

UNIVERSITY OF SOUTHERN QUEENSLAND

TYPHOID FEVER IN COLONIAL TOOWOOMBA AND BRISBANE

A Dissertation submitted by

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ABSTRACT

Typhoid fever is a forgotten disease in today's society, but for the people of nineteenth century Australia it was part of their every day lives. This thesis examines the role that the Queensland colonial government, the medical profession, and the communities of Toowoomba and Brisbane played in the fight against the disease. At separation from New South Wales the Queensland government officials were new and inexperienced and had inherited a financial debt. These circumstances resulted in cautionary governance when it came to public health policy and issues, but determination and single-mindedness when it came to development of roads and railway lines. The government's view at the time was if the colony was to prosper then this type of infrastructure must be developed at all costs. What the government failed to realise was that the infrastructure of drainage and sewerage, associated with good public health policies, needed to go side by side with other types of infrastructure. The prosperity of the colony rested on the health of its people. Because of the failure of the government to recognise the value of strong public health legislation it was up to the medical profession and the community to be vigilant and take the challenge to the government. This study has found that throughout the second half of the nineteenth century the medical profession and the community with the support of various newspapers had to challenge the government on public health issues consistently in relation to typhoid fever. This political pressure was more successful in Toowoomba where William Groom's leadership achieved some important engineering solutions whereas campaigns in the capital, Brisbane, were marked by diversity and divisions. Intransigent colonial government policy condemned both cities to inadequate sanitation infrastructure until the twentieth century.

CERTIFICATION OF DISSERTATION

I certify that the ideas, analyses, and conclusions reported in this dissertation are entirely my own effort, except where otherwise acknowledged. I also certify that the work is original and has not been previously submitted for any other award, except where otherwise acknowledge.

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INTRODUCTION

In the year 2000 a health warning was posted on the internet by the Australian Department of Health and Ageing from a report dated 10 May 2000 that read as follows:

TYPHOID FEVER - URGENT HEALTH ALERT

A health warning has been issued to all passengers who travelled on the P&O *Fair Princess*, cruise No.76 that departed Cairns, Australia on 12 May 1999 and travelled to Port Moresby, Samarai Island, Milne Bay, Honiara, Champagne Bay and Vila to see a doctor immediately if they are feeling unwell or have been recently sick.

The Communicable Diseases Network of Australia New Zealand (CDNANZ) advises that at least three passengers on this cruise have been infected with typhoid fever and there may be more passengers who are affected.

There are two confirmed cases of typhoid fever in Victoria and one in NSW. All of the cases notified so far appear to have taken a Kokoda Trail tour on 14 May.¹

Many people who read this warning would have been surprised that cases of typhoid fever had been located in this country in the twenty-first century because it is a disease that is preventable and virtually unheard of today. In the nineteenth century, however, the disease was rampant in all colonies of Australia and communities looked to Colonial Governments and medical professionals to solve the problem. Despite the tragic results of the disease in nineteenth century Australia, typhoid fever has not warranted a thorough investigation in its own right. Therefore, this study will fill this gap in historical works and investigate outbreaks of the disease in Toowoomba and Brisbane and analyse the response of the Queensland Colonial Government and these local communities to typhoid fever. Historically, the Queensland Colonial Government in the nineteenth century has been depicted as

¹ Department of Health and Ageing, 'Report on typhoid fever outbreak on an Australian cruise ship', Communicable Diseases Intelligence Vol. 23, No. 6, <http://www.health.gov.au:80/pubhlth/cdi/cdi2306/cdi2306d.htm> (accessed 21/03/02).

being a laissez-faire government, particularly in relation to Public Health.² The Queensland Colonial Government - with inherent financial problems - nevertheless pushed ahead with their desire to develop and prosper with roads and railway projects, while public health was ranked a low priority thereby allowing typhoid fever to become endemic in Toowoomba and Brisbane.

