

[Report 1921] / Medical Officer of Health, Lincoln City.

Contributors

Lincoln (England). City Council.

Publication/Creation

1921

Persistent URL

<https://wellcomecollection.org/works/xhcn75b9>

License and attribution

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

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

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



Wellcome Collection
183 Euston Road
London NW1 2BE UK
T +44 (0)20 7611 8722
E library@wellcomecollection.org
<https://wellcomecollection.org>

CITY OF



LINCOLN.

URBAN SANITARY AUTHORITY

ANNUAL REPORT

— OF —

THE MEDICAL OFFICER OF HEALTH,

For the Year 1921.

Lincoln :

LINCOLNSHIRE CHRONICLE, LTD., PRINTERS, SALTERGATE.



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

CITY OF LINCOLN.

ANNUAL HEALTH REPORT FOR 1921,

BY

C. J. COLEMAN, M.D., M.A., D.P.H.

Medical Officer of Health.

MEMBERS OF THE HEALTH COMMITTEE.

COUN. W. H. KILMISTER (MAYOR).

ALD. M. H. FOOTMAN (Chairman). COUN. G. L. B. KNOTT

„ H. A. COTTINGHAM

„ M. E. NEVILE

COUN. J. SMALLEY

„ A. HOWITT

„ J. HAGUE

„ C. E. SNOOK

„ W. BAKER

SANITARY STAFF (Officials).

December, 1921.

Medical Officer of Health :

C. J. COLEMAN, M.D., M.A., D.P.H.

Assistant Medical Officer of Health :

M. L. BERY, M.B., Ch.B.

Public Analyst :

E. M. CHAPLIN, Ph.D., F.I.C.

Chief Sanitary Inspector :

J. K. CRAWSHAW, M.B.E., Cert. S.I.A.

Special Inspector for Food and Slaughter-Houses. &c.

C. STREET, C.R.S.I., C.M.I.

Assistant Sanitary Inspectors.

A. GARNER, C.R.S.I.

H. HOE. C.R.S.I.

Superintendent of Health Visitors :

Miss E. M. DAVIES (Diploma in Hygiene,
Sanitary Institute), C.R.S.I.

Phthisis Nurses :

Nurse A. WOOD.

Nurse M. SENDALL.

Matron of the City Hospital and Sanatorium :

Miss E. O'KANE.

HEALTH DEPARTMENT,
CORPORATION OFFICES,
LINCOLN.

May, 1922.

MR. MAYOR, LADIES AND GENTLEMEN,

I have the honour to submit to you my report on the health and sanitary conditions of Lincoln during 1921.

It is proposed by the Ministry of Health that a full report of all subjects appertaining to the health of a District be submitted every five years, and that condensed reports be provided in the interval. I have accordingly made a condensed report for 1921, omitting material which was fully discussed in the 1920 report.

The Health Committee is to be congratulated on providing a motor ambulance and van for use at the City Hospital, as these will greatly facilitate the removal of patients to Hospital and Sanatorium, and also material for disinfection.

Unemployment has thrown a great strain on our Maternity and Child Welfare Centre, owing to the necessity for providing assistance in food and milk for Nursing Mothers and young Infants, which has entailed very heavy work on the part of the Staff at the Centre.

I wish to add my appreciation of the services of all my Staff during the past year.

I remain, Ladies and Gentlemen,

Your obedient Servant,

C. J. COLEMAN.

CITY OF LINCOLN.

STATISTICAL SUMMARY FOR 1921.

Population at Census, 1911	....	...	...	...	57,285
Population at Census, 1921 (adjusted by Registrar General)	...	...	...	...	66,600
Area of Municipal Borough	...	...	...	(acres)	6,166
Average number of persons per acre...	...	...	...	...	10.8
Birth-rate per 1,000 population, 1921	...	...	...	...	22.7
Death-rate per 1,000 population, 1921...	...	...	...	...	11.3
Infantile Mortality, per 1,000 Births	...	...	...	...	86.6
Zymotic Death-rate per 1,000	...	...	...	...	.62
Phthisis Death-rate per 1,000	...	...	...	...	.77
Respiratory Diseases Death-rate per 1,000	...	...	...	...	1.8
Malignant Diseases Death-rate per 1,000	...	...	...	...	1.24

NATURAL AND SOCIOLOGICAL CONDITIONS OF THE DISTRICT.

THE AREA OF THE MUNICIPAL BOROUGH is now 6,166 acres, and is divided into North and South Districts by the River Witham. The district to the south of the river is flat, the soil consisting of river alluvium, gravel and sand.

It may be noted that nearly all the additional Districts now included in the City are on low-lying ground in the river basin. To the north the land rises to a considerable eminence, on which the Cathedral stands; this is the northern escarpment of the Lincoln Gap. To the south, the Canwick Hill forms the southern escarpment, and the valley through which the river flows towards the Wash is the gap formed by the prehistoric Trent. The geological formation of the hills to the north and the south is oolitic limestone. The slope of the northern hill as it descends to the river is mostly covered with clay.

POPULATION.

Census of 1881	...	...	37,312
do. 1891	...	...	41,491
do. 1901	...	...	48,784
do. 1911	...	...	57,285
do. 1921 (adjusted)	...	...	66,600

Employment.

The iron foundries, which provide the staple employment in Lincoln, have been very seriously affected by lack of trade during the past year. Unemployment, which has been rife throughout the whole country, has been aggravated in Lincoln owing to the absence of Russian and other markets for agricultural machinery. Recovery of trade in the city must take considerable time.

I am informed by the Relieving Officers that £18,678 6s. 9d. was expended in Poor Law Out-Relief during the financial year, March, 1921—March, 1922.

During the same period £30,161 16s. 6d. was expended in Unemployment Relief. These figures show better than anything else the serious state in the City of industrial conditions during 1921.

UNEMPLOYMENT.

PRINCIPAL CHANNELS OF RELIEF IN OPERATION
IN THE CITY DURING THE PAST YEAR.

- (1). Out-door Relief by Guardians.
- (2). Unemployed State Relief.
- (3). Municipal Relief. (Milk, Food, etc.)
 - (a) Ordinary relief £250.
 - (b) For Nursing Mothers and Infants at Infant Welfare Centre. (Amount spent, 1921—about £2,000.)
 - (c) Extra nourishment for Tuberculous patients. (Amount spent, 1921—about £27.)
 - (d) Feeding of school children by Education Committee. (Amount spent, 1921—£1,712.)
- (4). Dawber Charity Relief.
 - (a) Unemployment Relief Fund. (For those not able to obtain relief from Guardians or State). (Amount spent, 1921—£2,100.)
 - (b) Extra nourishment for advanced Phthysical patients, via Medical Officer of Health. (About £70.)
 - (c) Contributions to County Hospital Dispensary, Children's Care Committee, etc.
- (5). Children's Care Committee.
Provision of boots, clothing and extra nourishment for children of school age. (Grants obtained from Dawber Committee and private subscriptions.)
- (6). Police Boot Fund for Unemployed.
- (7). Annuities.
Annuity Grants were made by the Dawber Charity Committee to the extent of £3,208 in 1921; and also by the Lincoln Municipal Charities Committee, who distributed about £1,160 during the year.
- (8). Provision of coal in necessitous cases.
 - (a) By Lincoln Coal Committee.
 - (b) By Municipal Charities Committee.
- (9). Relief Works.
The Lincoln City Council have executed engineering schemes by permission of the Ministry of Health to provide work for Unemployed.
The chief of these are :—

(a) Outer Circle Road.

