

**Report of the Commission of Public Health to the Minister of Public Health /
Department of Public Health, Victoria.**

Contributors

Victoria. Commission of Public Health.

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1946.

VICTORIA.

DEPARTMENT OF HEALTH.

TWENTY-FOURTH REPORT

COMMISSION OF PUBLIC HEALTH

MINISTER OF HEALTH.



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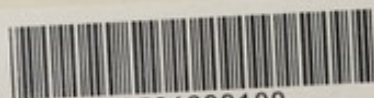
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NOTE.—Although Dr. Featonby was Chairman of the Commission throughout the year 1945-46, he has since resigned. His duties as Chairman have been taken over by Dr. C. R. Merrillees, F.R.C.S.E., L.R.C.P. et S.E., D.P.H.

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TWENTY-FOURTH REPORT OF THE COMMISSION OF PUBLIC HEALTH, 1945-1946

To the Honorable W. P. Barry, M.L.A., Minister of Health.

SIR,

We have the honor to submit, in accordance with the provisions of section 13 (3) of the Health Act 1928, our Report for the year ending 30th June, 1946.

SUMMARY OF VITAL STATISTICS, VICTORIA, 1945

CONTENTS.

	1945			1944			1943
	Marriages	Deaths	Births	Marriages	Deaths	Births	Births per 1,000 of Population
REPORT OF THE COMMISSION.	10,704	12,262	47,711	11,465	13,110	48,417	18.47
APPENDICES—	10,704	12,262	47,711	11,465	13,110	48,417	18.47
A. Report of the Director of Maternal, Infant, and Pre-school Welfare.							
B. Report of the Director of Tuberculosis.							
C. Report of the Engineer.							
D. Report of the Industrial Hygiene Division.							
E. Report of the Pure Food Division.							
F. Report of the Venereal Diseases Division.							
G. Work of the Analytical Laboratory.							
H. Reports of District Health Officers.							
I. Legislation, Regulations, Proclamations.							
J. Private Hospitals.							

MARRIAGES

Marriages in Victoria in 1945 compared 1940.

Year	Marriages	Deaths	Births	Births per 1,000 of Population
1945	10,704	12,262	47,711	18.47
1944	11,465	13,110	48,417	18.47
1943	11,465	13,110	48,417	18.47
1942	11,465	13,110	48,417	18.47
1941	11,465	13,110	48,417	18.47
1940	11,465	13,110	48,417	18.47

The 1941 figure is the lowest recorded in the history of the State.

The marriage rate of 18.47 per 1,000 of population in 1942 was the highest in recent years.

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To the Honorable W. P. Barry, M.L.A., Minister of Health.

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We have the honour to submit, in accordance with the provisions of section 13 (3) of the *Health Act* 1928, our Report for the year ending 30th June, 1946.

SUMMARY OF VITAL STATISTICS, VICTORIA, 1945.

Division.	Number of—				Rate per 1,000 of Population.			Infantile Mortality.
	Marriages.	Births.	Deaths.	Deaths under One Year.	Marriage.	Birth.	Death.	Deaths under One Year per 1,000 Births.
Greater Melbourne	..	23,706	12,282	637	..	19·93	10·33	26·87
Remainder of the State	..	17,494	8,214	518	..	21·23	9·97	29·61
Victoria	16,501	41,200	20,496	1,155	8·20	20·46	10·18	28·03

BIRTHS.

The following table shows the birth rates from 1855 to 1945 :—

Period.	Average Annual Births.	Rate per 1,000 of Population.	Period.	Average Annual Births.	Rate per 1,000 of Population.
1855-59	17,154	38·49	1934	27,828	15·20
1860-64	24,060	43·29	1935	27,884	15·16
1865-69	25,963	39·77	1936	28,883	15·63
1870-79	26,971	34·60	1937	29,731	16·02
1880-89	30,113 *	31·45	1938	30,344	16·25
1890-99	34,310	29·37	1939	30,493	16·20
1900-09	30,655	24·92	1940	31,962	16·86
1910-19	33,800	24·27	1941	34,406	17·76*
1920-29	35,457	21·77	1942	35,927	18·27*
1930	33,127	18·55	1943	39,117	19·74*
1931	30,332	16·86	1944	39,358	19·70*
1932	27,464	15·18	1945	41,200	20·46*
1933	28,392	15·59			

MARRIAGES.

Marriages in Victoria in 1945 numbered 16,501.

Period.	Marriage Rate per 1,000 of Population.	Period.	Marriage Rate per 1,000 of Population.
1931	5·66	1939	9·23
1932	6·49	1940	11·76
1933	6·96	1941	10·79*
1934	7·57	1942	12·02*
1935	8·38	1943	9·26*
1936	8·61	1944	8·94*
1937	8·74	1945	8·20*
1938	9·16		

* All population figures since 1940 are subject to revision. Consequently all rates are provisional.

The 1931 figure is the lowest recorded in the history of the State.

The marriage rate of 12·02 per 1,000 of population in 1942 was the highest on record.

DEATHS.†

The number of civilian deaths in 1945 was 20,496, and the death rate per 1,000 of population in 1945 was 10·18.*

Period.	Average Annual Number of Deaths.	Rate per 1,000 of Mean Population.	Period.	Average Annual Number of Deaths.	Rate per 1,000 of Mean Population.
1870-79	12,133	15·50	1935	18,456	10·03
1880-89	14,510	15·13	1936	18,778	10·16
1890-99	16,618	14·21	1937	18,613	10·03
1900-09	15,194	12·38	1938	18,955	10·15
1910-19	15,994	11·47	1939	20,169	10·72
1920-29	16,524	10·03	1940	20,293	10·70
1930	15,959	8·93	1941	20,416	10·54*
1931	17,033	9·47	1942	21,973	11·18*
1932	16,805	9·29	1943	21,327	10·76*
1933	17,456	9·59	1944	20,502	10·26*
1934	18,648	10·18	1945	20,496	10·18*

* All population figures since 1940 are subject to revision. Consequently, all rates are provisional.

† Excludes deaths of Defence personnel and of Internees and Prisoners of War from overseas.

PRINCIPAL CAUSES OF DEATH.

Cause of Death.	Deaths per Million of Population.									
	1908-12.	1937.	1938.	1939.	1940.	1941.	1942.*	1943.*	1944.*	1945.*
Tuberculosis (all forms)	1,037	435	409	450	428	449	442	375	377	363
Cancer	838	1,267	1,266	1,332	1,332	1,379	1,355	1,378	1,331	1,366
Diabetes	107	164	199	206	202	213	212	219	208	208
Heart diseases (including the conditions producing diseases of the heart) †	1,141	2,103	2,150	2,663	2,720	2,766	2,107	3,069	3,020	3,151
Pneumonia and broncho-pneumonia	834	620	628	638	726	678	730	697	576	558
Enteritis and diarrhoeal disease	833	81	81	111	73	58	84	85	66	53
Nephritis, acute and chronic	576	606	589	701	703	680	687	676	639	646
Accidental violence	531	565	559	658	529	497	467	379	390	333
Diphtheria	122	28	19	22	14	36	24	24	17	19

* All population figures since 1940 are subject to revision. Consequently, all rates are provisional.

† Increase due to form of certification of death having been changed in recent years.

MATERNAL DEATHS.

Period.	Average Annual Number of Deaths from—						Rate per 10,000 Live Births from—					
	Puerperal Infection.			Other Diseases of Pregnancy, Childbirth, and the Puerperium. (Detailed List No. 141-146, 148-150).	Total.		Puerperal Infection.			Other Diseases of Pregnancy, Childbirth, and the Puerperium.	Total.	
	Infection during Childbirth and the Puerperium. (Detailed List No. 147).	Post-abortion Infection. (Detailed list No. 140).			Including Criminal Abortion.	Excluding Criminal Abortion.	Infection during Childbirth and the Puerperium. (Detailed List No. 147).	Post-abortion Infection. (Detailed list No. 140).			Including Criminal Abortion.	Excluding Criminal Abortion.
		Spontaneous, Therapeutic, or Unspecified.	Criminal Abortion.					Spontaneous, Therapeutic, or Unspecified.	Criminal Abortion.			
1871-1880 ..	46			127	173		17·12			47·26	64·38	
1881-1890 ..	64			121	185		20·48			38·71	59·19	
1891-1900 ..	66			117	183		20·20			35·81	56·01	
1901-1910 ..	52			114	166		16·93			37·12	54·05	
1911-1920 ..	53			94	147		15·42			27·35	42·77	
1921-1925 ..	43			102	145		11·96			28·37	40·33	
1926-29 ..	44	12	21	121	198	177	12·78	3·46	5·92	34·66	57·02	51·10
1930-34 ..	33	9	27	91	160	133	11·08	3·13	9·17	30·99	54·37	45·20
1935-39 ..	18	6	41	74	139	98	5·97	1·90	14·05	25·25	37·17	33·12
1940 ..	19	1	50	58	128	72	5·95	0·31	15·64	18·15	40·05	22·53
1941 ..	23	1	44	57	125	79	6·68	0·29	12·79	16·57	36·33	22·96
1942 ..	20	1	29	59	109	77	5·57	0·28	8·07	16·42	30·34	21·43
1943 ..	23	5	39	69	136	93	5·88	1·28	9·97	17·64	34·77	23·77
1944 ..	11	4	17	69	101	81	2·79	1·02	4·32	17·53	25·66	20·58
1945 ..	14	2	12	50	78	63	3·40	0·48	2·91	12·14	18·93	15·29

NOTE.—Owing to changes in classification the maternal death rates given for years prior to 1940 are not strictly comparable with those for subsequent years.

INFANT MORTALITY.

(Deaths under One Year.)

Period.	Mortality Rate per 1,000 Births.			Period.	Mortality Rate per 1,000 Births.		
	Metropolitan Area.	Rest of State.	Victoria.		Metropolitan Area.	Rest of State.	Victoria.
1880-84 ..	170.1	92.3	120.0	1933 ..	40.9	40.0	40.4
1885-89 ..	178.5	97.9	133.3	1934 ..	48.2	41.4	44.6
1890-94 ..	140.4	94.9	114.7	1935 ..	43.0	39.5	41.2
1895-99 ..	131.5	100.0	112.5	1936 ..	44.1	40.7	42.3
1900-04 ..	116.5	86.2	98.2	1937 ..	37.1	36.3	36.7
1905-09 ..	96.5	71.5	81.2	1938 ..	34.1	34.3	34.2
1910-14 ..	84.2	64.9	73.8	1939 ..	32.3	38.9	35.6
1915-19 ..	76.2	55.4	66.1	1940 ..	39.7	39.2	39.5
1920-24 ..	71.6	58.6	65.3	1941 ..	34.6	38.1	36.2
1925-29 ..	58.3	50.2	54.3	1942 ..	43.8	38.9	41.6*
1930 ..	50.7	42.3	46.5	1943 ..	34.1	38.2	35.8
1931 ..	48.0	41.1	44.7	1944 ..	31.0	33.3	32.0
1932 ..	47.7	38.9	43.0	1945 ..	26.9	29.6	28.0

* The high infant mortality rate for 1942 can be ascribed mainly to whooping cough.

Details will be found in the report of the Director of Infant Welfare.

CANCER.

The cancer death rate has remained at approximately the new high level since 1939.

NOTIFIABLE DISEASES.

DISEASES DECLARED NOTIFIABLE.

Anchylostomiasis, Anthrax, Bilharziasis, Cholera, Cerebro-spinal Meningitis, Diphtheria, Dysentery (bacillary), Dysentery (amoebic), Encephalitis (lethargic), Helminthiasis, Hydatids, Leprosy, Malaria, Plague, Poliomyelitis, Polioencephalitis, Poliomyelitis, Psittacosis, Puerperal Fever, Scarlet Fever, Smallpox, Tetanus, Trachoma, Tuberculosis, Typhoid Fever, Paratyphoid Fever, Typhus Fever, Undulant Fever, Yellow Fever.

RETURNS FROM MUNICIPAL DISTRICTS FOR THE YEAR ENDING 31st DECEMBER, 1945.

Municipal District.	Population.*	Diphtheria.	Scarlet Fever.	Typhoid.	Tuberculosis.	Cerebro-Spinal Meningitis.	Poliomyelitis.	Malaria.
METROPOLITAN AREA.								
Box Hill	19,850	4	18	..	6	1	2	3
Braybrook	12,750	5	24	..	2	4	..	5
Brighton	38,400	2	74	..	11	1	3	18
Brunswick	58,200	24	81	..	13	5	3	32
Camberwell	71,800	15	107	..	15	4	15	30
Caulfield	80,500	15	151	1	17	3	6	28
Chelsea	8,000	2	14	..	2	1	1	4
Coburg	47,550	19	60	1	22	2	6	20
Collingwood	30,900	24	17	..	9	1	1	14
Essendon	51,400	5	78	..	17	..	4	18
Fitzroy	31,700	25	37	..	14	7	4	21
Footscray	62,500	138	97	1	15	4	5	23
Hawthorn	40,500	22	49	1	12	3	3	30
Heidelberg	31,300	21	38	..	18	1	8	7
Kew	32,200	7	15	3	18	1	1	20
Malvern	48,550	8	66	..	19	6	10	21
Melbourne	102,700	36	76	1	24	10	3	45
Moorabbin	24,700	6	35	..	5	3	7	11
Mordialloc	12,150	..	15	1	..	..	..	..
Northcote	45,850	18	68	2	17	2	8	32
Nunawading	7,600	4	19	..	2	..	..	..
Oakleigh	14,150	58	10	..	6	..	1	11
Port Melbourne	14,350	5	27	..	7	1	6	5
Prahran	59,750	35	57	..	33	4	2	46
Preston	39,500	12	68	..	8	4	6	23
Richmond	41,750	42	43	..	12	1	2	23
Sandringham	23,100	..	33	..	2	..	5	..
South Melbourne	45,150	42	37	1	16	2	3	15
St. Kilda	55,200	12	55	..	19	1	4	48
Williamstown	25,550	4	29	..	9	1	2	7

RETURNS FROM MUNICIPAL DISTRICTS FOR THE YEAR ENDING 31ST DECEMBER, 1945.--continued.

Municipal District	Population.*	Diphtheria.	Scarlet Fever.	Typhoid.	Tuberculosis.	Cerebro-Spinal Meningitis.	Folio-myelitis.	Malaria.
REST OF STATE.								
<i>Cities.</i>								
Ballaarat	37,650	4	24	..	15	..	1	2
Bendigo	26,950	25	79	..	18	..	1	..
Geelong	17,590	10	27	..	3	1	2	..
Geelong West	14,700	..	29	..	2	..	2	..
Mildura	7,500	10	34	..	5	1	1	..
Warrnambool	9,300	1	8	..	6	1	..	..
<i>Towns.</i>								
Ararat	5,050	2	4	..	1	..	1	..
Hamilton	6,100	16	12	..	1	..	1	3
Horsham	5,600	5	2	..	2	..	..	..
Newtown and Chilwell	8,890	2	17	..	5	..	..	..
Sale	5,000	2	1	..	2	1	4	..
<i>Boroughs.</i>								
Castlemaine	5,750	..	18	..	4	..	..	..
Clunes	1,170	..	1	..	1	..	..	..
Colac	5,630	..	7	..	1	3	..	..
Daylesford	2,660	..	12	..	..	..	..	..
Eaglehawk	3,850	4	10	..	1	..	..	..
Echuca	4,480	..	8	..	3	1	..	..
Inglewood	1,020	..	..	..	..	..	..	..
Koroit	1,690	..	..	..	..	..	1	..
Maryborough	5,900	1	2	..	1	2	..	..
Port Fairy	1,880	..	..	..	1	..	..	..
Portland	2,600	..	6	..	1	..	..	1
Queenscliffe	2,010	..	10	..	..	..	..	..
Ringwood	3,210	..	4	..	4	..	..	1
Sebastopol	1,820	..	..	..	..	..	1	..
Shepparton	6,250	18	41	..	1	..	8	..
Stawell	4,930	..	4	..	..	..	..	..
St. Arnaud	3,210	1	15	..	..	..	1	..
Swan Hill	4,950	3	6	..	1	..	..	..
Wangaratta	5,400	..	18	..	10	..	..	..
Wonthaggi	6,350	..	6	..	1	..	2	..
<i>Shires.</i>								
Alberton	6,010	..	5	..	1	..	..	..
Alexandra	3,570	..	24	..	..	..	..	..
Arapiles	2,300	..	..	..	..	..	..	..
Ararat	5,620	..	1	..	..	..	1	..
Avoca	3,080	..	3	..	..	..	..	..
Avon	2,690	2	..	..	..	..	1	..
Bacchus Marsh	3,510	..	8	..	1	..	1	..
Bairnsdale	8,120	5	4	..	1	..	1	..
Ballan	2,880	..	1	..	..	..	..	..
Ballarat	4,260	..	8	5	2	..	..	..
Bannockburn	2,370	..	1	..	..	..	..	..
Barrabool	1,970	..	2	..	..	..	1	..
Bass	4,560	3	9	..	..	..	1	..
Beechworth	4,770	..	1	..	..	..	1	..
Belfast	2,190	..	1	..	..	..	..	..
Bellarine	3,900	..	1	..	2	1	..	..
Bonalla	8,260	3	30	..	1	1	1	..
Berwick	10,200	6	13	..	2	..	..	..
Bet Bet	3,500	..	1	..	1	..	1	..
Birchip	2,200	..	3	..	..	..	..	..
Bright	4,860	1	5	..	1	..	..	4
Broadford	1,600	1	..	..	..	..	1	..
Broadmeadows	6,400	2	9	..	2	1	2	2
Bulla	2,890	1	..	1	1	..	..	..
Buln Buln	6,290	4	16	..	..	..	..	..
Bungaree	2,280	..	2	..	1	..	..	..
Buninyong	4,470	..	11	..	..	..	..	..
Charlton	2,880	1	1	..	..	..	..	..
Chiltern	1,950	1	..	..	2	..	..	..
Cohuna	3,530	1	..	..	..	..	..	1
Colac	8,200	2	4	..	1	..	..	..
Corio	4,230	1	8	..	..	..	..	..
Cranbourne	7,060	2	11	..	..	1	1	..
Creswick	4,470	..	2	..	1	..	..	..
Dandenong	11,500	12	15	..	6	4	6	3
Deakin	4,590	1	18	..	..	..	2	2
Dimboola	6,990	..	..	..	..	..	..	..
Donald	3,670	..	5	..	..	1	1	..
Doncaster and Templestowe	3,040	3	2	..	3	..	..	1
Dundas	3,560	..	3	1	2	..	..	..
Dunmunkle	5,060	..	4	..	1	..	1	..

RETURNS FROM MUNICIPAL DISTRICTS FOR THE YEAR ENDING 31ST DECEMBER, 1945—continued.

Municipal District.	Population.*	Diphtheria.	Scarlet Fever.	Typhoid.	Tuberculosis.	Cerebro-Spinal Meningitis.	Poliomyelitis.	Malaria.
REST OF STATE—continued.								
Shires—continued.								
East Loddon	2,000	..	..	..	..	..	..	..
Eltham	5,070	3	4	1	3	..	5	2
Euroa	3,910	2	11	..	1	..	2	..
Ferntree Gully	9,200	7	25	1	2	2	..	1
Flinders	5,880	..	5	..	4	..	1	3
Frankston and Hastings	7,040	7	25	..	4	..	..	2
Geelong	2,040	..	..	..	..	..	..	..
Glenelg	5,710	..	6	..	2	..	..	..
Glenlyon	2,750	..	10	..	..	..	..	1
Gordon	3,550	..	..	..	1	..	..	..
Goulburn	1,970	..	1	..	1	..	..	..
Grenville	2,650	..	..	..	..	..	..	..
Hampden	11,850	..	4	..	2	1	..	..
Healesville	2,700	2	3	..	..	..	..	..
Heytesbury	5,750	1	2	..	2	1	1	1
Huntly	2,980	1	1	..	..	..	..	..
Kaniva	2,550	..	1	..	..	..	1	1
Kara Kara	2,720	..	3	..	1	..	1	..
Karkaroc	6,750	2	3	..	1	..	..	2
Keilor	2,220	..	1	..	..	..	..	2
Korangi	9,400	1	1	..	2	..	1	..
Kilmore	1,780	3	..	..	..	..	..	..
Korangi	4,680	..	5	..	1	..	..	..
Korumburra	7,360	..	5	..	1	2	3	..
Kowree	3,670	1	5	..	1	..	..	..
Kyneton	6,720	5	15	..	1	..	1	..
Leigh	1,440	..	..	..	..	..	..	..
Lexton	1,610	..	1	..	..	..	..	..
Lillydale	9,940	2	16	..	4	3	1	7
Lowan	4,390	..	2	..	..	..	..	1
Maffra	6,240	1	7	..	2	..	2	..
Maldon	2,450	..	4	..	..	..	..	..
Mansfield	3,590	3	3	1	1	..	1	..
Marong	5,390	2	5	..	1	..	..	..
Melton	1,500	1	1	..	..	..	..	..
Metcalfe	2,700	..	10	..	2	..	..	..
Mildura	17,960	3	49	..	5	1	..	..
Minhamite	2,110	..	..	..	1	..	..	1
Mirboo	1,610	1	3	..	1	1	..	2
Mornington	2,370	..	1	..	1	..	..	..
Mortlake	3,540	..	..	..	..	1	..	2
Morwell	8,040	..	28	..	19	..	..	2
Mount Rouse	2,690	1	3	..	1	..	..	1
Mulgrave	3,850	4	2	..	3	..	2	..
Melvor	2,900	..	..	..	..	..	..	..
Narracan	8,500	7	35	..	14	..	1	..
Newham and Woodend	2,100	..	2	..	..	..	..	..
Newstead and Mount Alexander	2,400	..	..	..	..	1	..	..
Numurkah	6,050	1	10	..	..	1	..	..
Omoo	2,320	..	4	..	1	1	..	..
Orbost	5,050	3	11	..	1	..	1	..
Otway	3,830	..	3	..	..	..	1	..
Oxley	4,480	2	4	..	2	..	..	..
Phillip Island	1,020	1	6	..	1	..	..	..
Portland	5,500	2	3	..	1	..	..	2
Pyalong	710	..	..	..	..	..	..	..
Ripon	3,560	..	3	..	..	..	..	..
Rochester	6,650	3	1	..	6	..	4	..
Rodney	9,080	21	24	..	2	..	5	..
Romsey	2,990	..	..	..	..	..	..	..
Rosedale	4,170	..	..	..	1	..	1	..
Rutherglen	3,580	3	10	..	..	..	1	..
Seymour	4,120	..	2	..	..	..	2	..
Shepparton	5,600	11	14	..	..	..	5	..
South Barwon	4,250	..	5	..	1	..	..	..
South Gippsland	4,500	..	3	..	..	..	1	..
Stawell	3,830	..	1	..	..	..	..	..
Strathfieldsaye	3,530	2	1	..	1	..	..	..
Swan Hill	11,700	4	15	..	3	2	5	..
Talbot	1,270	..	..	..	..	..	..	..
Tambo	4,300	3	1	..	1	..	..	..
Towong	4,750	..	3	..	1	1	3	..
Traralgon	3,760	2	6	..	1	..	..	..
Tullaroop	2,190	..	1	..	..	..	..	..
Tungamah	5,200	3	3	..	..	..	..	..
Upper Murray	2,390	..	1	..	..	..	2	1
Upper Yarra	4,690	2	7	..	..	2	..	..
Violet Town	1,690	..	16	..	1	..	1	1
Walpeup	6,840	..	10	..	..	..	2	..
Wangaratta	2,440	..	3	1	..	..	1	..
Wannon	3,840	..	4	..	1	..	..	..
Waranga	5,330	1	12	..	1	1	5	..
Warracknabeal	5,300	..	3	..	1	..	..	1
Warragul	5,940	..	12	..	1	1	..	..

RETURNS FROM MUNICIPAL DISTRICTS FOR THE YEAR ENDING 31ST DECEMBER, 1945—continued.

Municipal District.	Population.*	Diphtheria.	Scarlet Fever.	Typhoid.	Tuberculosis.	Cerebro-Spinal Meningitis.	Polio-myelitis.	Malaria.
REST OF STATE—continued.								
Shires—continued.								
Warrnambool	8,630	..	10	..	3	2	..	..
Werribee	8,050	4	9	..	..	..	..	..
Whittlesea	3,260	3	1	..	1	..	..	2
Wimmera	4,330	1	6	..	..	..	..	..
Winchelsea	3,630	..	3	..	..	1	1	..
Wodonga	3,350	..	3	..	..	..	4	..
Woorayl	5,970	..	20	..	2	1	..	1
Wychoproof	6,030	..	..	..	1	..	..	1
Yackandandah	2,970	1	9	..	..	..	..	1
Yarrowonga	3,080	..	3	..	1	..	..	..
Yea	2,690	..	1	..	..	..	..	..

* Population figures subject to revision.

NOTE.—Institutional cases of infectious diseases are included in these returns. Incidence may thus appear unduly high in certain municipal districts in which there are situated children's homes, infectious diseases hospitals and similar institutions.

SUMMARY.

	Diphtheria.	Scarlet Fever.	Typhoid.	Tuberculosis.	Cerebro-spinal Meningitis.	Polio-myelitis.	Dysentery (amoebic).	Dysentery (bacillary).	Anthrax.	Hydatids.	Malaria.	Puerperal Fever.	Tetanus.	Anchyllostomiasis.	Paratyphoid Fever.	Undulant Fever.	Typhus (Endemic).
Metropolitan area	610	1,498	12	370	73	121	1	4	..	3	560	11	3	1	5	4	1
Rest of State	289	1,212	11	243	44	117	3	8	3	25	61	10	7	..	2	5	..
Grand Totals	899	2,710	23	713	117	238	4	12	3	28	621	21	10	1	7	9	1

NOTE.—Naval, Military, and Air Force cases are not included.

Anchyllostomiasis.—Melbourne (1).

Anthrax.—Rochester (3).

Dysentery (amoebic).—Hawthorn (1), Dandenong (1), Phillip Island (2).

Dysentery (bacillary).—Melbourne (2), Port Melbourne (1), St. Kilda (1), Ararat Town (1), Bright (1), Kyneton (6).

Hydatids.—Brunswick (1), Malvern (1), Richmond (1), Geelong (1), Warrnambool City (1), Hamilton (5), Newtown-Chilwell (1), Portland Borough (1), Sebastopol (1), Alexandra (1), Dundas (2), Glenelg (1), Hampden (4), Minhamite (2), Mount Rouse (1), Portland Shire (1), Wannon (2), Winchelsea (1).

Paratyphoid Fever.—Caulfield (1), Coburg (1), Essendon (1), Melbourne (1), Port Melbourne (1), Dandenong (1), Mount Rouse (1).

Puerperal Fever.—Brighton (3), Caulfield (3), Malvern (1), Melbourne (1), Prahran (1), Preston (1), South Melbourne (1), Ararat Town (1), (Berwick 1), Broadmeadows (2), Warragul (5), Werribee (1).

Tetanus.—Camberwell (1), Footscray (1), Kew (1), Port Fairy (1), Dundas (1), Lowan (1), Mortlake (2), Tallarook (1), Wimmera (1).

Typhus Fever.—Footscray (1).

Undulant Fever.—Brunswick (1), Coburg (1), Moorabbin (1), Hamilton (1), Braybrook (1), Ferntree Gully (1), Morwell (1), Narracan (1), Portland (1).

INFECTIOUS DISEASES.

DIPHTHERIA.

A new low-level of incidence was recorded for Victoria in 1945, the number of cases reported being 899 corresponding to an incidence rate of 44·6 per 100,000 of population.

The next lowest rate recorded was 62·5 per 100,000 in 1944. In 1943 and 1942 the rates were 67 and 66·5 respectively. The average number of cases reported for the five-year period 1941 to 1945 was 1,495 as compared with 2,615 for the period 1936 to 1940.

In 1945 there were 39 deaths, giving a death rate of 19 per million of population and a case-mortality rate of 4·3 per cent. The case mortality rate is more than three times the lowest rate (1·7 per cent.) which was recorded in 1937. The case-mortality rate has been rising since 1941. If, as well may be, the virulence of the organisms is increasing, the number of carriers may not be altered but they will become more dangerous to unimmunized persons.

Immunizing material was issued through the Department of Health sufficient to immunize 27,700 children fully in 1945. Of these about 14,400 were of school age and 13,300 of pre-school age.

There were over 39,000 births in Victoria in 1944. If every child were immunized in his second year at least 38,000 in that age-group alone would have been protected in 1945. There were 41,200 children born in Victoria in 1945. In order to have a fully protected child population entering school from 1950 onwards it will be necessary to immunize 38,000 to 39,000 children under the age of five years annually. If that number are protected at the end of their first year or early in their second year the annual death-roll from this disease would soon approach zero. At present, allowing, optimistically, that a few thousand pre-school children are immunized by family physicians each year, more than half the two-year-olds are still unprotected and are exposed to unwarrantable risk at their most dangerous age.

Full peace-time organizations should be possible soon. Municipal authorities should now provide facilities for the protection of unimmunized pre-school children at least annually—preferably at Infant Welfare Centres twice or, better still, four times a year where numbers warrant it.

Public education on the benefits of immunization should be intensified through all channels, especially those in which immediate personal contacts with the parents of young children are possible. Municipal councils have excellent opportunities of doing this through welfare nurse and health visitors. Education by radio, film and poster should be used; in this case it might be most economically organized by the Department of Health as part of its Public Health Education Organization.

Since the beginning of 1944 immunization campaigns have been carried out by councils generally with the co-operation of departmental officers, in the following municipalities in Victoria:—

Metropolitan Area.

Box Hill
Braybrook
Brighton
Brunswick
Camberwell
Caulfield
Chelsea
Coburg
Collingwood
Essendon

Fitzroy
Footscray
Hawthorn
Heidelberg
Kew
Malvern
Melbourne
Moorabbin
Mordialloc
Northcote

Nunawading
Oakleigh
Port Melbourne
Prahran
Preston
Richmond
Sandringham
South Melbourne
St. Kilda
Williamstown.

Rest of State.