LITERATURE REVIEW

Historical investigation into health and disease in Queensland has been well covered but the disease typhoid fever has been concealed or overlooked within the broader categories of Queensland's infectious diseases and public health research, and medical researchers such as Ross Patrick, John Pearn and John Tyrer have brought to their investigations a sense of authority from an epidemiological approach.³ It must be recognised that typhoid fever in the nineteenth century was difficult to examine until the late 1870s because of the difficulty in diagnosing the disease. Consequently, few have sought to take up the challenge to enquire into typhoid fever in its own right.

From the literature it is apparent that diagnosing typhoid fever was difficult for medical practitioners in the nineteenth century. Scholars such as J H L Cumpston,

² E. Barclay, Aspects of public health in Queensland from 1859-1914, Master of Arts Thesis, University of Queensland, 1979; R. Patrick, *A History of Health & Medicine in Queensland 1824-1960*, (St Lucia Q: University of Queensland Press, 1987), pp. 33-59.

³ Patrick, *op. cit.*, J. Pearn, *Pioneer Medicine in Australia*, (Brisbane Q: Amphion Press, 1988); J. Tyrer, *History of the Brisbane Hospital and its affiliates: A pilgrim's progress*, (Brisbane Q: Boolarong Publications, 1993).

Douglas Gordon, and Ross Patrick⁴ agree that diagnosing infectious diseases during this period was extremely difficult because the medical profession had no idea how the disease was spread. Historian Michael Cannon stated that a coherent, scientific explanation as to the cause of the disease was lacking. He also stresses that even though there was evidence that improved hygiene practices could save lives, many medical practitioners refused to move from the traditional approach.⁵

Other historians such as Saxby Pridmore, Thomas McKeown, and Philip H Manson-Bahr⁶ also stress this view when they point out that typhus, typhoid, dysentery, and diarrhoea were grouped together in statistical returns in all colonies during the first half of the nineteenth century because of diagnosing difficulties. The discovery of the germ theory by Louis Pasteur in 1877 was to be a breakthrough for contagious diseases such as typhoid fever, but the Queensland Medical Professionals did not wholly accept this scientific knowledge until the 1890s.⁷ Historians have debated the significance of the germ theory quite enthusiastically. Notably, M J Thearle and Ross Patrick view this discovery as the most important breakthrough of the period.⁸

⁴ J. Cumpston, *The Health of the People: A study in federalism*, (Canberra ACT: Roebuck Society Publication No. 19), 1978, p. 4; D. Gordon, *Health, sickness, and society: Theoretical concepts in social and preventive medicine*, (St Lucia Q: University of Queensland Press, 1976), p. 177; Patrick, *op. cit.*, p. 192.

⁵ M. Cannon, *Life in the Cities: Australian in the Victorian Age*: 3, (Melbourne V: Thomas Nelson (Australia) Limited), pp. 147-8.

⁶ S. Pridmore, 'Disease in Tasmania' in *Papers and Proceedings, Tasmania Historical Research Association*, (26), 1979, p. 36; T. McKeown, *Medicine in Modern Society: Medical Planning Based on Evaluation of Medical Achievement*, (London: George Allen & Unwin Ltd, 1965), p. 41; and P. Manson-Bahr, *Manson's Tropical Disease: A Manual of the Diseases of Warm Climates*, (London: Cassell and Company, Ltd, 1948), p. 304.

⁷ Patrick, *op. cit.*, pp. 195-7.

⁸ M. Thearle, 'Dr F.W.E. Hare and the Cold Bath Treatment of Typhoid Fever', in *Reflections on Medical History and Health in Australia: Third National Conference on Medical History and Health in Australia 1986*, (Parkville V: Medical History Unit, University of Melbourne, 1987), p. 15; Patrick, *op. cit.*, p. 220.

There is speculation among historians about how prevalent typhoid fever was in Australia pre-1850s. One viewpoint is that prior to the 1850s typhoid fever did not exist and therefore was not a problem for the medical profession or the community. The other viewpoint is that outbreaks of the disease occurred prior to the 1850s and was a matter of concern for communities. Jennifer Hagger and Ross Patrick argue that Australia was relatively free from infectious disease prior to the 1850s, including typhoid fever,⁹ whereas K S Inglis, J H L Cumpston and F McCallum, and S Pridmore assert that infectious diseases, in particular, typhoid fever, was endemic and sporadic in settlements throughout Australia before the 1850s.¹⁰ Historian Michael Cannon is quite adamant that typhoid fever was not only significant in Australia in the pre-1850 period, but patients with the disease were exposed to practices of quackery rather than scientific based treatments in hospitals.¹¹

The most important theme has been the need for sanitation reform to prevent the disease.

