—In addition to the 18 ashpits, there are 10,196 ashbins in use and these are all cleansed weekly. In 203 instances ashbins were found to be so dilapidated as to require renewal. The necessary supplies were made by the owners upon receipt of letters or notices as the cases required, while in a few instances supplies were made by the Corporation in their default. The provision and renewal

of ashbins is required at the hands of property owners and is dealt with under Sec. 36 P.H. Act, 1875. We have never had any difficulty in obtaining proper supplies.

HOUSE DRAINAGE.—It is not to be expected that any considerable amount of re-drainage would be required seeing that 4,126 houses have been re-drained in connection with privy conversion works during the past ten years.

There were 26 instances of entire re-drainage and 77 where fairly considerable portions were taken up and re-laid.

Twenty-one lots of drains were uncovered by the staff for inspection, and there were 372 applications of the "smoke test.'

In every case of Diphtheria or Enteric Fever the house drains are "tested," in addition to the usual examination for possible insanitary conditions.

Requests for drain tests by prospective tenants of houses are complied with free of cost.

WATER SUPPLY.—Every house is provided with an adequate supply of water from the Manchester Corporation Waterworks Department. During the year 229 reports of waste of water, due to defective fittings or burst pipes, were reported to that Department.

DISTRICT INSPECTION.—In accordance with the requirements of Sec. 92 P.H. Act, 1875, the regular inspection of the Borough is provided for. There were 2417 inspections of dwelling-houses, 2876 inspections of house yards, and 334 visits were paid to stable and similar premises.

The continued employment of men for the purpose of cleansing and disinfecting house gullies leads to the discovery and report of many nuisances of a minor character, which might otherwise—owing to the apathy of many householders—remain undealt with for a considerable time. The reports of these men are always confirmed by one of the staff before action is taken.

Similarly the men employed in the removal of house refuse have been instructed to report any cases of defect in connection with the arrangements for storing such material.

The arrangement made for free destruction at the Destructor of garbage and offal from greengrocers' and fishmongers' shops renders the accumulation of such material on their premises unnecessary. Daily removal of refuse in the summer months and removal three times weekly during the winter is aimed at, and the tradespeople concerned do their best to fall in with this arrangement.

Overcrowding and dirty conditions of dwellings appear to be on the increase. The overcrowding is for the most part due to the occupation of small houses by more than one family, and cases dealt with have a degree of occupancy much in excess of that laid down as a standard by the census department.

There were 45 cases of overcrowding, 137 of dirty dwellings or portions thereof, and six of dirty yards.

As pointed out in my last year's report present powers do not help very much. Most of our cases are taken under Sec. 46, P.H. Act 1875, and the recovery of a daily penalty or expenses incurred in cleansing is highly problematical where the goods are insufficient for a distraint.

Similiarly the proceedings under Sec. 91 (1), P.H. Act, 1875, are equally cumbersome and do not tend to much material improvement.

Summary power to deal with dirty people should be given.

Full details of the variety and number of nuisances dealt with will be found in tabulated form towards the end of this Section.

Smoke Observations.—There were 38 timed observations of mill and works chimneys, and 11 cases of excessive emission were recorded. These were reported to your Committee. In two cases notices were served, and in two others proceedings were ordered and instituted. The latter were disposed of by a fine of the costs in one case and a fine of 10/- and costs in the other.

The proceedings adjourned from the previous year were ultimately withdrawn on payment of 20/- (costs)—the firm in question having installed some smoke consuming apparatus in the meantime. In another instance a larger boiler was fixed with a view to providing more power.

House Gully Cleansing.—This work was resumed in the Spring, and continued until every house had been visited for the purpose of cleansing and disinfecting all gullies. The process consists of well brushing out to remove all grease and filth, and finally flushing with a plentiful supply of a disinfectant solution.