Cities—	Shires—continued	Shires—continued
Ballaarat	Beechworth	Maffra
Bendigo	Bellarine	Maldon
Geelong	Benalla	Mansfield
Geelong West	Berwick	Mildura
Mildura	Bet Bet	Minhamite
Warrnambool	Birchip	Mirboo
	Bright	Mornington
	Broadmeadows	Morwell
Towns—	Bulla	Mount Rouse
Ararat	Buln Buln	Mulgrave
Hamilton	Chiltern	McIvor
Horsham	Cohuna	Newstead and Mount
Newtown and Chilwell	Colac	Alexander
Sale	Corio	Numurkah
	Cranbourne	Omeo
	Creswick	Orbost
Boroughs—	Dandenong	Otway
Castlemaine	Deakin	Portland
Clunes	Dimboola	Rochester
Colac	Doncaster and	Rodney
Daylesford	Templestowe	Rutherglen
Inglewood	Dundas	Seymour
Maryborough	East Loddon	South Barwon
Portland	Eltham	South Gippsland
Ringwood	Euroa	Stawell
Shepparton	Ferntree Gully	Strathfieldsaye
Stawell	Flinders	Swan Hill
St. Arnaud	Frankston and Hast-	Talbot
Swan Hill	ings	Towong
Wangaratta	Glenelg	Tungamah
Wonthaggi	Glenlyon	Upper Murray
	Goulburn	Upper Yarra
	Hampden	Violet Town
	Heytesbury	Walpeup
Shires—	Huntly	Wannon
Alberton	Kaniva	Warangā
Arapiles	Kerang	Warracknabeal
Ararat	Kilmore	Warragul
Avoca	Korong	Warrnambool
Avon	Korumburra	Werribee
Bacchus Marsh	Kowree	Winchelsea
Bairnsdale	Kyneton	Wodonga
Ballan	Leigh	Woorayl
Bannockburn	Lexton	Wycheproof
Barrabool	Lillydale	Yackandandah
Bass	Lowan	Yea.

TYPHOID AND PARATYPHOID FEVERS.

In 1945, 23 cases of typhoid and 7 cases of paratyphoid fever were notified. The rate of typhoid was 1·1 per 100,000 and for paratyphoid 0·3 per 100,000 of population.

The 1944 figure of 15 typhoid fever cases was the lowest ever recorded. The death rate for 1945 was 3 per million of population compared with 1·5 per million in 1944. The death rate in 1943 when a milk-borne outbreak occurred was 13·6 per million of population.

In respect of these diseases the Commission still expresses regret that the pasteurization of milk in Melbourne has not been introduced.

SCARLET FEVER.

Two thousand seven hundred and ten cases were notified in 1945. There were 4 deaths—a case mortality rate of 0·15 per cent.

The incidence rate was 135 per 100,000 as compared with 392 per 100,000 in 1944, the highest recorded for many years.

POLIOMYELITIS.

Two hundred and thirty-eight cases were reported in 1945. All except six of these occurred in the second half of the year. The death rate during 1945 was 4·5 per million of population. During the first quarter of 1946, 194 cases and in the second quarter of 1946, 41 cases were reported.

During the 1937–38 outbreak, which also began in the month of July, 1,405 cases occurred before the end of that year, whilst 961 cases were reported during the first half of 1938. For the whole of that outbreak the mortality rate was 58 per million.

The case mortality rate in 1945 was 2 per cent. compared with 5·2 per cent. in the 1937–38 outbreak.

CEREBROSPINAL MENINGITIS.

One hundred and seventeen cases were reported in 1945 corresponding to an incidence rate of 6 per 100,000 of population.

The death rate was 10·5 per million of population. The case mortality rate was 18 per cent.

One hundred and fifty-nine civilian cases were reported in 1944 with a case mortality rate of 14·5 per cent.

DYSENTERY.

Sixteen cases were reported in 1945. There were twenty-nine cases in 1944.

PUERPERAL FEVER.

Twenty-one cases were reported in 1945 equal to approximately one case for every 2,000 live births. There were four deaths. This is equal to one death from puerperal fever for every 10,000 live births.

TETANUS.

Ten cases were reported. Five deaths occurred.

In view of the recent fatalities in infants in New Zealand attributed to the use of talcum powder infected with tetanus bacilli the Commission requested the Food Standards Committee to consider the possibility of fixing a bacterial standard for such powders. The Food Standards Committee recommended that dusting powders which are not actually labelled as sterile should in no circumstances be applied to open wounds. In view of the enormous use of dusting powders for purposes other than the dressing of wounds and as no bacterial standard for talcum powder exists anywhere it was decided that no good purpose would be served by setting such a standard in Victoria.

HYDATIDS.

Twenty-eight cases were reported—an incidence of 1·4 per 100,000 of population. Fourteen deaths were recorded.

The continued high incidence of the disease in the Western Health Area led the District Health Officer to undertake a statistical investigation into its prevalence in the State as a whole. He submitted a report to the Commission recommending the formation of a hydatid disease committee to be composed of representatives of the departments and organizations concerned. The Commission submitted its recommendation to the Minister. The Hon. the Minister having approved, this Committee was constituted in November, 1945, and having held several meetings has submitted a preliminary report embodying suggestions for further research and the launching of a campaign of popular education on the subject.

TUBERCULOSIS.

Six hundred and thirteen cases were reported in 1945. This figure is lower than the previous lowest figure (679) recorded in 1944.

The death rate was 362 per million of population. The previous lowest rate was recorded in 1943 when it was 375 per million.

Tuberculosis diagnostic centres have been established in the following municipalities: Prahran, Williamstown, Brunswick, South Melbourne, Newtown and Chilwell, Ballarat and Bendigo. There are mass radiography plants at the first five named.

We urge the extension of diagnostic centres or, at least, of mobile units.

MALARIA.

Six hundred and twenty-one cases were reported in 1945, all in ex-service personnel.

The complete freedom of civilians from malarial infection in the State of Victoria has been remarkable.

SURVEY OF GOITROUS AREAS AND THE SALE OF IODIZED SALT.

At the request of the Commission the National Health and Medical Research Council has undertaken a survey of goitrous areas in Victoria. The investigation will include the use of iodized salt to prevent goitre in these areas.

The Food Standards Committee has recommended that iodized salt shall contain not less than 40 nor more than 70 parts of iodine (calculated as potassium iodide) per million of salt and that it shall be properly labelled.

The Commission recommends the use of such a preparation instead of ordinary table salt as a preventive measure in goitrous areas. Adults with goitre should not use it without medical advice.

ANTI-TUBERCULOSIS WORK.

The anti-tuberculosis work in Victoria has recently been rendered difficult by the lack of staff, a factor which is prevalent in most countries throughout the world owing to the war.

Despite criticism from various quarters, the death rate for all forms of tuberculosis has steadily fallen from 663 per million in 1928 to the low record of 362 per million in 1945, which, although a slight rise was expected during war years, is approximately one-half.

It is considered that this rate will not be reduced materially, unless earlier diagnosis of cases is secured.

With the advent of mass radiographic surveys by miniature films rendering this practically and economically possible, it is considered that efforts to provide facilities throughout Victoria for the best means of carrying this out, should be made.

All municipalities will be able to help materially in this particular effort, not so much by attempting to provide units themselves, but by helping to educate the public. The aim should be to secure 100 per cent. examination of their residents when the annual survey is made, preferably by portable units in charge of highly skilled personnel.

MATERNAL, INFANT WELFARE AND PRE-SCHOOL DIVISION.

In 1945 the infant mortality rate per 1,000 births was 28·03, the lowest figure ever recorded in this State. This also applied to the metropolitan figure (26·87) and for the rest of the State (29·61), these rates comparing more than favourably with other countries.

Activities in this Division continued to develop satisfactorily particularly in the pre-natal and pre-school spheres. There are now seven pre-natal clinics in the metropolitan area staffed by departmental officers, while in two other municipalities the councils concerned have provided their own staff. All are, however, under departmental supervision and inspection.

With the granting of increased financial support by the Government, the rate of subsidy payable to approved free kindergartens was increased from £4 to £6 per annum per child from the 1st January, 1946, and on the 30th June, 1946, 86 free kindergartens were so subsidized.

The details of the activities and recommendations by the Director of Maternal, Infant and Pre-school Welfare are given in the report of the Director in an Appendix to this Report.

The Commission deeply regrets having to record the death, on the 14th July, 1946, of Dr. Vera Scantlebury Brown, O.B.E., Director of Maternal, Infant and Pre-school Welfare in Victoria, which closed the career of a very great public servant, and one whose unselfish services will ever be remembered.

The late Director was appointed in 1926, when the Infant Welfare Division of the Department of Health was established by Sir Stanley Argyle, the then Minister of Health, and no higher tribute to her ability, organization and foresight could be paid, than by consideration of the reduction of infant mortality rates from 55·6 per 1,000 in 1926 to 28·03 in 1945.

Dr. Scantlebury Brown, throughout her official career, recognized the necessity for high standard of training of nurses and others associated with the care of mothers and young children, and her untiring efforts to these ends have been reflected in the efficient services now maintained in this State.

In 1937 she presented a report to the National Health and Medical Research Council regarding adequate care of the pre-school child. This report largely influenced the Commonwealth Government to make available £100,000 for the benefit of this age group, and led to the establishment of the Lady Gowrie pre-school centres in each State capital city.

The officers of the Department of Health who were her colleagues, were very proud of her attainments, not only as a great administrator, but as a gay and lovable human being, who inspired in her staff a feeling of intense loyalty and affection.

DEVELOPMENT OF INDUSTRIAL HYGIENE.

It is probable that it is not realized generally how large is the field for the promotion of industrial hygiene.

In 1942, in Victoria, approximately 48 per cent. of all persons, male and female, between the ages of 18 and 60 years were engaged in industry. This percentage did not include wharf labourers (who numbered several thousand), agricultural workers nor those engaged in transport services.

Much of the health hazard in industry is not within the control of the worker himself. His employer, however well disposed, does not always know the risks—especially of the rapidly increasing number of chemical processes associated with modern industries. The healthiness or otherwise of the working conditions of nearly half the wage earners in the State will depend ultimately on the kind and extent of control exercised by an expert Government health authority.

The Commission appreciates the Minister's action in the development of this important branch of health activity and urges as rapid development as possible of a full industrial hygiene organization; so that the health of all industrial workers can be maintained under the supervision of a sufficient staff of expert scientists and trained inspectors.

In this branch of the Ministry's activities much educational material is available for employers, employees and the public. This material should be incorporated in the plan of public education in healthy living.

Steady research into all the newer processes in industry in relation to their possible dangers to the health of workers should be provided for.

FOOD CONTROL BY LOCAL AUTHORITIES.

A few municipal councils still shirk their responsibility relating to the Food Standards Regulations where analyses have shown that foods sold to the public are not in compliance with the minimum standards laid down in the regulations. These standards are such that any failure to comply indicates adulteration or unlawful sophistication to the disadvantage of the purchaser. The local Health Authority is charged, under the Health Act, with the duty of protecting the public within its own district against the despicable offence of adulterating food for sale. Excess water in milk and milk products is a common offence overlooked by councils. In a case, which occurred recently, of excess water in butter slightly over the percentage allowed by the regulations and considered to be trivial an estimation showed that if the same "trivial" excess had applied to the whole output of that butter factory the public would pay annually £180 for a ton of water as butter.

There is no legitimate excuse for the adulteration of food for sale. Prosecution should automatically follow detection.

D.D.T. IN OR ON FOODSTUFFS.

The use of D.D.T. as an insecticide and particularly in connexion with the spraying of fruit in orchards on a large scale is growing.

The Commission referred the matter to the Crown Solicitor who ruled that the Food Standards Committee had the power to prescribe standards.

This Committee recommended that "the permissible limit of D.D.T. as estimated by the prescribed method, be ten parts per million of fruit and vegetables," and that "no D.D.T. shall be permitted in any other food." The Committee advised that in their opinion, although there is no known toxic effect from the consumption of fruit and vegetables containing less than ten parts per million of D.D.T. the public should be advised that all fruit and vegetables should be washed before use.

The Food Standards Committee have also recommended that the label of any preparation containing D.D.T. shall contain a statement of the D.D.T. content in terms of the para para isomer of dichloro-diphenyl-trichlorethane and shall contain the following appropriate warning notice, viz. :—

Liquids—Avoid repeated skin contact. Do not spray on food or food utensils.
Wash hands after using.

Powders—Avoid contamination of food or food utensils with this preparation.

Preparations containing over 10 per cent. of D.D.T. are included in the fourth schedule of the Poisons Act. The labelling of these must comply with the provisions of the Poisons Act.

STANDARD FOR WHOLE MEAL FLOUR AND BREAD.

Over the past decade it has been laid down by scientific nutritionists that where cereals form a considerable part of the diet of peoples, these should be consumed in their entirety or as near to that as is practicable. For this reason it is necessary that, in the interests of health, that whole meal and whole meal bread should be available for those who require it.

Alleged "whole meal bread" is on the market to meet the increased public demand, but one cannot depend on getting the genuine article, as the composition varies greatly. In some instances it is merely white bread artificially coloured.

This is an urgent matter and as has been repeatedly pointed out standards should be fixed for wholemeal and wholemeal bread. At a recent meeting the Foods Standards Committee deplored the fact that section 3 of the Bakers and Millers Act still stands in the way of action in this direction being taken by them.

It can be asserted with confidence that when this obstacle to the provision of a standard has been removed a lasting benefit will be conferred on the community.

THE PASTEURIZATION OF MILK ACT.

The Commission has already expressed its regret at the postponement of the coming into force of this Act.

In nature, the milk of the mother animal is taken directly from the source into the mouth of her young. This simple process does not protect the recipient altogether against the transfer of disease from an affected mother animal. Man's ingenuity has adapted cow's milk to his own needs. His handling, conveying and storing of this food has brought the risk of further contamination even in the simple hand-can or jug. At times, his unawareness of his own infectiousness out-balances his scrupulously cleanly care. By modern bulk-handling methods for urban supplies one small contaminated can of milk may, in the mixing, affect hundreds of gallons of bulked raw milk and, literally, place the lives and health of thousands of consumers in jeopardy.

Raw milk produced and handled by ordinary clean methods cannot be guaranteed safe at all times. Safety means freedom from the possibility of conveying infection due to its accidental contamination by disease-producing organisms.

Milk can be made safe by a properly organized strictly-controlled technically-perfect system of pasteurization.

Until the establishment of such a publicly-controlled system the Commission advises the public not to use milk as nourishment without boiling it.

HOSPITALS.

It is regretted that the Public Works Department has been unable to make the progress expected in the replacement or remodelling of infectious diseases blocks of poor quality at country hospitals. Sketch plans have been prepared and in some cases approved for nine out of the first ten blocks on the priority list, but none has yet reached the stage when final plans and specifications have been completed.

MEAT SUPERVISION.

There is a fairly widespread interest in the proclamation of meat areas and the construction of public abattoirs. Sites have been approved at Kyneton and Daylesford, and plans for the buildings are in course of preparation. In the Western District a conference called by the Commission of representatives of the Shires of Hampden, Heytesbury, Mortlake and Warrnambool resulted in an agreement to constitute a meat area far larger than was originally intended, which will extend from Lake Corangamite nearly to Warrnambool and from a line above the north end of the lake to the coast. When this area is proclaimed, small extensions of the Geelong and Warrnambool meat areas would result in meat supervision over a wide belt of country extending from Geelong to Warrnambool, and will form an example which could well be followed by the municipalities traversed by the other main railways of the State.

Those portions of animals usually used as food are subject to diseases and parasites, some of which are transmissible to man. Even when free from disease they may be unwholesome or in other ways unfit for human consumption.

Meat killed outside a meat inspection area is not subject to regular or skilled supervision. The lack of facilities frequently found in the small private abattoirs leads to insanitary handling of carcasses adversely affecting the keeping quality of the meat.

Within proclaimed meat areas animals, both before and after killing, are subject to skilled inspection by inspectors specially trained in animal anatomy and pathology.

Where killing is done at a central abattoir provided with cool storage, as is generally the case now in proclaimed meat areas, the consumer receives wholesome well-kept healthy meat. Meat, not branded by an authorized meat inspector cannot be brought into a meat area for sale except under specially controlled conditions.

The state of meat reaching the consumer outside a meat area can never be guaranteed.

The aim of the Commission, for many years, has been the encouragement of municipal co-operation with itself in the establishment of a more or less continuous belt of meat areas covering the more densely populated portions of the State. As it is quite practicable to deliver meat by motor transport anywhere within a radius of 25 to 30 miles from a central abattoir it is only in the more remote rural areas that the supply of meat killed under strict supervision is not economically practicable.

COUNTRY SEWERAGE.

Applications and plans for the constitution of new sewerage authorities are coming to hand at a fairly rapid rate, and with the aid of the increased rate of Government subsidies to towns of under 2,000 population and the all-round reduction of interest rates, it appears that many of these will be able to commence work as soon as supplies of materials become available.

Existing sewage treatment works have been on the whole well managed during the war, except that there are many cases where the areas used for the disposal of effluent by irrigation have not been subdivided, and where no real effort is being made to obtain a return from the land.

STREAM POLLUTION.

The mobile laboratory referred to in the last report has been obtained from the Commonwealth, and when it has been overhauled and the staff of the Engineering Division has been brought up to strength, it will be possible to open an effective campaign against persons and firms responsible for polluting rivers and lakes. In the meantime a Committee formed at the suggestion of the Commission is inquiring into the existing legislation and regulations on stream pollution, with a view to advising on legislation needed to enable effective control to be exercised.

ECONOMICAL AND EFFICIENT HEALTH INSPECTION GROUPS.

For the sake of economy and efficiency it is highly desirable that certain neighbouring country municipalities, which, individually, could not be expected, reasonably, to provide a full-time officer, should be grouped for the employment of the same medical officer of health or health inspector.

Voluntary grouping of municipalities for this purpose with the approval of the Commission has been provided for by section 22, sub-section 7 of the *Health Act 1928*.

Many opportunities have occurred in the past for the formation of suitable economical and effective groups. As section 22 (7) of the *Health Act* now stands the Commission can suggest to councils the advisability of forming a group. It cannot do more unless and until all the councils involved come to have the same mind about it at the same time. Then, the Commission may approve. When three, four, or more councils are possible participants, this voluntary grouping plan is liable to result in an excessive number of councils deciding to group rather with the idea of reducing costs than for the purpose of effective working on an economic basis. On the other hand discussions are liable to be long drawn out, often to die of inanition leaving some municipalities without proper sanitary supervision at all.

When the plan is successful, perhaps after years of discussion, one member has the power to break away at any time, nullifying the result of years of effort.

The history of voluntary grouping of councils records sufficient successes to prove the economy and efficiency of the principle. However, there have been many lost opportunities and bitter disappointments because the Commission had no power to initiate discussions and to make a final decision.

An amendment of section 22 of the *Health Act* could be made to give the Commission power to propose specified groupings, to convene meetings of representatives for discussion, to take evidence itself, and, in the absence of unanimity among the councils within a time limited by the Commission, the power of final decision as to grouping and to make the appointment if councils fail to do so within a specified time, subject to the present provisions of section 22, sub-sections 7 (a), (b), and (c).

EDUCATION OF THE PUBLIC IN HEALTHY LIVING.

Dr. Johnstone Jervis, in his presidential address to the Society of Medical Officers of Health in London on 23rd November, 1945, said "Among the many causal factors of disease and ill-health there is none so formidable as ignorance. From the very earliest times it has allied itself with such evils as dirt, disorder, vice, and drunkenness, and still is to be found in their company."

Even among population groups not obviously nor necessarily associated with these latter evils ignorance of modern hygienic principles and practice is widespread. People must know how to live before they can co-operate in raising the level of community health. Thus, the science of healthy living constitutes a fundamental part of any education scheme for adults as well as for children.

Great advances have been made in eliminating gaps in the scientific knowledge of health during recent decades. Much of this knowledge has not yet been woven into the social fabric of civilized communities.

Well organized education of the public in healthy living will hasten the process.

The Commission is of the opinion that publicity should be co-ordinated and further developed as an aid to the promotion of health. Full advantage should be taken of all modern methods of publicity and a persistent programme carried out.

RECOMMENDATIONS.

Education of the Public in Healthy Living.—That financial provision in the Ministry's budget should be made for its publicity plan to be rapidly developed. Skilled publicity staff is required to take full advantage of modern methods of publicity.

A persistent programme should be planned and carried out in liaison with the Education Department and other educational and health organizations if possible.

Industrial Hygiene.—That the organization of this branch of the Ministry's activities be developed rapidly to make comprehensive investigations into all factors likely to affect industrial workers' health at work and to advise expeditiously on all measures likely to promote optimal hygienic conditions of work.

Wholemeal Flour and Bread.—That section 3 of the Bakers and Millers Act be repealed as has been previously repeatedly recommended, so that a legal standard for wholemeal flour and wholemeal bread may be set up under the Food and Drugs Standards Regulations.

Pasteurization of Milk Supply.—That the establishment of a safe milk supply authorized by the Pasteurization of Milk Act be given priority over any non-vital public works programme.

Efficient and Economical Sanitary Control in Country Municipalities.—That section 22 (7) of the *Health Act* 1928 be amended so as to give the Commission power to initiate discussions, to convene conferences of councils for the purpose of appointing the same health officer or inspector to two or more specified councils; and in the absence of agreement between the councils called in conference within a time limited by the Commission to make a final decision as to appointment, conditions of employment, remuneration and allowances; and, after a time limited by the Commission, to make the appointment subject to the provisions of section 22 (7) (a), (b), and (c) of the *Health Act* 1928 if the councils do not meanwhile make the appointment.

Quarantine.—That such portions of Part XV. of the *Health Act* 1928 and eighth, ninth, and tenth schedules thereto dealing with matters over which the Commonwealth Government has assumed jurisdiction be repealed.

RECOMMENDED AMENDMENTS TO THE HEALTH ACT 1928.

Definition of Boarding-house in section 3.—The word “five” to read “three.”

Amend *Definition of Piggery* in section 3 of the *Health Act* 1928 to read “piggery” means any building enclosure yard or field in which five or more pigs (exclusive of sucklings) are kept. Some modification of section 81 (1) (a) and the Second Schedule may be necessary to include “piggery whether conducted for the purposes of trade or not”.

Pollution of Water.—Division 5, Part IV. The Commission desires power under this Division to require the submission of plans and other particulars of any proposed trade premises which will produce liquid wastes; and power to refuse approval of such plans unless they include satisfactory provision for the prevention of the pollution of any stream.

Power to make Regulations Prescribing Fees for Reporting Industrial Diseases to be provided by amendment to section 95 (c).

Definition of Private Hospital, section 160 *Health Act* 1928.—Amend to read—“Private hospital” means any building house tent or place (other than an institution supported in whole or in part by or receiving aid from the State) in which cases of any prescribed class or classes are received or lodged or in which it is intended that they shall be received or lodged for attendance or care and for which a charge is made and includes premises for the reception and/or the accommodation of the sick the aged and/or the infirm.

Power to Prescribe Fees for the Examination of Plans and Specifications of Private Hospitals by amendment of section 168.

Injurious Utensils or Appliances.—The addition of a sub-clause (f) to section 217 to read—“composed of or containing more than a specified quantity or proportion of any specified substance” and in relation thereto an amendment of section 257 giving power to prescribe substances, quantities and proportions allowable in relation to matters contained in section 217 as amended.

Power to Prohibit Sale of Deleterious Food Drug or Substance.—Addition to Part XII. of the *Health Act* 1928 to give the Commission power to prohibit the sale of any food drug or substance which in the opinion of the Food Standards Committee is deleterious to health and making the sale or advertising of such food drug or substance an offence against this Part.

Prohibition of the Use of any Substance containing harmful Bacteria or Spores.—The addition of a sub-clause (h) to section 216—“it contains harmful bacteria or spores”.

Publication of False Statements relating to Food Drugs or Substances.—In section 226 (1) (a)—After the word “sale” add the words “of any food drug or substance or”; and in section 226 (1) (b) omit all words after “material particular”. In section 226 (2) (a)—Omit the words “printed and published” and insert instead the word “circulating”.

Add a new paragraph to section 226 (2) calling it (d) containing the words “contained in any wrapper or packet or label delivered with any goods”.

Analyses to be made by Approved Analysts under Part XII. of the Health Act 1928.—In section 242 (1) the word "Act" to be deleted and the word "Part" inserted instead.

Provision for Dealing with Samples when Purchased.—Section 249 (a)—Insert a proviso in this sub-clause indicating that the requirements of this paragraph shall be deemed to have been complied with in respect to a seller other than the "last vendor" referred to in section 241 as re-enacted by the *Health Act 1935* if there is forwarded to such seller by registered post not later than the day next following the purchasing of the food drug or substance for analysis a notice of the purchaser's intention to have the food drug or substance analysed.

Warranty.—Addition to section 267 as re-enacted by section 19 of the *Health Act 1941*. After the words "he shall be discharged from the prosecution" add the words "in which case the person who gave the warranty shall be deemed to have sold the said food drug or substance and proceedings may be instituted against him notwithstanding the provisions of section 263 provided that proceedings be instituted within four weeks of the first hearing".

Amendment of the Melbourne and Metropolitan Board of Works Act and the Sewerage Districts Act to empower authorities to take immediate action to remove blockages from house drains at the expense of the owner without waiting for the written consent of the owner.

The consideration by the *Housing Commission* of the framing of regulations, under the *Slum Reclamation and Housing Acts*, to provide for *Standards of Construction and Occupancy of Flats and Apartment Houses*.

An amendment of the *Health Act* to enable the making of *Regulations to provide for Adequate Air-space, Lighting, Ventilation, and Sanitation of Office Buildings*.

The Commission considers that the *Minister of Health* should have power to recommend to the Governor in Council the addition of *Occupational Diseases to the Schedule of Compensable Diseases under the Workers Compensation Act*.

Section 79.—The only reference in the Act to camps is contained in paragraph (i) of this section, giving power to make regulations for the regulation and control of the sanitation of camps and securing cleanliness thereof.

Recommended that a new section be introduced, requiring approval of the council to the establishment of a camping area, requiring every such camping area to be registered, and prescribing a fee for registration. Suggested also that provision is desirable to enable inclusion in the regulations of requirements prohibiting camping in certain areas, e.g., urban areas such as parts of Frankston, where the erection of numbers of tents in back yards or on small vacant blocks causes unhygienic conditions and annoyance to neighbours.

Section 173.—There is no power to specify, in approval of the opening of a public building, the type of use to which it is to be put. An owner having received approval of a building erected as a dance hall, may convert it into a cinema; or one erected as a church may be converted to a day school. The Commission can then get the building made suitable for its new use only by serving an order and allowing time for fulfilment.

Recommended that a further clause be added to section 173.—*Approval of opening of a Public Building may be Limited to any one or more of the uses specified in the definition of Public Building in section 3; and may specify the maximum number of persons that may be accommodated in the building and in any compartment thereof.*

Section 178 (2) (b), and 381 (2) (b).—"Daily Penalty." It is understood that an offence becomes a "continuing offence" after the offender has been convicted for the first offence.

Recommended that provision be made that when an offender defies the law by, e.g., continuing to use a public building without approval, evidence may be given of the continuance of the offence, and the daily penalty imposed in addition to the fine for the original offence.

Section 259 (1) (a).—"Reasonable Precautions" as a Defence. Suggested that a sub-clause be added (similar to 268 re warranty) compelling the defendant to notify the informant that he intends to rely on this defence, and setting out in full details the precautions he has taken.

Sections 280 and 281 (a).—*Slaughtering of Animals elsewhere than at Abattoirs.*—At present a man may not kill animals for sale except at abattoirs.

Killing for use in his boarding house is not "for sale"; and a man may therefore claim that he can kill for the use of his boarders without interference by the council.

Suggested that section 281 (a) be amended by adding after the words "not for sale" the words "nor for the purpose of being used in the preparation of any food for sale."

Section 281 (b)—Slaughtering of Animals by Farmer.—The sub-section allows the council to give permission for such slaughtering. The interpretation of this varies from—

- (i) Council must permit each slaughtering; to
- (ii) Permission may be given for all time.

The first is too restrictive, and the second too vague. Suggested—Add to sub-section (b) "Provided that such consent shall be valid for a period not longer than one year"; or alternatively—

..... shall not be valid after the expiry of that calendar year."

Section 82, and Second Schedule (Offensive Trades).—Poultry Killing or Cleaning or Dressing.

Recommended add new paragraph to section 82 :—

(3) Nothing in this Division shall be deemed to prohibit any person from killing cleaning or dressing any poultry (or causing to be killed, &c.), on any premises in a shire for retail sale on such premises (? or on the road adjoining) provided :—

- (i) The council has given in that calendar year its consent in writing :
and
- (ii) such poultry has been reared on the premises of that person.

CHAIRMAN, PUBLIC HEALTH COMMISSION.

The Commission desires to place on record its regret that Dr. H. N. Featonby who, on the 29th of April, 1937, succeeded Dr. E. Robertson, found it necessary for personal reasons to retire from his position as Chairman of the Commission.

Dr. Featonby, by his unfailing tact, his genial personality, and his extensive knowledge of the functions of the Commission and of the many matters subject to its jurisdiction, proved himself to be an outstanding officer and one to whom the State of Victoria is indebted for his careful and capable administration and for much loyal service.

Dr. Featonby, besides presiding at the meetings of the Commission and controlling the administration of the General Health Branch, was chairman of the National Fitness Council, the Dietitians Board, the Food Standards Committee and the Consultative Council on Tuberculosis, as well as being a member of the Anti-Cancer Council, the Faculty of Medicine and the Victorian Medical Co-ordination Committee.

His advice on matters generally relating to public health was sought on many occasions, both by the Government of the Commonwealth and the corresponding departments of the other States.

The members of the Commission and the staff of the Department take this opportunity of wishing Dr. Featonby long life and happiness in his retirement.

Respectfully submitted—

C. R. MERRILLEES

WALTER SUMMONS

J. A. MICHELSEN

F. V. SCHOLLES

ALEX. M. KING

EDW. C. RIGBY

} Members of the
Commission

J. WHITLOCK, Secretary.

Melbourne, 24th September, 1946.

APPENDIX A.

REPORT OF THE DIRECTOR OF MATERNAL, INFANT AND PRE-SCHOOL WELFARE FOR 1945-46.

INTRODUCTION.