Cost about £14,000. Work provided for unemployed, 12,474 men's days.

(b) Sewage Out Fall Works.

Humus and storm water tanks, cost about £17,000. Work provided for unemployed, 9,040 men's days.

(c) Foss Ward Sewage.

Cost about £45,000. Work provided for unemployed, 26,480 men's days.

(d) Smaller Schemes.

Work provided for unemployed, 936 men's days.

(10). Provision of Medical Treatment.

The County Hospital and Dispensary have been of great assistance during the year as heretofore.

(11). Nursing Provision.

The Lincoln District Nursing Association has now become well established, and has done excellent work in providing District Nursing facilities for necessitous cases.

As regards Municipal Relief, great care has been exercised to avoid over-lapping on other forms of Relief by obtaining full particulars as possible of all monies coming into the household of which grants of milk, etc., be made.

The above are, I believe, the main sources of Relief.

There are smaller agencies of a Parochial nature which have done their best to alleviate distress.

Vital Statistics.

DEATHS.

During the year 818 deaths were registered; these divided into sexes for each quarter are :—

	M.	F.	Total.
1st quarter	118	119	237
2nd „	96	91	187
3rd „	92	77	169
4th „	122	103	225
	<hr/>	<hr/>	<hr/>
	428	390	818
	<hr/>	<hr/>	<hr/>

The total compares with previous years as follows:—

1907	...	...	807	1914	...	...	804
1908	...	...	767	1915	...	...	929
1909	...	...	775	1916	...	...	868
1910	...	...	782	1917	...	...	878
1911	...	...	874	1918	...	...	1,149
1912	...	...	797	1919	...	...	856
1913	...	...	772	1920	...	...	800
				1921	...	...	818

Fifty-seven persons died in the Workhouse, 107 in the County Hospital, 23 in the City Hospital, 8 in the Lawn Asylum, 12 in the Red House Nursing Home, 2 in the New Barracks, 2 in Private Nursing Home, 1 in H.M. Prison, and 10 in the Maternity Home. (1 Adult and 9 Infants).

The Registrar-General now sends particulars of deaths of Lincoln residents who die elsewhere, but whose deaths must be added to the total of deaths registered locally; he also gives the number of people who have died in Lincoln during the year, but who were not residents in the locality, and this number must be subtracted from the total number of local deaths. I have, therefore, added 45 deaths to the total of 818, and subtracted 110 deaths. This leaves 753 deaths of Lincoln residents for the year 1921, which forms the basis for my future analysis.

As the deaths of Lincoln residents in 1921 were 753 and the population at the middle of the year as regards death-rate is estimated at 66,600, the death-rate per 1,000 of the population is 11.3.

As regards the usual Zymotic diseases, the death-rate was .62 per 1,000.

	1918.	1919.	1920.	1921.
Zymotic Diseases, death rate per 1,000	.68	.38	1.05	.62
Respiratory ,, ,, ,,	2.34	2.40	1.9	1.8
Phthisis ,, ,, ,,	.95	.94	.72	.77
Other Tuberculous Diseases	.11	.24	.21	.24
Malignant Diseases	.95	.94	.97	1.24

CAUSES OF, AND AGES AT, DEATH DURING THE
YEAR 1921.

CAUSES OF DEATH	Net Deaths at the subjoined ages of "Residents" whether occurring within or without the district.								
	All Ages	Under 1 year	1 and under 2 y'rs.	2 and under 5 y'rs	5 and under 15 y'rs	15 and under 25 y'rs	25 and under 45 y'rs	45 and under 65 y'rs	65 and Up- wards
All Causes { Certified	746	124	20	20	14	27	88	151	302
{ Uncertified	7	4	..	..	..	..	..	1	2
1 Enteric Fever .. ..	..	..	..	..	..	..	..	..	..
2 Small Pox .. ..	..	..	..	..	..	..	..	..	..
3 Measles	1	..	1	..	..	..	..	..	..
4 Scarlet Fever .. ..	..	..	..	..	..	..	..	..	..
5 Whooping Cough	9	5	2	2	..	..	..	..	..
6 Diphtheria and Croup	9	..	1	5	3	..	..	..	..
7 Influenza	12	..	1	1	..	1	4	2	3
8 Erysipelas	1	..	..	..	..	..	..	..	1
9 Phthisis (P.T.B.)	51	..	..	1	..	9	23	15	3
10 Tuberculous Meningitis	8	5	1	2	..	..	..	..	..
11 Other Tuberculous Diseases	8	1	1	..	1	..	5	..	..
12 Cancer, Malignant Disease	82	..	..	..	..	..	5	42	35
13 Rheumatic Fever .. ..	..	..	..	..	..	..	..	..	..
14 Meningitis	5	1	1	..	..	..	1	1	1
15 Organic Heart Disease	78	2	..	..	1	5	10	21	39
16 Bronchitis	74	14	3	2	..	1	1	8	45
17 Pneumonia (all forms)	32	8	2	1	2	..	3	3	13
18 Other Diseases of Respiratory Organs	17	..	2	1	1	1	5	3	4
19 Diarrhoea and Enteritis	24	20	1	1	1	..	..	..	1
20 Appendicitis and Typhlitis	1	..	..	..	..	..	1	..	..
21 Cirrhosis of Liver	2	..	..	..	..	..	..	..	2
21 ^a Alcoholism .. ..	..	..	..	..	..	..	..	..	..
22 Nephritis and Bright's Disease	11	1	..	1	..	..	2	1	6
23 Puerperal Fever	1	..	..	..	..	1	..	..	..
24 Other Accidents and Diseases of Pregnancy and Parturition	4	..	..	..	..	1	3	..	..
25 Congenital Debility and Mal- formation, including Pre- mature Births	58	58	..	..	..	..	..	..	..
26 Violent Deaths, excluding Suicides	13	1	..	..	1	1	2	6	2
27 Suicides	6	..	..	..	..	..	2	4	..
28 Other Defined Diseases	181	12	4	3	4	7	20	46	85
29 Diseases, Ill-defined and un- known	1	..	..	..	..	..	1	..	..
30 Senility	64	..	..	..	..	..	..	..	64
TOTALS	753	128	20	20	11	27	88	152	304

INFANTILE MORTALITY.

One hundred and twenty-eight deaths occurred in Infants under one year of age, giving a mortality of 86.6 per 1,000 births. Fifty-three deaths occurred within a month of birth.

Premature Birth, Atrophy, Malformation and Debility were responsible for 58 deaths, and form the largest individual factor in the mortality.