Notices.—Although a considerable number of nuisances and other matters are remedied and attended to upon receipt of letters, it was found necessary to serve notices as under:—

Preliminary notices (nuisances)	...	...	12
Statutory do. do.	...	...	271
Do. do. (Sec. 36 P.H. Act, 1875)	...		73
Do. do. (Sec. 46 do.)	...		28

Statutory notices.—(Sec. 41 P.H. Act, 1875) ...			1
Do.	do.	(Sec. 5 Inf. Dis. Prev. Act 1890)	17
Do.	do.	(Sec. 6 do. do.)	1
Do.	do.	(Sec. 93 Eccles Corp. Act, 1901)	1
Do.	do.	(Sec. 22 P.H.A.A. Act, 1890)	3
Do.	do.	(Sec. 2 (3) Factory Act, 1901)	4

It was also found necessary to obtain a Justices' Order for the removal a body to the mortuary in a case in which the retention of the body in the house was likely to endanger the health of the inmates.

Infectious Diseases.—561 visits of inquiry were paid in connection with 351 cases notified. Efforts are made with a view to tracing the origin of the cases, but little success is obtained in this respect. Inquiries into the sanitary conditions of the premises are made at the time of visit, and any defects are noted and remedied. In this connection I may state that matters of sanitation as applied to dwellings appear to have very little connection with any of the cases reported. It is certain that very few have their origin in conditions and circumstances connected with their dwellings. This was not so when privies and open ashpits were general, but, with their extinction, a real menace to health has been entirely removed. Still, in cases of Enteric Fever and Diphtheria, extra care is taken in the examination of the conditions from the sanitary point of view, and drain tests are made. As so much of the house property is of recent erection, and upwards of 4,000 older houses have been recently re-drained, it is only to be expected that few drainage defects would be discovered.

Schools are communicated with as to the exclusion and subsequent re-admission of cases and contacts, and the librarians are also informed where books from libraries have been in use at infected houses. In such instances the books are brought to the Town Hall for disinfection before being put into circulation again. The latter arrangement has now been extended to Phthisis.

Phthisis.—470 visits and re-visits were paid to the 163 known cases of this disease. Of these 129 were first visits of inquiry, as compared with 104 in the previous year. The remainder were subsequent visits to these and former cases, made with a view to arranging for periodical disinfection of infected rooms and to supervise the conditions of the house and means of isolation, if any.

It is satisfactory to be able to report that two shelters for the use of insured persons have been provided by the County Council Authorities, and they have been in almost continuous use by the patients. The risk due to close association in the homes has thus been minimised.

In most of the cases proper isolation cannot be carried out owing to the smallness of the houses, and in advanced cases particularly, this lack of accommodation constitutes a grave risk. It is no uncommon thing to find palpably dangerous cases in houses too small for the family when well, and altogether inadequate when invaded by such a disease as this.

Disinfection of rooms and bedding is freely offered, and we have arranged for a systematic disinfection of infected premises once every three months. A considerable measure of success has been attained, and during the year 461 rooms have been disinfected, and 33 lots of bedding removed for steam disinfection.

Special attention continues to be given to houses vacated by persons known to have been suffering from this disease, with a view to thorough disinfection before being re-let.

A new feature in connection with this work has been that of supplying milk free of cost in suitable cases, which numbered 27. Daily supplies of a quart and upwards are arranged for. The total cost of such supplies was £49 17s. 7d.

Other Tubercular Diseases.—In these cases, which numbered 26, the premises were visited and inspected on lines similar to those adopted in the Housing Act, with a view to improving the conditions, if necessary.

School Diseases.—228 visits were paid in respect of cases such as Measles, Mumps, Whooping Cough, etc., in children of school age. This figure is very considerably below that for the year 1913 when 856 similar visits were paid.

Disinfection.—The number of rooms disinfected in connection with all cases of disease was 773 as compared with 531 for the previous year. The number of lots of bedding removed for disinfection was 344 (including 33 in cases of Phthisis) as compared with 135 for the previous year. Sixty-one library books in use in infected houses were also disinfected. The increase in numbers is due to the action taken with regard to cases of Phthisis and to the considerable increase in the number of cases of infectious diseases reported.

The process adopted is that of steam disinfection for bedding and clothing, and spraying with Izal and subsequent fumigation in the case of rooms. Assistance in this connection is freely given in the case of verminous houses, and any applications for disinfection of premises after death from Cancer, Pneumonia, etc., are also dealt with and assistance given.