The death of Dr. Vera Scantlebury Brown, Director of Maternal, Infant and Pre-school Welfare occurred on the 14th July, 1946, after a long illness.

The organization and activities of this Department are the result of her leadership in child care and an appreciation of her work by the Chief Health Officer, Dr. H. N. Featonby with whom she worked for many years is given below:—

"In 1926, at the request of the Victorian Government, Dr. Vera Scantlebury Brown and Dr. Henrietta Main presented a report on the welfare of women and children, which included recommendations for the improvement of existing services. The then Minister of Health, Sir Stanley Argyle, accepting the recommendations of this Report, established the Infant Welfare Division of the Department of Health, with Dr. Scantlebury Brown as the director—a position she held until her death.

In 1926 infant welfare work was carried out by voluntary societies with some assistance from municipalities and the State Government. In twenty years this work has been expanded into a great State-wide service, with many fine municipal infant welfare centres, mobile services in country districts, and a correspondence scheme for mothers in remote rural areas.

The director, at the beginning of her career, recognized the necessity of a high standard of training for nurses in this new service. She sought and obtained government subsidies for training schools, provided they complied with certain necessary standards of efficiency. The Nurses Board at her request also laid down a prescribed

course of training, appointed examiners and established a State register for those who had completed this course, and had passed the prescribed examination.

Dr. Scantlebury Brown next turned her attention to the pre-school child—for whose welfare little provision was being made. A report on this question was made to the National Health and Medical Research Council in 1937. It was largely due to this report that the Commonwealth Government granted £100,000 for the benefit of this age group, and established with the fund so provided the Lady Gowrie Pre-school Centres in each State capital city.

The director also succeeded in establishing a pre-natal branch, which is already providing a valuable and necessary service for expectant mothers. Dr. Scantlebury Brown during her twenty years of service had to triumph over the many administrative difficulties which were met during the years of depression and during the war. These difficulties were met with unflagging cheerfulness, faith and confidence.

The very great services of Dr. Scantlebury Brown to the State were widely recognized during her lifetime. Her death has inspired genuine and sincere tributes, not only from the Premier of the State, but from municipal authorities and mothers from every corner of Victoria. We, who were her colleagues, were very proud of her attainments, but she was far more to us than a great administrator, she was a gay and lovable human being, who inspired in her colleagues and staff a feeling of intense loyalty and affection.

The officers of the Department of Health to which she gave such long and distinguished service will forever hold in veneration the name of this great and good woman."

TABLE I.—INFANT MORTALITY IN VICTORIA, 1910-1945.

Period.	Rate per 1,000 Births.			Period.	Rate per 1,000 Births.		
	Greater Melbourne.	Remainder of State.	Victoria.*		Greater Melbourne.	Remainder of State.	Victoria.*
1910-14	84.2	64.9	73.8	1934	48.2	41.4	44.6
1915-19	76.2	55.4	66.1	1935	43.0	39.5	41.2
1920-24	71.6	58.6	65.3	1936	44.1	40.7	42.3
1925	60.2	53.7	57.0	1937	37.1	36.3	36.7
1926	61.6	49.5	55.6	1938	34.1	34.3	34.2
1927	62.5	49.4	56.1	1939	32.3	38.9	35.6
1928	56.8	54.5	55.6	1940	39.7	39.2	39.5
1929	50.5	43.9	47.2	1941	34.6	38.1	36.2
1930	50.7	42.3	46.5	1942	43.8	38.9	41.6
1931	48.0	41.4	44.5	1943	34.1	38.2	35.8
1932	47.7	38.7	43.0	1944	31.0	33.3	32.0
1933	40.9	40.0	40.4	1945	26.87	29.61	28.03

* See Diagram 3.

VICTORIA. INFANT MORTALITY RATE 1900-1945.

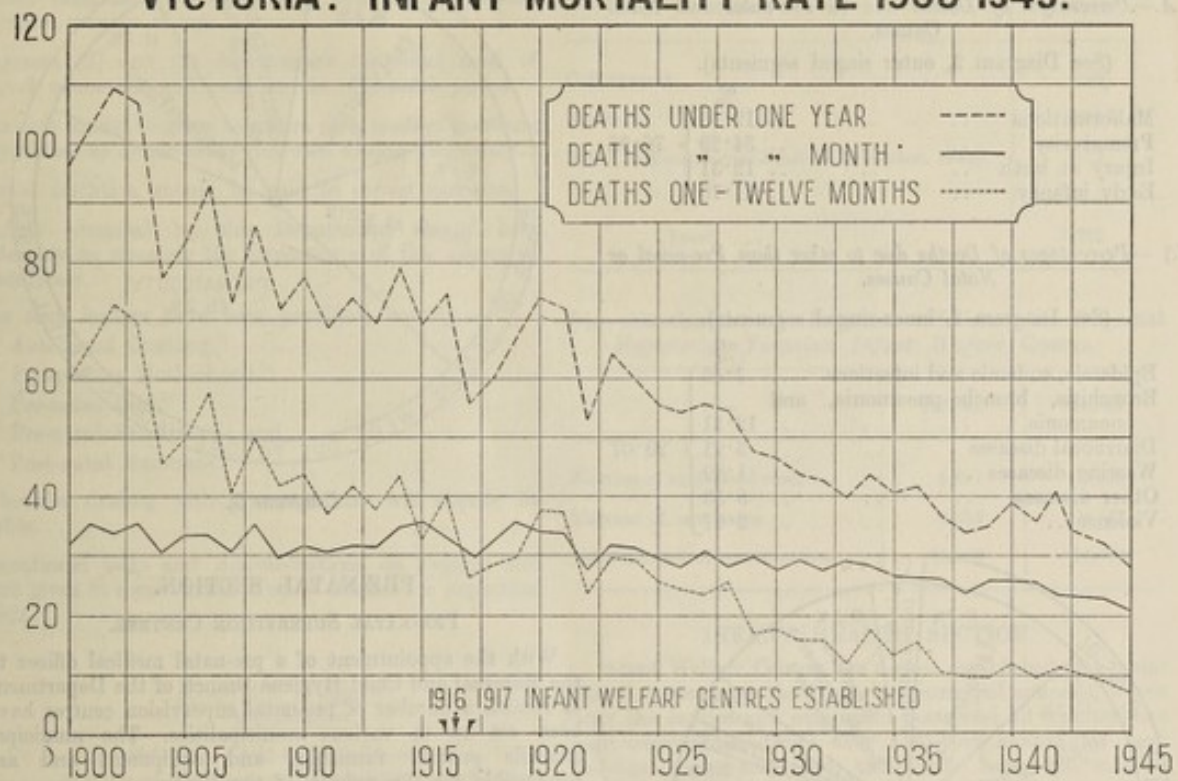


Diagram 1.

TABLE II.—INFANTILE DEATH RATES FROM CERTAIN CAUSES.

Cause of Death.	Deaths under One Year per 1,000 Births in—							
	1891-93.	1901-10.	1911-20.	1921-30.	1931-35.	1943.	1944.	1945.
Epidemic, Endemic, and Infectious Diseases ..	12.41	7.31	4.87	3.87	3.01	2.22	1.12	0.97
Bronchitis, Broncho-pneumonia, Pneumonia ..	11.37	8.13	6.86	6.08	6.19	4.99	3.99	3.45
Diarrhoeal Diseases	29.66	24.62	16.13	9.85	2.32	2.07	1.49	0.90
Malformations, &c.	3.45	4.86	4.38	4.43	4.54	4.06	4.29	3.54
Wasting Diseases	22.24	12.74	13.09	6.77	2.91	1.20	.97	0.53
Prematurity	13.13	14.99	15.17	15.34	12.90	10.71	10.65	9.61
Injury at Birth				2.57	3.22	3.20	3.02	3.45
Early Infancy	21.51	12.77	7.98	3.42	4.55	4.22	3.56	3.28
Other Diseases				4.42	2.26	2.30	2.11	1.55
Violence	3.16	2.47	1.07	.80	.96	.79	.76	.75
Total all Causes	116.93	87.89	69.55	57.25	42.76	35.76	31.96	28.03

TABLE (3).—PERCENTAGES OF CAUSES OF DEATHS IN INFANTS UNDER ONE YEAR OF AGE DURING 1945.

A.—Percentages of Deaths due to Pre-natal and Natal Causes.

(See Diagram 2, outer ringed segments).

	%	
Malformations	12.63	70.93
Prematurity	34.29	
Injury at birth	12.31	
Early infancy	11.70	

(B).—Percentages of Deaths due to other than Pre-natal or Natal Causes.

(See Diagram 2, inner-ringed segments).

	%	
Epidemic, endemic and infectious ..	3.46	29.07
Bronchitis, broncho-pneumonia, and pneumonia	12.31	
Diarrhoeal diseases	3.21	
Wasting diseases	1.89	
Other diseases	5.53	
Violence	2.67	

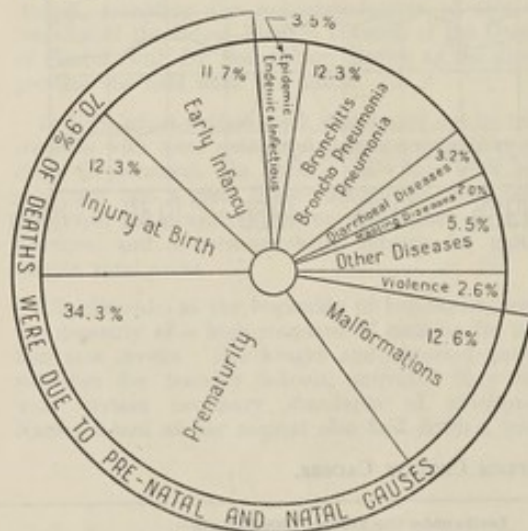


Diagram 2.

TABLE (4).—PERCENTAGES OF CAUSES OF DEATHS IN INFANTS UNDER ONE MONTH OF AGE IN VICTORIA, 1945.

(A).—Percentages of Deaths due to Pre-natal and Natal Causes.

(See Diagram 3, outer-ringed segments).

	%	
Malformations	11.73	88.39
Prematurity	45.17	
Injury at birth	16.09	
Early infancy	15.40	

(B).—Percentages of Deaths due to other than Pre-natal or Natal Causes.

(See Diagram 3, inner-ringed segments).

	%	
Epidemic, endemic and infectious diseases ..	2.3	11.61
Bronchitis, broncho-pneumonia, pneumonia	5.63	
Diarrhoeal diseases	1.27	
Wasting diseases	1.95	
Other diseases	1.84	
Violence	0.69	

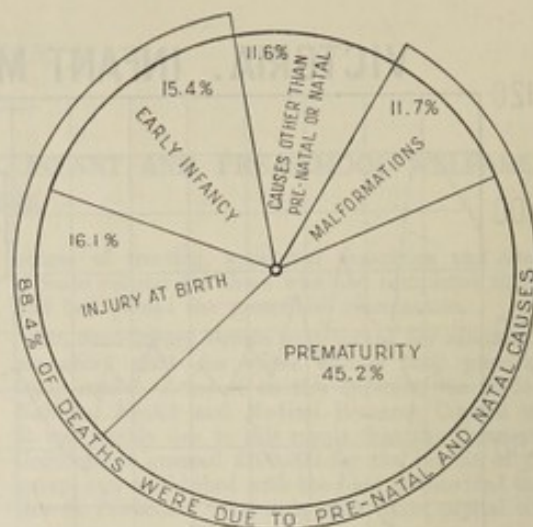


Diagram 3.

PRE-NATAL SECTION.

PRE-NATAL SUPERVISION CENTRES.

With the appointment of a pre-natal medical officer to the Maternal and Child Hygiene Branch of the Department of Health a number of pre-natal supervision centres have been set up in various municipalities. The municipal councils provide furnishing and equipment and are responsible for the upkeep of the Centre.

Government assistance is given in the following manner:—

- (1) Where desired, services of the pre-natal medical officer and nurse are provided to municipalities by the Department one-half day per week.
- (2) If the Departmental medical officer is not available, the Department will engage an approved pre-natal medical officer on a session-fee-payment basis.
- (3) If the municipal councils desire to appoint their own medical officer, the Department will grant a subsidy of £50 per annum, provided the Centre is conducted in an approved manner.

Many of these Centres are being established in Infant Welfare Centres and are being conducted in hours when such Infant Welfare Centres are not functioning, or in special rooms set apart for the purpose. At South Melbourne a hall has been partitioned to adapt it to the purpose. At Prahran Health Centre a special set of rooms has been erected.

The following diagram gives an indication of the needs for such special buildings, but according to the alterations necessary in individual Centres, expenses for alterations and equipment vary from a few pounds to approximately £100—the number of essential articles varying with the likely number of attendances. It is wise to begin very simply when entering upon the scheme until it has been tested. A fair trial should be given before any final decisions are reached.

An increasing number of patients has attended the pre-natal supervision Centres during the year and new Centres have been opened at Collingwood, Hawthorn, Northcote, Richmond, and Sunshine. Fitzroy is opening a Centre shortly and at Prahran the numbers attending have been so heavy that the pre-natal Centre is now open two half days a week instead of one afternoon as formerly.

The infant mortality rate for the State of Victoria in 1945 was 28.03.

A study of Diagrams (1), (2), and (3) illustrating the Vital Statistics, shows that this lowering of the infantile mortality rate, has occurred mainly between one month and twelve months of age.

Diagrams (2) and (3) demonstrate the vital need of increased education and care in the *Pre-natal period*.

This care should be given to ensure *early medical treatment* of any illness or abnormality detected during pregnancy.

Special attention should be paid to *correct nutrition*.

Leaflets compiled by this Department should help considerably in stressing the importance of this aspect in pre-natal care.

Five such leaflets have been provided, namely:—

- "Ante-natal Clothing."
- "Prospective Motherhood."
- "Pre-natal Diet."
- "Pre-natal Exercises"; and
- "Post-natal Exercises."

A booklet dealing with pre-natal care will shortly be available.

Educational talks and demonstrations on hygiene and diet are given in some Infant Welfare Centres for expectant mothers.

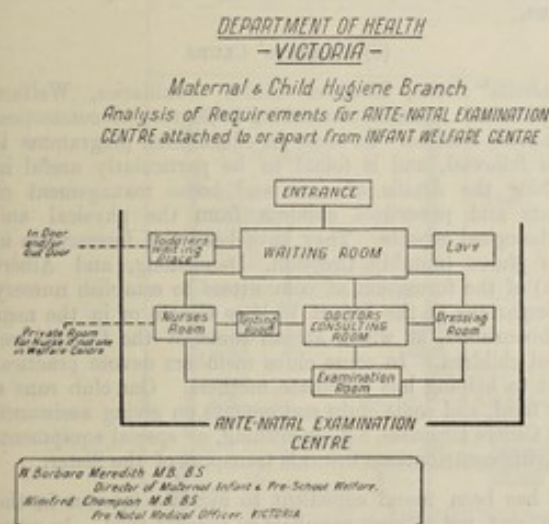


TABLE (5).—ATTENDANCES OF EXPECTANT MOTHERS FOR YEAR ENDED 30TH JUNE, 1946, AT:—
(a) *Metropolitan—Municipal Pre-natal Supervision Centres.*

Name of Centre,	Number of Patients,	Number of Visits to Centres,
South Melbourne	138	578
Northcote	78	312
Sandringham	18	59
Richmond	34	118
Prahran	228	1,098
Total	496	2,165

(b) *District-nursing Pre-natal Supervision Centres.*

Name of Centre,	Number of Visits to Centre,
Collingwood	639
Footscray	501
South Melbourne (until end of November, 1945) ..	122
Total	1,262

(c).—*Attendances of Expectant Mothers for Pre-natal Hygiene at Victorian Infant Welfare Centres.*

—	1944-45.	1945-46.
Number of individual cases ..	5,937	5,995
Number of new cases ..	4,453	4,567
Total number of consultations ..	13,908	14,063

INFANT HEALTH SECTION.

Infant Welfare Centres are depots established and maintained throughout the State by municipal councils, which bear the capital and equipment costs and all maintenance and salary expenditure over £165 per annum for each full-time nurse employed, this latter being the subsidy granted by the Government through the Department of Health. This subsidy is to be increased to £200 per annum from the beginning of the financial year. The municipal council employs, pays and discharges the nurse.

The council may be assisted domestically by its own local Health Committee or by the local voluntary Infant Welfare Committee.

All the Infant Welfare Centres subsidized by the Government are co-ordinated through the Maternal Infant, and Pre-school Division of the Department of Health, but some of the councils, with their local committees also seek affiliation with one of the voluntary organizations.

VOLUNTARY ORGANIZATIONS.

(a) *The Victorian Baby Health Centres Association*, with which approximately 57 per cent. of the Infant Welfare Centres are affiliated, and so may also be known as Baby Health Centres.

(b) *The Society for the Health of Women and Children*, with which approximately 11 per cent. of the Infant Welfare Centres are affiliated, and so may also be known as Baby Welfare Centres.

The remaining 32 per cent. of the Infant Welfare Centres are not affiliated with either voluntary organization.

NUMBER OF CENTRES.

At the end of June, 1946, there were 316 Static Centres operating in Victoria.

During 1945-46 four centres closed. One centre reopened leaving 273 Static Centres. Twenty-two new Static Centres and one new depot in the Kowree Shire were opened during the year.

These make a total of 316 Government subsidized Centres operating at the end of June, 1946.

170 municipalities contributed towards the support of these Centres leaving 27 municipalities not contributing to any form of infant welfare service. These are served, however, with others, by the departmental Infant Welfare Correspondence Scheme.

New councils which have established Centres (3) are:—Mansfield, Eltham, and Charlton.

Councils with Established Centres forming New Centres (14).—Berwick, Chelsea, Cranbourne, Corio, South Barwon, Geelong West, Frankston, Flinders, Portland Shire, Healesville, Lilydale, Orbost, Seymour, and Werribee.

Newly-formed subsidized Centres (22).—Aspendale, Avenel, Barwon Heads, Bendoc, Bittern, Bonang, Carrum, Charlton, Cranbourne, Digby, Eltham, Geelong North, Gembrook, Healesville, Little River, Manifold Heights, Mansfield, Mt. Dandenong, Officer, Somerville, Tallarook, Toolangi.

Of the 170 contributing or supporting municipalities—

35 metropolitan councils support	106 Infant Welfare centres.
106 country councils support	.. 192 Infant Welfare Centres.
22 councils contribute to	.. — adjacent Infant Welfare centres.
7 councils support	.. 18 Circuit Infant Welfare centres.
170 councils support or contribute to	316 Infant Welfare Centres.

(3) MUNICIPAL ACTIVITY AND SUPPORT.

Municipal interest and support is well-marked and evidenced in many beautiful Centre buildings specially erected for the purpose.

Special new buildings have been erected at Heidelberg West and Warrandyte.

Many councils have plans prepared and new buildings will be erected when permits are obtained.

A plan for the new Infant Welfare Centre at Albert-street, Footscray, is shown in this Report with other plans for Infant Welfare Centres with provision for the pre-school child.

Fresh and dried milk is still supplied by councils in some areas when occasion demands.

Dental care which was interrupted during the war is again being given in two of the city centres (Flemington and North Carlton) and in one of the country centres (Colac).

(4) VOLUNTARY HELPERS.

These assist the Sister in the Centre by weighing and measuring babies and children. They usually attend a short course first, to enable them to learn the routine. Their help is invaluable at many Centres.

Further voluntary helpers are assisting and more are needed in supervision of the waiting pre-school children, either in playgrounds or in the indoor waiting places.

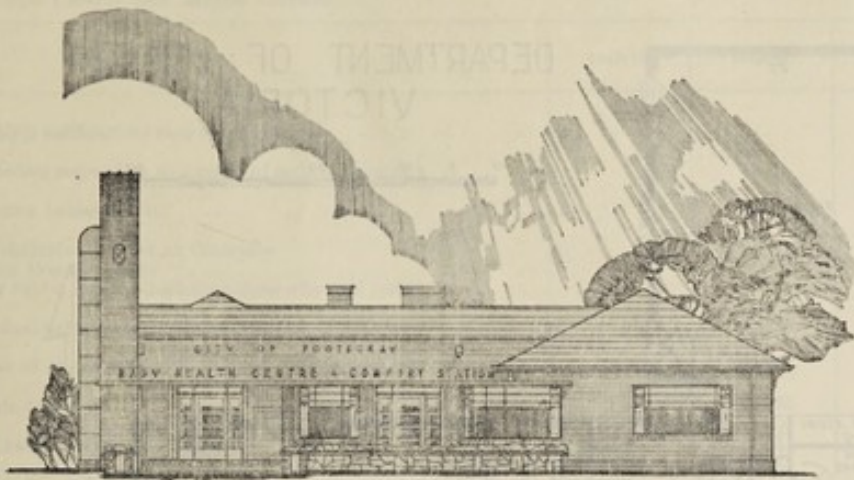
(5) HOME HELP SCHEME.

To aid expectant or nursing mothers and families where there are young children and the mother is temporarily incapacitated by illness an emergency house-keeper service was instituted in Kew municipality. This has been of great benefit to many mothers and in the ensuing year a Government subsidy will aid municipalities to provide this source.

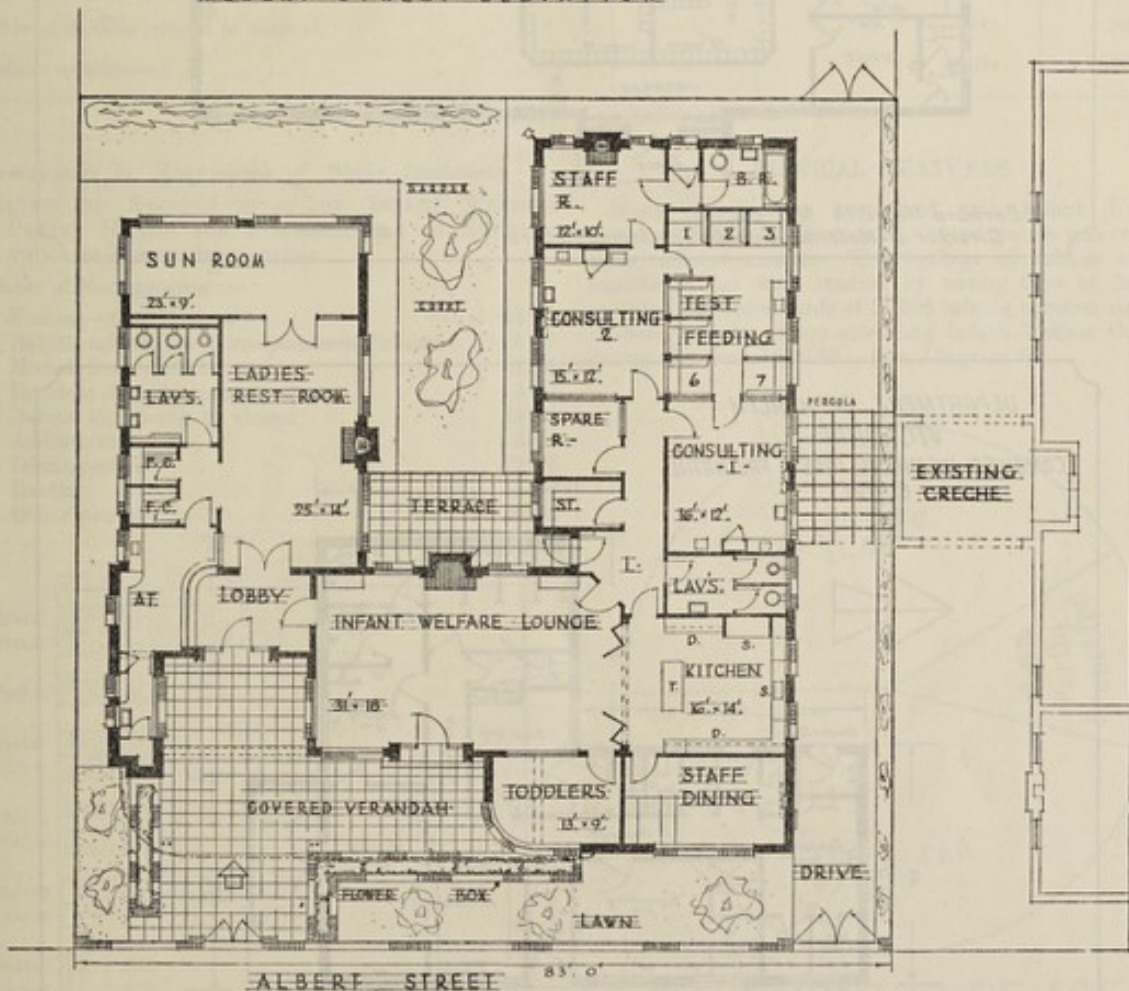
(6) PARENTS' CLUBS

Parents' Clubs, Mothers' Clubs, Auxiliaries, Welfare Leagues, etc., are still flourishing in degrees in connection with some Centres. In some an educational programme is often followed, and is found to be particularly useful in teaching the details of care and home management of infants and pre-school children from the physical and psychological aspects. They have been the forerunners in some places (notably Croydon, Dandenong, and Albert Park) of the formation of committees to establish nursery kindergartens at the Infant Welfare Centre or in the near neighbourhood, at which attend some of the Centre pre-school children. In some clubs members devote practical effort to helping less fortunate mothers. One club runs a milk fund, and some clubs concentrate on giving assistance with Centre expenses, e.g., furnishing, or special equipment, or giving contributions towards transport of the Sister.

It has been found expedient to increase interest in the movement, not to limit members to parents only. In some cases fathers' councils have been formed.



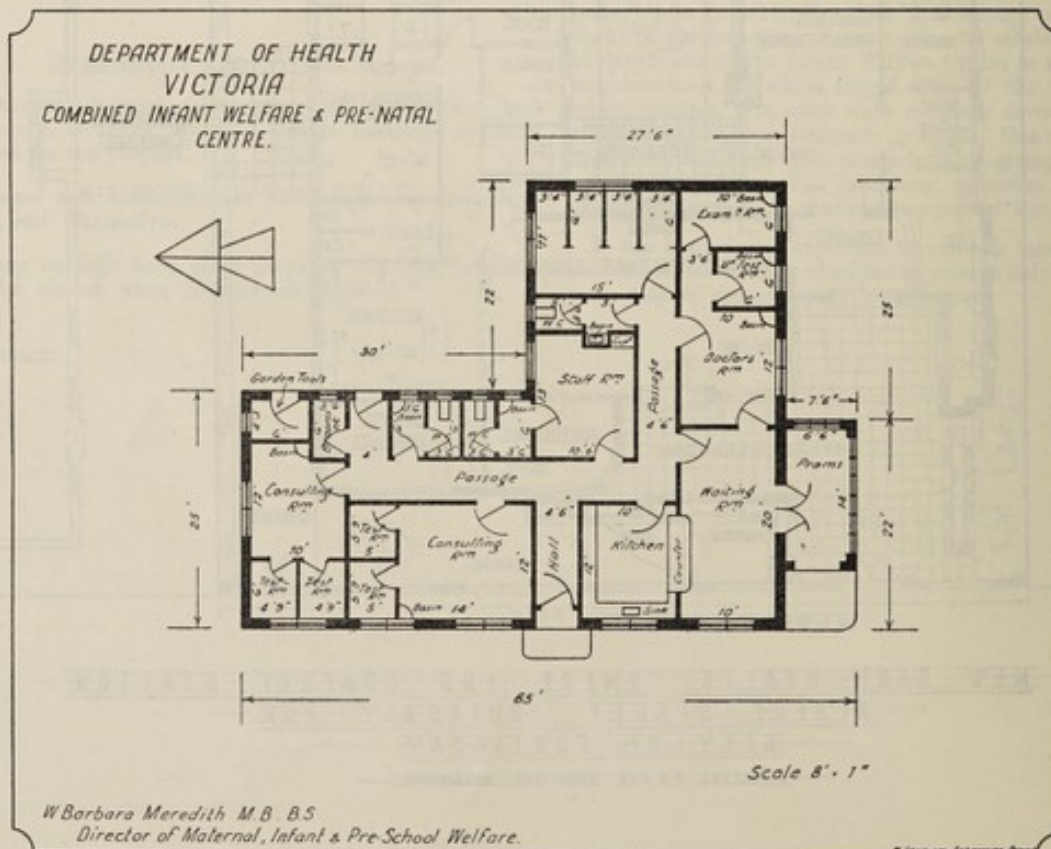
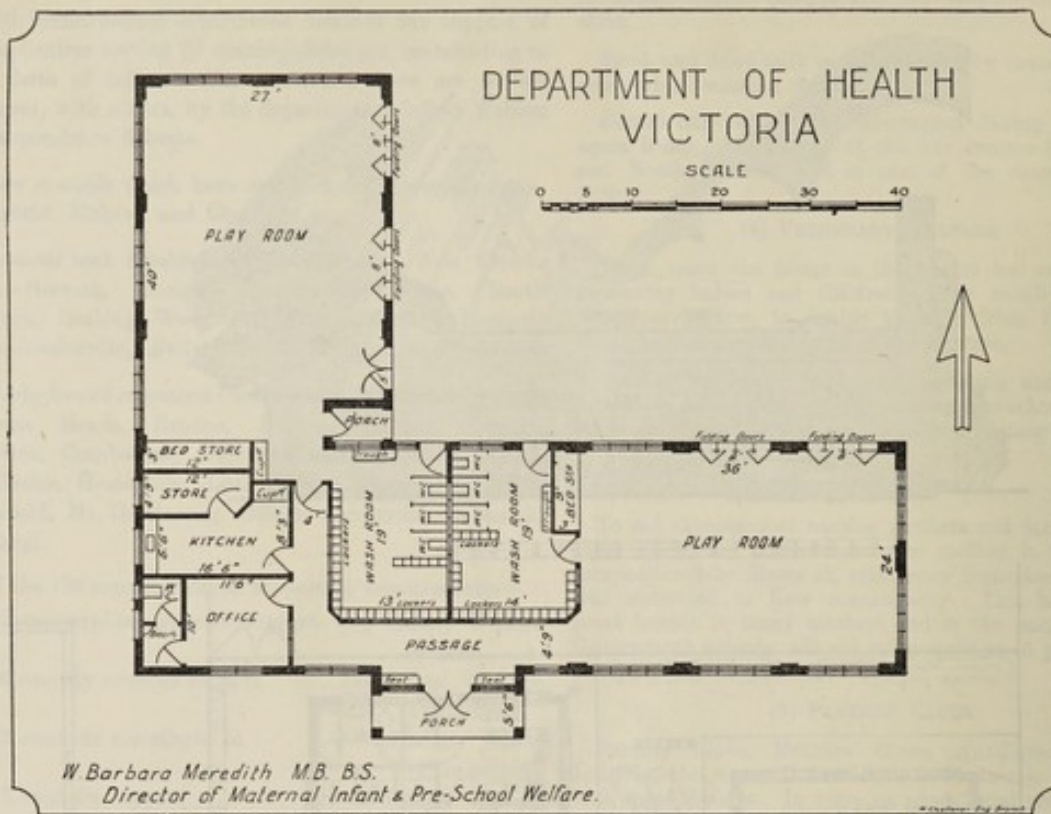
ALBERT STREET ELEVATION



ALBERT STREET 83' 0"

— NEW BABY HEALTH CENTRE AND CONVEY STATION —
 — ALBERT STREET FOOTSCRAY FOR —
 — CITY OF FOOTSCRAY —

— J. PLOTTEL F.R.A.I.A. ARCHITECT MELBOURNE —



DEVELOPMENT OF INFANT WELFARE SERVICES IN VICTORIA.