Historians have agreed that post 1850 outbreaks of typhoid fever were on the increase, and many agree that sanitation reform was slow. However, there are three distinct approaches as to the implementation of reforms. Firstly, it has been argued that inaction by colonial governments resulted in poor public health systems. Secondly, legislative delays contributed to reforms not being put in place, and difficulties in obtaining suitable people to administer a reform system. The third

⁹ J. Hagger, *Australian Colonial Medicine*, (Adelaide SA: Rigby Limited, 1979), p. 9; Patrick, *op. cit.*, p. 34.

¹⁰ K. Inglis, *Hospital and Community: A History of The Royal Melbourne Hospital*, (Carlton V: Melbourne University Press, 1958), pp. 32-3; J Cumpston, and F. McCallum, *The History of the Intestinal Infections (and Typhus Fever) in Australia 1788-1923* (Melbourne V: Service Publication No 36, H.J. Green, Government Printer, 1927), p. 7; S. Pridmore, (26), p. 36.

¹¹ Cannon, *op. cit.*, p. 144.

view focuses on the role of middle-class movements and their concern for sanitation and public health reforms. Nevertheless, there is general agreement that delay in sanitation reform was detrimental to the health of the people. The challenge for this review is to examine the main approaches historians have taken in relation to typhoid fever outbreaks, and sanitation reforms colony by colony. There is no particular ordering of the colonies but Queensland is examined last because it is the focus of this study.

Victoria

Historians Michael Cannon and David Dunstan in their works on the city of Melbourne are in agreement that outbreaks of typhoid fever occurred post 1850.¹² They also agree this was due to the growth in population and that no changes were made to the infrastructure to accommodate such development. However, on the matter of sanitation reform Michael Cannon subscribes to the school of thought that laissez-faire economics resulted in a poor health system.¹³ Whereas David Dunstan is of the view that legislative delays, resistance to new taxes by the electorate, and difficulty in obtaining suitable people to administer a reform system were the barriers that slowed sanitation reform down.¹⁴

Michael Cannon's position on laissez-faire colonialism was that it was a harsh system that contributed to ensuring a continued division between two different

¹² Cannon, *op. cit.*, p. 146; D. Dunstan, *Governing the Metropolis: Politics Technology and Social Change in a Victorian City: Melbourne 1850-1891*, (Carlton V: Melbourne University Press, 1984), p. 13.

¹³ Cannon, *op. cit.*, p. 142.

¹⁴ D. Dunstan, 'Dirt and disease', in G. Davison, D. Dunstan, and C. McConville, *The Outcasts of Melbourne: Essays in Social History*, (Sydney NSW: Allen & Unwin, 1985), p. 143.

classes of people during this period, the working class including the urban and rural poor, and the leisured class.¹⁵ Charity hospitals were starved for funds. Medical care was denied to people who were sick and dying, but could not afford to pay for their treatment. As a result hospital authorities applied discriminatory testing to patients to see if they should receive treatment. The same authorities were guided by a shortage of funds rather than what was in the best interest of patients. Cannon's standpoint is that the colonial government was not concerned with people and their health.

Unlike Michael Cannon, David Dunstan denies that the Victorian Government was apathetic about the people and their health. His position is that lengthy parliamentary debates, differing economic interests, professional allegiances, and territorial and political loyalties all contributed to delays in sanitation reform. In Dunstan's view the social and political fragmentation of Melbourne, rather than vested economic interests, explains why sanitation reform post 1850s was so slow.¹⁶

On the other hand historians Graeme Davison and Shurlee Swain offer the perspective of class theory to explain the increase in typhoid fever outbreaks in the post 1850 era.¹⁷ They assert that risk of illness or death was higher in working class areas than middle class areas. Also medical care for working class areas was limited. As urban historians Davison's and Swain's position is that when it came to disease and sanitation reform working class people were the least influential in the colonial community. These historians insist that working class people in Melbourne were tied

¹⁵ Cannon, *op. cit.*, p. 142.