Pneumonia and Bronchitis were responsible for 22 deaths.

As regards Zymotic Diseases, 5 deaths were due to Whooping Cough, and 20 deaths to Infantile Diarrhœa.

INFANT MORTALITY TABLE.

1921. 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 4 weeks.	4 weeks and under 3 months.	3 months and under 6 months.	6 months and under 9 months.	9 months and under 12 months.	Total Deaths under 1 year
All causes	{ Certified	33	9	6	1	49	26	25	9	15	124
	{ Uncertified	3	1	..	..	4	..	..	..	..	4
	{ Small-pox .. ..	..	..	..	..	..	..	..	..	..	..
	{ Chicken-pox .. ..	..	..	..	..	..	..	..	..	..	..
	{ Measles .. ..	..	..	..	..	..	..	..	..	..	..
	{ Scarlet Fever .. ..	..	..	..	..	..	..	..	..	..	..
	{ Whooping Cough .. ..	..	..	1	..	1	..	4	..	..	5
	{ Diphtheria and Croup .. ..	..	..	..	..	..	..	..	..	..	..
	{ Erysipelas .. ..	..	..	..	..	..	..	..	..	..	..
	{ Tubercular Meningitis .. ..	..	..	..	..	..	..	1	2	2	5
	{ Abdominal Tuberculosis .. ..	..	..	..	..	..	..	..	1	..	1
	{ Other Tuberculous Diseases .. ..	..	..	..	..	..	..	..	..	..	..
	{ Meningitis (not Tuberculous) .. ..	..	..	..	..	..	1	..	..	..	1
	{ Convulsions .. ..	..	..	..	..	..	..	1	1	1	3
	{ Laryngitis .. ..	..	..	..	..	..	..	..	..	..	..
	{ Bronchitis	1	..	1	..	2	2	6	1	3	14
	{ Pneumonia (all forms) .. ..	..	..	..	..	..	2	3	..	3	8
	{ Diarrhœa .. ..	..	..	..	..	..	1	1	..	1	3
	{ Enteritis .. ..	..	3	..	..	3	7	2	1	1	14
	{ Gastritis .. ..	..	..	..	..	..	..	1	2	..	3
	{ Syphilis .. ..	..	..	..	..	..	1	..	..	..	1
	{ Rickets .. ..	..	..	..	..	..	..	..	..	..	..
	{ Suffocation, overlying .. ..	..	..	..	..	..	..	..	..	..	..
	{ Injury at birth	1	..	..	..	1	..	..	..	..	1
	{ Atelectasis .. ..	..	..	..	..	..	..	..	..	..	..
	{ Congenital Malformations	2	..	..	..	2	1	..	..	..	3
	{ Premature birth	26	5	2	..	33	6	..	..	..	39
	{ Atrophy, Debility and .. ..	..	..	..	..	..	..	..	..	..	..
	{ Marasmus	3	2	2	..	7	5	3	..	1	16
	{ Other Causes	3	..	..	1	4	..	3	1	3	11
TOTALS		36	10	6	1	53	26	25	9	15	128

BIRTHS.

During the year 1921, 1,526 births were registered, of which 96 were illegitimate. These, divided into sexes for each quarter of the year were as follows:—

	Males	Females	Total
1st Quarter	177	200	377
2nd Quarter	214	215	429
3rd Quarter	180	203	383
4th Quarter	169	168	337
Totals	740	786	1,526

The percentage of Illegitimate Births to total Birth Rate is given in the table below for the last seven years:—

1915—5.5 per cent.	1918—7.7 per cent.
1916—5.1 „	1919—7.4 „
1917—6.4 „	1920—6.28 „
	1921—6.29 „

Information supplied by Registrar-General showed that there were 50 outward transfers and 2 inward, leaving a balance of 48 births to be subtracted. The nett number of births belonging to the City of Lincoln is therefore 1,478. The Birth-rate for the year was 22.2 for 1,000 of the population, calculated on a basis of 66,6000, the figure given by the Registrar-General.

Comparative Table of Birth-rate, Death-rate and Infantile Mortality as far as ascertainable in 1921:—

	Death-rate per 1,000	Birth-rate per 1,000	Infantile Mortality per 1,000 Births
England and Wales ..	12.1	22.4	83
96 Greater Towns, including London ..	12.3	23.3	87
148 Smaller Towns ..	11.3	22.7	84
London	12.4	22.3	80
Lincoln	11.3	22.2	86.6

VITAL STATISTICS OF WHOLE DISTRICT
DURING 1921 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.		Number.	Rate.	Of Non-residents registered in the District.	Of residents not registered in the District.	Under 1 year.		At all Ages.	
			Number.	Rate.					Number.	Rate per 1,000 Nett Births.	Number.	Rate.
1	2	3	4	5	6	7	8	9	10	11	12	13
1915	55,226	1,189	1,182	21.4	929	16.2	142	42	118	99.9	829	15.1
1916	55,078	1,272	1,271	21.2	868	15.2	142	26	96	75.5	752	13.6
1917	65,341	1,110	1,113	17.0	878	14.9	149	48	95	85.3	777	13.2
1918	BR 67,348 OR 60,707	1,204	1,206	17.9	1,149	18.9	266	36	87	72.0	919	15.3
1919	BR 63,107 OR 60,581	1,160	1,158	18.2	856	14.1	151	21	92	79.0	726	11.98
1920	63,655	1,479	1,455	22.7	800	12.5	107	39	117	79.0	732	11.5
1921	66,600	1,526	1,478	22.2	818	12.3	110	45	128	86.6	753	11.3

Drainage and Sewerage.

During the year under review the Corporation has laid 5,635 yards of sewer in the Foss Ward, and has built and equipped two new pumping stations, one in Boutham Park Road, and one in Rookery Lane.

The approximate cost £45,000.

The scheme of sewerage is not completed, and houses on the higher part of Hykeham Road must continue to drain to cesspools.

I am informed by the Surveyor that, "The Hykeham Road sewer is laid as far as it is intended at the present."

SEWAGE DISPOSAL.

The sewage disposal works still turn out a good effluent, but here again considerable expense has been incurred in the making of three humus tanks. To obtain efficiency through these tanks the sewage must pass very slowly, and three tanks are not sufficient.

CLOSET ACCOMMODATION.

Twenty-one box closets and nineteen privy vaults have been abolished during the year, and forty W.C.'s have been

substituted. A great deal more of this work is required, and will be taken in hand as soon as the house drains in the Foss Ward are connected up to the new sewer.

These conversions leave us now with 94 privy vaults, 239 box colsets; and it is estimated that there are 15,966 water closets now in use.

DANGER OF CONTAMINATION OF WELL WATERS.

In my last report I stated that the principle of drawing drinking water from the ground adjoining a cesspool is particularly bad.

I again wish to emphasise the danger to public health of the conditions existing in the area which was taken into the Borough in November, 1920, where the houses drain to cesspools which are not tight, and drinking water is drawn from wells on the same site.