(Comparative Figures).

TABLE (6).

A.—Static Centres and Mobile Services.

	1917-18.	1926-27.	1944-45.	1945-46.
Number of birth notifications received during year	..	..	36,353	37,594
Number of babies responding as a result of such notifications	..	..	22,858	23,330
Number of new babies on roll	..	..	37,910	39,327
Number of individual babies at Centres—				
(a) under twelve months	..	..	38,213*	42,219*
(b) over twelve months (including those over two years)	..	..	44,897*	46,084*
Total individual babies and children at Centres	913	25,735	78,202†	82,588†
Total number of attendances of babies and children at Centres	4,116	192,142	838,733	833,248
Nurses' visits to homes	1,407	62,535	78,547	82,460
Number of babies referred to doctor	..	..	8,514	8,417
Number of babies referred to hospital	..	..	1,443	1,504
Number of mothers referred to doctor	..	..	1,469	1,590
Number of mothers referred to hospital	..	..	411	355
Telephone consultations	..	..	30,094	31,359

* Including transfers.

† Excluding transfers.

Non-responses to Notifications of Births Invitations.

ANALYSIS OF REASONS GIVEN BY INFANT WELFARE CENTRE NURSES FOR NON-RESPONSES TO NOTIFICATIONS OF BIRTHS INVITATIONS.

Cause of Non-response :—	%
Visiting other Centres	14.87
Babies referred to Correspondence Scheme	5.98
Moved from district	7.24
Resident beyond municipality	4.67
Babies too young to attend	13.26
Address unknown	2.63
Disinterested	12.75
Deaths	7.88
Other causes	30.72

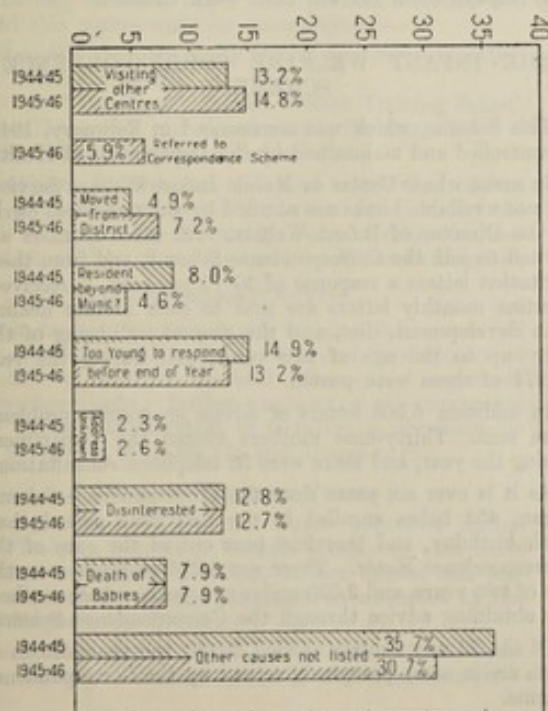
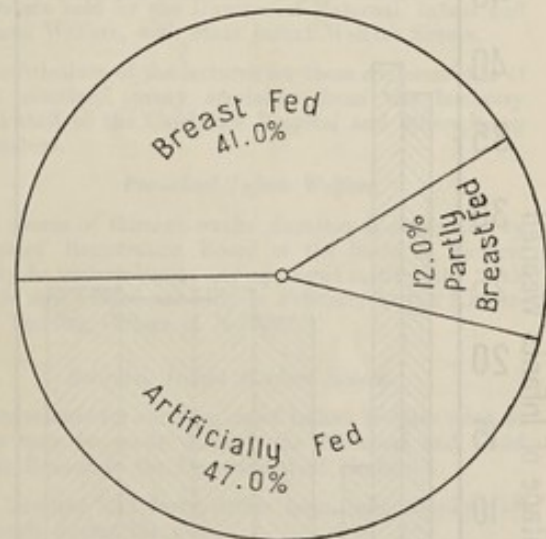


Diagram 5.

CLINICAL FEATURES.

Many consultations were held with Infant Welfare nurses to discuss the keeping of Centre records and returns in a uniform manner. The feedings of infants at six months of age were studied by noting type of feeding recorded on record cards of 27,906 infants between six and eighteen months of age attending Infant Welfare Centres during the year 1945-46. (See Diagram 6).



AT 6 MONTHS OF AGE

Diagram 6.

AT SIX MONTHS OF AGE.

This is compared with Diagram (7) shown below of special analysis made by the Infant Welfare Inspectors showing the feedings at three months of age of 3,374 infants attending 47 Infant Welfare Centres in the metropolitan area and 19 in the country.

MOBILE INFANT WELFARE SERVICES.

These services contact mothers and babies in the more sparsely populated areas of Victoria.

The Pioneer Motor Travelling Centre—a two-nurse residential caravan is controlled by the Victorian Baby Health Centres Association, and receives an annual subsidy from the Department of Health, £330 being paid to the Association and £150 to contributing councils.

This caravan operates in the Northern Mallee as far west as Murrayville.

There are four circuit services in Victoria established and maintained by the Department and known as Government-municipal Circuit Services.

The municipalities concerned pay the Department half the Sister's salary and maintain Centres or Depots established on the Circuit routes.

The areas covered by the four van services are:—

- (1) The Omeo and Tambo shires, in the Gippsland District.
- (2) The Dimboola Shire, in the Wimmera District.
- (3) The Towong and Upper Murray Shires in the far North-east of Victoria.
- (4) The Kowree Shire including the Balmoral riding of the Wannon Shire in the far west of Victoria.

Regular fortnightly, and in some cases, weekly visits are paid to each of the towns in these shires, and visits are also paid to the further out farms and homes on the routes.

These Mobile Services are greatly appreciated by country mothers, and the response has been very gratifying.

Seven hundred and fifty-five individual babies and children paid 5,073 visits to the Victorian Health Centres Association's Caravan, and 1,464 individual babies and children paid 11,056 visits to the Van Services during the year 1945-46.

During the war years great difficulty was experienced in obtaining suitable vehicles for this work, and at present two army disposal trucks are in use.

The smaller type van has been proved the most satisfactory type as this is more suitable for women drivers, and is also safer on the mountainous roads.

The work on these vans is exacting and strenuous, but the Sisters find that the appreciation shown by the mothers fully repays them for the hard work entailed.

THE INFANT WELFARE CORRESPONDENCE SCHEME.

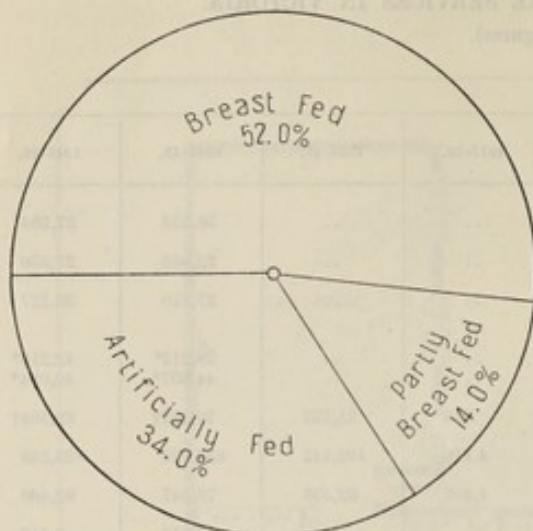
This Scheme, which was commenced in February, 1940, is controlled and maintained by the Department of Health.

In areas where Centre or Mobile Infant Welfare Services are not available births are notified by the municipal clerks to the Director of Infant Welfare. All these mothers are invited to join the Correspondence Scheme, and from these invitation letters a response of 30.75 per cent. is received. Routine monthly letters are sent to each mother dealing with development, diet, and the general well-being of the baby up to the age of two years, and during the year 32,974 of these were posted.

In addition 6,508 letters of advice on specific problems were sent. Thirty-nine mothers visited the Department during the year, and there were 53 telephone consultations.

As it is over six years since the Correspondence Scheme began, 451 babes enrolled in the first year passed their sixth birthday, and therefore pass out of the care of the Correspondence Sister. There are 6,276 children over the age of two years, and 2,590 under two years, whose mothers are obtaining advice through the Correspondence Scheme.

Of the 22 new centres opened during the year, fifteen of them are in areas previously served by the Correspondence scheme.



AT 3 MONTHS OF AGE

Diagram 7.

AT THREE MONTHS OF AGE.

Analysis was also made of ages at which 1,161 infants being artificially fed at three months of age, were weaned.

TABLE 7.—AGE OF WEANING OF 1,161 INFANTS BEING ARTIFICIALLY FED AT THREE MONTHS OF AGE. (SEE DIAGRAM).

		%
1-2 weeks 463 infants, no breast milk or weaned	40	(approx.)
2-4 weeks 123 infants weaned	10	"
4-8 weeks 288 infants weaned	25	"
8-13 Weeks 287 infants weaned	25	"

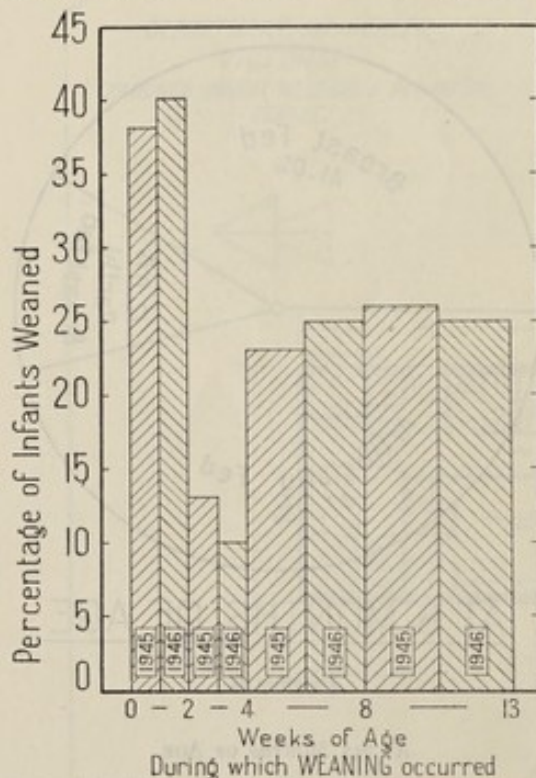


Diagram 8.

Weeks of age during which weaning occurred.

DEVELOPMENT OF INFANT WELFARE SERVICES IN VICTORIA.

TABLE (8).—INFANT WELFARE CORRESPONDENCE
SCHEME.

	1944-45.	1945-46.
Invitations sent—		
(a) first	3,180	3,082
(b) second	1,977	1,932
Responses—		
(a) first invitation	1,239	1,084
(b) second invitation	803	458
	2,042	1,542
Non-responses (cards re- turned)—		
(a) attending centres	249	178
(b) babies died	45	16
(c) Disinterested	74	42
	368	236
Expectant mothers advised	97	98
Total number of letters (ante- natal)	619	609
Personal letters and queries answered	10,935	6,508
Progress letters sent	35,007	32,974
Number of babies since in- auguration—		
(a) over two years	5,208	6,276
(b) under two years	2,566	2,590
	7,774	8,866
Number of letters posted for year	44,396	39,008

TRAINING IN INFANT WELFARE AND MOTHCRAFT.

A.—MEDICAL STUDENT.

The undergraduate medical students are still given an intensive course at two of the approved Infant Welfare Training Schools one day before attending the Children's Hospital, and a final day at the end of the hospital course.

At the end of June, 1946, 1,382 medical students had attended this course since its inauguration :—

519 at the Victorian Baby Health Centres' Association Training School.

394 at "Tandarra" Infant Welfare Training School. (This school was closed during the war).

469 at the Presbyterian Babies' Home.

In addition, lectures and practical instruction on the care of premature and new-born babies are given by the medical officer of the Victorian Baby Health Centres' Association, at the university and at the Women's Hospital.

B.—MIDWIFERY NURSES.

Some instruction is given, during training, in the care and feeding of infants and in the growth and development of the child, by approved medical officers and registered infant welfare nurses; further emphasis on the importance of care during establishment of lactation is necessary, as shown by figures in Table (7) and Diagram (8).

C.—INFANT WELFARE NURSES.

Training Schools.—There are three approved Infant Welfare Training Schools in Victoria complying with State regulations for training of infant welfare nurses, and presenting students for a State examination conducted by the Nurses' Registration Board :—

Presbyterian Babies' Home, 19 Canterbury-road, Camberwell, conducted by the Presbyterian Church.

Tweddle Baby Hospital, Barkly-street, Footscray, conducted by the Society for Health of Women and Children.

Victorian Baby Health Centres' Association, Swanston-street, Carlton, conducted by the Victorian Baby Health Centres Association.

Tandarra Infant Welfare Training School will re-open in August, 1946, and function as formerly.

The number of infant welfare nursing students trained per annum during the last three years is as follows :—

	1944.	1945.	1946.
Presbyterian Babies' Home	11	14	11
Tweddle Baby Hospital	15	18	11
Victorian Baby Health Centres Association Training School	26	28	27

Total number of Infant Welfare Nurses registered at end of June, 1946 1,004

Number of Infant Welfare Nurses engaged in subsidized Infant Welfare Centres 167

Number of Infant Welfare Nurses engaged by the Department of Health 14

i.e.,

(1) Inspectors of Infant Welfare Centres 6

(2) Correspondence Sisters 3

(3) Pre-natal Sisters 1

(4) Rural Sisters 4

Number of Infant Welfare Nurses specially engaged in pre-school work 4

(City of Melbourne, 2; City of Prahran, 1; City of South Melbourne, 1).

Monthly Conferences with Infant Welfare Sisters.

These are held by the Director of Maternal, Infant and Pre-school Welfare, with State Infant Welfare Sisters.

The curriculum of the lectures for these conferences is of a high standard, many specialists from the honorary medical staff of the Children's Hospital and others being the lecturers.

Pre-school Infant Welfare.

This course of thirteen weeks' duration is conducted by the Nurses' Registration Board of the State of Victoria and may be undertaken at any approved institution. This course is now offered annually in February at the Kindergarten Training College in Melbourne.

Relieving Infant Welfare Sisters.

Arrangements for carrying on of Infant Welfare work at Centres may be made through the Maternal and Child Hygiene Branch of the Department of Health.

One hundred and forty sisters have been supplied by the branch during the year.

Special Activities carried out by the Director and Infant Welfare staff include :—

Investigations concerning establishment of new Centres, Centre Inspections, Visits to Training Schools, Addresses and Lectures, Public Meetings and Conferences, office interviews, preparation, revision and distribution of literature, pamphlets, booklets, posters. Reception and analysis of quarterly and annual Infant Welfare Centre reports from 316 Centres.

(D).—MOTHERCRAFT NURSES.

Training Schools.—There are now eight approved Mothercraft Training Schools, as follows:—

	Number of Trainees.	
	1944-45.	1945-46.
Bothany Babies' Home, Geelong ..	8	10
Foundling Hospital, Berry-street, East Melbourne ..	7	10
St. Joseph's Foundling Hospital, Broadmeadows ..	12	20
Methodist Babies' Home, 19 Copelen-street, South Yarra ..	15	13
Presbyterian Babies' Home, 19 Canterbury-road, Camberwell ..	11	15
St. Gabriel's Church of England Babies' Home, Balwyn ..	13	14
Victorian Baby Health Centres' Association Training School, Swanston-street, Carlton	..	..
Tweddle Baby Hospital, Barkly-street, Footscray ..	10	10

Two Department of Health Mothercraft Nurses' Examinations have been held. Since the inauguration of this examination in 1930, 1,125 had satisfactorily passed by the end of June, 1946. The number of mothercraft nurses who passed the examination during 1945-46 was 78.

Pre-school Mothercraft Course.

Mothercraft nurses of the Department of Health are eligible to undertake a thirteen weeks course of training given annually in June at the Kindergarten Training College, Melbourne.

Mothercraft Nurses' Bureau.

Nurses were only available for 175 cases though 975 cases were booked.

The Mothercraft Matrons' Council and the Mothercraft Nurses' Council still function, the latter meeting regularly to consider the interests of mothercraft nurses. There has not been any necessity to call on the Board of Reference for mothercraft nurses.

Examples of Co-operation between Infant Welfare and other Activities may be Cited as follows.

(1) *Community Centres.*—This Department has continued to work in co-operation with the National Fitness Council of Victoria and the Housing Commission in regard to the development of infant welfare facilities in connection with the new housing projects, e.g.—

Fishermen's Bend.—The Residents' Council has given active and financial support to all branches of its own community facilities.

The area of the Infant Welfare Centre has been extended and the Centre is now open two afternoons each week. The Residents' Council has given the Sister-in-charge warm support and during the year were responsible for furnishings and the general care of the Centre.

It is interesting to note that Residents' Sub-committee for infant welfare and kindergarten units have combined to form a pre-school committee. This committee has raised £21, which has been paid into the Residents' Council funds.

Pre-school Unit.—The Resident and the Kindergarten Executive and members are to be congratulated on the gift of £4,000 towards extensions and new building fund. The playground unit has raised sufficient funds to provide double swings including guards, gymnastic combination and climbing tower.

An excellent vacation play centre was held for one week and was staffed by the Professional Youth Leaders' Training Course students. Attendance averaged 200 per day and excursions were made to places of interest.

Mothers Club.—During the year, the ladies' club has supported various community projects. Mothers' Thrift Account now totals nearly £400. This amount was raised over a period of two years. An electric pick-up was donated to the Community Hall by this club.

The folk dance group is open to all units.

The community activities are largely attributable to the enthusiasm and interest of the Residents' Council and the sub-committees.

(2) The co-operation between the *Infant Welfare Centre of the City of Melbourne*, situated at North Carlton, and the *Lady Goverie Pre-school Child Centre*. The same medical officer (the Child Welfare Medical officer of the City of Melbourne) supervises both institutions and acts as a vital connecting link between them. There is also the nucleus of a Community Centre in this scheme because of the juxtaposition of a children's playground.

(3) The co-operation between the *City of Melbourne Infant Welfare Centre at Pigdon-street* and the *Education Department* is an example of the possibility of continuity of observation of the child's development from the pre-natal stage to the end of his school period. This Centre is housed at the school with a small nursery school in the waiting room, from which, as age advances, the child is passed on to the kindergarten and then to the school classes. His Centre records are readily available to the school medical officer, if desired.

(4) *Prahran Health Centre* is an example of an excellent Health Centre, as it comprises various branches:—

- (a) Infant Welfare Branch—two Infant Welfare Sisters attached.
- (b) Pre-natal Branch—Medical officer and Infant Welfare Sister.
- (c) Pre-school Branch—Infant Welfare Sister.
- (d) Tuberculosis Department—with X-ray staff and outfit.
- (e) A Physical Fitness Department. As part of its activities a special programme is outlined for those over school age who are not quite fit. This Department contains a hall for exercises, two rooms for social activities, as well as offices, baths, &c.

(5) In rural areas co-operation exists between Infant Welfare Centres and Bush Nursing Hospitals; between Infant Welfare and Pre-school Centres and between Infant Welfare and Country Women's Association Centres, and in some cases between Infant Welfare Centres and rest rooms.

PRE-SCHOOL SECTION.

(A).—DEVELOPMENT OF GOVERNMENT POLICY.

Marked growth of interest in the pre-school movement has been developing in the community in recent years. It is gratifying that Victorian Governments have responded to community requests for the extension of this movement to foster the welfare of pre-school children. Indeed, by a continued forward policy, Victorian Governments have put this State into a position of leadership among Australian States in the matter of giving assistance on a stable basis to the State-wide extension of the pre-school movement, which has been so ably pioneered by voluntary effort.

Subsidy to Units.

One of the most significant decisions of the Victorian Government was the establishment in 1944-45 of the principle of a *per capita* subsidy to any approved free nursery kindergarten throughout the State.

This subsidy was at first at the rate of £4 *per capita*. During this year, 1945-46, the rate of subsidy has been increased and £6 is now available to such pre-school units approved by the Minister.

The amount of State Government subsidy paid to maintenance of nursery kindergartens for the year July, 1945-June, 1946, is £20,665, being six months at £4 *per capita* and six months at £6 *per capita*.

Subsidy to Training.

Owing to extreme shortage of trained kindergarten teachers, rapid expansion of the service is at present impossible. Of 129,000 pre-school children in the State, only 4,500 are able to attend subsidized free kindergartens.

Recognizing that shortage of trained personnel is the major factor in holding back the service, the Government in November, 1945, allocated for the first time a subsidy to the Kindergarten Training College—£5,000 for temporary building extension, and £2,500 annual maintenance.

Subsidy to Pre-school Child Development Officers.

In February, 1946, the Government approved the principle of subsidizing half the salary of pre-school child development officers. Such an officer would be appointed by a municipal council to undertake, in conjunction with the Department, supervision and organization of pre-school activities within the municipality. This is an important step towards implementing the departmental policy of decentralization.

Growth of the Department.

In April, 1945, the pre-school section of the Department was initiated. A threefold development was planned, Medical, Dental, and Educational. The first steps were taken towards setting up the educational side and the appointment of a Chief Pre-school Educational Supervisor was made. In January and April, 1946, respectively, two further Pre-school Educational Officers were appointed to assist.

In June, 1946, approval was given by the Minister for the appointment of a Pre-school Medical Officer.

Approval was also given in September, 1945, for the appointment of a social worker to undertake surveys and assist generally.

In September, 1945, a pre-school educational officer was appointed to the Correspondence Section to make this advisory service available to outback families with pre-school children.

(B).—FIELD DEVELOPMENTS.

(1) Nursery Kindergartens.

Since 1944 payment of State Government subsidy to Free Kindergartens has been made through the Department of Health, under whose general supervision these kindergartens now operate.

There are 85 subsidized Free Kindergartens with an aggregate of 4,500 children from two to six years of age in attendance.

Of these Kindergartens—

- 43 are affiliated with the Free Kindergarten Union.
- 13 are affiliated with the Roman Catholic Office of Education.
- 11 are affiliated with the Church of England Kindergarten Council.
- 10 are affiliated with the Presbyterian Kindergarten Council.
- 8 are independent of any organization and come directly under the Department.

Supervisory visits are made to these pre-school centres by officers of the Department, and conferences held with staffs, committees, executives of voluntary organizations, as required.

All units applying for subsidy for the first time are inspected by departmental officers, and a report prepared for the Director and the Minister.

4691/47.—3

(2) Pre-school Play Centres.

In March, 1945, a six-months course of training for pre-school play leaders opened at the Kindergarten Training College under the auspices of the Department of Health. At the conclusion of the course fifteen students gained certificates.

Under these leaders Pre-school Play Centres were set up in the following districts:—

Frankston, Kew, East Kew, Noble Park, Springvale, Mt. Dandenong, East Malvern.

An officer of the Department was set aside to oversee these Centres.

As play centres are not receiving a subsidy from the Government, supervision can only be offered by the Department to the committees concerned. It has been found that such supervision has been greatly desired and appreciated.

The Department has drawn up an agreement form for play leaders and committees, which is of great assistance in safeguarding proper conditions for the health and education programme in these Centres. Again, this form can only be suggested for use.

(3) Courses of Training.

(a) *Pre-school Infant Welfare.*—This course of thirteen weeks duration is conducted by the Nurses' Registration Board of the State of Victoria, and may be undertaken at any approved institution. This course is now offered annually in February at the Kindergarten Training College, Melbourne. Five nurses completed the course this year. One nurse came from New Zealand and one from West Australia. Two entered under the Army Rehabilitation Scheme.

(b) *Pre-school Mothercraft.*—Mothercraft nurses of the Department of Health are eligible to undertake a thirteen weeks' course of training given annually in June at the Kindergarten Training College, Melbourne. Seven nurses graduated in September, 1945, and received the Departmental Certificate in December, 1945.

(c) *Pre-school Lectures in Mothercraft Training Schools.*—A Pre-school Educational Officer visits the Mothercraft Training Schools at regular intervals to give a series of simple lectures on child behaviour and management. During 1945-46 an aggregate of 70 lectures was given at the following training schools:—

- St. Joseph's Babies' Home.
- Berry-street, Babies' Home.
- Presbyterian Babies' Home.
- St. Gabriel's Church of England Babies' Home.
- Methodist Babies' Home.
- Bethany Babies' Home.
- Tweddle Baby Hospital.

The trainees have also been taken in groups for directed observation to Lady Gowrie Child Centre and other Kindergartens. Altogether 105 nurses have attended these lectures.

(d) *Pre-school Play Leader.*—This six months' course of training was offered again in March, 1946. There were 25 enrolments. The course is given at the Kindergarten Training College, but is under the auspices of the Department of Health, and entitles the graduate to a certificate issued by the Department.

(4) Advisory Service.

The Department has been able to answer the call of the community for advice on practically every angle of pre-school organization. Enquiries have come from individuals, committees, organizations, members of Parliament, town councillors, doctors, architects, business firms, schools, &c., in most cases seeking information as to standards, methods of inaugurating and financing pre-school groups.

Attendance at meetings by departmental officers usually follows these initial inquiries and approximately 150 such meetings have been addressed during the past year.

The Department has thus been able to fulfil one of its important functions, that of central co-ordinating and advisory authority in the pre-school field.

TABLE (9).—GOVERNMENT EXPENDITURE ON MATERNAL, INFANT AND PRE-SCHOOL WELFARE PAID THROUGH THE MATERNAL AND CHILD HYGIENE BRANCH OF THE DEPARTMENT OF HEALTH, VICTORIA, 1945-1946.

Salaries—	£	£
Medical and Administration ..	1,633	
Infant Welfare and Pre-school Staff ..	4,881	
Clerical assistance ..	1,967	
		8,481
Subsidies—		
To municipalities towards maintenance costs of Infant Welfare Centres (at the rate of £165 per annum in respect of each full-time Centre)	27,264	
Cost of railway passes to Infant Welfare nurses attending part-time Centres	782	
Grant to Infant Welfare Training Schools	2,100	
To Free Nursery Kindergartens—		
Kindergartens ..	20,665	
Kindergarten Training College	2,500	
	23,165	
		53,311
Contingencies—		
Office expenses	1,660	
Travelling expenses	925	
Maintenance of mobile circuits (excluding salaries)	1,531	
		4,114
		65,906

COMMENTARY ON GENERAL PROGRESS AND SPECIAL NEEDS FOR EXTENSION.

The lowering of the infantile mortality rate for the State of Victoria to 28.03 per 1,000 births is satisfactory and compares favourably with that of other countries, especially if the difficulties against which the mothers are contending to be remembered, e.g., short periods in hospital, difficult housing, &c.

From Diagrams (2) and (3) it is clear that this lowering of infantile mortality is due to a decrease in the number of deaths due to preventable diseases and that there has been little decrease in these due to natal and neo-natal causes. There is, therefore, great need to demonstrate the vital need for increased education in pre-natal period. The need for early detection and treatment of any abnormality in pregnancy and the value of correct nutrition should be stressed. For this purpose leaflets mentioned under pre-natal section are available and should be used in all Infant Welfare Centres.

The ante-natal work could be carried still further if another half-time medical officer could be appointed. It might then be possible to educate mothers still further in need for ante-natal care by talks at Centres and Parents' Clubs, illustrated by films, &c.

INFANT AND CHILD WELFARE CENTRES.

There are now 316 Infant Welfare Centres in the State and only 27 out of 197 shires are not contributing to some form of infant welfare service. This extension of the work is very pleasing and there is much evidence of widespread appreciation of this service, particularly in country districts, e.g., Centres have been established at Mansfield, Charlton, Digby, Bendoc, Bonang, Tallarook, &c.

Many Infant Welfare Centres in the country have shown interest in the formation of pre-school groups, but this work is hindered by the difficulty of obtaining trained personnel.

The importance of natural feeding is stressed in all Infant Welfare Centres and in all training schools, but the figures in this Report are not satisfactory and many children are still weaned during the first few weeks of life.

In this connection it is satisfactory to note that the Government has approved of the appointment of a full-time medical officer for infant welfare. It is hoped that it may be possible for this officer to make a nutritional survey of expectant and nursing mothers and infants throughout the Infant Welfare Centres.

An increased award rate given by the Hospital Nurses' Wages Board has led to an increase in infant welfare sisters salaries. This has been met by the Government giving an increased subsidy to the municipalities from the 1st July, 1946, when £200 will be given per annum for each full-time infant welfare sister employed. Departmental salaries have also been raised as a result of the award.

TRAVELLING FACILITIES.

The Government pays subsidy of £330 per annum to Victorian Baby Health Centres' Association for their caravan, and also subsidies to the extent of £150 per annum those municipalities contributing to the Association Caravan Service.

Four mobile units are provided by the Government, the only cost to the municipalities included in this service being an annual payment equivalent to one-half the salary and travelling expenses of the circuit nurse. An extension of this mobile service is desirable.

In rural areas, where car transport expenses are incurred by the Infant Welfare nurse in the performance of her duties, a transport subsidy is now payable to the municipality concerned. This is equivalent to approximately one-half the expenditure paid by the municipality.

LITERATURE.