¹⁶ Dunstan, *op. cit.*, pp. 141-2.

¹⁷ G. Davison, 'Introduction', in Davison, et. al, *op. cit.*, p. 18; S. Swain, 'The poor people of Melbourne', in Davison, et. al, *op. cit.*, p. 109.

to the suburbs they lived in because of their low status and their dependence on local medical charities. However, people from middle class areas had the position in society to influence and bring about change.¹⁸ Their view is that the poor and working class could not help themselves; they were reliant on the middle-class movement to bring about change.

This supports the views of Michael Cannon by showing how government inaction affected the material conditions of poor and working class colonial Australians. However, these historians have also put forward a strong case for the middle-class movement and their influence in bringing about sanitation reforms.

South Australia

In South Australia there was a definite relationship between typhoid fever and sanitation problems, as in all of the Australian colonies during the nineteenth century. According to Philip Woodruff typhoid fever outbreaks were due to overcrowding and the filthy conditions of the city.¹⁹ However, Woodruff's views on the responsibility of government in the face of this sanitation crisis are not clear. On the one hand he affirms the work of Cannon and Dunstan with his evidence of gross neglect and apathy on the part of the government and the community, but on the other hand he states that the government was aware of and acting on the sanitation problem as early as 1849.²⁰ It seems that there was some government support, but on the whole an apathetic view to the sanitation problem was present.

¹⁸ Davison, *op. cit.*, p. 18; Swain, *op. cit.*, p. 92

¹⁹ P. Woodruff, *Two Million South Australians*, (Kent Town SA: Peacock Publications, 1984), p. 28.

²⁰ *ibid.*

However, what is apparent is that South Australia followed the Victorian pattern in that sanitation reforms were slow in being enacted. According to Woodruff government involvement was not producing much improvement. Money was not a problem, but the manpower to implement any changes was not available. Many able-bodied people were departing for the Victorian gold fields in the 1850s and left South Australia with a shortage of labour. Woodruff defends his assertion that the government was concerned and interested in the health of the community by quoting a circular letter that went to all doctors in the colony 'seeking their views on [the] sanitary state of the city, and the effects of this on health'.²¹ However, why the government was content to just 'inspect, discover and report conditions dangerous to health',²² is not spelt out clearly in this work, and demonstrates a gap in our understanding of the politics of public health in South Australia.

Tasmania

In Tasmania typhoid fever outbreaks post the 1850s did not occur as often as in other colonies. However, the outbreaks of 1866 and 1877-81 were very severe and of great concern to the Tasmanian government.²³ Saxby Pridmore's account of the impact of the disease in Tasmania is concise and vivid.

On the subject of typhoid fever and sanitation Saxby Pridmore concedes that despite a large number of 'legislative moves in the public health sphere',²⁴ in Tasmania the legislation was not enforced and was even neglected. Tasmania was slower than the

²¹ *ibid.*

²² *ibid.* p. 29.

²³ Pridmore, *op. cit.*, pp. 36-37.

²⁴ *ibid.* p. 36.

other colonies of Australia to undertake sanitation reform which he attributes to circumstances particular to Tasmania. For example, there were no large goldfields, and no bubonic plague outbreaks in Tasmania; therefore, the driving force behind sanitation reform was absent. This argument is surprising since deaths from fevers were increasing, and the smallpox outbreak in Launceston in 1887 resulted in the death of eleven people. However, Pridmore goes so far as to say that ‘the thorough preventative measures adopted may be considered to reflect a creditable awareness of public health methods’.²⁵

New South Wales

The Sydney experience of typhoid fever was very similar to that of the other colonies. Historians John Goldsmid and Peter Curson not only support the view that typhoid fever outbreaks were on the rise post 1850, but also stress that the mortality rate in New South Wales was high between 1876 and 1878, 1882 to 1887, and again in the years 1897 to 1904.²⁶

Historian John Goldsmid in his writings has not concentrated very much on typhoid fever although he describes the typhoid fever outbreaks as ‘a scourge in all the main Australian cities’²⁷ and ‘*par excellence* the fever of Australia’.²⁸

²⁵ *ibid*, p. 39.