School Offices.—As previously reported the offices at two schools have been dealt with. Two iron trough closets were removed from the Patricroft National Schools and substituted by fresh water closets with separate flushing cisterns, and at the Monton Memorial School the remaining set of latrines was removed and similarly substituted by separate closets.

There are ten schools where some form of latrine closet is still in use.

Dairies and Cowsheds.—The number of premises registered for the sale of milk was 108, as compared with 114 for the previous year. There were 35 applications for registration, and 41 persons ceased selling. Most of the new applications were the result of transfers of business, and were therefore made in respect of premises previously registered.

In most cases the sale of milk forms but a small portion of the business of the person registered, as will be seen from the following list of trades carried on at premises at which milk is sold:—

Exclusively for the sale of milk	*17*
Confectioners' shops	49
Provision shops	30
Private houses	5
Grocers and off-licensed premises	4
Tripe shops	3

For the first time greengrocers' premises are absent from the above list. Inspections of milkshops and cowsheds numbered 374 and 114 respectively. There are still only nine cowkeepers within the Borough. Most of the milk retailed is supplied by outside farmers, principally in Cheshire, and we have a complete list of those sources of supply.

In only three cases was it found necessary to remind occupiers as to limewashing their premises, and 18 defects in sanitary conditions were noted and remedied.

New Regulations.—The preparation of new regulations referred to last year, was deferred upon the introduction into Parliament of a new Milk Bill. It was thought unwise to proceed until the scope of the new measure was ascertained.

The new powers sought related, among other matters, to:—

1. Certain details in connection with the construction of cowsheds.
2. Insistence upon the maintenance of ventilation.
3. Specified periods for cleansing cowsheds.
4. Provision of proper manure midden.

5. Greater care in preventing contamination or infection of milk.
6. Greater cleanliness of milk vessels and protection of such vessels from contamination.
7. Milk being kept cool.
8. Milk being kept covered with suitable covers.
9. Grooming of cows and cleanliness of udders.
10. Personal cleanliness of milkers.

TUBERCULOSIS ORDER 1913.—The bi-monthly examination of all dairy cows was continued by your Veterinary Inspector (Mr. Wood, M.R.C.V.S.) until shortly after the war broke out, when all work under this Order was, for the time being, stopped. Details of the results of four inspections are as follows:—

	NO. OF CATTLE.			
	On premises.	Inspected.	Healthy.	Sick.
February.....	113	113	112	1
April	115	115	115	...
June.....	108	108	108	...
August.....	114	114	114	...
Total.....	450	450	449	1

Reports made with respect to the cows inspected state that there were:—

In good condition	313
Improved as compared with previous visit ...	80
In fair condition	16
Not in good condition	39
*Suspected to be suffering from tuberculosis ...	1
Suffering from stoppage of bowels	1
Total	450

*Not reported as sick.

There were no bacteriological examinations of milk during the year.

BAKEHOUSES.—There are 45 bakehouses upon our register as compared with 51 during the previous year. They are all situate above

ground. There were 295 visits of inspection, and eight cases of want of limewashing and 35 defects in relation to other sanitary matters were noted and dealt with.

Slaughter-Houses.—There are still 14 private slaughter-houses on our register, and of these five are licensed. They are maintained in good condition, such defects as are noted being promptly dealt with. There were five instances of want of limewashing. As far as possible, inspections of the premises take place when killing is in progress, but it is impossible to inspect all carcases, as the premises are so scattered.

There is, however, such friendly co-operation between the butchers and the department that in any doubtful case the the assistance of the staff is sought, and either Mr. Wood, the Veterinary Inspector, or Mr. Knowles, who is a certified meat inspector, attends to the required inspection. This arrangement does not in any way supersede the ordinary meat inspection visits.

The following are particulars relating to surrender and portions seized during killing operations :—

Surrendered.	*Seized.*
Carcase of pig—Tuberculosis.	Nil.
12 lots of offal, at various times.	

Food Inspection.—In one instance a poulterer was proceeded against for exposing for sale three unsound head of poultry. He was fined £3 and costs. Forty other head of poultry were surrendered.

Inspection of all food stuffs is provided for, and in the Summer months attention is given to fruit—14 lbs. of unsound pears were surrendered.