Government approval has been given for the providing of literature in such quantity that it will be available free for all Infant Welfare Centres, kindergartens, medical practitioners, &c. This literature will provide information for the expectant mother and also for the mother in the care of infant and pre-school child. It will ensure uniformity of teaching and help to co-ordinate all branches of child care.

THE "GUIDE TO INFANT FEEDING".

Adopted as a text book for Infant Welfare nurses and medical students has been revised by the late Director, and Dr. Kate Campbell, and will shortly be in the hands of the printer.

INCREASED STAFF.

During the year more councils have increased their Infant Welfare Centre nursing staffs in an endeavour to provide for their mothers the minimum time of ten minutes per case and thus maintain the efficiency of the Centre.

VOLUNTARY HELPERS.

During the war years some Centres have experienced difficulty in obtaining voluntary help. It is hoped that now a number of women are freed from war-time activities they will turn their attention to this branch of service, thus enabling the Infant Welfare sister to concentrate on the essential part of her work. In several Centres Red Cross helpers have offered to help regularly with the weighing of babies.

HOME HELPERS.

Public attention has been drawn throughout the year to the disabilities and difficulties with which the expectant mother and mother of young children contends. Owing to the overcrowding of our obstetric hospitals mothers have been discharged with their babies as early as the sixth day and have been compelled to grapple unaided with the difficulties of young children and unsuitable homes. Certain municipal councils, notably Kew, have instituted a system of home helpers for such cases.

In the coming year the Government has decided to inaugurate Government assistance for such Home Help Schemes. It is hoped that other municipalities will endeavour to provide such a service.

PRE-SCHOOL.

The three months post-graduate course of education in the care of pre-school child for registered Infant Welfare nurses has been appreciated. Up to date thirteen nurses have completed this course and 56 mothercraft nurses have also undertaken a pre-school course.

During the year two pre-school educational supervisors were appointed to the Department—Miss Freda Goldenberg and Miss Frances Emmerson. Miss Emmerson has supervised the various Play Centres.

MEDICAL OFFICER.

Approval has also been given by the Government for the appointment of a full-time medical officer to supervise the health of pre-school children. It is also hoped some provision for psychiatric services may be obtained.

MUNICIPAL MEDICAL OFFICER.

Where a municipality has many pre-school groups, Infant Welfare Centres, ante-natal clinics, &c., the appointment of an expert child welfare medical officer has been suggested.

Such an officer would work under the Medical Officer of Health on the lines adopted by the City of Melbourne for its child welfare work. The Government has approved of subsidizing such an officer in the ensuing year.

PRE-SCHOOL CHILD DEVELOPMENT OFFICER.

Such an officer may be appointed by a municipality to supervise various kindergartens and play groups in the municipality. Part of her work would be to further parent education and also to advise parents on pre-school educational matters at local Infant Welfare Centres when required. Government subsidy for such an officer may also be provided in the ensuing year.

SUMMARY OF RECOMMENDATIONS.

(1) That the teaching of ante-natal infant welfare and pre-school sections of the Department be aided by obtaining suitable films, e.g., nutrition, infant and child care, &c.

(2) That the services provided by the Government through this Department be also publicized by making of films, posters, &c.

(3) That a further half-time medical officer be obtained for work in ante-natal supervision centres and for instruction of mothers in importance of ante-natal care.

(4) That further staffing of Infant Welfare Centres by infant welfare sisters (on basis of one nurse to not more than 4,500 attendances per annum in fifteen hours a week Centre) be made to increase opportunity for more pre-natal care, natural feeding advice and assistance and detailed nutritional advice.

(5) That the importance of appointment of child development officers in municipalities be emphasized.

(6) That municipal councils be urged to set up Home Help Schemes along lines of Government subsidy.

(7) That where a municipality has numerous child welfare activities the importance of medical supervision of such be stressed.

(8) That provision of further facilities for the training of pre-school officers and of infant welfare and mothercraft nurses in pre-school care be made by the Government.

(9) That in the interest of public nutrition (and of growing children in particular) Governments shall prevent the impoverishment of our natural cereal foods by over-refinement and shall lay down suitable standards for whole meal bread, for fortifying all flour with mixed whole grain cereals for prepared breakfast foods.

(10) That efforts be made to increase natural feeding:—

(a) By correct nutrition of mother in pre-natal and nursing stage.

(b) By expert attention in stage of establishment of lactation in mothers by midwives specially trained in essentials of natural feeding.

(c) By provision of satisfactory home help.

(d) By good mothercraft.

(11) That a clean and safe cows' milk supply be maintained.

(12) That the extension of dental services for young children be made and subsidized as soon as possible.

W. BARBARA MEREDITH, M.B., B.S.,

Acting Director of Maternal, Infant and Pre-school Welfare.

3rd February, 1947.

APPENDIX B.

REPORT OF DIRECTOR OF TUBERCULOSIS, VICTORIA.

SUMMARY OF WORK—YEAR ENDED JUNE, 1946.

Area of Victoria 87,884 sq. miles.

Population 2,030,630

ANNUAL DEATH RATE PER 1,000,000.

Year.	Respiratory Tuberculosis.	Non-respiratory Tuberculosis.	Tuberculosis (All Forms).
1928	581	82	663
1929	496	92	588
1930	498	97	595
1931	481	68	549
1932	450	76	526
1933	40	66	471
1934	411	74	485
1935	414	64	478
1936	412	59	471
1937	384	51	435
1938	362	47	409
1939	402	48	450
1940	383	44	427
1941	397	55	452
1942	402	45	447
1943	323	52	375
1944	340	37	377
*1945.. ..	323	40	363

* Subject to revision.

Since my last report, the war has ended and some improvement has taken place in the staffing of institutions. Whereas throughout the whole period of the war 200 beds were unoccupied, now there are only 136, and it is anticipated with the increase in salaries and improved conditions for staff, these beds will be available for patients awaiting admission. Although peace has come there is likely to be a transition period before ex-service personnel settle down and staff difficulties are expected to disappear only gradually.

We have adopted the following procedure for the selection of in-patients:—

- (1) Re-admission of patients who have already had sanatorium treatment at some time is reduced as much as possible.
- (2) Advances cases are referred for domiciliary treatment, unless their home conditions or the presence of young children in the home require that the case be segregated.
- (3) Slowly progressive cases have been referred for bed rest at home during the waiting period and have been admitted to sanatorium later.
- (4) Priority is given, as far as possible, to early cases who would benefit most from sanatorium treatment, and to those cases for whom artificial pneumothorax treatment, at an early date, is indicated.

INSTITUTIONS.

	Male.	Female.	Total.
BEDS NOW AVAILABLE FOR RECEPTION OF TUBERCULOSIS CASES IN VICTORIA.			
Grosswell Sanatorium, Mont Park ..	192	..	192
Heatherton Sanatorium, Cheltenham ..	..	124	124
Greenvale Sanatorium, Broadmeadows ..	..	96	96
Central Hospital, Melbourne	42	42	84
Austin Hospital, Heidelberg	84	44	128
Austin Hospital, Heidelberg (Children's Ward)	6	6	12
Dunstan Chalet, Royal Park	19	..	19
Eleanor Shaw Chalet, Royal Park ..	..	12	12
Bendigo Chalet, Bendigo	14	10	24
Ballarat Chalet, Ballarat	6	6	12
	363	340	703

BEDS UNDER CONSTRUCTION.

Greenvale Sanatorium	..	144	144
Heatherton Sanatorium	..	72	72
Mildura Chalet	7	7	14
Hamilton Chalet	7	7	14
Horsham Chalet	7	7	14
Wangaratta Chalet	7	7	14
Sale (Ex-R.A.A.F. Hospital)	18	18	36
	46	262	308

BEDS TO BE AVAILABLE IN 1947.

	409	602	1,011
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Figures set out below show increase of beds since 1927 being 84 more than shown in my last Report.

1927	413
1946	703

STATE SANATORIA BOARD.

Heatherton, Greenvale, and Grosswell Sanatoria are controlled by the State Sanatoria Board, comprising eight (8) members appointed by the Minister. They are representatives of the National Council of Women of Victoria, the Australian Natives' Association, business men, and hospital and social workers, with the State Director of Tuberculosis as Chairman, *ex-officio*, Mr. W. J. Lynch, Secretary, and Mr. W. Paterson, Inspector.

The following are the present members of the Board:—

Dr. J. Bell Ferguson, State Director of Tuberculosis (chairman) *ex-officio*.

- Mr. Edgar Rouse—Managing Director of Kodak (Aust.).
 Sir Herbert Gepp—Managing Director of Australian Paper Manufacturers Ltd.
 Mr. C. J. Gates—Commissioner of State Savings Bank of Victoria.
 Dr. A. Haywood—Executive of Australian Natives' Association.
 Mrs. Herbert Brookes—Member of Committee of Management of Alfred Hospital.
 Mrs. D. A. Skene—Executive of the National Council of Women of Victoria.
 Mr. T. E. Meek—Member of Committee of Management of Royal Melbourne Hospital.

The Board's functions are to—

- (i) Make recommendations (subject to the approval of the Minister and the Public Service Board) regarding the number, status, and salaries or wages of the Sanatoria staff.
- (ii) Appoint and remove—temporary female staff only.
- (iii) Allot duties of members of Sanatoria staff.
- (iv) Have general control of Sanatoria repairs, new buildings, furnishings, &c.
- (v) Members have the power of inspection at any time and to exercise a general supervision over the workings of the Institutions to assure a high standard of efficiency.

INSTITUTIONS.

METROPOLITAN.

GRESSWELL SANATORIUM.

Medical Superintendent :

Dr. D. B. Rosenthal—192 Beds (Male Patients).

Due to the increase in staff, it has now been possible to open one of the two new 24-bed wards built in 1942, and 168 beds are now occupied with prospects of the other ward being opened at an early date.

The Senior Medical Officer has now been provided with a five-roomed cottage with an attractive garden, &c. Continued improvements are being made to the gardens and grounds by the Curator of Gardens and Grounds, Mont Park, whose services have been made available by the Mental Hygiene authorities for all our sanatoria. He visits monthly.

To provide optimum accommodation for the domestic and nursing staff, approval has been given to the erection of a modern nurses' home in the sanatorium grounds to accommodate 140.

The comfort of the patients has not been overlooked and plans are envisaged for the provision of a new recreational hall and an additional occupational therapy work room.

Referring to the question of nurses' quarters acute difficulty was found in accommodating the extra staff required. This was solved for the time being by the generous co-operation of the neighboring Mental Hospital authorities at Mont Park by the provision of an unoccupied block in their grounds.

Occupational Therapy.

Continued interest is being taken in this valuable work and nearly every patient is occupied in some type of work of helpful and instructive character. Exhibitions of handcrafts have been held on two occasions, and the value of the exhibits on each occasion were worth in the vicinity of £3,000. The turnover has now reached £4,234, compared with £47 when occupational therapy was first introduced into the institution in 1934. We must endeavour to expand this work in the direction of vocational training so that certain selected patients may actually learn some occupation of value while in sanatorium which will serve as a means of livelihood on discharge.

GREENVALE SANATORIUM.

Medical Superintendent :

Dr. M. E. Playle—96 Beds (Female Patients).

I have now to report, that owing to staff being forthcoming, the new 24-bed ward was opened and the institution is now fully occupied.

Provision was made in the plans for additional wings to the 72-bed ward which has been under construction for some time. The wings and an additional floor will accommodate in all another 72 beds, and when finished will bring this new block to 144 beds with considerable saving in constructional costs. The beds available will then be 240. This additional number of beds requires extension to the administration block as previously planned. The Recreation Hall, which is a converted building from Coode Island, is shortly to be replaced by a modern hall accommodating approximately 350 patients and staff. Plans have now been developed, and it is anticipated work will commence at an early date. This amenity is long overdue.

Amenities for staff are being improved. A new concrete tennis court has been constructed in place of the existing clay court. Improvements to the swimming pool and also a nine-hole golf course are under construction.

The grounds are assuming a pleasant appearance under the skilled instruction of Mr. D. McSwan, Supervisor of Sanatorium Gardens and Grounds, in collaboration with the sanatorium gardeners. Many new lawns have been prepared and sown and shrubs planted.

Occupational Therapy.

Patients have continued under the guidance of Mrs. Snow, who made occasional voluntary visits, to carry on occupational therapy in the new well equipped and lighted block provided for this purpose.

Unfortunately, we have been unable to obtain the services of a qualified and whole-time instructress in handcrafts. With the help of the Australian Red Cross Society we hope to obtain this in the near future.

HEATHERTON SANATORIUM.

Medical Superintendent : Dr. H. Watson.

(124 beds—Female Patients.)

Since the Government assumed full financial and administrative responsibility for the management of this institution in February, 1945, the State Sanatoria Board is endeavouring to bring the administration of this institution into line with the other sanatoria. Certain improvements have been made, such as renovations to the domestic quarters and also attention to buildings around the institution with many structural repairs.

A new 72-bed three-storied ward is now under construction and is to be completed in 1947. Government approval has been obtained for the erection of a second 72-bed ward of similar design. Approval has been given for the erection of a new home to accommodate 132 members of the domestic and nursing staff. Plans have been prepared and tenders called. These 72-bed units are of the latest design and well reflect great credit on the authorities concerned.

The gardens and grounds of the institution are being improved under the direction of the Supervisor of Sanatorium Gardens and Grounds, Mr. D. McSwan.

Occupational Therapy.

A full-time instructress, Miss E. Keys, is now employed at the institution five days weekly, and appreciation of her instruction is manifested in letters received from patients and relations. As in the other institutions, the Board is endeavouring to extend these activities. Plans are being prepared for the present Recreation Hall to be enlarged and extra provision will be made for occupational therapy by altering accommodation in another building.

SUMMARY OF SURGICAL WORK AT THE AUSTIN HOSPITAL.

Operations at Austin Hospital Sanatorium Wards—Year 1945-46.

Type of Operation.	Total Number of Operations.	Total Number of Patients.	Male.	Female.	Number of Patients.	Austin Hospital Patients Only.				
						Arrested.	Improved.	I.S.Q.	Worse.	Died.
Thoracoplasty	45	21	9	12	19	8	6	2	1	2
Monaldi suction drainage	1	1	..	1	1	1	..	..	..	..
Phrenic nerve operations—	..	..	..	..	11	6	4	1	..	..
Crush	44	43	15	28	..	..	..	..	..	..
Recrush	2	2	..	2	..	..	..	..	..	..
Evulsion	6	6	3	3	..	..	..	..	..	..
Pneumoperitoneum induced (associated with phrenic paralysis)	1	1	1	..	..	..	1	..	..	..
Thoracoscopy for adhesion section	95	89	31	58	5	3	2	..	..	..
Bronchoscopic examination	2	2	1	1	..	..	..	..	..	..

AUSTIN HOSPITAL SANATORIUM—1ST JULY, 1945, TO 30TH JUNE, 1946.

Austin Patients only—Artificial Pneumothorax Inductions.

Attempted without success .. 1 male
Induced and maintained .. 5 (2 male, 3 females)

Pleural Lavage for Tuberculous Empyema.

Number of patients .. 4 (3 male, 1 female)

CENTRAL HOSPITAL.

(84 beds—42 female, 42 male.)

Dr. A. Pennington—Medical Director.

Mr. C. H. McVilly—Administrator.

Following the acquisition of the Old Melbourne Hospital by the State Government, 84 tuberculosis beds were made available in July, 1945.

It is hoped to extend facilities for some of the more modern methods of surgical treatment, in addition to similar activities, at the Austin Hospital where theatre accommodation is restricted. In addition to tuberculosis beds it is proposed to have a Cancer, General, and Venereal Diseases Sections. A highly-qualified staff was secured, chiefly composed of ex-service medical officers, and appointments made on a sessional basis.

Owing to nursing and domestic staff shortages, only 42 beds were used. This difficulty, it is anticipated, will be overcome as the staff position improves.

From 24th July, 1945, when the 42 beds were used, until the date of compilation of this Report, 136 patients were admitted including 46 males, 90 females.

Fifty-three patients had some form of surgical treatment. This treatment included Artificial Pneumothorax, Phrenic Crush, Pneumoperitoneum, Lobectomy, and ten Thoracoplasties, and nineteen adhesion sections were performed.

AUSTIN HOSPITAL.

Dr. Hilary Roche—Medical Superintendent.

(140 beds, 84 males, 44 females, 12 children.)

The Austin Hospital continues to be the surgical centre for tuberculosis cases where the honorary services of Mr. C. J. Officer Brown are available.

As in the case of other Institutions, shortage of staff has caused the closure of 72 of the 140 beds available, and it is hoped that those will be re-opened with the publication of the next Annual Report.

DUNSTAN CHALET, MOUNT ROYAL.

(19 male patients.)

This Chalet, of total capacity of nineteen beds, is still proving a great help in placing chronic male patients without relatives or funds, and, during the year, dealt with 13 admissions, 4 discharges, and 5 deaths.

Since its opening in December, 1929, 362 patients have been admitted.

ELEANOR SHAW CHALET, MOUNT ROYAL.

(12 female patients.)

This Chalet, of total capacity of twelve beds, is for the placing of chronic female patients without relatives or funds, and has, during the year, dealt with 7 admissions, 6 discharges, and 3 deaths.

Since its opening in December, 1942, 53 patients have been admitted.

Whilst these male and female beds are invaluable, there is an urgent need for increase in the number of beds for indigent patients, and it would be extremely helpful if some of the other benevolent homes would arrange to provide additional accommodation under this heading.

COUNTRY BED ACCOMMODATION.

As reported last year, the Government has provided finance for the building of small Chalets, each of fourteen beds, in the grounds of certain Base Hospitals. Work is still in progress at Mildura, Hamilton, Horsham, and Wangaratta, and it is intended later to build Chalets at Geelong, Sale, Mooropna, and Warrnambool.

BALLARAT CHALET.

(6 male and 6 female patients.)

This Chalet, comprising six male and six female beds, built in the grounds of the Base Hospital, handled the following:—

	Male.	Female.	Total.
Admissions	5	10	15
Discharges	5	7	12
Deaths	..	2	2

Since its opening in May, 1940, 137 patients have been admitted, 70 males and 67 females.

BENDIGO CHALET.

(14 male and 10 female patients.)

This Chalet, comprising fourteen male and ten female beds, is situated in the grounds of the Base Hospital, and handled the following:—

		Male.	Female.	Total.
Admissions		15	12	27
Discharges		9	12	21
Deaths		5	2	7

Since its opening in October, 1933, 537 patients have been admitted, 279 males and 258 females.

SANATORIA ACTIVITIES.

Institution.	Admissions.		Discharges.		Deaths.	
	Male.	Female.	Male.	Female.	Male.	Female.
Austin ..	62	103	64	98	15	9
Greenvale ..	..	103	..	72	..	14
Gresswell ..	130	..	105	..	10	..
Heatherton ..	..	124	..	100	..	31
Ballarat Chalet	5	10	5	7	..	2
Bendigo Chalet	15	12	9	12	5	2
Dunstan Chalet	13	..	4	..	5	..
Eleanor Shaw Chalet ..	..	7	..	6	..	3
	195	339	187	295	35	61
Total ..	534		482		96	

DURATION OF STAY OF PATIENTS IN SANATORIA.

The following figures have been arrived at by averaging the stay, making correction for unduly short periods, due to death or where patients have left at own request—

Gresswell ..	..	12 months
Heatherton ..	..	12 months
Greenvale ..	..	8 months
*Austin ..	..	4 months

* Austin Hospital as the Surgical Centre includes a number of short term beds.

CONSULTING SURGICAL, RADIOLOGICAL, LARYNGOLOGICAL, DENTAL, AND OPHTHALMIC SERVICES.

CONSULTING THORACIC SURGEONS.

Mr. C. J. Officer Brown, Surgeon, continues to visit each Sanatorium regularly, where, in consultation with the State Director and the Medical Superintendent, all cases are considered and recommendations made for surgical treatment where necessary.

Mr. F. J. Colahan, in a honorary capacity, performs certain portion of such work at St. Vincent's Hospital, as also does Mr. F. Heyward at the Central Hospital.

RADIOLOGIST SERVICES.

Dr. Thwaites has, since 1940, made his services available as Honorary Radiologist to Heatherton Sanatorium.

OPHTHALMIC SERVICES.

We continue to have the services of Dr. Ellen J. M. Day, who visits each Sanatorium frequently for the purpose of examining patients who have some visual defect.

The supply of glasses to the poorer patients at a flat rate per head has continued under the arrangement with the Eye and Ear Hospital and has continued to prove satisfactory.

DENTAL SERVICES.

Visiting dentists still attend Sanatoria regularly on a sessional basis.

LARYNGOLOGIST SERVICES.

Dr. Walter Williams continues his visits to the Sanatoria for examination of patients requiring attention to ear, nose, and throat. He also attends the Central Tuberculosis Bureau on one half-day each week.

It will be seen, therefore, that our Sanatoria patients have available to them highly-specialized services which are much appreciated.

MASS RADIOGRAPHY.

DR. K. HALLAM—PART-TIME SUPERVISOR OF MASS RADIOGRAPHY.

Dr. K. Hallam reports that no fresh advances were made in the 1945-46 period, except that a centre was opened in October, 1945, at the Sacred Heart Hospital, Moreland, in the municipality of Brunswick.

The centres at South Melbourne, Newtown (Geelong), Williamstown, Prahran, and Brunswick have been examining members of the civil population, a statistical survey being appended. He reports that, as part-time Supervisor of Mass Radiography, he has travelled extensively in country districts to ascertain the best method of approach to surveys in such districts and to confer with local authorities.

The City Health Officer of Melbourne was interviewed, and talks with the Honorable the Minister of Health and the Consultative Council on Tuberculosis have resulted in a better perspective of the problems involved in an extensive campaign of Mass Radiography.

Dr. H. Maxwell James has recently visited U.S.A. and Canada with Mr. C. J. Officer Brown, Consulting Thoracic Surgeon, on behalf of the Government. He reported that the opinion there favours intensive local efforts in chosen areas at one time in a specified period rather than diffuse efforts for a whole State.

A Special Committee on Mass Radiography, attended by Drs. J. O'Sullivan, C. Eddy, K. Hallam, and the State Director of Tuberculosis, was co-opted to the Consultative Council on Tuberculosis. Their main recommendations were:—

- (1) That a full-time Supervisor of Mass Radiography be appointed, his title to be Supervisor of Mass X-ray Surveys, whose duties would be to have control and supervision of Mass Surveys under the direction of the State Director of Tuberculosis.
- (2) That two micro-radiographic transportable units be ordered, such units to be transported in 3-ton trucks, one unit to be used in the city and one in the country, this to be regarded as a beginning as a total of eight units would be required, five for the metropolitan area and three for the country area.

The prevalence and danger of undetected cases of pulmonary tuberculosis in the community are well known and the efficiency of micro-radiography in case finding is proven. The blue prints for mass radiography are drawn up, and those concerned in the problem are ready to go into action when staff and materials are made available.

Great advances in the technique of micro-radiography have been made by Dr. C. Eddy and his staff in the Commonwealth X-ray and Radium Institute at the Melbourne University. It is hoped to apply their methods as soon as possible.

MOBILE CHEST X-RAY UNIT.

With the prospect of obtaining the necessary trained technicians the Government is likely to proceed with its scheme for the provision of a travelling X-ray unit in country areas in the coming year.

It is hoped to appoint a Supervisor of Mass Radiography and at a later date provide further transportable X-ray units as the scheme develops.

CENTRAL TUBERCULOSIS BUREAU.

Mass radiography of tuberculosis contacts, public servants, and selected groups has been continued efficiently during the past year by the X-ray staff, Messrs. J. Long and F. Taylor.

A high standard has been maintained.

Apart from the micros shown hereunder, large films have also been taken of chests and sinuses at this Bureau and others.

Summary of Micro Examinations—Central Tuberculosis Bureau.

	Micros.	Large Films Ordered.	N.A.D.	Quiescent.	Active.	Heart.	Other Pathology Non T.B.
(a) Contacts of Known Tuberculosis Patients—							
Male	1,631	..	..	..	..	..	..
Female	2,185	..	..	..	..	..	..
Total	3,816	180	98	46	25	6	5
(b) Others—General Population—							
Teachers	1,064	22	19	2	1	..	..
Queen Victoria Hospital	104	..	..	..	..	..	..
Gas Company	62	2	2	..	..	..	..
Greenvale Staff	56	..	..	..	..	..	..
Heatherton Staff	3	..	..	..	..	..	..
Bureau Staff	10	..	..	..	..	..	..
Health Department	70	1	..	1	..	..	..
Brookes McGlashan and McHarg	57	1	..	1	..	..	..
Railways	5	..	..	..	..	..	..
Central Hospital Staff	30	4	3	1	..	..	..
Morey Hospital	12	..	..	..	..	..	..
Alexander Cowans Ltd.	15	..	..	..	..	..	..
School Play Leaders and Mothercraft Nurses	56	1	1	..	..	..	..
Opportunity Club	6	..	..	..	..	..	..
Australian Red Cross Society	4	..	..	..	..	..	..
St. Andrew's Hospital	14	1	..	..	1	..	..
Total	5,384	212	123	51	27	6	5

MUNICIPAL CENTRES.

Summary of Micro Examinations.

Centre.	(a) Number Examined.	(b) Number Probably Tuberculosis.	(c) Number of (b) Considered of Significance.
Newtown (Geelong) ..	1,786	41	22
South Melbourne ..	5,834	338	67
Prahran	859	13	2
Williamstown	4,315	66	15
Brunswick	1,089	15	3
Total	13,883	473	109

SUMMARY.

Excluding contacts 15,451 persons have been microed. Of that number 478 (2.9 per cent.) were suspects, and of these 110 (0.23 per cent.) were considered probably active tuberculosis cases.

REMARKS.

Municipal Centres.

Newtown (Geelong).—At this Centre, 1,786 examinees were X-rayed. The work had eased off due, presumably, to lack of propaganda. When this is in full flood, as we hope it will be in the near future, full use should be made of this Centre.

Williamstown.—The number of examinees X-rayed was 4,315. Good work continues to be done here under the enthusiastic control and guidance of Dr. Coutts and Mrs. Caithness of the Red Cross.

Prahran.—Spools of films are taken from time to time of contacts, and of those who come along specifically for the purpose of having a micro film taken, 859 being X-rayed during the year.

South Melbourne.—Steady work has been done at this Centre, where 5,834 examinees were X-rayed.

Brunswick.—This Centre is attached to the Sacred Heart Hospital, Moreland, and since its opening in October, 1945, has made progress in handling 1,089 examinees.

Before any of these Centres work in full capacity considerable propaganda and publicity will have to be undertaken.

BUREAUX ATTENDANCES, ETC.

Bureaux.	New Cases Applying.	Total Attendances Old and New Cases.	X-ray Examinations.		A.P. Result Attendances.
			Films.	Screens.	
Central ..	5,223	25,400	7,868	3,559	1,649
Ballarat ..	200	775	433	19	231
Bendigo ..	273	1,220	653	2	131
Geelong ..	84	1,765	360	89	90
Prahran ..	323	783	259	..	1
Total ..	6,103	29,953	9,573	3,669	2,102

NUMBER OF CONTACTS EXAMINED.

Bureaux.	Infecting Cases.	New Contacts.	Number of Re-examinations.	Total Number of Contacts Examined (Old and New).
Central	486	2,283	2,041	4,324
Ballarat	28	96	181	277
Bendigo	70	153	364	517
Geelong	35	137	373	510
Prahran	71	68	51	119
Total	690	2,737	3,010	5,747

Contacts Found Actively Tuberculosis from Above Examinations:—

Bureaux—

Central	76
Ballarat	—
Bendigo	6
Geelong	2
Prahran	2
Total	86 = .98 per cent.

NUMBER OF CONTACTS EXAMINED BY VOLLMER PATCH TESTS.

Results.

	Number.	Positive.	Negative.	Number of Record of Result.
Contact of cases with positive sputum ..	74	41	32	1
Contact of cases with negative sputum ..	22	5	17	..
Contact of cases with no record of sputum ..	118	37	66	15
Contact of cases with no sputum	6	5	1	..
Total	220	88	116	16

RESULT OF X-RAY, ETC., OF POSITIVE VOLLMER TEST.

Number.	Positive.	Negative.	Doubtful.
88	1	83	4

INVESTIGATION OF APPLICANTS FOR MINERS' PHTHISIS ALLOWANCES.

Result of Investigation.

Bureaux.	Number Reviewed.	Silicosis.	Silicosis plus Tuberculosis.	Tuberculosis only.	Negative.
Central	14	5	3	2	4
Ballarat	12	6	2	..	4
Bendigo	9	4	4	..	1
Total	35	15	9	2	9

TRAINEES X-RAYED FOR FOUNDLING HOSPITALS—BROADMEADOWS AND EAST MELBOURNE.

Number Examined.	Positive.	Negative.
19	..	19

PRE-SCHOOL MOTHERCRAFT NURSES X-RAYED.
(Arranged through Department of Health.)

Number Examined.	Positive.	Negative.
13	..	13

VISITING NURSES' ACTIVITIES.

Bureaux.	First Visits.	Revisits.	Invalid Pensioners Visited.
Central	630	3,618	1,235
Ballarat	15	1,012	346
Bendigo	32	314	..
Geelong	37	491	107
Prahran	29	127	49
Total	743	5,562	1,737
Total visits	6,305		

Owing to the great increase in the work at the Bureau, the attendance of nurses has been required more often than previously, and they, therefore, have not been able to do quite the same amount of visiting. Difficulties of transport and petrol shortage have also contributed to the smaller number of nurses' visits paid this year.

An extension of the scheme of visiting nurse to country areas will commence shortly with the appointment of Miss V. Stenborg to the Western Health area. It is hoped that this service will be later extended to other Country Health areas in the State.

TREATMENT.

Artificial Pneumothorax.

At present, 210 patients are receiving the above treatment, as set out below:—

Bureaux.	Male.	Female.	Total.
Central	37	67	104
Ballarat	8	8	16
Bendigo	5	8	13
Geelong	5	3	8
Prahran	..	..	..
At Sanatoria	27	16	43
At Austin	12	14	26
Total	94	116	210

VARIOUS TREATMENTS.