²⁶ J. Goldsmid, *The Deadly Legacy; Australian History and Transmissible Disease*, (Kensington NSW: New South Wales University Press, 1988), p. 33; P. Curson, *Times of Crisis: Epidemics in Sydney 1788-1900*, (Sydney NSW: Sydney University Press, 1985), p. 15.

²⁷ Goldsmid, *op.cit.*, p. 33.

²⁸ A. Davidson, ‘Geographical Pathology’, (Pentland Edinburgh, 1892), cited in Goldsmid, *op. cit.*, p. 33.

On the other hand historian Peter Curson's work on epidemics in Sydney between 1788 and 1900 is very detailed and explicit about infectious diseases during this period. He strongly argues that from the mid-1870s the threat of epidemic disease was the catalyst that activated middle-class concern for sanitary reform and a better public health system.²⁹ His viewpoint is that sanitation reforms occurred because of the middle-class movement for sanitary reform. In other words he has adopted a social movement analysis regarding sanitary reforms and public health in the colony of New South Wales. He points out that there were three epidemics that brought about awareness of living conditions, urban sanitary conditions and public health.³⁰ These were scarlet fever 1875-6, smallpox 1881-2, and typhoid 1885-6; poor sanitary conditions contributed to these epidemics and sanitation reform were crucial to their eradication.

In her study of public health in nineteenth century New South Wales Catherine O'Carrigan also offers a social movement analysis to explain how sanitary reforms and better public health practices occurred in the colony of New South Wales.³¹ However, she agrees that inaction by the colonial government definitely delayed sanitation reform in that colony.³² She disputes that Parliamentarians were pushing for sanitation reform at all, and it was only as various medical men became members of Parliament and one became Lord Mayor of Sydney that sanitation reforms were

²⁹ Curson, *op. cit.*, p. 16.

³⁰ *ibid.*

³¹ C. O'Carrigan, 'Some Facets of Public Health in Nineteenth Century New South Wales', in J. Pearn, and C. O'Carrigan, eds, *Australia's Quest for Colonial Health; Some influences on early health and medicine in Australia*, (Brisbane Q: The Department of Child Health, Royal Children's Hospital, 1983), p. 133.

³² *ibid.* p. 138.

initiated. O’Carrigan forcefully points out that reforms that occurred were due to medical men as individuals not ‘governmental initiatives or municipal concern’.³³

Another study that has developed a social movement analysis to explain sanitation reforms in ‘Australia’s urban centres’³⁴ is that of historians Drew Hutton and Libby Connors in their study *A history of the Australia Environment Movement*. They argue that because of the appalling material conditions of urban centres churchmen, labour activists, engineers, architects and doctors campaigned for sanitation reform.³⁵ The importance of the studies by historians Peter Curson, Catherine O’Carrigan and Drew Hutton and Libby Connors is the consistency they have displayed in their views that sanitation reforms resulted because individuals and community groups pushed for social change.

Western Australia

It has been well documented that typhoid fever outbreaks in the colony of Western Australia were particularly horrendous. Historians John Goldsmid, Vera Whittington and Dudley Snow have pointed out that Western Australia has the unenviable record of the highest typhoid mortality in proportion to the population.³⁶ These historians also agree that the goldfields were the worst affected areas and that typhoid fever was of epidemic proportions.³⁷

³³ *ibid.* p. 133.

³⁴ D. Hutton, and L. Connors, *A history of the Australian Environment Movement*, (Cambridge: Cambridge University Press, 1999), p. 78.

³⁵ *ibid.*, pp. 78-79

³⁶ Goldsmid, *op. cit.*, p. 34; V. Whittington, *Gold and Typhoid Two Fevers: A Social History of Western Australia 1891-1900*, (Nedlands WA: University of Western Australia Press, 1988), p. 9; D. Snow, *The Progress of Public Health in Western Australia 1829-1977*, (Nedlands WA: University of Western Australia Press, 1981), p. 79.