Samples of water analysed from the wells where these conditions exist are certified, invariably, to be injurious, and I cannot too strongly urge the necessity for immediate action to be taken in providing a new water supply and connecting the house drains to the sewer which now exists, and in this way abolishing the use of the cesspools.

In some limited areas the ground is already sewage logged, and week after week I have seen sewage standing on the surface of the ground.

During 1921 thirty-nine houses in the added area have been connected to the Corporation water mains.

Sanitary Inspection of District.

Mr. Crawshaw reports:—

SUMMARY OF THE WORK OF THE SANITARY STAFF.

Statutory notices served	...	...	...	...	...	6
,, ,, complied with	...	...	...	...	...	6
Informal notices served	...	...	...	...	...	510
,, ,, outstanding on 31st December, 1920						34

Circular letters re notices	108
Privy vaults abolished	19
Privy boxes abolished	21
New water-closets provided	52
W.C. pans provided	53
" " connected to traps	48
" " cleansed	21
" cisterns repaired	115
" " overflow pipes repaired	26
" flush pipes repaired	52
" supply pipes repaired	55
" seats repaired	14
Choked W.C.'s cleansed	119
Drains tested with smoke, etc.	232
" found defective and repaired	77
" relaid	67
" found choked and cleansed	239
New inspection chambers built	25
Manhole covers provided	11
Drain ventilating pipes tested	221
" " " choked	33
" " " repaired	22
" " " fixed new	6
" " " lengthened	11
Sink waste pipes trapped	24
" " " repaired	43
" catchpits abolished	0
Eaves spouts and down spouts repaired	55
Yards and passages asphalted	204
Defective roofs repaired	58
Foul sinks removed	34
Urinals cleansed	0
" provided	0
Windows of houses made to open	7
Ashpits abolished	11
Covered metal ashes bins provided	358
Houses inspected	212
" found to be dirty	10
" cleansed	8
" found to be overcrowded	4
Pig-styes inspected	41
" found in insanitary condition	10

Visits to Common Lodging Houses	...	...	...	...	68
„ Canal Boats	...	...	...	...	20
Complaints investigated	...	...	...	...	809
Re-visits re complaints	...	...	...	...	399
Works inspected	...	...	...	...	237
Living Vans inspected at Fair-time	...	...	...	...	68
Cases of notifiable diseases investigated	...	...	...	...	258
„ „ „ „ re-visited	...	...	...	...	78
„ „ Non-notifiable diseases visited	...	...	...	...	1
„ „ Small-Pox Contacts visited	...	...	...	...	3
„ „ Infectious Diseases removed to Hospital	...	...	...	...	103
Premises disinfected	...	...	...	...	278
Bundles of wearing apparel passed through steam disinfector	...	...	...	...	9
Beds and mattresses	...	...	...	...	300
Bundles of bed-clothing, etc.	...	...	...	...	210
Verminous beddings and mattresses destroyed	...	...	...	...	22
Rooms stoved to destroy vermin	...	...	...	...	13
Notices to education re infectious cases in school children	...	...	...	...	60
Children excluded from school	...	...	...	...	207
Miscellaneous visits	...	...	...	...	1,155
Visits to Factories and Workshops	...	...	...	...	41
Rooms disinfected	...	...	...	...	1,446

Visits to food preparation places, etc., given under
Food Inspection.

PUBLIC SANITARY CONVENIENCES.

In July last a special report was made to the Health Committee and forwarded to the Highways Committee, on the inadequacy of the public sanitary conveniences. It was shown that throughout the whole of the City there are 17 urinals for men and one sanitary convenience for females.

It was acknowledged that there was insufficiency of public sanitary conveniences, but owing to financial conditions no further provision was made.

The subject, however, should not be lost sight of, and should be considered as soon as conditions will allow.

Food.PUBLIC HEALTH (MILK & CREAM) REGULATIONS,
1912 & 1917.

REPORT FOR YEAR ENDED 31ST DECEMBER, 1921.

	Number of Samples examined for the presence of a Preservative.	Number in which Preservative was reported to be present.
Milk	69	0
Cream	0	0
Preserved Cream... ..	2	2
Instances where the requirements as to labelling have not been observed	0	0

Meat.

Licenses to slaughter have been granted to John H. Leachman, Bracebridge Low Fields, and James Hobbins, 154, High Street, Bracebridge.

Knackers' licenses were granted to Aubrey Hughes, Poppleton's Lane, Boutham, and John Christopher of the same address.

One slaughterhouse on Cross o' Cliff Hill has not yet been dealt with. A Sub-Committee was appointed to consider this question, but has not yet come to any decision.

LIST OF SAUGHTERHOUSES.

One Abattoir belonging to the Corporation	Monks Road ...	Licensed.
Herrick, J. W.	Craven Street ...	"
Nissler, J. A., & Sons	High Street ...	"
Leachman, George G.	St. Paul's Lane ...	"
Industrial Co-operative Society	Brayford Wharf ...	"
Sowerby, George	7, Sincil Street ...	Registered.
Curtis, A. W., & G. Barrand ...	Rear 171, High Street	"
Maddison, J. B.	St. Paul's Lane ...	"
Hill, Mrs. R., & Taylor Bros....	Alfred Street ...	"
Horton, E.	Peel Street ...	"
Dalton, S. S.	Boundary Street ...	"
Applewhite, Chas. Wm. ...	Occupation Road ...	"
Varty, J.	Grantham Street ...	"
Pateman, F. J.	43, Newport ...	"

MEAT INSPECTION.

An inspection of the following table conveys the necessity for the constant supervision of this important branch of the work of the Health Department.

UN SOUND MEAT AND FOOD DESTROYED DURING 1921:—

		sts.	lbs.	
Beef	11 carcasses with offals ...	518	4	tuberculous
"	19 " " " ...	651	6	non-tuberculous
"	parts of 50 carcasses ...	393	12	tuberculous
"	" 12 " " ...	88	4	non-tuberculous
Mutton	18 carcasses with offals ...	108	0	unsound
"	parts of 6 carcasses ...	14	8	unsound
Pork	27 carcasses with offals ...	194	0½	tuberculous
"	18 " " " ...	294	2	non-tuberculous
"	parts of 43 carcasses ...	238	6½	tuberculous
"	" 4 " " ...	8	2	non-tuberculous
Veal	5 carcasses with offals ...	39	11	unsound
"	parts of 6 carcasses ...	9	9	"
Offals, Miscellaneous	... ..	446	7	"
Frozen Meat	... ..	225	3	"
Ham	... ..	1	0	"
Bacon, smoked	... ..	1	6	"
Pork Pies	... ..	1	6	"
Cheese	... ..	4	8	"
Rabbits and Hares	... ..	48	3½	"
Fish	.. ..	19	3	"
Fresh Fruit	.. ..	95	13	"
Tinned Fish	... ..	9	7¼	"
Tinned Meat	... ..	29	2¼	"
Tinned Fruit	... ..	41	11	"
Tinned Milk	... ..	43	6	"
Butter	... ..	3	11	"
Eggs (134)	... ..		6	"
Nuts	... ..	10	0	"
Other Food	... ..		1½	"
Total	... ..	3,540	5½	
		1,344	9	tuberculous
		1,042	0	non-tuberculous
		1,153	10½	unsound
		3,540	5½	Total

Number of Animals Slaughtered at Public Abattoirs,
January to December, 1921:—

Beast.	Sheep.	Pigs.	Calves.
1,430	8,126	3,376	62

PRIVATE SLAUGHTER HOUSES AND "MAKING-UP ROOMS."