The following table sets out the number of patients discharged from Sanatoria to various Bureaux for continuation of special treatment:—

Bureau.	Tuberculin.	A.P. Treatment.
Central	20	90
Ballarat	..	5
Bendigo	..	4
Geelong	..	6
Prahran	..	1
Total	20	106

THORACOPLASTY.

This form of collapse therapy is carried out chiefly at the Austin Hospital, which is regarded as our surgical tuberculosis centre. Results of these operations over a period of years are shown below:—

Results of Known Operations Performed since 1930 at Austin Hospital or Elsewhere.

CONDITION OF PATIENTS—JUNE, 1946.

Year.	Number of Patients.	Well and Working.	Well.	I.S.Q.	Not Known.	In Sanatoria.	Deaths.
1930 ..	3	..	..	..	..	..	3
1931 ..	5	..	2	..	2	..	1
1932 ..	12	..	1	..	1	..	..
1933 ..	12	..	..	..	1	..	1
1934 ..	7	1	..	..	3	..	3
1935 ..	12	..	1	3	2	..	6
1936 ..	20	1	7	..	2	..	10
1937 ..	7	..	2	..	..	..	5
1938 ..	3	1	1	..	..	..	1
1939 ..	15	1	4	3	..	..	7
1940 ..	12	2	4	3	2	..	1
1941 ..	3	1	..	..	1	..	1
1942 ..	8	2	1	1	..	..	4
1943 ..	11	..	8	2	..	..	1
1944 ..	6	..	2	..	..	4	..
1945 ..	22	..	9	1	4	6	2
Total ..	138	9	42	13	18	10	46

Total alive, 65.2 per cent.

BEQUESTS RECEIVED (as at 30th June, 1946).

Gresswell Sanatorium.

Thomas Baker (Kodak), Alice Baker, and Eleanor Shaw Benefactions—	£
Building of Occupational Therapy Workshop	1,450
Machinery for Occupational Therapy Workshop	250
Felton Bequests Committee—	
Building of Kiosk	250
Wireless Equipment	150

Greenvale Sanatorium.

Thomas Baker (Kodak), Alice Baker, and Eleanor Shaw Benefactions—	£	s.	d.
Library	250	0	0
Talkie Equipment	250	0	0
Occupational Therapy (Equipment) ..	250	0	0
Felton Bequests Committee—			
Wireless Equipment	50	0	0

£ s. d.

Estate of the late Mrs. Anne Davies —

One sixteenth part of estate—received to date 837 17 3

Provided from this Fund—

X-ray 330 8 6
Mantel Wirelenses 55 1 6
Bed Tables for Patients 16 9 2
New Wireless (1943) 289 15 0

Kodak (Australasia) Pty. Ltd.—

Talkie Equipment 75 0 0

Estate of the late Mrs. Kitchen (and share in residue of estate) 25 0 0

Heatherton Sanatorium.

Estate of the late Mr. G. W. Moore .. 43 15 0

Miscellaneous.

Estate of the late Mr. John L. Burge (amount not stated, but estimated to be within the vicinity of) 20,000

Gift by Miss Eleanor M. Shaw—

Eleanor Shaw Chalet, Royal Park .. 3,500

GENERAL.

NEW SANATORIUM.

Government approval has been given to the erection of a new male sanatorium of 400 beds, and a site has been chosen at Watsonia adjoining the military camp. Negotiations are proceeding for the purchase of the land.

FINANCIAL ALLOWANCES TO TUBERCULOSIS SUFFERERS.

The Commonwealth Government under the terms of its *Tuberculosis Act 1945*, is now making £250,000 available for distribution amongst the States for payment of allowances to tuberculosis sufferers and their dependents. It is anticipated that the scheme will be implemented early in 1947 and the worry of sanatorium treatment with attendant financial burdens will be somewhat relieved.

ADMINISTRATIVE ACCOMMODATION FOR TUBERCULOSIS DIVISION.

The Honorable the Minister of Health, Mr. W. P. Barry, M.L.A., has approved of the Tuberculosis Division occupying the premises adjoining the Central Tuberculosis Bureau and formerly the Venereal Disease Clinic, which has been removed to the Central Hospital. This will be an administrative centre and ancillary clinic to the Central Tuberculosis Bureau to accommodate personnel connected with schemes for Mass Radiography, rehabilitation of and financial payment of allowances to tuberculosis sufferers, anti-tuberculosis publicity, &c. Renovations of the building will commence at an early date. It is intended to appoint a Supervisor of Mass Radiography, a Supervisor of Rehabilitation, and two full-time medical officers with the necessary staff of X-ray technicians, nurses, and clerks.

VISIT OF DR. H. MAXWELL JAMES, CLINICAL TUBERCULOSIS OFFICER, AND MR. C. J. OFFICER BROWN, THORACIC SURGEON, TO U.S.A. AND CANADA.

The Government on the recommendation of the newly-formed Consultative Council on Tuberculosis, sent Dr. H. Maxwell James and Mr. C. J. Officer Brown to U.S.A. and Canada in December, 1945, and their Report is at present being prepared on the observations of the methods used in those countries to combat tuberculosis.

A preview of this Report shows that anti-tuberculosis work in Victoria compares very favourably with the work done overseas, except that such work requires to be increased in volume and more funds should be made available for our anti-tuberculosis scheme.

CONSULTATIVE COUNCIL ON TUBERCULOSIS.

Reference has been made above to the Consultative Council on Tuberculosis. This body of members were called together by the then Minister of Health, the Honorable Ian Macfarlan, K.C., M.L.A., under the provisions of the *Health Act* 1944 to advise him as to the best means of combating tuberculosis, and particularly as to—

- (a) the measures and precautions necessary to prevent the incidence and spread of the disease.
- (b) community radiography as a method of detecting the disease and of ascertaining the effect of treatment;
- (c) the proper medical, surgical, or other methods of treating the disease including the relevant subjects of convalescence, occupational therapy, rehabilitation, and provision for dependants;
- (d) the type and location of necessary institutions; and
- (e) any other relevant matter, subject, or thing which, in the opinion of the Council, will be of value in either the prevention of cure of the disease and any steps that should be taken for its ultimate eradication.

The members are—

Dr. H. N. Featonby.
 Professor P. MacCallum, Chairman.
 Dr. J. Bell Ferguson.
 Dr. H. Maxwell James.
 Mr. C. J. Officer Brown.
 Dr. C. H. Fitts.
 Mr. A. S. H. Gifford.
 Dr. W. J. Newing.
 Dr. W. S. Newton.
 Dr. Hilary Roche.
 Dr. D. B. Rosenthal.
 Sir Sidney Sewell.
 Professor F. M. Burnet.
 Dr. W. W. S. Johnston.
 Dr. R. Webster.

PREVENTION OF BOVINE TUBERCULOSIS AND SAFE MILK SUPPLY.

Tuberculin testing of cattle and elimination of tubercle in herds is, as mentioned before, a costly undertaking, and will never secure safe milk by itself. The only practical procedure for any Government is to secure the provision of properly-pasteurized bottled milk for all large centres of population. It is hoped this will be undertaken as soon as practicable.

Pasteurization is not suggested as a substitute for inspection and testing. Inspection and testing should be left to the Department of Agriculture.

As far as the Health Department is concerned, pasteurization should be insisted upon. Pasteurization will secure a safe milk, not only from tuberculosis, but from all diseases spread by milk.

Unfortunately, there has been delay in the Government's putting into practice its intention to provide pasteurization plants, owing to shortage of materials. It is hoped these plants will be installed at an early date.

I would remind the Government that in probably no other field of medicine has more definite progress been made than in the field of diseases of the chest, and this has included great advances in treatment of pulmonary tuberculosis.

Mass X-rays Surveys proved their worth in the Armed Forces, and it now is clear that such benefit must be extended in the fullest possible manner to the civilian population. Surgical approval to certain forms of lung tubercle has made enormous advances.

Bronchoscopy has now reached the stage where it should be part and parcel of the routine methods used in diagnosis and treatment in tuberculosis institutions.

Chemotherapeutic and anti-biotic substances are now in view which may prove of enormous help in the war against tuberculosis; and a safe vaccine for raising resistance of susceptibles is now in use.

All these advances require a skilled, enthusiastic, well-chosen, and well-qualified personnel.

If we are to secure such, the Government must offer sufficient financial inducements to attract suitable men and women graduates to the Tuberculosis Service, so that they may make it their life work.

Finally, I should like to express appreciation of all members of the staff for their work during the past year.

Although shortages of staff have continued these difficulties have been met and surmounted as they rose without undue complaint.

J. BELL FERGUSON, M.D., M.R.C.P., D.P.H., F.R.A.C.P.,

State Director of Tuberculosis.

APPENDIX C.

REPORT OF THE ENGINEERING DIVISION, 1945-46.

The total number of plans dealt with was almost the same as last year, the only notable alterations being a large decrease in the number of plans of private hospitals, and a corresponding increase in that for plans of septic tank systems. Night inspections show a further decrease, there having been only one officer on this work for the whole year, but the return of the Assistant Engineer has enabled the inspection of municipal sewage treatment works to be fully re-established.

Of the pre-war staff of eleven officers, one is still with the Army, one has resigned, and one has transferred to another department, while two have returned from the Services, bringing the present staff to eight officers. Advertisements of the two vacant positions have brought no suitable applications, although the salaries for both positions have been raised to an adequate level.

SEWERAGE AND SEWAGE TREATMENT WORKS.

Preliminary plans for two new schemes and two revived ones have been submitted and examined, while several others are on hand awaiting inspection of the proposed disposal sites, and it is learned that numbers of other schemes are in the course of preparation. House-connexion work in partly-sewered towns is again proceeding at a moderate rate.

The return of two officers enabled the regular quarterly inspections of all sewage-treatment works to be resumed in November, 1945, with collection and analyses of sewage at various stages of treatment. Results of operation of the works continue to be generally satisfactory, though two or three are in some difficulty owing to deferment of maintenance work which was beyond the unaided capacity of the operator, and in some others, additions to the treatment plant are becoming urgent owing to the growth since 1939 of the towns which they serve.

Following recommendations by the Commission, action is being taken to provide proper administrative buildings and amenities for the employees at plants which were deficient in those respects, but there is a regrettable lack of action in regard to proper subdivision of irrigation areas to enable stock to be controlled so as to get the best results both as to disposal of the sewage effluent and as to utilization of the fodder.

INSTITUTIONAL AND DOMESTIC SEPTIC TANK SYSTEMS.

The number of plans of septic-tank systems examined has been almost trebled, most of them being either for camping and picnic grounds or in connexion with proposed swimming pools for country towns. In addition there are many requests for advice and information on the subject of installing septic tanks, and it seems that there is a boom in their construction, which, though desirable in many ways, is not well-timed in view of the fact that their construction takes a large amount of cement as well as stoneware pipe and sanitary fittings, all needed for new housing.

STREAM POLLUTION AND DISPOSAL OF TRADE WASTES.

The mobile laboratory referred to in the last report has been received, but having had considerable use it is being generally overhauled before being brought into use.

An expert committee, consisting of representatives of the Departments concerned and of the Melbourne and Metropolitan Board of Works and the Provincial

Sewerage Authorities has been appointed to inquire into and advise on legislation required to improve the legal machinery for the protection of streams, and has held its first meeting. At present there are regulations in regard to stream pollution under three different Acts for the State as a whole and under a fourth Act for the metropolis.

Field work has been limited to following up the Warrnambool case mentioned in the last report, in which case a successful prosecution was launched, and to testing the efficiency of a plant provided to deal with offending drainage from a Geelong plant.

HOSPITALS AND BENEVOLENT INSTITUTIONS.

The figures given for the numbers of plans examined include eight sets of sketch plans submitted for comment and criticism, six being for Infectious Blocks to be built at the Department's expense at provincial hospitals, and two for other hospital buildings.

The number of plans dealt with is disproportionate to the amount of work actually being done, while none of the infectious blocks, for which sketch plans have been approved, has yet reached the contract stage, though the first was authorized in October, 1944.

ABATTOIRS AND OFFENSIVE TRADES.

Plans examined were limited to additions, mainly small, to abattoirs in various districts. There has been a revival of interest in the extension of meat supervision in country areas. A most encouraging instance is the agreement which was reached at a meeting of representatives of the Department and four shire councils, Hampden, Heytesbury, Mortlake, and Warrnambool, for the constitution of by far the largest meat area in the State, which will extend from Lake Corangamite to near Warrnambool and from a line north of the Lake to the coast, and will be served by a single abattoir to be built between Camperdown and Terang. Sites for municipal abattoirs have been approved at Kyneton and Daylesford, and plans are in course of preparation.

REGULATIONS AND LEGISLATION.

Revised regulations dealing with Cams and Meat Transport have been prepared and sent to the printer, while a complete redraft of the Public Building Regulations is almost complete and includes amendments to incorporate the structural provisions of the Uniform Building Regulations and to eliminate fire risks revealed by the destruction of the Regent Theatre, Melbourne. On account of shortage of staff, it has not been possible to complete the review of comments on the draft regulations for public hospitals and institutions.

DIAGRAMS AND PAMPHLETS.

The septic-tank diagram has been in great demand. In consequence of a general increase in the charges made by sanitary contractors for cleaning tanks, to from twice to four times pre-war charges, an amended design, adapted for the removal of sludge by pumping from beneath the liquid, has been prepared and is now in the hands of the printer. With this design, the cost of removing sludge should be reduced to about one-third of that when the whole contents of the tank have to be bailed out. A diagram for a larger tank on the same principle, which had been distributed in limited number as hektograph copies, has now been printed. To meet the demand for some method of dealing with nightsoil

from dwellings outside municipal-clearance areas, but having a water supply insufficient for the operation of a septic tank, a design for a septic closet, requiring only two or three buckets of water per week, has been prepared and is also in the printer's hands. This is a modification of an American design, and the same type of closet, brought under the notice of the Public Works Department by the Engineer of this Department, has been used with success for some years by the former Department at picnic areas not provided with water supplies.

BOARDS AND COMMITTEES.

An appreciable amount of the Engineer's time is taken up by service on various boards and committees. He is *ex officio* a member of the Building Regulations Committee and a Referee under the Uniform Building Regulations, a member of the Building Surveyor's Board, and represents the Commission on the Expert Committee on Stream Pollution and on the Committee on Interior Illumination of Buildings of the Standards Association of Australia. He has attended in all twenty meetings in the last eight months.

Mr. C. E. B. Waldron, M.Sc., continues to be Chairman of the Plumbers and Gasfitters Board and his report is appended. Mr. C. Cross is Chairman of the Cinema Operator's Board, and also represents the Commission on the Nitro-Cellulose Committee convened by the Department of Labour. He has attended seven meetings and three examinations of the Cinema Operators Board and three meetings of the Nitro-Cellulose Committee.

CONFERENCE OF SEWERAGE ENGINEERS AND OPERATORS.

This Conference was again held in the Board Room of the Melbourne and Metropolitan Board of Works, and the question of the admission of trade wastes to sewers was discussed in all its aspects. There was the usual good attendance of over 50 members. It is hoped that at the next Conference the pre-war practice of compiling and publishing a summary of the discussions may be able to be resumed.

E. A. HEPBURN, B.C.E., A.M.I.C.E.,
Engineer.

ANNUAL REPORT, 1945-46.

ENGINEERING DIVISION.

Plans Examined.

Class of Building.	New.	Alteration or Extension.	Total.
Theatres	1	3	4
Picture Theatres	2	24	26
Dance Halls	..	..	..
Public Halls, Churches, Sunday Schools	24	43	67
Day Schools	1	30	31
Public Hospitals	3	19	22
Infectious Diseases Hospitals	7	1	8
Other Public Buildings	9	10	19
Total Public Buildings	47	130	177
Private Hospitals	..	28	28
Offensive Trade Premises	..	15	15
Total Buildings	47	173	220
Public Sewerage Systems	4	1	5
Septic Tank Systems	46	..	46
Total Plans Examined	97	174	271

INSPECTIONS.

Day Inspections.

Building Inspections	1,133
Tests of Mechanical Ventilation Systems	20
Offensive Trade Premises	16
Septic Tank Systems	37
Butter Factory Drainage Disposal Systems	..
Public Sewerage Systems	79

Night Inspections.

Enforcement of Regulations	479
Collection of Air Samples	7
Total Inspections	1,771

SPECIAL TECHNICAL INSPECTIONS.

By J. F. McDonnell, M.Sc., 1945-46.

Date.	District.	Matter Investigated.	Outcome.
14.3.46	Geelong ..	Drainage Treatment Plant, Oriental Wool Scouring Mill	Plant performance not good. Further inspection proposed
27.3.46	Dandenong ..	Drainage Treatment Plant, Dandenong Bacon Factory	Plant performance found to be excellent
4.4.46	Chelsea ..	Pacific By Products, Drainage Treatment	Existing and proposed provisions for drainage treatment noted
10.4.46	Daylesford ..	Site proposed Abattoir	Site approved by Commission
3.5.46	Kyneton ..	Site proposed Abattoir	Site approved by Commission

SPECIAL TECHNICAL INSPECTIONS.

By E. A. Hepburn, B.C.E., A.M.I.C.E., 1945-46.

Date.	District.	Matter Investigated.	Outcome.
18.7.45	Bendigo ..	Proposed extension of Sewage farm	Extension approved
27.8.45	Seymour ..	Site for Sewage Treatment Works	Site selected north of town
31.1.46	Upper Delatite	Alleged pollution of river by sewage from Forestry Department Camp	No evidence of pollution but Department advised as to improvement of treatment plant
20.3.46	Camperdown ..	Conference with representatives of four shires on meat area	Agreement reached for proclamation of a very large meat area
30.5.46	Romsey ..	Sites for proposed septic tank systems.	Council advised that two were suitable and one should not be allowed

REPORT OF THE PLUMBERS AND GASFITTERS BOARD FOR 1945-46.

The Board held five meetings. The penal powers of the Board are still inadequate, but amending legislation has not been initiated.

The Board has informed the Minister that the funds available from current revenue are inadequate for it to work efficiently and to maintain an inspection staff. It has submitted several suggestions for the management of its finances to him, including recommendations that inspectors be permanent officers of the General Health Branch or annual renewal registration fees be increased to at least seven shillings and sixpence, which latter suggestion will require amending legislation.

Rules have been framed dealing with the eligibility of applicants for registration. The concession that persons in the Forces be registered without payment of annual renewal fees has been terminated, and the return of many hundreds of servicemen to their civil occupations has been shown in the improved income.

The number of names on the Register on 30th June, 1946, was 2,984. One hundred and seventy applications for registration or reclassification were dealt with. One hundred and ten names were removed from the Register.

Three examinations were held and two of the nine candidates passed and were registered. The small percentage of passes is proof of the necessity of examining persons whose training appears to be inadequate.

Income was £482 0s. 1d. and expenditure £441 10s. 3d., the favourable balance being due to the small sum, approximately £130, spent on inspection.

The Registrar, Mr. F. Vine, has in this year received more clerical assistance, but the return of servicemen has delayed the annual printing of the Register.

The Inspector, Mr. C. C. Crichton, has rendered good service in the very inadequate time allotted to him.

Fourteen days' time has been spent by me in the several duties of the Board.

C. E. B. WALDRON, M.Sc., A.A.C.I.,
Chairman.

APPENDIX D.

ANNUAL REPORT OF THE INDUSTRIAL HYGIENE DIVISION, 1945-46.

(1) VISITS TO FACTORIES AND WORKS.

The following table shows the number of visits to the different kinds of factories and works:—

Type of Factory or Activity.	Number of Visits.
Electrical power house	19
Engineering works	12
Accumulator works	10
Shoe factories	6
Foundries, iron and steel	4
Foundries, brass	2
Art printing	2
Plastics	2
Ships	3
Motor car works	2
Wholesale grocers	1
Radioactive paint works	1
Rock crushing works	1
Leather cloth	1
Chemical works	1
Powdered milk factory	1
Refractory bricks	1
Meat works	1
Printing	1
	71

(2) ROUTINE INVESTIGATIONS.

DUST INVESTIGATIONS.

Investigations into the dust hazard in various parts of the Newport Power House have been carried out, and recommendations made to the Railways Department.

Dust investigations have also been carried out in a foundry, refractory brick works, and in a wholesale food manufactory. In the two former cases they revealed a definite silicosis hazard.

Dust counts of samples collected at a coal mine by the Mines Department have also been made.

An examination of locally-manufactured aluminium dust from the point of view of its suitability for use in aluminium therapy has been carried out. It was not suitable.

Altogether 161 dust counts were done, and six air-borne samples were collected for chemical analysis.

BENZENE INVESTIGATIONS.

Investigations into the benzene hazard in various factories were continued and 21 determinations made. Fourteen of these determinations revealed concentrations in excess of the permissible limit for continuous exposure (50 parts per million), and ten were greater than 100 parts per million. In not all of the instances was exposure continuous. The attention of the management was called to the conditions in each case, and the necessity of taking steps to reduce the hazard pointed out where improvement was necessary.

INVESTIGATIONS OF LEAD WORKERS.

Sixty-nine blood films from workers exposed to lead hazard were examined for basophilic stippling and for the ratio of large to small lymphocytes. Sixty-six determinations of the concentration of lead in urine and eight determinations of the concentration of lead in human blood were carried out.

Four determinations of the concentration of lead in the air of accumulator works were done.

The results as a whole indicate that the lead hazard in accumulator works has not yet been removed.

SPECIAL INVESTIGATIONS.

The investigation into the cause of the effects suffered by thirteen firemen at a fire in a machine shop referred to in the Annual Report (1944-45) was continued. The results of the investigation were embodied in a paper which is to be published in the British Journal of Industrial Medicine.

The following investigations were not carried out mainly by this Division but are mentioned as matter of interest in which this Division took some part. They are probably reported on more fully elsewhere.

DERMATITIS AMONG WHARF WORKERS.

A considerable number of cases of dermatitis occurred among wharf workers engaged in unloading hay from a ship's hold. Tests carried out by the Agriculture Department indicated that the *pediculoides ventriculosis* mite was responsible. Advice was given on the methods of keeping the mites away from the body. The Agriculture Department had charge of the treatment of the hay.

FATALITIES IN SHIP'S TANK.

Four members of a ship's company, who entered an empty ballast tank, died as a result of breathing air containing insufficient oxygen. The depletion of oxygen was due to extensive rusting which had gone on in the empty tank. It is understood that warnings have been issued to the Shipping Authorities in regard to the danger of such entry into ballast tanks. Similar cases have occurred in Great Britain.

OCCUPATIONAL DISEASES.

The following occupational diseases were reported during the year 1945-46:—

Silicosis	11
Silicosis with Tuberculosis	2
Lead Poisoning—	
Accumulator Works	5
Spraying with lead arsenate	2
Lead Works	1
Poisoning by p-nitrochlorobenzene	3
Pneumoconiosis (Foundry)	1
Poisoning by Sulphur Dioxide	1
Dermatitis	1

Reporting of occupational diseases is still unsatisfactory.

LECTURES.

The course of lectures to Factory Inspectors was continued.

Two lectures on occupational diseases were given to the class for Industrial Nurses conducted by the Royal Victorian College of Nursing.

INFORMATION TO MANUFACTURERS.

It is again emphasized that this aspect of the work is important but cannot be extended with the present staff. It is felt that if a publicity officer were appointed in the Health Department this Division would be of much more value, as a great deal could then be done to educate both employer and employee as to the hazards in industry and the methods for improving the conditions.

RESEARCH.

The work on the effects of inhalation of cadmium fumes and of fumes from heated sulphonated castor oil, referred to in the previous report, is to be published in the British Journal of Industrial Medicine at an early date.

Further work on this subject will be carried out after removal of the laboratory to the Central Hospital is completed.

Work on the excretion of lead under different methods of treatment is being continued.

A considerable amount of work on methods for the determination of lead in blood and in urine has been done, with a view to improvement in the accuracy of the methods. Some of the published methods for lead in blood have been found to give unreliable results. Modifications of the procedures have resulted in much greater accuracy.

COMMITTEE ON INDUSTRIAL HYGIENE OF THE MEDICAL RESEARCH COUNCIL.

Meetings of this Committee have been attended by me throughout the year.

LEGISLATION.

This Division has co-operated with the Labour Department in the drafting of Regulations for the control of spray painting.

Draft Regulations under the Health Act in regard to the compulsory medical examination of employees in certain lead trades have been submitted to the Crown Law authorities for review. It is expected that they will be put into their final form at an early date, for submission to the appropriate authorities.

LABORATORY ACCOMMODATION.

Progress towards the establishment of the Industrial Hygiene Division laboratories at the Central Hospital has been disappointingly slow, but present indications are that the accommodation should be ready within a few months' time.

After the move has been made the activities of this Division can be greatly extended.

Staff.

The appointment of the two technical assistants (chemists) has enabled a much greater volume of work to be carried out.

The applications for the posts as Industrial Hygiene Inspectors have been received, and it appears that three suitable candidates will be appointed.

The appointment of an Assistant Medical Officer in this Division and of clerical staff is urgently needed.

WORKERS' COMPENSATION.

This Division has been trying for the last eight years to have the Workers' Compensation Act brought up to date by the inclusion of a number of occupational diseases which were not, during this period, compensable.

It is a pleasure to record that, at last, something has been done to remedy this state of affairs.

The new Workers' Compensation Act makes provision for any disease due to occupation being compensable.

D. O. SHIELS, D.Sc., Ph.D., F.R.I.C., F.A.C.I., M.B.,
B.S., Medical Officer, Industrial Hygiene.

APPENDIX E.

REPORT OF THE PURE FOOD DIVISION FOR THE YEAR 1945-46.

Supervision of the factories engaged in the production of food in the metropolitan area has been continued throughout the year and regular inspections have been made.

MEAT.

Our people depend mainly on meat to provide the necessary protein in their diet, so that, as far as possible, the preparation of this commodity should be properly supervised and inspected.

The most important object of meat inspection is to prevent diseased or otherwise unwholesome meat being used for human consumption.

So far, about two-thirds of Victoria's population enjoy this safeguard.

While it is not at the present time considered practicable to establish meat inspection over the whole State, it has to be recorded that there still remain many populous centres where such public health service should be in operation.

Five new meat areas, Frankston, Maryborough, Kyneton, Daylesford, and Castlemaine, have been gazetted but are not yet in operation. Camperdown and district is in course of preparation.

The enforcement of meat inspection in the above localities has been repeatedly deferred in deference to the wishes of those engaged in the meat trade, but it is hoped by the end of the year to see this measure adopted.

Regulations designed to protect meat in transit from contamination by dust, flies, &c., have been drawn up and are now being considered by municipal councils concerned before being put into operation. This, it is expected, will take place by the end of the year.

MILK.

The milk supply of this community still falls short of what is desirable.

Much has been done by the Dairy Supervisors of the Department of Agriculture in securing milk from dairy farms in a tolerably clean condition, at least free from obvious dirt, and in maintaining it so in transit to the consumer. This, however, is not enough. If this most important food is to be consumed with safety, that is, free from the very real risk of conveying infectious diseases such as tuberculosis and typhoid fever, it is absolutely necessary that it should be efficiently pasteurized.

Experience of compulsory pasteurization in at least one dominion of the Empire has been that milk-borne infection has been abolished.

MANUFACTURED FOODS.

Practically all the food factories in the metropolitan area are very well conducted and leave little to be desired in the score of cleanliness and general sanitation.

Those concerned in the canning of meat and the manufacture of biscuits, cakes, and breakfast foods have reached vast proportions in this State, and the output is of excellent quality for such commodities.

It is rather unfortunate that among manufactured foods that large class known as prepared cereals, which looms so largely on our breakfast tables, is not regarded with favour by nutrition authorities.

The Nutrition Advisory Section of the National Fitness Movement indeed advise that such articles of food should be used "very sparingly". Several of them are advertised in most extravagant and misleading terms in press and radio. Claims at variance with known facts are made regarding their nutritive value.

WHOLEMEAL BREAD.

A survey has been made of samples of wholemeal as milled by the Victorian millers.

With few exceptions the product has not measured up to the standard of genuine wholemeal. This means that those bakers who honestly endeavour to provide a genuine wholemeal bread are dependent upon the genuineness of the raw material supplied by the millers, and, in consequence, the loaf varies in wholemeal content from about 80 per cent. to as low as 10 per cent. or even less.

With the increasing demand by the public for wholemeal bread, it is a matter of increasing urgency that a simple definite standard, based on the mineral and fibre content, should be fixed for both wholemeal and wholemeal bread.

The conflicting statute standing in the way of such standard being fixed should be repealed without delay.

C. P. ROWAN, M.B., B.S., D.P.H.,
District Health Officer.

APPENDIX F.

ANNUAL REPORT OF VENEREAL DISEASES DIVISION OF THE GENERAL HEALTH BRANCH, DEPARTMENT OF HEALTH, VICTORIA, 1945-46.

The statistics of reported civilian cases (see Table 1 below) show a substantial increase in gonorrhoea and a slight increase in syphilis, in males. The figures for males had previously been falling steadily for some years. The female gonorrhoea notifications have again decreased substantially, and the fall in female syphilis cases has continued.

The figures for defaulters show a decrease in the number reported, but also a decrease in the percentage of defaulters who, on being communicated with, have resumed attendance for treatment.

It is regrettable that efforts to obtain a visiting nurse for women defaulters have been unsuccessful.

Weekly visits to the Children's Welfare Department Home at Royal Park have been maintained for the purpose of treating children who are infected with venereal disease—congenital syphilis in most cases. Fairhaven Home, Yarra Bend, has also received weekly visits.

The use of penicillin for cases of gonorrhoea is increasing. The drug is available for treatment of cases in hospital, and is supplied to hospitals free of charge when certified to be required for V.D. cases.

The Departmental clinics in Little Lonsdale street received 999 new cases during the year. The removal of the clinics to the new location at the Central Hospital is expected in the near future.

TABLE 1.—SEX DISTRIBUTIONS OF INFECTIONS FROM 1ST JULY, 1931, TO 30TH JUNE, 1946, IN PERIODS OF TWELVE MONTHS.