Particular attention is given to places were food stuffs, such as potted meats, boiled pickled meats, etc., are being prepared for food.

Common Lodging Houses.—Two in number, registered for—(*a*) 94 adult males and (*b*) 57 adult males, 30 mixed adults and 10 children. In the latter case the single men's quarters have no communication with those set apart for married couples, single women, and children.

The proprietors are still urged to exercise great care in the matter of beds and bedding, particularly when found to have been used by persons suffering from Phthisis. When such cases are notified from the lodging houses disinfection of bedding and room, or, in the case of the larger rooms, the space around the bed, is promptly arranged for.

Disinfectants are always freely supplied.

Eighty-six inspections were made, and on two occasions it was necessary to remind the proprietors as to the necessity for limewashing. Generally speaking the management is excellent.

Houses Let in Lodgings.—The number on our register is 25, an increase by 11 over the number for the previous year. Ninety-six visits of inspection were made. In sixteen instances lodgers were being housed in unregistered premises, and these were dealt with by registering the premises if found suitable, or otherwise requiring the tenant to cease keeping lodgers.

During the year a special placard calling attention to the provision in the Byelaws as to registration was posted throughout the Borough. As stated in my report last year many of the ordinary dwelling-houses have not the accommodation or conveniences necessary for keeping lodgers, and a good deal of overcrowding may reasonably be suspected. Where this is discovered it is dealt with.

Fried Fish Shops.—169 visits of inspection were paid to the 40 premises on our register. Attention is principally directed to the prevention of damp and dirty conditions, and to the preparation of the food in a cleanly manner. There is also supervision in respect of the materials used.

This kind of business still appears to be on the increase and, while originally most in demand at supper time, the shops are extensively patronised for the mid-day meal.

Stables & Pig-Keeping Establishments.—334 inspections. They were most frequent in the Summer, and were then made with a view to preventing the accumulation of manure and garbage on the premises. There are 18 places where pigs are kept.

Canal Boats Inspection.—There were 102 inspections of canal boats. In sixteen instances infringements of the Act or Regulations were found—a percentage of 15·7 of the whole.

The number and description of infringements are as follows :—

Defective cabin floors	7
Leaky boats	3
Time for re-painting cabins exceeded ...	3
Leaky decks	3
Certificates requiring renewal	2
Lockers to repair	2
Defective stoves	2
do. bed locker...	1

Defective drawers	1
do. stern rail	1
do. fore cabin	1
Re-painting required...	1
Dirty cabin	1
Want of steps to cabin	1
Absence of certificate	1

The total number of infringements (30) was exceptionally high.

Eighteen notices were served in respect of the matters requiring attention and, with the exception of one served in the latter part of the year, all have been complied with. I am pleased to be able to report a greater willingness on the part of owners to comply with these notices.

The number of persons for whose accommodation the cabins were registered was as follows :—

Aft cabin.	Fore cabin.
309	14

The number of persons found on board was 148

Adults.		Children.	
Males.	Females.	Males.	Females.
108	31	4	5

Seven children were of school age and inquiry made elicited the information that proper attendance at school was arranged for.

There were no cases of sickness amongst the occupants.

The water supply was good and the means of storage adequate.

Having regard to the nature of the cargo carried in most cases, the cabins were found to be clean and the occupants are to be commended upon the condition in which they maintain them. In only one case was a really dirty cabin noted.

The boats inspected were engaged in conveying :—

Coal	91
Acid	6
General cargo	4
Cotton	1

The inspections were made at the Canal Wharf and the Ship Canal Co.'s Wharf, Patricroft, and I have to thank those in charge for their assistance.

Workshops—Excluding Bakehouses (45).—There are now 162 on our register as compared with 165 in the previous year. The inspections numbered 414.

Bootmaking & Clogging...	38	Millinery	24
Dressmaking	22	Tailoring	18
Millinery and Dressmaking	7	Laundries	6
Wheelwrights	5	Joiners	4
Blacksmiths	4	Cabinet Making	3
Tin-plate Workers ...	3	Cycle Repairing	3
Hosiers	3	Stone Masons	3
Saddlery	2	Umbrella Makers ...	2
Picture framers	2	Mineral Water Works ...	2
Gold beating	1	Instrument Repairing ...	1
Paste making	1	Watch repairing	1
Plumber	1	Bleaching	1
Rope making	1	Basket making	1
Carriage building... ...	1	Scene painting	1
Printing	1		

The total number of persons in employment in these workshops was 482—a marked decrease on the previous year's figure, 581.