These are being continually called upon with a view to reducing risk of unsound food being supplied to the public. I am pleased to say that the conditions of these premises have been much more cleanly than was the case when war conditions predominated, and this work was somewhat neglected. The structural conditions, however, are unsatisfactory, being unsuitable for their purpose and call for constant supervision.

COWSHEDS, DAIRIES AND MILK SHOPS.

These premises have been regularly inspected during the year.

Each cowshed has been limewashed at least twice in twelve months, and the general conditions are more cleanly, and, as you are aware, several of these cowsheds need structural improvements, being constructed of wood and getting dilapidated, yet just comply with the bye-laws, but are not consistent with the production of a clean and wholesome milk supply.

Dairies and milkshops could be improved by adopting more up-to-date methods to secure the supply and distribution of this class of food.

MARKETS.

There is now an improvement in the amount of business carried on in the markets which entails more inspection, to secure the public against unwholesome food. The different forms of food offered for sale, and supplied from various sources, some of which are not inspected before reaching the City, necessarily receive continuous visits for examination.

BAKEHOUSES.

More regular supervision has secured an improvement in the cleanliness of these premises.

While some of the buildings are well equipped, there are still a number that are small and are capable of considerable improvements, though they comply with the Factory and Workshops Acts.

FRIED FISH SHOPS.

There are about forty shops for this purpose.

Complaints are far less numerous than in the past. Regular visits are made to secure the carrying out of this trade under the best conditions possible.

The following is a list of visits paid during 1921 :—

Visits to Cowsheds	...	...	...	...	255
„ „ Dairies and Milkshops	...	...	...	...	305
„ „ Abattoir	...	...	...	...	623
„ „ Private Slaughterhouses	...	...	...	...	338
„ „ Cattle Market	...	...	...	...	44
„ „ Butter Market	...	...	...	...	65
„ „ Fruit Market	...	...	...	...	52
„ „ Fish Market	...	...	...	...	52
„ „ Making-up Rooms	...	...	...	...	170
„ „ Bakehouses	...	...	...	...	60
„ „ Ice Cream Shops	...	...	...	...	60
„ „ Fried Fish Shops	...	...	...	...	220
„ „ Dining and Refreshment Rooms	...	...	...	...	30
„ „ Fruiterers and Green Grocers	...	...	...	...	50
„ „ Fishmongers	...	...	...	...	66
„ „ Grocers Shops	...	...	...	...	150
„ „ Butchers Shops	...	...	...	...	300
„ „ Hotel Kitchens	...	...	...	...	6
„ „ Tripe Boilers	...	...	...	...	20
„ „ Hide and Skin Yards	...	...	...	...	35
„ „ Knackers Yards	...	...	...	...	12

Food and Drugs' Acts.

SAMPLES SUBMITTED FOR ANALYSIS DURING 1921.

Milk	...	...	...	64	
Milk for dirt content	...	...	...	22	
Butter	...	...	...	20	
Margarine	...	...	...	1	
Dripping	...	...	...	5	
Bread and Butter	...	...	...	5	
Cream	...	...	...	2	
Milk	...	...	...	5	Informal Samples
Camphorated Oil	...	...	...	6	„ „
Coffee	...	...	...	1	„ „
Ground Rice	...	...	...	3	„ „
Ground Ginger	...	...	...	1	„ „
Cocoa	...	...	...	2	„ „
Mustard	...	...	...	3	„ „
White Pepper	...	...	...	1	„ „
Total	...	...	...	<u>141</u>	

PARTICULARS OF SAMPLES OF MILK WHICH
WERE BELOW THE STANDARD FIXED.

No. in Record.	Date 1921.	Adulteration	Article.	Action Taken.
31	Feb. 12	Non Fatty Solids 7.70 per cent Milk Fat ... 3.40 " Water ... 88.90 " <u>100.00</u> "	New Milk.	Fined 10/-
32	Feb. 12	Non Fatty Solids 7.96 per cent. Milk Fat ... 2.94 " Water ... 89.10 " <u>100.00</u> "	"	Fined 10/-
41	Mar. 8	Non-Fatty Solids 8.54 per cent. Milk Fat ... 1.65 " Water ... 89.81 " <u>100.00</u> "	"	Samples 41, 50, and 51 relate to the milk from one farm. The deficiency in milk fat was traced to the farm where it was found that a big proportion of the cows were newly calven, and that the morning's milk was below the standard in fat.
50	Mar. 18	Non-Fatty Solids 8.80 per cent. Milk Fat ... 2.10 " Water ... 89.10 " <u>100.00</u> "	"	
51	Mar. 18	Non-Fatty Solids 8.79 per cent. Milk Fat ... 2.54 " Water ... 88.67 " <u>100.00</u> "	"	The farmer took steps immediately to improve his milk and proceedings were not instituted.

Samples of milk were run through cotton wool discs, and in several cases a considerable amount of dirt was shown.

It was decided, therefore, to send to the Nottingham City Laboratory for a bacterial count of some of our milk. Five samples were sent, and below are extracts from the reports :

Sample No.	Number of cows from which milk was taken	Number of Micro-organisms per cubic centimeter.	T.B.	B. Coli.
1	4	40,000	Not Found	In 0.01 c.c.
2	3	32,000	" "	1.0 c.c.
3	16	867,000	" "	0.0001 c.c.
4	Shop mixed	56,000	" "	0.01 c.c.
5	15	259,000	" "	0.001 c.c.

Judged by the standard required for Grade A milk these samples must be considered bad, particularly numbers 3 and 5. It is to be noted that no tubercle bacilli were found.

Prevalence of, and Control over, Infectious Diseases.

INFECTIOUS DISEASES GENERALLY.

There was a marked diminution in the number of Scarlet Fever cases notified, as compared with any year in the last decade.

The disease was mild, and there were no deaths.

Diphtheria was somewhat more prevalent, and accounted for nine deaths.