Year.	Gonorrhoea.		Acquired Syphilis.		Soft Sore.		Congenital Syphilis.		Total.	
	Male.	Female.	Male.	Female.	Male.	Female.	Male.	Female.	Male.	Female.
1931-32	3,222	637	477	303	61	1	4	11	3,764	952
1932-33	2,779	657	458	286	57	..	1	5	3,295	948
1933-34	2,444	540	323	188	39	..	2	2	2,808	730
1934-35	2,718	590	369	185	35	..	1	..	3,123	775
1935-36	2,298	543	240	136	3	..	2	1	2,543	680
1936-37	2,621	487	306	157	12	..	4	1	2,943	645
1937-38	3,014	589	216	128	1	..	8	8	3,239	725
1938-39	2,836	627	207	130	..	..	11	..	3,054	757
1939-40	2,364	538	246	134	10	16	4	7	2,624	695
1940-41	2,390	486	306	164	2	1	2	5	2,700	656
1941-42	1,904	322	438	198	4	6	3	7	2,349	533
1942-43	1,776	607	482	259	1	12	10	7	2,269	885
1943-44	1,526	818	336	221	13	..	9	14	1,884	1,053
1944-45	1,438	478	282	141	22	..	2	3	1,744	622
1945-46	1,995	347	293	121	42	1	5	2	2,295	471
Totals	35,285	8,266	4,979	2,751	302	37	68	73	40,634	11,127
									51,761	

TABLE 2.—DEFAULTERS.

Year	Total Cases Notified.		Defaulters.						Defaulters Returned to Treatment.					
			Male.		Female.		Total.		Male.		Female.		Total.	
	M.	F.	Number.	Per cent.	Number.	Per cent.	Number.	Per cent.	Number.	Per cent.	Number.	Per cent.	Number.	Per cent.
1934	3,023	731	445	14.7	34	4.7	479	12.8	43	9.7	7	20.6	50	10.5
1935	2,648	693	404	15.3	24	3.5	428	12.8	59	14.6	1	4.2	60	14.0
1936	2,770	644	532	19.2	34	5.3	566	16.3	127	23.9	5	14.7	132	23.3
1937	2,982	631	324	10.8	31	4.9	355	9.8	55	16.9	4	12.9	59	16.6
1938	3,034	719	344	11.3	27	3.8	371	9.9	60	17.4	6	22.2	66	17.8
1939	2,940	736	379	14.3	101	13.7	480	13.1	124	32.7	20	19.8	144	30.0
1940	2,760	727	541	19.6	180	24.7	721	20.6	124	22.9	50	27.7	174	24.1
1941	2,510	605	678	27.0	108	17.8	786	25.2	240	35.5	38	35.1	278	35.3
1942	2,466	676	540	21.4	154	22.7	694	22.0	169	31.3	59	38.3	228	32.8
1943	1,821	1,048	378	20.8	272	25.9	650	22.6	112	29.6	97	35.7	209	32.1
1944	1,773	776	313	17.7	246	31.7	559	21.9	93	29.7	79	32.1	172	30.8
1945	1,751	498	266	20.9	129	25.9	495	22.0	35	23.2	27	20.9	112	22.9

WESTMORE F. STEPHENS, M.B., Ch.B.,
M.O. Venereal Diseases,
General Health Branch,
Department of Health, Victoria.

APPENDIX G.

REPORT OF THE GOVERNMENT CHEMIST FOR THE YEAR ENDING 30th JUNE, 1946.

STAFF.

One temporary analyst on loan to the Commonwealth Government resigned. His place was filled by the re-appointment in January of Mr. T. L. Almond, returned from active service with the A.I.F.

GENERAL.

The number and type of samples submitted during the year by officers of the Department, by municipalities for whom samples are analysed under the Health Act, and by other Departments, are shown in the accompanying table, which also indicates the number of samples adulterated or not genuine. The total number of samples analysed shows an increase on the previous year.

WORK FOR SERVICES AND COMMONWEALTH DEPARTMENTS.

The Services and some Commonwealth Departments continued to utilize the facilities and experience of this laboratory; naturally this work has practically ceased since the end of the war. The Government Chemist acted in an advisory capacity to Commonwealth Food Control, particularly in relation to specifications for service foodstuffs.

EFFLUENTS.

With the return to more normal conditions, the number of effluents from country sewage treatment works was more than doubled. A number of trade wastes were also examined.

WINES AND SPIRITS.

War conditions resulted in the number of samples of wine and spirits remaining at the same low level as last year. "Adulterated" samples of spirits were mainly not true to label.

SAMPLES OF INTEREST.

Tripe.—Successful prosecution was obtained against a manufacturer selling tripe with a pH value higher than that prescribed; subsequent samples of tripe were found to be below the maximum pH value (7.5). A considerable number of samples, obtained from tripe manufacturers after the first cooking, were analysed for moisture content. It was found that there was a wide range (from 73.3–85.3 per cent.) in moisture content of individual tripes at this particular stage of manufacture.

Pate de Foie.—A sample labelled "Pate de Foie" was found to be a meat paste containing liver and other edible viscera.

Fish Pastes.—In four samples of fish paste, the fish portion was found to be mainly composed of the non-fatty type of fish (e.g., barracoutta and sea salmon), the kinds of fish mentioned on the label being present in lesser amount.

Cordials.—A number of flavoured cordials and fruit juice cordials were examined with a view to ascertaining whether they were true to name and correctly labelled. Some samples contained excess preservative, and some flavoured cordials contained added acetic acid and flavouring other than that derived from the fruit or vegetable designated on the label.

Desserts, &c.—A considerable number of jelly crystals, fruit jelly crystals and new forms of packed "desserts" were submitted for test for colouring and flavouring, and for compliance with labelling regulations. In some cases the product was found to be one for which there was no prescribed standard, and the presence of artificial colouring and flavouring was a contravention of the Regulations. Others containing artificial flavouring carried a pictorial design of fruit on the label, while in others the presence of artificial colouring and flavouring had not been declared.

Cheeses.—Many "name" cheeses were analysed to ascertain if they were true to name in respect of composition, character and method of manufacture. Most samples were found to be correctly described, but several so-called "cream" cheeses proved, on analysis, to be "curd" cheeses.

Mustard Compounds.—Samples of mustard compounds were found, on analysis, to be mixtures of mustard, starch and turmeric, with more added starch than is permitted in mustard. Samples of mustard were shown to be free from added starch.

Industrial Hygiene Samples.—Samples analysed for the Medical Officer of Industrial Hygiene included metal alloy for lead, lacquers for nature and amount of solvent, and dusts &c., for free silica.

MEDICO-LEGAL WORK.

Exhibits submitted to the Medico-legal Chemist, mainly from the police, numbered 259, somewhat more than last year. In addition, 121 veterinary specimens were examined for poisons by him on behalf of the Department of Agriculture.

W. R. JEWELL, M.Sc., B.Met., F.R.I.C., F.A.C.I.,
Government Chemist.

SAMPLES SUBMITTED BY (A) MUNICIPAL HEALTH INSPECTORS; AND (B) TAKEN BY DEPARTMENTAL OFFICERS, ETC., AND ANALYSED AT THE DEPARTMENT'S LABORATORY FOR THE PERIOD TWELVE MONTHS
ENDED 30TH JUNE, 1945.

Sample.	A.		B.	
	Number Submitted.	Adulterated or not Genuine.	Number Submitted.	Adulterated or not Genuine.
Baking powder	2	..	..	..
Beer, lager, &c.	..	..	1	..
Bicarbonate of soda	2	..	..	..
Bread	8	..	2	..
Bread, brown	1	..	..	..
Butter	16	2	..	..
Cake, &c.	..	..	1	..
Cereals, grains, &c.	8	..	..	..

SAMPLES SUBMITTED—continued.

Sample.	A.		B.	
	Number Submitted.	Adulterated or not Genuine.	Number Submitted.	Adulterated or not Genuine.
Cheese	9	..	1	..
Cheese cream	..	..	6	3
Cocoa	11	..	..	..
Coffee	11	..	..	..
Coffee and chicory	23	..	..	..
Cordials and syrups, flavoured	1	..	9	6
Cordials and syrups, fruit juice	5	..	1	..
Cordials and syrups, imitation	..	..	3	..
Cornflour	9	..	..	..
Cream, snow	..	..	2	..
Curry powder	3	..	..	..
Custard powder	8	..	3	..
Drinks, summer and temperance	2	..	2	..
Effluents	1	1	..	..
Effluents, S.R. and W.S. C.	..	..	7	..
Effluents, Health Department	..	..	225	..
Essence of lemon	1	..	..	..
Fish, tinned	..	..	4	..
Flour	8	..	..	..
Flour, self raising	6	..	..	..
Fruit, dried	3	..	2	..
Fruit juice	1	..	..	..
Ginger, ground	1	..	..	..
Honey	3	..	..	..
Ice cream, &c.	2	..	..	..
Jam and conserve	10	..	..	..
Jelly crystals	1	..	14	3
Lard and dripping	5	..	1	..
Meals, prepared and digestive	4	..	..	..
Meat, chopped	32	..	..	..
Meat, corned	1	..	..	..
Meat, manufactured	10	..	36	3
Meat, sausages	134	8	7	..
Milks	445	7	135	7
Milk, breast	..	..	22	..
Milk, condensed	1	..	..	..
Milk, dried	2	..	..	..
Miscellaneous	11	..	34	..
Mustard	1	..	4	..
Oatmeal	9	..	..	..
Oatmeal, flaked	2	..	..	..
Pastry	1	..	..	..
Pepper	2	..	..	..
Phosphate aerator	4	..	..	..
Pickles	2	..	1	..
Sauce, tomato	7	..	3	..
Sauce, worcestershire, &c.	4	..	..	..
Spirits, brandy	..	..	8	4
Spirits, gin	..	..	3	2
Spirits, whisky	..	..	10	5
Sugar	1	..	..	..
Tea	1	..	..	..
Vinegar	43	..	2	..
Water	14	..	8	..
Wheatmeal	1	..	..	..
Wine	..	..	1	..
Totals	894	18	558	33

Total number of samples submitted 1,452
 Number adulterated or not genuine 51

Additional samples analysed for other Departments:—

Dairy produce (mainly milk) 124
 Waters 9
 Wines 4
 Effluents 2
 Neatsfoot oil 2
 141
 Total number of samples analysed 1,573

APPENDIX H.

REPORTS OF DISTRICT HEALTH OFFICERS FOR THE YEAR 1945-46.

CENTRAL DISTRICTS.

C.H.O.

I have the honour to present my annual report for the past year. The time has been one of restoration of pre-war activities, but as is usual in recent years there is little to report in the way of improvements.

STAFF.

The district staff is still depleted and there seems to be little expectation of immediate restoration of our establishment in spite of the growing work attendant on the cessation of war.

The following changes have occurred:—

Additions:—Nurses — Miss Murray and Miss Tupper (New appointment), Inspector.—Mr. Wyss (New appointment)

Loss:—Inspector.—Mr. Leffers (Promoted to D.H.I. Northern area).

The total staff is as follows:—

1. District Health Officer for the two Metropolitan areas.
2. Inspectors:—Senior—Mr. Bennett.
Assistant—Mr. Wyss.
3. Nurses:—(i) Private Hospitals—Miss Dudley.
Assistant—Miss Tupper.
(ii) Hospital Benefits—Miss Murray.
4. Clerical:—Miss Gribble and Miss Male allotted by the Branch Secretary for district correspondence.

Mr. W. Clowes (D.H.I.) and Miss Lindsay are still on leave to other services. It is hoped that the full staff will be shortly available.

MUNICIPAL.

I have particularly to call to your attention the close co-operation afforded by the municipalities and consider that the steady improvement in general sanitation especially in respect of garbage and nightsoil disposal, is due in large measure to effective action of municipal and the district officers.

MEDICAL OFFICERS OF HEALTH.

The usual changes expected with the change over to peace-time condition are taking place. Two Councils are without the services of a medical officer, namely, the Shire of Gisborne and the Shire of Newham and Woodend.

HEALTH INSPECTORS.

The situation has greatly improved with the discharge from the services of municipal inspectors and of gentlemen qualified to act as such.

There have been several changes in inspector groups:—

1. New Group.—City of Nunawading and Shires of Mulgrave and Doncaster and Templestowe.
2. Rearranged Groups.—Chelsea, Mornington and Flinders now Chelsea and Mornington.
3. The three shires of Werribee, Whittlesea and Eltham by agreement employ the one inspector, but there is no formal group.
4. The Shire of Flinders and the City of Moorabbin each now employ a whole time inspector.

Most of the groups are too large and require revision. In fact the whole system of municipal inspection is faulty and requires many more officers than has been thought necessary in the past.

DISTRICT ACTIVITIES.

Immunization.—Very little immunization has been done by the district staff as the Medical Officers of Health have practically taken this over. It is thought that large Department campaigns will not be often needed and then only for educational co-operation with a new and inexperienced local practitioner.

Food.—Much more supervision has been exercised respecting foods. This has been necessary to keep up with the numerous new products now coming on the market as the result of increased labour supply and the increased availability of the materials. Mr. Bennett's report deals with this in detail.

Private Hospitals.—It is with regret that I must report the grave deterioration in the general situation through the closures and impending closures of many hospitals. These closures are caused by shortage of staff and the extra cost of running a hospital, due to rise in prices of goods together with the extra wages and shorter hours now allowed to the staff. This extra cost in some cases has not been compensated by an adequate rise in maximum fees.

Hospital Benefits.—The Commonwealth scheme for the payment of 6s. per day for each patient in a hospital has proceeded smoothly. The district staff looks after the medical side of this scheme for the whole State. The scheme does not embrace "chronic" private hospitals and Victoria is liable to be greatly prejudiced, not only through differential treatment as between States, but by the cumbering of hospitals in which the benefit is obtainable by chronic patients who would not otherwise receive such payment. This is now being reviewed and it is hoped that the anomaly will be resolved.

Infectious Diseases.—The year has been remarkably free from serious outbreak of infectious disease. The usual occasional threats of epidemic in such diseases as scarlet fever and measles have occurred, but apart from the persistence of the occurrence of poliomyelitis cases reported to you from time to time there have been no occasions for alarm. The outbreak of poliomyelitis has now subsided. That all the cases have been accommodated without friction appears to be due to the quick sizing up of the position by the staff of Fairfield Hospital and the generous admission of cases even from outside the metropolitan area. As the figures for all infectious diseases will appear in the General Branch report these are not included here.

General Sanitation.—Improvement in this branch is so striking that special mention is called for. Garbage tips, nightsoil depots, drainage, &c., have improved beyond expectation in the best of times in spite of the want of material and man-power which has distinguished the past year and municipalities generally are to be congratulated.

I have particularly to thank the members of the staff of my district and of municipalities for their vigorous and cheerful acceptance of the extra burden of this year, without which co-operation there would have been a complete breakdown.

C. R. MERRILLEES,

F.R.C.S.E., L.R.C.P. ET S.Ed., D.P.H.,
Senior Health Officer.

CENTRAL AREAS.

S.H.O.

I beg to submit the following report.

During the year 476 routine and 162 hospital inspections were made by the staff or assisting Municipal Inspectors and included the following:—

Boarding houses;
Knackers yards;
Wharfs;
Bread handling;
Racecourse catering;
Septic tanks;
Meat delivery;
Food wrapping and utensils;
Dogs' meat shops;
Illegal slaughtering;
Meat brands;
Sanitary depots;
Garbage depots.

Special inquiries were made respecting—

Meat delivery vehicles;
Establishment of nightsoil depot;
Alleged sale of horse flesh;
Rats;
Duties of Municipal Inspectors;
Alleged nuisance from dogs in private dwelling;
Fish paste manufacture;
Medicated cigarettes;
Holding yards at abattoirs.

Samples of foodstuffs were submitted for analysis:—

Milk	32	All complied
Cheese	2	Wrongly labelled
Meat products ..	2	Complied
Cordials	4	One did not comply but lapsed through time
Ice cream	2	Complied
Tripe	4	All adulterated
Jelly crystals ..	1	Complied

Mr. Wyss made the following special investigations:—

FOODS.

General Investigation into the Following Industries of:—

Phosphate Aerator Industry.
Fish Curing Process.
Aerated Waters Manufacture.
Cordial Manufacture.
Cheese Manufacture.
Butter Manufacture.
Macaroni, Vermicelli, and Spaghetti Manufacture.
Ice Cream Manufacture.
Kelpure Seaweed Manufacture.
Coffee Manufacture.
Tripe Manufacture.
Beer Manufacture.
Vinegar Manufacture.
Fish Paste Manufacture.
Liver Paste Manufacture.
Breakfast Foods Manufacture.
Pickled Vegetables Manufacture.
Sale of Broken Prunes (regarding condition and water content) to Government Institutions.
Dried Fruits infected with Rutherglen Bug.

Sampling.

Samples taken—108.

Tomato sauce ..	3	Complied
Pork sausages ..	2	Complied
Milk	6	Complied
Vinegar	3	Complied
Liver pastes ..	2	Incomplete
Fish pastes ..	4	Incomplete for quantities of fishment
Tripe	26	Incomplete. These included prosecution samples from shops and also a systematic sampling during the manufacturing process to estimate the water content at different stages
Cordial	9	Samples for quality tests also for compliance with labelling statements—7 complied; 1 had excess pres.; 1 incorrect labelling. Explanation accepted for Vitamin content—Complied
Citrus Cocktail ..	1	
Fruit jelly crystals	7	
Essences	3	Two incorrect labelling
Prunes	2	For water content
Molasses	2	Regarding labelling—Ex- planation accepted
Various foods ..	13	Labelling

INQUIRIES REGARDING LABELLING AND BRANDING.

A general investigation of all labels on foods regarding labelling as to natural food contents, quantities of single and component constituents, preservatives, flavouring, colouring, and place of manufacture, &c.

OTHER INVESTIGATIONS.

Kororoit Creek pollution.
Fitzroy cyanide fumigation in connexion with fatalities from the use of cyanide.
Oakleigh diphtheria outbreaks during 1945.
Chlorination practices for municipal swimming baths.
Medicated cigarettes.
Manufacture of talc powder in Victoria and the supply for local and overseas use.

HOSPITALS—(Miss Dudley)

Hospital Inspections	138
Measuring premises for registration as a private hospital	5
Investigating complaints re private hospitals ..	8
Inspections re unregistered hospitals	11
Total Inspections	162

Prosecution "Obstruction", fined £5, costs £2 2s. 1

Seizures (District Inspectorial Staff)—

Bacon, green, 10 carcasses ..	Not branded
Bacon, cured, 42 sides ..	Not branded
Calves, 2	Slaughtered illegally
Pork, 1 carcass	Slaughtered illegally
Pork, 3 fresh	Slaughtered illegally
Pork, 3 salt	Slaughtered illegally

PROSECUTIONS.

Prosecutions were taken against nineteen (19) persons involving 27 breaches of the Act and Regulations. One charge was withdrawn. One prosecution was dismissed on account of wrong person charged. All others were successful.

The offences were:—

Unclean food vehicle	1
Unclean abattoirs	4
Swine access to raw offal	2
False label on drugs	1
False advertisement of drugs	1
Loose dogs about abattoirs	2
Loose poultry about abattoirs	2
Unclean bakehouse	1
Food not protected from insects	1
Adulterated tripe	2
Killing horses at abattoirs	1
Keeping swine at abattoirs	1
Record book not kept at abattoir	1
Chipped crockery	2
Wrapping food in newsprint	1
Illegal slaughter	1
Unregistered piggery	1
Nuisance at piggery	1
Cheese falsely labelled	1

Fines £82 10s.; costs £38 19s. 7d.

S. BENNETT,
District Health Inspector.

WESTERN HEALTH AREA.

REPORT FOR YEAR 1945-46.

Part One.

A. DISTRICT HEALTH OFFICER'S DUTIES.

1. Conferences attended	5
2. Visits to schools, immunization	307
3. Inspections of private hospitals	46
4. Inquiries into tubercular patients outside clinic area	47
5. Attendances at Geelong Chest Clinic	12
6. Miscellaneous inspections	42

B. DISTRICT HEALTH INSPECTOR'S DUTIES.

1. Inspections—	
Inquiries	56
Private hospitals	17
Public buildings	34
Sanitary	108
Trade premises	183
Total	398
2. Visits to schools, immunization	225

C.

The district staff also carried out duties in the North-Western Health Area, and, in addition, acted as Chairman, and Secretary, respectively of the Hydatid Disease Committee, which held six meetings in Melbourne.

D. PRIVATE HOSPITALS.

There are now 26 in the area, two having closed, one at Geelong and one at Warrnambool; a new hospital for chronic patients has opened in Geelong West. Considerable concern has been caused in Geelong by the closing of a large midwifery hospital, which has resulted in a threatened shortage of midwifery beds. This difficulty is being met by the conversion of one hospital, previously registered for chronic cases only, to a midwifery hospital, by the proposed re-opening of a midwifery hospital and the registration of a new one, and by the provision of "pay-beds" in the extension of the midwifery ward at the Kitchener Memorial Hospital. Throughout the Health Area private hospitals continue to be faced with serious staff difficulties.

E. CHEST CLINIC.

	1944-45.	1945-46.
Patients admitted to clinic	121	84
Patients passed for sanatorium	13	13
Contacts examined and re-examined	462	531
Contacts found to be tuberculous	3	4
Percentage found tuberculous	0.6	0.7
Discharged as non-tuberculous	24	10
Visits by Nurse	559	474
Pneumo-thorax refills	32	90
X-ray examinations	334	417
Sputum examinations	148	93
Attendances at evening clinics	153	134
Total attendances	1,811	1,765

During the year it was possible for the District Health Officer to resume some duty at the Clinic. I now undertake examination of contacts and cases referred, on one day a week, leaving the care of actual cases to Dr. Piper. It will be noted that there has been a considerable increase in the number of pneumo-thorax refills carried out. The installation of an X-ray plant for screening these patients has proved a great convenience. The percentage of contacts found to be tuberculous remains about the same. Owing to illness, Sister Gillies has needed several periods of sick leave, her duties being undertaken by Sister Baker. Mrs. Cullen, who had carried out the duties of part-time clerical assistant, returned to England, her place has been taken by Miss Keith.

Part Two.

A. VITAL STATISTICS.

Area of district	12,690 square miles
*Population	162,398
Estimated increase	570

Year.	Birth Rate.	Death Rate.	Infant Mortality Rate.
GEELONG AREA, 41,300.			
1938-1942	17.78	12.34	41.48
1943	21.72	10.80	27.8
1944	20.27	12.34	28.71
1945	21.40	11.82	33.94
COLAC AREA, 5,650.			
1938-1942	22.44	11.13	28.87
1943	25.89	14.18	68.5
1944	20.03	12.23	53.1
1945	28.85	11.15	24.54
WARRNAMBOOL AREA, 9,300.			
1938-1942	21.00	10.34	34.91
1943	18.12	12.87	41.4
1944	16.99	12.58	44.30
1945	22.37	10.65	33.65
HAMILTON AREA, 6,100.			
1938-1942	22.94	10.88	34.44
1943	23.61	13.28	27.8
1944	21.97	12.13	22.39
1945	25.41	10.16	19.35

* All population figures and rates are provisional since 1939.

B. SANITATION.

There have as yet been no additions to the sewered areas in the district, but preliminary steps towards sewerage have been taken in respect of the townships of Portarlington, Torquay, and Barwon Heads, and the Borough of Port Fairy. Double pan services have, on the whole, been efficiently carried out. There is room for improvement in many of the garbage depots. Septic tanks installations have increased from 1,172 to 1,289, an increase of about 10 per cent., double that of the preceding year. Two hundred inspections of these installations were made by Municipal Health Inspectors in eighteen municipalities. There are 58 chemical closets of various sorts.

C. ADMINISTRATION.

1. Nuisances, complaints, &c. :—

	1944.	1945.
Municipalities issuing notices	24	23
Number of notices issued	640	619
Number of notices complied with	635	615
Prosecutions	..	3
Cautions	..	2
	£ s. d.	£ s. d.
Fines and costs	..	11 2 0

In the Shire of Hampden, five carcasses of beef were condemned and voluntarily destroyed on account of tuberculosis. In the Shire of Heytesbury, a quantity of confectionery, and in the Town of Hamilton, a large quantity of fruit and vegetables were voluntarily destroyed when found to be unwholesome.

Sixteen of the following samples were found to be adulterated. In fourteen cases the councils concerned took legal proceedings. In three instances cases were withdrawn, in one of these because the vendors were being proceeded against elsewhere. Eleven convictions were recorded, fines and costs totalling £45 11s. 6d. In the other two cases cautions were administered.

2. Food sampling :—

		1944.		1945.	
		Number.	Percentage.	Number.	Percentage.
Groceries	206	39.4	138	29.2	
Meats	92	17.6	105	22.2	
Bakers' products	26	5.0	60	12.8	
Milk	150	28.6	133	28.1	
Milk products	20	3.8	7	1.4	
Confectionery	1	0.2	..	..	
Cordials	28	5.4	29	6.1	
Drugs	..	..	..	..	

3. *Staff Changes.*—Dr. Alan Kidd has been appointed Medical Officer of Health of Geelong City, Dr. Reid has been appointed Medical Officer of Health of the Town of Newtown and Chilwell, *vice* Dr. G. Beck, deceased, while Dr. Francis has resumed duty at Port Fairy after service with the Forces.

Mr. Nash has resigned from the position of Health Inspector of the Shire of Heytesbury; this shire is at present without a Health Inspector, urgent duties being carried out by Mr. J. W. Smith, of the Shire of Hampden. Mr. Herbert has resigned from the Borough of Colac, his place being taken by Mr. Taylor, late of Hobart. Mr. Hickman has resumed duty as Health Inspector of the Shire of Warrnambool, after service with the Forces.

D. PROPOSED NEW MEAT AREA.

The project to constitute a meat area comprising portions of the Shires of Hampden, Heytesbury, Mortlake, and Warrnambool was revived, and a conference was held at Camperdown between Mr. Hepburn and the District Health Officer, as representing the Department, and representatives of the four shires. At this conference it was decided that a meat area should be constituted, the approximate locality where the abattoirs would be sited was fixed, and the approximate boundaries of the area, which will embrace the greater part of the Shires of Hampden, Heytesbury, and Mortlake, together with a small corner of the Shire of Warrnambool, were decided on. It will necessarily be some time before the abattoirs can be built; when, however, this meat area is proclaimed, it should also be possible to extend the Geelong, the Colac, and the Warrnambool Meat Areas, to embrace a wide belt of territory extending along the railway line from Geelong to Port Fairy.

E. NOTIFIABLE INFECTIOUS DISEASES.

							Average	Annual Number.		Actual Number.				
							1932-35.	1936-40.	1941.	1942.	1943.	1944.	1945.	Half 1946.
Diphtheria	..	..	..	..	..	..	322	247	158	54	124	91	36	4
Scarlet fever	..	..	..	..	..	..	183	164	460	376	341	416	176	111
Typhoid fever	..	..	..	..	..	..	5	2	2	..	..	..	2	1
Tuberculosis	..	..	..	..	..	..	71	61	55	47	60	68	38	25
Puerperal fever	..	..	..	..	..	..	2	3	..	..	1	2	..	..
Hydatid disease	..	..	..	..	..	..	10	7	2	10	7	13	24	3
Tetanus	..	..	..	..	..	..	2.6	2	4	2	..	..	5	1
Polio-myelitis	..	..	..	..	..	..	20	17	5	3	..	2	10	16
Cerebro-spinal meningitis	..	..	..	..	..	..	3.4	1.4	17	43	25	23	13	7
Encephalitis lethargica	..	..	..	..	..	..	0.2	..	..	..	..	..	..	..
Dysentery	..	..	..	..	..	..	0.4	0.4	..	10	3	1	..	2
Psittacosis	..	..	..	..	..	..	..	0.2	..	..	..	..	..	..
Undulant fever	..	..	..	..	..	..	..	..	1	..	1	3	2	1
Malaria	..	..	..	..	..	..	..	..	..	..	..	15	22	68
Endemic typhus	..	..	..	..	..	..	..	..	..	..	1	..	..	..

Diphtheria.—There is a progressive fall in the incidence of this disease, as shown in the following table:—

Period.	Total Cases.	Average Rate per 100,000.
1922-1925	1,657	305
1926-1930	1,262	166
1931-1935	1,789	236
1936-1940	1,248	154
1941-1945	464	57

Immunization was begun in 1938, since that time it has been carried out in every municipality at least once, most of the larger centres now carry it out annually, and the shires once every three years. In the period 1938-45, 28,099 children have been tested, and 21,501 have received full treatment with Formol Toxoid, while 1,564 have received at least two doses. In addition to these, 165 children have been treated with alum precipitated toxoid at Portland. These figures do not include the large number of children who have been treated privately in the various municipalities during the period. While results so far achieved are satisfactory, it is to be hoped that there will be no lessening in the numbers presented for immunization treatment annually.

Scarlet Fever.—During the last five years this disease has been very widespread throughout the district, and the incidence has been exceptionally high. Most cases however have been mild.

Typhoid Fever.—After several years with no cases, two were reported in 1945. One was a case of paratyphoid, the other proved to be a chronic carrier.

Tuberculosis.—The number of cases reported showed a diminution, but this was more apparent than real, for in Geelong and surrounding municipalities there was a lessening of the number of cases reported, even though eighteen possible cases were detected at the Newtown X-ray Centre. The attention of medical practitioners was drawn to this apparent anomaly in a circular letter.

This year Sister Stenborg has been appointed as travelling tuberculosis nurse for the portion of the district outside the area served by the Geelong Chest Clinic. A register of over 500 cases reported since 1932 has been prepared, and, after a period of training at the Central Tuberculosis Bureau and the Geelong Chest Clinic, she will shortly begin home visits in the district. Her appointment should prove of great value in maintaining touch with ex-sanatorium patients, and in securing the regular periodical examination of contacts of patients.