There were 219 adult males, 185 adult females, 58 female young persons and 20 male young persons. The decrease was principally amongst the females.

Limewashing of rooms was required in 9 instances, and 38 other minor nuisances were dealt with.

Sixteen lists of out-workers were received in respect of the 16 out-workers' premises on our register. Each of these premises was inspected four times. There were no cases of infectious diseases in connection with these places, which were all kept in good sanitary condition.

Five notices of occupation of newly established workshops were received from H.M. Inspector of Factories but all these premises had been previously placed on our register.

Nine cases of want of "Abstract" were reported to the Inspector of Factories.

As the result of the service of notices upon this Authority by the Factory Inspector, three notices relative to the want of proper sanitary accommodation or defects therein were served under Sec. 22, P.H. Acts (Amendment) Act, 1890. In one case proceedings were instituted and the responsible person was fined £2 and costs. In a second case the notice was complied with, and in the third the notice was served towards the end of the year.

Four reports as to want of limewashing were submitted to your Committee and the four notices subsequently served were complied with.

SHOPS ACT, 1912.—From time to time our register is brought up to date and at the present time there are 944 shops of all kinds upon that register.

Application for a compulsory Closing Order as per a schedule of hours submitted was made by the retail meat traders, and a poll was taken with the result that :—

26 voted in favour of the Closing Order.
1 voted against the Closing Order.
3 did not vote.

The Order will therefore shortly be made.

The grocers are still exempt from half-day closing, but the majority close on Wednesday afternoons. This is particularly the case in the larger establishments.

Of the 944 shops registered, 445 are not exempt from half-day closing, and of the latter :—

148 are engaged in the provision of clothing and allied trades.
98 ,, ,, supply of household requisites.
55 ,, ,, boot trade and sale of other leather goods.
39 supply goods for personal use.
16 are engaged in supplying goods for sports.
89 are of a miscellaneous character.

DISEASES OF ANIMALS ACT.—One case of Parasitic Mange was discovered and dealt with. There was no other case of contagious disease. A considerable amount of extra work was entailed as a result of the restrictions consequent upon the various outbreaks of Foot and Mouth Disease in various parts of Great Britain and Ireland.

"WART" DISEASE OF POTATOES.—There was a rather extensive outbreak of this disease at the Peel Green Allotments. Arrangements were made for the removal and destruction of all infected tubers and haulms, and re-planting on those plots without being previously licensed has been prohibited.

POISONS AND PHARMACY ACT.—A licence to sell poisonous substances for horticultural purposes was renewed.

HACKNEY CARRIAGES, &C.—Fourteen proprietors' licences were granted in respect of 12 cabs and 2 wagonettes, and licences were issued to 18 drivers and conductors.

PETROLEUM ACT.—Ten licences for the storage of petroleum, and one for the storage of carbide of calcium were granted.

EXPLOSIVES ACT.—Thirty-one licences for the sale of fireworks were granted.

Loan of Limewash Brushes, &c.—There were 450 loans of limewash brushes, 408 supplies of freshly slaked lime, and 2,325 supplies of disinfectants. These figures are very much in excess of those for the previous year.

Public Mortuary.—Twenty-one bodies were received at the mortuary. Of these, 10 were taken there for post mortem examinations.

General.—All the clerical work—which annually increases—was promptly attended to, and the records of the Department are kept up to date. Tabulated particulars of matters dealt with, and work done, by the staff, together with the Home Office table of particulars relative to the administration of the Factory Act, and a list of cases taken before the magistrates, are appended hereto.

CASES BEFORE THE MAGISTRATES.