NOTIFIABLE DISEASES.	NUMBER OF CASES NOTIFIED.							
	At all Ages—Years.							
	At all ages.	Under 1.	1 to 5.	5 to 15.	15 to 25	25 to 45.	45 to 65.	65 and upwards.
Small Pox .....	...	...	...	..	...	...	...	...
Cholera (C) Plague (P).....	...	...	...	...	...	...	...	...
Diphtheria (including Membranous croup)	99	...	21	65	6	7	...	...
Erysipelas	16	...	1	1	3	4	5	2
Scarlet Fever	37	1	7	23	4	2	...	...
Typhus Fever.. .....	...	...	...	..	..	...	...	...
Enteric Fever.....	1	...	...	...	1	..	...	...
Relapsing Fever (R) Continued Fever (C) .....	...	...	...	...	...	...	...	...
Puerperal Fever.....	1	...	...	...	...	1	...	...
Cerebro-spinal Meningitis..	2	...	...	...	...	2	...	...
Poliomyelitis .....	...	...	...	...	...	...	..	...
Ophthalmia Neonatorum.....	3	3	...	...	...	...	...	...
Pulmonary Tuberculosis	71	...	1	8	14	37	10	1
Other forms of Tuberculosis.....	15	1	2	2	5	4	1	...
Malaria	2	...	...	...	2	..	...	...
Encephalitis Lethargica	5	1	...	...	...	4	...	...
Pneumonia (All Forms)	6	...	..	2	3	...	1	...
TOTALS	258	6	32	101	38	61	17	3

There was one death from Measles, and nine from Whooping Cough.

There were twelve deaths from Influenza, which again existed in sporadic fashion, but was not epidemic.

There were five notifications of Encephalitis Lethargica.

One case of Typhoid Fever was notified and removed to Hospital; the notification was afterwards withdrawn, as the case was discovered to be Pneumonia. Complete recovery was made.

SCARLET FEVER.

During 1921 there were 37 cases of Scarlet Fever notified in the City, as compared with 90 cases in 1920.

The number of cases notified in each year for the past ten years is given below:—

1912— 97	1917—148
1913— 92	1918—133
1914—170	1919—100
1915—119	1920— 90
1916—119	1921— 37

Twenty-one of the notified cases were removed to the City Hospital.

DIPHTHERIA.

The case mortality has been somewhat higher as compared with previous years.

Contacts of notified cases have been swabbed, especially as regards school children, and the services of the Bacteriological Laboratory were placed at the disposal of practitioners in the City, both for diagnosis and the discovery of possible carriers.

Ninety-nine cases of Diphtheria were notified during 1921, as compared with 128 notifications in 1920.

Nine deaths resulted from this cause, giving a case mortality of 9.1 per cent.

1909 case mortality	11.0	1915 case mortality	19.6
1910 „ „	8.5	1916 „ „	5.1
1911 „ „	6.9	1917 „ „	9.6
1912 „ „	2.4	1918 „ „	6.5
1913 „ „	4.4	1919 „ „	8.3
1914 „ „	9.4	1920 „ „	6.9
		1921 „ „	9.1

The notifications received during the last ten years are as follows :—

1911—145	1916— 78
1912—122	1917— 52
1913— 67	1918— 61
1914— 95	1919— 72
1915— 56	1920—128
	1921— 99

Eighty of the cases were removed to the City Hospital.

ENCEPHALITIS LETHARGICA.

Five cases of Encephalitis Lethargica were notified during the year, one in January, one in February, one in April, one in June, and one in December.

The first case was a male of 39 years, who was removed to the City Hospital a week after on-set of symptoms, which were head-ache and drowsiness with slight rise of temperature. The case subsequently ran a mild course and the patient made a good recovery, and was discharged from Hospital with no complications. He was unwilling to have lumbar puncture performed.

The second case was a nurse in a Nursing Home, who had mild symptoms, and ultimately made a complete recovery. No pathological specimens were available.

The third case was a child of ten months, who died a few hours after notification. No bacteriological material available.

The fourth case was a married woman, aged 36 years, who died on the date of notification, having been just previously removed to the County Hospital. The family were unwilling for a post-mortem.

The final case was a woman, aged 29 years, who was notified one day before her death. She developed slight ptosis and squint of left eye, and complained of drowsiness and head-ache, and then rapidly became semi-unconscious, and died as stated.

Unfortunately, in this case also no post-mortem was permitted.

There was apparently no connection between these several cases, and as will have been noticed, they occurred at different periods of the year.

Pulmonary Tuberculosis.

Under the Tuberculosis Regulations, 1912, 71 cases of Phthisis were notified.

The total number of deaths from Phthisis in 1921 was 51, and equivalent to a death-rate of .77 per 1,000.

Year	Est. Pop.	Deaths	D.R. per 1000	Year	Est. Pop.	Deaths	D.R. per 1000
1907	53,341	68	1.38	1915	55,226	55	.99
1908	54,017	68	1.30	1916	55,079	55	.99
1909	54,765	63	1.18	1917	58,617	65	1.10
1910	55,474	45	.85	1918	60,707	64	.95
1911	57,285	60	1.40	1919	60,581	57	.94
1912	58,358	56	.96	1920	63,655	47	.72
1913	59,322	57	.96	1921	66,600	51	.77
1914	60,172	44	.73				

FORMS OF TUBERCULOSIS OTHER THAN PHTHISIS.

There were 15 cases notified under the above head, giving the following classification:—

Tuberculosis of Glands in Neck	...	...	6
„ „ Joints	...	...	3
„ „ Bone	...	...	1
„ „ Peritoneum and Mesentery			
Glands	...	...	4
„ „ Epididymus	...	...	1
			—
Total	...		15
			—

Administration and Control over Tuberculosis.

DISPENSARY AND SANATORIA.

Full particulars under this heading were given in last year's report.

The Tuberculosis Nursing Staff paid 168 primary visits to patients during the year, and 5,123 re-visits to patients in their own Homes.

Forty-four cases of advanced disease, requiring special nursing attention were transferred to the Lincoln District Nursing Association,

During the year 145 males and 61 females attended the Tuberculosis Dispensary, making a total of 2,449 attendances.

The number of deaths due from Phthisis still form a large proportion of the cases notified. I have already previously discussed some of the causes of this.

Venereal Disease.

The scope of the Corporation activities in this particular have already been fully set forth last year.

Propaganda lectures have been arranged during the past year, under the auspices of the Health Committee.

Dr. White gave a lecture to men in which great interest was shown, and it is hoped that further lectures will be given on the same lines during 1922.

I give below the statistics for 1921 :—

Number of patients who attended the Clinic from 1st January, 1921, to 31st December, 1921, are :—

Males	...	...	...	119
Females	...	...	...	37
Children	...	...	...	23
				—
Total	...	...	...	179
				—

Total number of attendances at the Clinic, 4,007.

Pathological specimens examined at the Clinic ... 99
 " " sent to the Nottingham

Laboratory :—

Gonococcus, Spiro-Chætes and other organisms	...	...	...	15
Wasserman Tests	...	...	...	291
				—
				306
				—
Specimens Total	...	...	...	405
				—

Injections of Salvarsan Substitutes ... 916

Midwives' Act.

Eight Midwives gave notification of their intention of practising during the year.

Sixteen records of sending for medical help were notified to the Maternity and Child Welfare Department, in accordance with the requirements of the Central Midwives' Board, also 26 still births were notified.

Twenty-eight visits of inspection to Midwives were made, re their house, bag and appliances.

City of Lincoln Maternity and Child Welfare Department.