The Mass Radiological Centre at Newtown continues to do valuable work, as instanced by the following extract from the report for 1945 of the Medical Officer of Health of the Town, Dr. Reid:—

Number of persons X-rayed	..	..	2,055
Details of abnormalities—			
Probable active tuberculosis—			
Early	..	19	
Moderate	..	5	
Advanced	..	4	
		—	28
Probable old tuberculosis	..	11	
Calcification of glands, &c.	..	11	
Pleural thickening, adhesions, &c.	..	33	
Bronchiectasis	..	4	
Chronic bronchitis	..	3	
Pulmonary abscess	..	1	
Heart abnormalities	..	5	
Dextro-cardia	..	1	
Total	..	..	97

Hydatid Disease.—This year the Honorable the Minister approved of the appointment of a Hydatid Disease Committee, which consists of the following:—Dr. H. E. Albiston, representing the Australian Veterinary Association; Mr. J. S. Bacon, Department of Education; Dr. G. E. Cole, Department of Health; Cr. F. L. Dawkins, Municipal Association; Mr. A. R. Grayson, Department of Agriculture; Professor Peter MacCallum, British Medical Association; Mr. V. W. Officer, Victorian Graziers' Association. This Committee has held several meetings, at the first of which Dr. G. E. Cole was appointed chairman, and Mr. L. N. Strahle (District Health Inspector) was appointed secretary. The Committee has submitted a preliminary report to the Honorable the Minister recommending the inauguration of a sustained educational campaign, both among adults and children, and the appointment of a Research and Extension Officer. In the course of its investigations the Committee has received considerable advice and assistance from Sir Louis Barnett, the chairman of the Hydatid Research Committees of New Zealand.

Malaria.—There is a steady increase in the number of cases reported, as is only to be expected with the return of service personnel from overseas. All the cases have occurred among ex-service personnel. The reporting of such cases is not uniform throughout the district.

Polio-myelitis.—There has been an increased incidence towards the end of 1945 and in the first quarter of 1946, lessening in the second quarter of the year. The 26 cases were reported from seventeen different municipalities, the greatest number of cases in any one municipality being three. The following table shows the quarterly incidence since 1940:—

Year.	Quarters.				Total.
	1.	2.	3.	4.	
1940	..	5	1	..	6
1941	3	2	..	1	6
1942	1	..	2	2	5
1943	..	..	..	..	..
1944	1	1	..	..	2
1945	..	..	2	8	10
1946	12	4	..	..	..

Cerebro-spinal Meningitis.—The increased incidence of recent years has diminished somewhat, but is still well above the pre-war average of four cases per annum. The sixteen cases reported in the last twelve months were scattered throughout nine municipalities, the greatest number reported from any one municipality being six, but those were fairly evenly spaced throughout the period.

Year.	Quarters.				Total.
	1.	2.	3.	4.	
1941	3	2	4	8	17
1942	6	6	18	13	43
1943	3	3	11	8	25
1944	2	9	4	6	21
1945	2	2	4	5	13
1946	3	4	..	..	..

Vaccination against Small-pox.—Dr. Vaughan, Medical Officer of Health of the Borough of Portland, carried out vaccination against small-pox during the year, and noted in his report for February that "a gratifying response has been made to the Council's offer to provide free vaccination, and over 600 persons availed themselves of the opportunity."

F. NON-NOTIFIABLE INFECTIOUS DISEASES.

Vaccination against Pertussis.—This was carried out in the Shire of Heytesbury, where the Medical Officer of Health, Dr. Barrett, reported that "a large number of children were immunized against whooping cough" and in the Shire of Colac, where 32 children were immunized by Dr. Brown, the Medical Officer of Health.

Influenza.—An unusual number of monthly reports by Medical Officers of Health throughout the district recorded the incidence of cases of true influenza. Copies of these were supplied to the Director of the Walter and Eliza Hall Institute of Research.

G. MISCELLANEOUS.

Floods.—The effects on sanitation of the great floods which affected the western portion of the district early in the year were surprisingly few:—The interference with the water supply of Coleraine and Casterton; the temporary interference with the sewerage system at Portland; shortage of sanitary pans in some townships; the drying out of dwellings; and the disposal of carcasses of stock were the main problems, which were all adequately dealt with by local authorities as they arose.

GEORGE COLE, D.S.O., M.B., B.S., D.P.H.,
District Health Officer.

NORTH-EASTERN HEALTH AREA.

Administration.—No change in personnel.

Duties.—Municipal centres were visited and other parts of the area as required. Councillors and municipal officers were interviewed regarding matters of local administration. Assistance and advice were given to Medical Officers of Health. The work of municipal health inspectors was generally supervised and co-ordinated by the District Health Inspector or, in special details, by myself. Twenty-six interviews were held with Medical Officers of Health and eleven with other medical practitioners. Sixty-one interviews were held with councillors and municipal officers other than Medical Officers of Health. Twenty-five interviews were held with other Government Officers in the area, hospital staffs and other members of organizations interested in health matters. One investigation into unusual incidence of infectious disease was made. Thirteen special investigations were made into sanitary and local administrative problems. Anti-diphtheria immunization campaigns were carried out by medical officers of health generally with the assistance of district officers in eleven municipalities. Approximately 1,800 children were dealt with in these campaigns.

Eight hundred and thirty-six inspections under the Health Acts and Regulations were carried out by the District Health Officer, or with or by the District Health Inspector. The collection of data on health and sanitation, compilations for publication and the handling of public health and medical inquiries by the public formed part of the office duties.

INCIDENCE OF NOTIFIABLE INFECTIOUS DISEASES.

Disease.	Average Annual Number. 1931-32 to 1939-40.	Actual Number.					
		1940-41.	1941-42.	1942-43.	1943-44.	1944-45.	1945-46.
Diphtheria	226	78	43	144	160	88	85
Scarlet Fever	71	189	113	89	294	260	216
Typhoid fever	8	4	8	15	3	1	3
Tuberculosis	22	34	38	28	15	26	18
Poliomyelitis	14	1	5	2	1	3	47
Puerperal fever	3	1	..	..	3	..	1
Hydatids	3	..	1	..	..	..	2
Tetanus	1	4	1	..	1	..	1
Cerebro-spinal meningitis	1.5	4	10	42	13	5	5
Encephalitis lethargica	.3	..	..	1	1	..	..
Dysentery	.3	..	..	..	..	1	..
Trachoma	2.1	..	..	..	..	..	..
Helminthiasis	.3	..	..	..	..	..	..
Paratyphoid fever	..	..	2	..	..	..	..
Malaria	..	1	1	1	..	..	22
Anthrax	..	2	..	..	..	..	..
Undulant fever	..	1	..	1	..	..	..

Diphtheria.—Although the incidence is falling and compares favourably with the district figures in the nineteen-thirties, the incidence rate is considerably above that for the whole population of the State. The group composed of the Borough and Shire of Shepparton and the Shire of Rodney, with a population of less than one quarter of the total of the area has contributed 39 out of the total of 85 cases. This group reported 52 cases in 1944-45, 126 cases in 1943-44 and 68 in 1942-43 out of totals of 88, 160 and 144 for those years respectively for the whole area. Every effort should be made by propaganda and the provision of facilities, at least annually for unimmunized school children and oftener for pre-school children, for protecting the small proportion of unimmune population now contributing these cases. A house to house canvass by health visitors and officers of the health branch of councils and the regular screening of suitable films by local cinema proprietors would help to credit the district with having removed a "blot from its escutcheon."

A small outbreak of diphtheria smouldered for several months in the Myrtleford end of Bright Shire producing eighteen cases. Owing to the high proportion of children which has been immunized, this outbreak did not reach the high incidence it probably would have done otherwise. Nine municipalities did not report any cases for the year 1945-46; whilst six reported one only each.

All municipalities in the area are providing immunizing facilities at no direct cost to the public. The reason why the incidence of diphtheria in the north-eastern area of Victoria is not now almost nil is ignorance and prejudice or carelessness and indifference in a small proportion of the parents. Both of these can be removed almost completely by persistent health education.

Scarlet Fever.—Although the number of cases (216) for 1945-46 is lower than that of the peak year 1943-44 (293) it is much higher than the average in the nineteen-thirties. Only three out of twenty-five municipalities reported no cases.

The Shires of Benalla (29), Upper Murray (26), Violet Town (24), and the Borough of Shepparton (20) reported the highest incidence. Isolation is the only means of controlling this disease, and that is by no means a success from the administrative point of view. Some day active immunization will be developed as a really protective measure against streptococcal infections. Meanwhile isolation does modify the rate of spread.

Typhoid Fever.—Three cases were notified, one each from the Shires of Beechworth, Mansfield and Shepparton. No carrier was located in any of the cases.

Tuberculosis.—Eighteen cases were notified. The Tuberculosis Unit has been erected at Wangaratta Base Hospital. One has been authorized for Mooropna Base Hospital.

Poliomyelitis.—After freedom for many months three cases occurred in June, 1945, in Wodonga and Yack-andandah Shires. It is understood that there were cases in Albury, N.S.W., in May 1945. There has been a desultory incidence throughout half the municipalities of the area since then. Forty-seven cases were reported for the year 1945-46. Forty-seven cases were reported in the 1937-38 outbreak. This was approximately half the rate per 100,000 for the whole State in that outbreak. During the 1945-46 outbreak the incidence per 100,000 of population in the North-eastern area was twice that of the general rate for the State.

Malaria.—All 22 cases were in ex-service personnel.

Municipal Administration.—Five municipalities are still working war emergency arrangements for health inspection work. It should now be possible for all councils to make arrangements to fill vacancies and to organize the health inspections as on a permanent basis. Man power and material shortages still affect proposed sanitary works. This situation should ease in 1946-47. Improvement of water supplies is one of the principal items affected. Completion of sewerage works begun before the war and new schemes may be looked for in the coming months. At least eight towns are on the approved list.

During the year several problems connected with the administration of the Streams Pollution Regulations have cropped up, fortunately with no ill results.

In sanitary services the municipalities have generally exercised good control considering the war conditions.

Food control has been good, except that difficulties in procuring fly-wire have not prevented risk of fly-borne disease. No outbreak occurred. It is to be hoped, however, that inspectors will now have defects in protection of food against flies remedied as soon as possible. Considering all the disabilities inevitably associated with the war years the councils of the North-eastern area and their officers have carried out the health administration well.

Private Hospitals.—Shortage of nursing staffs have caused overwork and in some cases closure of hospitals. Most private hospitals are now working again, though shortage of staff still is a problem.

Maternal and Child Welfare Work.—The war has not affected the efficiency of this service which is now organized to provide for the needs of all children up to the school age even in remote parts.

H. W. FRANKLANDS, M.B., B.S., D.P.H.,
District Health Officer.

EASTERN HEALTH AREA

I have to submit the following report for the year ending 30th June, 1946 :—

ADMINISTRATION.

All portions of the area have been visited during the past year. With the exception of the Shire of Omeo, which has not a qualified health inspector, in all cases it was found that the local administration was generally well attended to by the local officers. The exception in several shires to this being in the question of supervision of the food supplies; this is dealt with later on in the report.

DISTRICT HEALTH INSPECTOR.

This officer has carried out his duties in a very efficient manner. In addition to his own work and assistance with Diphtheria Immunization Campaigns, he has given great assistance to the shires in the South Gippsland Group during the absence of their health inspector on sick leave. He made the following inspections, &c., during the year :—

Abattoirs	50
Boarding-houses	5
Camps	7
Dairies	27
Inquiries (various)	201
Grocers	77
Markets	2
Private hospitals	2
Sanitary	212
Vehicles	35
Bakehouses	24
Butchers	51
Cattle saleyards	25
Eating-houses	38
Factories	11
Hotels	17
Offensive trades	22
Public buildings	22
Shops	62

This makes a total number of inspections done 890. During the course of these inspections, 30 sheep's livers were condemned as unfit for food owing to the presence of hydatid. He took seventeen food samples during the year, all of these complied with the standard. Prosecution reports were laid in six cases, four of these were dismissed and in the other two convictions were obtained with fines of £10 and £1 12s. 9d. in costs. He also attended as witness for the Shire Council in several cases and costs of £3 12s. 11d. were allowed.

INFECTIOUS DISEASES.

During the year the following notifications of infectious disease were received in the area :—

Diphtheria, 19; tuberculosis, 33; puerperal fever, 7; scarlet fever, 347; poliomyelitis, 49; cerebro-spinal meningitis, 1.

The following table gives the incidence for the past ten years :—

Year.	Diphtheria.	Scarlet Fever.	Typhoid Fever.	Tuberculosis.	Poliomyelitis.	Cerebro-spinal Meningitis.
1936-37	117	52	1	21	..	..
1937-38	37	57	1	35	140	..
1938-39	88	81	3	14	3	..
1939-40	83	71	3	29	..	..
1940-41	246	138	2	31	..	..
1941-42	77	169	1	29	4	5
1942-43	81	163	1	39	1	14
1943-44	41	294	..	29	..	16
1944-45	39	220	..	50	..	4
1945-46	19	347	..	33	49	1

Diphtheria.—The number of cases of diphtheria is the lowest for some twenty years, and this in spite of there being now a much larger population in the area with increased travel and movement of individuals. The effects are now to be seen following the regular immunization campaigns held in all shires in the area.

Scarlet Fever.—The number of cases reported is again very high and will apparently remain so for some time as the great majority of cases which have been seen and reported are very mild. There are very many mild cases which are never seen or reported, and these continue to keep spreading the infection from place to place.

Tuberculosis.—The number reported is about the average for this area. It is almost certain that there is considerably more of this disease prevalent than is known as in nearly every case it is found that it is only the well-defined and/or advanced case which comes under notice and is so reported.

Poliomyelitis.—In common with other parts of Victoria, the area has had quite a comparatively large number of cases, 49 being reported in the twelve months. However, the cases were widespread in incidence and no definite outbreak in any locality. The vast majority of the cases were of a mild type.

Cerebro-spinal Meningitis.—Only one case was reported in the twelve months. This disease is disappearing again after reaching its maximum during the years 1942-44. This coincides with the closing of the various military and air force camps in the area.

Diphtheria Immunization.—During the year, campaigns were carried out in the Shires of Orboost, Morwell, Buln Buln, and the Town of Yallourn. A pleasing feature of the recent campaigns is the great interest taken by the parents, and this is shown by the comparatively large numbers of pre-school age children who are presented for treatment. Owing to the large number of children who have now at some time received treatment, it is usual in the larger centres to carry out a preliminary Schick Test at the beginning of each campaign. Owing to the scattered population of the various shires, it is only possible to have time to carry this out in the larger centres.

Given below are the figures for the year ending 31st December, 1945:—

School Children—

Presented for treatment	2,131
Preliminary Schick Test	1,136
Schick Positive	238
Began treatment	1,291
Sensitive Positive	408
Received one dose, 0.5 c.c.	32
Received two doses, 1.5 c.c.	140
Received three doses 2.5 c.c.	617

Pre-school Children (Alum-Precipitated Toxoid)—

Presented for treatment	588
Received one dose 0.25 c.c.	91
Received two doses 0.75 c.c.	497

Thus, during the calendar year 1945, 1,114 children received the full course of treatment in one or other type of treatment. Two hundred and sixty-four children received partial treatment of some type also.

Sanitation.—The sewerage plants which are in operation in various places have been giving satisfaction during the year. It is hoped that in the near future, those places which had their sewerage schemes partly completed when interrupted by war conditions will be soon able to resume installation and begin to give service. Stream pollution is at times somewhat of a problem, but matters in this respect have shown a great improvement in the past few years.

Food Supplies.—There are two Meat Inspection Areas in the district. For the protection of the community, it is hoped that more will be constituted in the future. Until such time, the majority of the community will have little protection given them in this regard. While the majority of the municipal authorities are doing excellent work in the supervision of the food supplies by means of sampling and efficiently dealing with such cases of adulteration which are found, yet, in a few districts, some shire councils still neglect to take any definite action to protect the community when such adulterations are found. This is a matter which calls for more efficient administration by the local authorities, which, in the past, have consistently neglected this important side of their health administration.

RALPH E. HARRIS, L.R.C.P., et S. (Ed.), D.P.H.
District Health Officer.

NORTHERN HEALTH AREA.

The Chief Health Officer,

I have to present my annual report for the year 1945-46.

INFECTIOUS DISEASES.

Diphtheria.—Fifty cases of diphtheria were notified, the lowest incidence for many years. Nineteen cases were from Bendigo, and thirteen municipalities had no cases. During 1945, only twelve of the 28 municipalities in the area carried out some immunization, and the number of children treated was very small. Only 199 were treated with formalized toxoid and 1,011 with alum-precipitated toxoid. Councils of municipalities, where no immunization was done during the year, are being circularized and urged to make this a constant feature of health work every year. The increasing use of alum-precipitated toxoid and the immunization of more pre-school children is a step in the right direction. The present low incidence cannot be expected to continue unless more immunization is done each year.

Scarlet Fever.—Two hundred and ninety cases of scarlet fever were notified, 22 cases less than the previous year but still a very high incidence. Only five municipalities were free of any cases notified. There were 86 cases in Bendigo, 31 in the Shire of Swan Hill, 27 in Waranga, 18 in the Borough of Swan Hill, 18 in Daylesford, and 12 in Castlemaine. There is thus widespread streptococcal infection throughout the area.

Pulmonary Tuberculosis.—Thirty-seven cases were notified, five less than the previous year. Fourteen cases were from Bendigo. If notifications are of any value in the estimation of incidence of this disease, and there is no reason to think that notification is any less thorough in recent years, rather the reverse, then it is of value to note that figures have been falling consistently over the last fifteen years during which time accurate figures are available. For the five-year period 1930-34, an average of 79 cases were notified each year and for the five-year period 1941-45, 44 cases. The death-rate for 1945 for the City of Bendigo was 4.5 per 10,000 of population, which is only half the rate of fifteen years ago. In spite of the publicity given to the lack of facilities in combating tuberculosis, with the present set-up for dealing with this disease, there has been marked progress.

Ten cases of silicosis were notified from the Tuberculosis Bureau, Bendigo, as cases of industrial disease. Nine examinations of applicants for the Treasury allowance for miners' phthisis were made. Four of the notified cases were considered to show radiological and clinical evidence of tuberculosis in addition to silicosis and two of these were found to have tubercle bacilli in the sputum.

The following is a summary of the work carried out at the Tuberculosis Bureau, Bendigo, for the year 1945:—

Number of first attendances for investigation	238
Re-attendances	860
Cases passed for treatment at the Chalet ..	34
Contacts:—	
Number of infecting cases	57
Number of contacts examined	97
Number of contacts re-examined	322
Number of contacts found tuberculous ..	8
Home visits by nurse	309
Pneumothorax refills	98
X-ray examinations	582
Sputum examinations	226
Total attendances	1,098

KING EDWARD VII. MEMORIAL CHALET, BENDIGO BASE HOSPITAL.

There were 27 admissions during the year, including 5 re-admissions. There were 7 deaths. Of patients discharged, 21 in number, 17 were improved in health, 2 were in a stationary condition, and 2 were worse. Five patients had been treated with artificial pneumothorax. Four of the pneumothorax patients had adhesion section at the Austin Hospital. Only three of the patients admitted could be said to be in the early stage of disease. Nine of the discharged patients still had tubercle bacilli in the sputum on discharge. At the end of the year, 22 patients were under treatment.

Of the 27 patients admitted, thirteen came from localities outside the City of Bendigo.

The following are necessary in this area in order to cope with the high local incidence of tuberculosis:—

(1) Equipment for mass miniature radiography in Bendigo. At present the number of early cases discovered is dishearteningly small. People are referred by doctors to the bureau for investigation only when symptoms have appeared. Except for the radiological examination of nurses and student teachers in the Education Department, there is no examination of the apparently healthy. Too little use of the bureau facilities is made by doctors. They, as well as the public, need education in the importance of radiological examination of the lungs of the apparently healthy.

(2) Legislation for the initial and periodical examination by X-rays of gold miners, together with a scheme of compensation for sufferers from silicosis as an industrial disease.

(3) A sanatorium of at least 120 beds situated near Bendigo to treat patients from the whole northern area. If it is intended to bring the number of beds in the State up to about 2,000, as has been recommended, the incidence of disease in this district warrants at least 120 beds. Patients do not care to be sent to the south of the State for climatic reasons; they prefer to be in touch with their relatives. A local sanatorium could be visited regularly by a thoracic surgeon for the purpose of consultation and the carrying out of necessary surgical procedures, or patients could be transferred temporarily, as at present, to the surgical centre. I am sure that, if all additional beds for the State are provided only in Melbourne, this area will have to continue to provide for its patients as at present, with only 24 beds, for the reason that patients will not be persuaded to leave this locality and go to Melbourne for sanatorium treatment.

Poliomyelitis.—Thirty-eight cases were notified, the first return to epidemic incidence since 1937. Cases began to appear during the last quarter of 1945, considerably later than the beginning of the epidemic in Melbourne. Only two cases were notified during the quarter ending 30th June, 1946, so that the epidemic appears to be over. Cases were very scattered throughout the area, thirteen municipalities being affected, with the Shire of Swan Hill having eight cases and Waranga seven cases. There were only three cases in Bendigo.

Cerebro-spinal Meningitis.—There were six cases notified, three of which were in the Shire of Korong.

There were two cases of puerperal fever and one case of tetanus.

Six cases of bacillary dysentery were notified from Kyneton. There was one case of trachoma notified from Swan Hill.

Malaria.—One hundred and thirty-two cases in returned servicemen were notified.

The following table illustrates the principal incidence of infectious disease in the area over the last ten years:—

Disease.	Number of Notified Cases.									
	1936-37.	1937-38.	1938-39.	1939-40.	1940-41.	1941-42.	1942-43.	1943-44.	1944-45.	1945-46.
Diphtheria	189	113	76	91	83	110	184	192	80	50
Scarlet fever	127	71	111	73	134	138	236	358	312	290
Tuberculosis	82	59	72	54	66	48	44	49	42	37
Poliomyelitis	2	102	6	1	1	1	1	6	2	38
Cerebro-spinal meningitis	..	1	2	..	2	15	15	12	8	6

Meat Areas.—The Boroughs of Eaglehawk and Echuca are to be constituted Meat Areas.

Disposal of Garbage.—Garbage disposal in Bendigo is to be improved by the use of new approved sites and by systematic covering.

Private Hospitals.—Nine inspections of private hospitals were made.

Food Sampling.—Of 301 food samples taken by municipal inspectors, eleven were found to be adulterated.

In one instance a successful prosecution resulted, and in four instances warnings were issued. In the case of the other six samples, all of which were of milk, two prosecutions were undertaken, one case being dismissed under the warranty provision of Section 267 (2) of the Health Act 1928. In the second case, five samples of milk from a dairy farmer failed to comply with the required standard but the case was dismissed. The Council lodged an appeal with the Supreme Court and the appeal was successful.

Inspections.—The following inspections and investigations were carried out by the district inspector:—

Abattoirs	84
Bakers' premises	85
Butchers' premises	109
Eating-houses	91
Inquiries	59
Factories	33
Grocers' shops	145
Offensive trades	11
Public buildings	4
Sanitary inspections	58
Shops	185
Vehicles	45
Miscellaneous	20
Total	929

K. GARDNER KERR, M.B., B.S., D.P.H.,
District Health Officer.

NORTH-WESTERN HEALTH AREA.

As Dr. Brennan, District Health Officer for the North-Western Health Area, was absent on duty with the military forces, the following information has been supplied by Mr. K. Holland, District Health Inspector:—

Dr. Cole, District Health Officer for the Western Health Area on periodical visits to this district, inspected hospitals, attended conferences, and assisted at diphtheria campaigns.

STAFF CHANGES.

Two Group Health Inspectors and three Medical Officers of Health have resumed duty in their respective areas after service with the military forces.

SANITATION.

Sewerage plants inspected in this area appear to be giving satisfactory service, and, as the material supply situation improves, this boon will be extended to many other areas in which sewerage authorities have been formed, and in which people are clamouring for such amenities.

NIGHTSOIL COLLECTION AND DISPOSAL.

In most cases these services are only reasonably satisfactory, disposal being the worst feature. In some cases, due to lack of suitable personnel, local authorities have experienced considerable difficulty in maintaining a service.

GARBAGE (COLLECTION AND TIPPING).

The benefit of this service is achieving some recognition, and some progressive shires are establishing them in their town areas.

Collection is satisfactory, and in large centres where garbage tips are efficiently controlled, the method of disposal is satisfactory, but, where uncontrolled tipping is the rule, breeding grounds for flies and rats is the result, and, in future, more supervision from local authorities will be necessary to prevent this state of affairs.

FOOD SAMPLING.

In the main councils complied with the statutory requirements in regard to food sampling, but, as in the past, little thought was given to the choice of samples. The result is that only a limited variety of samples, with undue emphasis on proprietary lines, to the exclusion of milk, meat, and other local products, were sent in.

FOOD PREMISES.

A reasonable standard of cleanliness was maintained, but it is problematical if the arrears in necessary maintenance and replacements will be overtaken in the near future.

FOOD DELIVERY.

Retail deliveries are satisfactory, but the wholesale delivery of meat leaves much to be desired and not much improvement can be expected until the Meat Transport Regulations are brought into operation.

OFFENSIVE TRADES.

In most types of offensive trade a satisfactory standard was maintained, but, in the case of abattoirs, more particularly private abattoirs outside Meat Areas, a better standard is required. In the majority of instances, these are decrepit structures of great age, which do not comply with building requirements and are in need of replacement. Run in conjunction with piggeries to dispose of the inedible offal and depending for their state of cleanliness on the strictness of local supervision, they are anachronisms which will not be capable of economic removal until Regional Meat Areas, complete with municipal abattoirs, responsible for inspection, slaughtering, chilling, and delivery of carcasses, are in operation throughout the area.

Tuberculin testing of dairy herds has again been carried out at Mildura, Maryborough, and Creswick, and this very necessary service is being contemplated by other municipalities.

Inquiries and inspections by the District Health Inspector totalled 746 and assistance at diphtheria immunization campaigns and to local health inspectors was also given.

NOTIFIABLE INFECTIOUS DISEASES REPORTED DURING THE PAST SIX YEARS.

Disease.	1940-41.	1941-42.	1942-43.	1943-44.	1944-45.	1945-46.
Diphtheria	209	112	100	104	42	45
Scarlet fever	449	214	292	580	439	222
Typhoid fever	3	3	2	3	10	5
Tuberculosis	68	52	42	48	43	40
Poliomyelitis	1	9	3	..	..	34
Parotid fever	5	..	3	..	1	..
Hydatids	..	..	2	1	..	..
Tetanus	2	4	1	3	3	..
Cerebro-spinal meningitis	4	14	20	16	4	8
Encephalitis lethargica	..	..	..	..	..	..
Dysentery	..	..	..	..	..	..
Trachoma	..	..	..	..	..	..
Helminthiasis	..	..	1	..	..	..
Malaria	..	1	..	..	5	5
Typhus	..	..	1	..	..	..

Diphtheria.—Approximately the same as last year and a considerable decrease on figures for previous years.

Scarlet Fever.—The incidence of this disease is below average.

Poliomyelitis.—Thirty-four cases reported represents sporadic cases from all parts of the area, with, in the cases investigated, no connecting link.

Typhoid.—The five cases were from the same source as the ten cases last year, and investigation by the responsible authorities revealed "Carriers" who have now been transferred to another institution.

Malaria.—The reported cases were returned servicemen.

Tuberculosis.—The number of cases is about average.

Diphtheria immunization was carried out by ten municipalities and 2,236 children were treated. This number is below average and more campaigns are necessary to achieve the maximum result.

The attached report, supplied by the District Health Nurse, Sister Douglas, gives details of the activities at the Ballarat Tuberculosis Chalet and Bureau during the year ending 30th June, 1946.

TUBERCULOSIS BUREAU, BALLARAT.—YEARLY RETURN, 1945-46.

	Male.	Female.	Under 14.		Total.
			Male.	Female.	
Number of new cases applying	73	82	27	18	200
New cases taken on at Bureau for observation and treatment	37	56	21	16	139
Re-attendances	235	349	25	36	645
Re-examinations	227	338	25	36	626
Admissions to T.B. chalet	5	10	..	..	15
Discharges from T.B. chalet	5	7	..	..	12
Number of deaths at T.B. chalet	..	2	..	..	2
Cases passed for Austin	..	..	..	..	..
Cases passed for Royal Park	..	..	..	..	..
Cases referred to other Institutions	..	..	..	..	..
Bureau cases transferred to Sanatorium	..	..	..	..	..
Sanatorium cases transferred to Bureau for special treatment	2	3	..	..	5
Patients discharged after treatment at the Bureau—					
Markedly improved	..	..	..	..	..
Improved	..	..	..	..	..
In status quo	..	..	..	..	..
Worse	..	..	..	..	..
Patients found non-tuberculous	36	26	6	2	70
Contacts—					
Number of infecting cases	13	15	..	..	28
Number of contacts examined	23	37	21	15	96
Number of contacts re-examined	44	87	21	29	181
Number of contacts found tuberculous	..	..	..	..	..
Number of contacts under suspicion T.B.	23	37	21	15	96
Number of invalid pensioners seen	201	145	..	..	346
Home Visits—					
Medical Officer	..	..	..	..	..
Nurse's first visit	5	10	..	..	15
Nurse's revisits	532	480	..	..	1012
Special visits in connexion with after-care	..	..	..	..	..

TUBERCULOSIS BUREAU, BALLARAT.—YEARLY RETURN, 1945-46—continued.

	Male.	Female.	Under 14.		Total
			Male.	Female.	
Pneumothorax refills	90	141	..	..	231
X-ray examinations { films	154	221	29	39	434
	6	13	..	..	19
Sputum examinations	187	74	..	..	261
Total attendances, old and new cases	272	405	46	52	775
Attendances at evening session	39	46	4	5	94

APPENDIX I.

NEW LEGISLATION, 1945-46.

ACTS.

Health (Wines) Act 1945 (No. 5078).

Hospital Benefits Act 1945 (No. 5101).

REGULATIONS.

The Food and Drug Standards Regulations were amended to specify the labelling required on preparations containing DDT and to limit the amount of DDT permissible on fruit and vegetables.

The date of coming into operation of the Meat Transport Vehicles Regulations was deferred to 1st November, 1946.

PROCLAMATIONS.

Fish curing was declared an offensive trade.

The Sale and Yallourn Meat Areas were extended, the name of the latter being altered to "Morwell Meat Area".

The date of operation of the Frankston, Castlemaine, Daylesford, Kyneton, and Maryborough Meat Areas was deferred to 1st September, 1946.

APPENDIX J.

PRIVATE HOSPITALS.

Registered at 30th June, 1945 .. 322

Registered at 30th June, 1946 .. 308

of which 280 contained five or more beds with a total of 4,357 beds and 28 with less than five beds with a total of 89 beds.

Grand total beds 4,446

New hospitals opened 12

Hospitals closed 26