Offence.	Result of Proceedings.	Amount of Penalty.		
		£	s.	d.
Refusal to admit officials to inspect premises.	Order granted.	0	4	0
Non-compliance with notice to abate nuisance (over-crowding).	Order granted and fined costs.	0	9	0
Non-compliance with notice to provide W.C.accommodation for persons of both sexes.	Fined £2 and costs.	2	10	6
Non-compliance with order to abate nuisances--black smoke Two cases. (Had been adjourned from 1913).	Withdrawn on payment of costs.	1	0	0
Non-compliance with notice to abate nuisance--black smoke.	Order granted and fined costs.	0	10	0
Non-compliance with notice to abate nuisance in connection with bakehouse.	Work done prior to hearing—withdrawn on payment of costs.	0	5	0
Non-compliance with notice to abate nuisance—stopped-up drain.	Order to abate and fined £1 and costs.	1	10	0
Non-compliance with notice to abate nuisance--black smoke.	Fined 10/- and costs.	1	0	6
Exposure of person suffering from an infectious disease. (Scarlet Fever).	Fined 20/- and costs.	1	13	6
Exposure of unsound food. (Three head of poultry).	Fined £3 and costs.	3	13	6
Non-compliance with notices to abate nuisances. (Four cases).	Work done prior to hearing. Summonses withdrawn on payment of costs.	0	16	0
	Total amount of costs, &c.	£13	12	0

Tabulated particulars of Nuisances dealt with, and of other Work done, by the Staff in the Sanitary Department, apart from those matters referred to in the Housing and T.P. Section, during the year ended December 31st, 1914.

	1914	1913	1912	1911
House Drains—taken up, cleansed & re-laid ..	291	211	355	381
,, slopstone waste pipes, disconnected from	1	1	...	2
,, bath ,, ,, ,,	...	1	...	1
,, lavatory ,, ,, ,,	...	...	...	1
,, privy drains ,, ,,	...	...	...	197
,, downspouts ,, ,,	39	18	38	142
,, ventilated	3	7	30	50
,, want of	...	3	1	5
Gully Traps—defective	62	150	147	385
,, want of	1	2	5	10
,, filthy	...	5	...	1
Soil Pipes—defective	8	11	9	14
,, ,, ventilation of	3	4	2	20
,, bath and lavatory waste pipes disconnected from	1	...	...	..
,, downspouts disconnected from ...	3	1	...	2
Water closets—defective	65	79	100	72
,, various defects in	182	137	101	102
,, inefficient flush to	4	16	5	4
,, insufficient in mills, &c. (No. of cases)...	5	4	10	8
Slop-water closets—defective	15	12	27	41
Defective privy pits	2	35	33	65
,, ashpits	1	1	17	36
,, paving of yards and passages... ...	310	249	291	176
,, ,, house floors, &c.	109	70	74	10
,, channelling	...	3	1	..
,, slopstone waste pipes	169	226	171	89
,, brickwork around slop waste pipes ...	52	31	30	44
,, eaves gutters and spouting	222	208	189	129
,, bath and lavatory waste pipes	8	1	7	4
,, plaster on house walls	57	38	41	...
,, roofs	53	55	54	53
,, manure middens	4	9	1	1
,, slopstones	17	15	24	11
,, urinals	7	12	7	3
,, ventilating shafts	6	...	...	...
,, brickwork of boiler	39	...	...	...
,, window frames, &c.	59	...	...	...
No. of cases of dirty bedding	2	2	6	8
,, ,, verminous houses	9	7	21	16
,, houses provided with additional W.C. accommodation ..	3	16	1	5
Cesspools abolished	...	3	4	1
Dirty houses cleansed	128	59	79	26
Yards, &c. cleansed	6	4	12	19
Closets, filthy, cleansed	8	8	10	7
House premises, damp	46	31	43	23
House premises, want of ventilation and light ...	2	1	12	13
Houses overcrowded	45	36	39	19
Accumulations of manure and rubbish	55	55	53	43