Annual Report, 1921.

Notification of Births' Act, 1907 and 1915.

Births registered	1526
Notices sent out re notification of births ...	182

Birth enquiry visits.	Revisits under					Revisits to Illegitimate Children.	Special Visits.	Total.
	1 year.	2 years.	3 years.	4 years.	5 years.			
1445	1927	2077	274	45	24	57	370	6219

Of the notified births visited 1,053 were breast fed, and 392 artificially fed.

The following unsatisfactory Housing Conditions were found at the visits:—

Houses where parents were in lodgings...	149
„ with two families or more occupying separate rooms	402
„ over-crowded	46
„ „ and dirty	25
„ damp	11
„ with unsuitable food storage accommodation	69
„ with no through ventilation ...	78
„ Infested with vermin	3

Sanitary Defects.

No ashes bins	...	...	...	...	36
Defective ashes bins	...	...	...	...	89
„ water closets	...	...	...	...	36
„ drains	...	...	...	...	23
Houses in bad repair	...	...	...	...	281
Various defects	...	...	...	...	54
					— 519

<i>Infantile Death Enquiries</i> :—Number notified	...	...	...	...	128
Number of deaths investigated	...	...	...	...	118
Died in Institutions (not investigated)	...	...	...	...	10
„ shortly after birth	...	...	...	...	35
Breast fed	...	...	...	...	23
Artificially fed	...	...	...	...	33
Breast and artificially fed	...	...	...	...	18
Proprietary foods	...	...	...	...	9
					— 128

Conditions not favourable to infant hygiene found at above enquiries :—

Houses with unsuitable food storage accommodation	...	...	...	...	25
Houses with no through ventilation	...	...	...	...	12
„ dirty and ill-kept	...	...	...	...	7
„ over-crowded	...	...	...	...	5
„ with two families	...	...	...	...	2
					— 51

Maternity and Infant Welfare.

Full information was provided in last year's Annual Report. The statistical details for 1921 are given below :—

INFANT CLINIC.

Infant Consultations.

Number of children on the Register	...	...	...	...	2299
					Total Number of Attendances made.
At the Clinic	...	...	...	...	12932
Medical „	...	...	...	...	2379

No. of Babies first visits.					No. of visits by babies who have previously attended.					Attendances of Kes-teen Babies	Total.
Under 1 yr.	Under 2 yr.	Under 3 yrs.	Under 4 yrs.	Under 5 yrs.	Under 1 yr.	Under 2 yrs.	Under 3 yrs.	Under 4 yrs.	Under 5 yrs.		
855	130	47	6	9	4721	3780	865	284	120	115	10,932

The infants attending during the year have been classified according to physical conditions:—

Children normal. General advice given.	Suffering as a result of incorrect feeding. Advised and visited by H.V.'s.	Suffering from some defect or disease, and seen by Doctor.
805	207	1,287

The following list shows the diseases from which the children seen by the Doctor were suffering:—

Diseases.	Cases attended.	No. of attendances made.
Wasting	10	188
Rickets	15	191
Minor Ailments	592	770
Skin ,,	143	381
Chronic Diseases	7	7
Tubercular ,,	10	10
Bronchitis	18	18
Phimosis	179	260
Hernia	12	16
Discharging Ears	35	143
Ophthalmia	6	20
Convulsions	15	35
Flatulence	49	69
Diarrhoea	67	111
Jaundice	6	15
Adenoids	14	31
Tongue Tie	5	10
Normal	104	104
	1,287	2,379

Of the 1,287 cases seen by the Doctor:—

Treated at the Clinic	1052
Referred to County Hospital	79
,, ,, District Nursing Association	68
,, ,, Private Doctor	55
,, ,, Dispensary	33
	1287

Municipal Midwifery Service and Maternity Home.

Anti-natal Clinics. Two are held weekly.

	Number of cases attended at Clinic.		Total number of attendances made.	
Maternity Home	77	...	113
District	39	...	69
		116		182

	Number of cases visited at their home,		Total number of visits made.	
Maternity Home	87	...	125
District	67	...	173
		154		298

The 116 cases on the register seen at the Clinic have been classified according to physical conditions:—

Normal—General advice given	50
Treated at the Clinic	13
,, ,, their own home	22
Transferred to Maternity Home	26
,, ,, County Hospital	1
Referred to Private Doctor	4

Living-in Cases.

Cases attended—Maternity Home	220
District	383
	603

		Compl. cases in which a Doctor was called in.		Death of Mother.		Infant.		Still-born.		Transferred from District to M.H.	M.H. to District
M.H.	20	1	...	4	...	7	...	13	...	10	
District	15	1	...	—	...	10	...		...
	35	2	...	4	...	17	...		...

Maternity Home.

Patients still in the Home on 1st December, 1921...	12
Number of cases in Home attended by private doctor	5

Pupil Midwives

19 Pupils have completed their training during the year, and entered for the Central Midwives' Board Examination.

Ailing Babies admitted to Maternity Home for Treatment.

Number of cases admitted	9
Number of cases discharged:—	
(a) In good health	3
(b) Improved	3
(c) No improvement	1
(d) Died	2

NECESSITOUS CASES.

Home Helps.

Number of families supplied with Home Helps...	93
--	----

Home Nursing.

Families supplied	23
--------------------------	----

Midwifery Assistance.

Cases receiving help towards midwifery fees ...	209
---	-----

Food and Milk.

Expectant Mothers supplied	519
Nursing Mothers supplied... ..	491
Children under five years of age supplied ...	1040

SCHOOL FOR MOTHERS.

The School for Mothers is entirely conducted by voluntary workers.

There are on the Register... ..	36
Attendances made	418

Sewing demonstrations and lectures on hygiene and cooking are given.

Voluntary workers assisting at the Centre	34
Attendances made	348
Callers at Office other than mothers and babies	1503

PUERPERAL FEVER, OPHTHALMIA AND INFANTILE INFECTIONS.

One case of Puerperal Sepsis was notified during the year by a Medical Practitioner. Unfortunately, death ensued.

Three cases of Ophthalmia Neonatorum were notified, one by a Medical Man and two by Midwives.

The first was notified on the 3rd February, and had recovered by the 23rd of that month.

The second was notified on the 23rd April, and was ultimately reported well about the 20th July, the third was notified on November 10th, and had recovered by the 23rd December.

All these cases were visited by the Corporation Health Visitors, and nursing treatment also undertaken by them.

One hundred and seventeen visits were paid to these three cases, under the supervision of the Medical Officer of Health.

Sanitary Administration.

STAFF.

The adequacy of the Staff and the accommodation of the Health Offices were fully discussed last year.

There has been no alterations during 1921.

Hospital Accommodation.

CITY HOSPITAL AND DAWBER SANATORIUM PAVILIONS.

The horse ambulance and van which have been in use for many years have been replaced by motor vehicles, giving very great improvement of efficiency and administration.

The motor ambulance was available on 14th September, 1921.

The general lines of Sanatorium treatment was the same as described in last year's report.