	1914	1913	1912	1911
Buildings—obstructive to light and air, removed ...	2	...	6	8
Keeping fowls, &c. so as to cause nuisance ...	5	10	17	13
'Backing up' of sewage (reported to Surveyor) ...	2	...	10	9
Dangerous yard walls do. do. ...	22	26	36	...
Street gullies, defective	77	31	10	31
Manholes—foul smells from	5	8	15	4
Sewers defective	28	24	13	30
Waste of water	229	217	178	99
Want of manure middens	2	4	9	5
,, ashbin accommodation	203	119	200	99
Miscellaneous	124	163	158	150
Milkshops and cowsheds requiring limewashing ...	3	5	4	2
,, ,, defects in remedied ...	18	19	24	10
,, unregistered	2	...	...	...
Bakehouses requiring limewashing	8	8	7	7
,, defects in remedied	35	22	11	16
Workshops requiring cleansing & limewashing ..	9	17	13	16
,, defects in remedied	38	74	61	82
Hairdressers premises—defects in remedied ...	...	..	...	4
Slaughter-houses requiring limewashing	5	9	8	5
,, ,, defects in remedied	7	...	13	15
Houses let-in-lodgings requiring limewashing ...	1	...	...	..
Keeping Lodgers in unregistered premises ...	16	2	10	20
Houses let-in-lodgings—Breach of Bye-laws ..	5	2	...	2
Stables requiring limewashing	2	2	3	..
Fried fish shops requiring limewashing	1	1	3	2
,, ,, ,, defects in remedied	12	14	8	8
,, ,, ,, accumulations of offal... ...	1	1	3	..
Ice cream shops—defects in remedied	2	4	4	5
Common lodging houses requiring limewashing, &c.	2	1	6	..
Pigstyes requiring limewashing	7	3	9	5
,, defects in remedied	2	...	7	5
Back to back houses converted into through dwellings	...	...	...	...
No. of privies converted into water closets	4	29	32	197
,, water closets provided in lieu of privies ..	4	52	36	334
,, houses not newly erected provided with new drains	26	85	95	239
,, preliminary notices served	12	21	25	41
,, Statutory Notices (94 P.H. Act) ...	275	201	173	162
,, complaints made under Sec. 41 P.H.A. ...	1	4	...	5
,, notices served under do. ...	1	3	...	5
,, notices under Sec. 5 of I.D.P.Act. 1890, requiring stripping and limewashing ...	17	6	7	18
,, notices Sec. 6 I.D.P. Act.	1	2	...	...
,, reports made under Sec. 36 P.H.A. ..	75	50	77	85
,, notices served do. do. ...	73	50	75	85
,, of notices under Sec. 95 E.C.A. 1901 ...	...	...	3	31
do. Sec. 98 do. ...	1	...	...	...
do. houses let in lodgings	...		...	6
,, cases before the Magistrates	14	50	11	13
,, letters written	3088	2434	2257	2321
,, letters received	1397	1316	1216	1219
,, of visits in cases of zymotic diseases..	561	297	377	506
,, ,, of phthisis	470	438	453	134
,, ,, in other cases of sickness ...	228	314	856	271

	1914	1913	1912	1911
No. of rooms disinfected	773	531	696	466
,, schools do.	...	...	10	..
,, books do.	61	46	17	40
,, Walls, &c. stripped and limewashed ...	317	70	109	142
,, Re-inspection of nuisances	2919	4697	4162	3854
,, Inspections of dwellings	2417	2116	4561	4369
,, ,, yard premises	2876	2691	...	...
,, ,, under Housing T.P. Act ...	595	145	222	499
,, re-inspections ,, ,, ,, ...	2127	1492	...	...
,, inspections of slaughter houses	249	342	372	338
,, ,, milkshops	374	343	394	404
,, ,, cowsheds	114	95	110	123
,, ,, common lodging houses ..	86	73	63	86
,, ,, houses let in lodgings ...	96	17	35	118
,, ,, bakehouses	295	342	282	353
,, ,, workshops	414	405	447	466
,, ,, outworkers' premises ...	64	62	18	24
,, ,, stables & piggeries ...	334	374	438	408
,, ,, van dwellings	142	184	87	208
,, ,, canal boats	102	95	88	99
,, ,, fried fish and other shops ...	169	82	108	119
,, ,, factory premises	51	52	35	..
,, ,, marine stores	31	23	40	12
,, ,, ice-cream manufact'rs premises	75	88	97	60
,, ,, hair-dressers' premises ..	37	32	49	35
,, ,, mineral water works	14	16	17	8
,, ,, greengrocers' premises ...	117	114	142	68
,, ,, offensive trade premises ...	48	38	10	...
,, ,, urinals &c.	53	165	...	...
,, school closets disinfected	6	...	15	...
,, cottage water closets inspected	202	439	595	50
,, school premises inspected	40	26	25	...
,, owners seen re nuisances	493	406	359	381
,, smoke observations	36	66	11	67
,, 'tests' applied to drains	272	333	338	794
,, drains opened up for examination ...	21	38	24	81
,, typhoid pails removed, cleansed, &c. ..	1	43	33	415
,, earth closets disinfected	8	...	...	..
,, Notices under Sec. 93 Eccles Corporation Act 1901	...	24	18	27
,, Certificates under Sec. 93, E.C.A., 1901 ..	...	24	18	27
,, Notices under Section 46 P.H.A., 1875 ..	28	18	14	30
,, Loans of limewash brushes	450	426	413	...
,, Supplies of lime	408	228	228	...
,, ,, disinfectants	2325	1439	1420	...
,, Parcels of bedding disinfected	344	135	142	...
,, Stable premises disinfected	1	2	5	...
,, visits *re* Shops Act	852	170	...	...

BOROUGH OF ECCLES.

Factories, Workshops, Workplaces, and Homework.

I.—Inspection of Factories, Workshops and Workplaces.

Inspections made by Sanitary Inspectors.

Premises.	Number of		
	Inspections.	Written Notices	Prosecutions.
Factories (including Factory Laundries)	51	1	
Workshops (including Workshop Laundries)	709	6	
Workplaces			
Total	760	7	

II.—Defects Found in Factories, Workshops, & Workplaces.

Particulars.	Number of Defects.			Number of Prosecutions.
	Found.	Remedied.	Referred to H.M. Inspect'r	
Nuisances under the Public Health Acts :—				
Want of cleanliness	11	8		
Want of Ventilation	2	1		
Overcrowding	Nil.	Nil.		
Want of drainage of floors	2	2		
Other nuisances	33	22		1
Sanitary accommodation — insufficient			1	
Sanitary accommodation — unsuitable or defective.....	5	2		
Sanitary accommodation — not separate for sexes	1	Nil.	2	1
Offences under the Factory and Workshop Act :—				
Illegal occupation of underground bakehouse (S. 101)	Nil.	Nil.		
Breach of special sanitary requirements for bakehouses (SS. 97 to 100)..	11	7		
Other offences (Excluding offences relating to outwork included in Part 3 of this Report)..	30	30		
Total	95	72	3	2

III.—Home Work.

NATURE OF WORK.	Outworkers' Lists, Section 107.							
	Lists received from Employers.						Notices served on Occupiers as to keeping or sending lists.	Prosecutions.
	Sending twice in the year.			Sending once in the year.				
	Lists.	Outworkers.		Lists.	Outworkers			Failing to keep or permit inspection of lists. / Failing to send lists.
		Contractors	Workmen.		Contractors	Workmen.		
Wearing Apparel—								
(1) Making, &c. ...	14	7	7	4	4	4		
(2) Cleaning & washing	.....	....	....	.....				
Umbrellas, &c.	2	1	1					
Total..	16	8	8	4	4	4		

IV.—Registered Workshops.

Workshops on the Register (S. 131) at the end of the year	Number.
Bakehouses	45
Bootmaking and Clogging	38
Dressmaking	22
Tailoring..	18
Millinery	24
Cabinet Making & Upholstering	3
Millinery and Dressmaking	7
Wheelwrights	5
Laundries..	6
Various other Trades	39
Total Number of workshops on Register..	207

V.—Other Matters.

Class.	Number.
Matters notified to H.M. Inspector of Factories ;—	
Failure to affix Abstract of the Factory & Workshop Act (S.133)	9
Action taken in matters referred by H.M. Inspectors as remediable under the Public Health Acts, but not under the Factory and Workshop Act (S. 5). — Notified by H.M. Inspector.	5
Action taken in matters referred by H.M. Inspectors as remediable under the Public Health Acts, but not under the Factory and Workshop Act (S. 5). — Reports (of action taken) sent to H.M. Inspector	3
Other	7
Underground Bakehouses (S. 101) :—	
Certificates granted during the year..	Nil.
In use at the end of the year	Nil.