The painting of the Administrative Block and the Hospital Pavilions was undertaken during the year. The Enteric Fever Pavilion was not available for Phthisis patients for a very considerable period, and the number of Phthisis patients treated was, therefore, less than in 1920.

In conclusion, I should like again to acknowledge the great assistance given by Miss O'Kane, the Matron, and Dr. Bery, the Resident Medical Officer, in their endeavours to maintain a high standard of efficiency in every department of the Hospital and Sanatorium.

CITY HOSPITAL.

(DAWBER SANATORIUM PAVILION).

Forty-two cases remained in at the end of 1920.

One hundred and fifty-seven cases were admitted during the year, fifty-eight of these being Discharged Soldiers.

Twenty-three cases remained in at the end of 1921.

One hundred and sixty-four cases were discharged, and twelve died in Hospital.

(FEVER PAVILIONS).

One hundred and fifty-one cases were under treatment in the City Hospital Pavilions during 1921, twenty-four of these cases remaining in from 1920.

Record of admissions during 1921 :—

Diphtheria.	Scarlet Fever.	Enteric Fever.	Anthrax.	Encephalitis Lethargica.	Cerebro-Spinal Fever.
88	30	4	1	1	2
Pneumonia.					
1					

Of the above cases, 22 were admitted from outside authorities, classified as follows :—

Diphtheria.	Scarlet Fever.	Enteric Fever.	Anthrax
8	9	4	1

Bacteriological and Chemical Analysis.

BACTERIOLOGICAL LABORATORY.

EXAMINED.	Positive.	Negative	Total
Diphtheria (Swabs)	86	550	636
Tuberculosis (Sputum)	180	428	608
Enteric (Widal Test)	1	5	6
Anthrax (Blood) ... ..	...	1	1
Ringworms (Hair)	111	106	217
Other examinations	13	21	34
Totals	391	1,111	1,502

Housing.

Three hundred and twenty new houses have come into assessment, of which 225 were part of the Municipal Housing Scheme.

The number of inhabited houses on December 31st, 1921, was 16,179.

In last year's report reference was made to an application for permission to build a further 100 houses on the St. Giles' Estate, in order to meet the demand, and to relieve the overcrowding of the City. Permission was obtained in due course. At the present time 50 houses are in the course of erection, 38 of them being the non-parlour type.

The problem of over-crowding, however, is not one of shortage of houses only. Unemployment and the lack of means to pay the rent of larger houses is causing some of our artizan class with growing families to remain in dwellings which are totally inadequate.

Cases have come to my notice where eight and ten people are living in two-roomed cottages. In other cases two and sometimes three families are living in houses with not more than two or three bedrooms.

In some cases there is not sufficient money coming into the home to warrant them in looking for a larger house, and while landlords have the choice of tenants, the person with a big family has great difficulty in being accepted.

At the present time there are 20 houses vacant at the Swanpool Garden City, and there are also a few of the Ministry of Munitions houses at St. Giles' unoccupied.

It is somewhat difficult to account for these houses being empty. On the Swanpool Garden City the houses are 13s. per week, plus the rates, and they are not on the inclusive rental principle, which persons having a weekly income seem to require. In addition, there is no gas or any public lighting provided for these houses.

There has not been that gradual upward movement which it was hoped would take place when Municipal houses became available. It was expected that those who could pay 15s. or 18s. per week would vacate houses, which would become available for persons with a lesser income, whose families were getting too large for the house they were living in.

The position which now obtains is that some of the smaller houses are so over-crowded as to be dangerous to the health of the inhabitants, and we have no immediate remedy which can be applied to these cases.

Appendices.

HOUSING CONDITIONS. STATISTICS.

Number of new houses erected during the year :—

(a) Total	320
(b) As part of a Municipal Housing Scheme	225

1. UNFIT DWELLING-HOUSES.

(1) INSPECTION.—Total number of dwelling-houses inspected for housing defects (under Public Health or Housing Acts)	212
(2) Number of dwelling-houses which were inspected and recorded under the Housing (Inspection of Districts) Regulations, 1910	293
(3) Number of dwelling-houses found to be in a state so dangerous and injurious to health as to be unfit for human habitation	4
(4) Number of dwelling-houses (exclusive of those referred to under the preceding sub-heading) found not to be in all respects reasonably fit for human habitation.	0

2. REMEDY OF DEFECTS WITHOUT SERVICE OF FORMAL NOTICES.

Number of defective dwelling-houses rendered fit in consequence of informal action by the Local Authority or their Officers	0
---	---

3. ACTION UNDER STATUTORY POWERS.

(A) Proceedings under Section 28 of the Housing, Town Planning, &c., Act, 1919.

(1) Number of dwelling-houses in respect of which notices were served requiring repairs	0
(2) Number of dwelling-houses which were rendered fit :—	
(a) By owners	0
(b) By Local Authority in default of owners	0
(3) Number of dwelling-houses in respect of which Closing Orders became operative in pursuance of declarations by owners of intention to close	0

(B) Proceedings under Public Health Acts.

(1) Number of dwelling-houses in respect of which notices were served requiring defects to be remedied	516
(2) Number of dwelling-houses in which defects were remedied :—	
(a) By owners	482
(b) By Local Authority in default of owners	0

(C) Proceedings under Sections 17 and 18 of the Housing, Town Planning, &c., Act, 1909.

(1) Number of representations made with a view to the making of Closing Orders	0
(2) Number of dwelling-houses in respect of which Closing Orders were made	4
(3) Number of dwelling-houses in respect of which Closing Orders were determined, the dwelling-houses having been rendered fit	0
(4) Number of dwelling-houses in respect of which Demolition Orders were made	0
(5) Number of dwelling-houses demolished in pursuance of Demolition Orders	0

RAINFALL

1921	Total Depth in inches	Greatest Daily Fall		No. of Rainy Days
		Depth	Date	
January	1.75	.36	1st	17
February .. .. .	.14	.09	25th	4
March .. .. .	.63	.18	19th	15
April	1.02	.32	13th	12
May	1.86	.66	7th	14
June .. .. .	.53	.25	26th	8
July .. .. .	.33	.09	25th	7
August	3.16	1.18	11th	14
September .. .. .	.67	.20	9th	7
October	1.49	.86	3rd	7
November	1.65	.55	3rd	11
December	1.47	.51	24th	19
Total, 1921.. ..	14.70			135
Total, 1920.. ..	24.74			178

RAINFALL, 1895 TO 1921.

Year	Inches	Year	Inches	Year	Inches	Year	Inches
1895	24.27	1902	21.43	1909	27.24	1916	26.69
1896	26.50	1903	29.53	1910	24.83	1917	20.80
1897	26.29	1904	19.72	1911	18.88	1918	21.12
1898	20.59	1905	18.22	1912	27.76	1919	24.98
1899	26.57	1906	23.53	1913	19.80	1920	24.74
1900	27.01	1907	24.47	1914	20.42	1921	14.70
1901	23.01	1908	20.75	1915	27.52		