³⁷ Goldsmid, *op. cit.*, p.34; Whittington, *op. cit.*, p. 8; Snow, *op. cit.*, p. 79.

With Western Australia having the record for the highest mortality rate due to typhoid fever sanitation reform should have been a priority of the colonial government of Western Australia. However, Dudley Snow stresses that sanitation reform was slow and took a long time to implement. He agrees that this was due to the colonial government's failure to address public health issues. However, he also stresses there were conflicts within the government and the Central Board of Health. Many debates about funding and salary allocations were conducted and hindered sanitation reforms.³⁸ These administrative struggles and the resulting delays to sanitation reforms are well covered. Snow's account of typhoid fever outbreaks in Western Australia is an impressive and detailed account.

Vera Whittington presents a systematic account of typhoid fever outbreaks, high rates of mortality, and the lack of adequate medical facilities.³⁹ She also highlights that the Western Australian government was neglectful in its public health commitment reinforcing Cannon's work on laissez-faire attitudes. In her study she attributes this neglect to 'ignorance, greed and apathy'.⁴⁰ John Goldsmid also gives a short version of typhoid fever outbreaks in Western Australia, although his discussion does not include sanitation reforms.

All of these writings are important to the history of typhoid fever in Western Australia and their value as a group is to give an account that captures the whole picture of the disease in Western Australia during the nineteenth century.

³⁸ Snow, *op cit.*, pp. 46-47.

³⁹ B. Kennedy, Review of 'Gold and Typhoid, Two Fevers: A Social History of Western Australia, 1989-1900, by Vera Whittington, *Australian Historical Studies*, Vol. 24, No. 95 (October 1990), pp.318-19.

⁴⁰ Whittington, *op cit.*, p. 7.

Queensland

The colony of Queensland like Western Australia experienced severe outbreaks of typhoid. Historian Ross Fitzgerald is of the view that the sanitation conditions in Toowoomba and Brisbane were so bad they were likened to ‘the grossest sanitary situation in any old English towns’.⁴¹ Medical professional Ross Patrick stresses that the sanitation infrastructure in Brisbane was of a low standard particularly in the 1850s, but there were no reports of serious epidemics at that time.⁴²

Historian Lori Harloe indicates that epidemics of infectious diseases were the driving force behind public health acts being implemented. She states that an outbreak of typhoid fever led to the *Public Health Act* of 1884.⁴³ In her study of Public Health and Tropical Medicine she gives a good account of the situation but does not have a lot to add to the specifics of typhoid fever history.

However, Ross Patrick and Enid Barclay have gone into considerable detail about sanitation reforms in the 1870s and 1880s in Queensland. Both agree that the Queensland government operated under a laissez-faire economic attitude to sanitation reform.⁴⁴ Ross Patrick also insists that there were administrative problems associated with such reforms as well.⁴⁵

⁴¹ R. Fitzgerald, *From the Dreaming to 1915: A History of Queensland*, (St Lucia Q: University of Queensland Press, 1982), pp. 270-1.

⁴² Patrick, *op. cit.*, pp. 33-35.

⁴³ L. Harloe, ‘From North to South: The Translocation of the Australian Institute of Tropical Medicine’ J. Pearn, *op. cit.*, p. 148.

⁴⁴ Patrick, *op. cit.*, pp. 33-59; E. Barclay, ‘Fevers and Stinks: Some problems of Public Health in the 1870s and 1880s’ *Queensland Heritage*, Vol. 2, No. 4, May 1971, 4.

⁴⁵ Patrick, *op. cit.*, pp. 33-59.

Enid Barclay has given a comprehensive account of the public health issues and sanitation reforms throughout the second half of the nineteenth century in the colony of Queensland through her article 'Fever and Stinks: Some problems of Public Health in the 1870s and 1880s' and her Honours and Masters theses.⁴⁶ Her thesis work on typhoid fever gives a valuable insight into the public debates that drove sanitation reform in nineteenth century Queensland.

A study by historians Helen Gregory and John Thearle titled 'Casualties of Brisbane's Growth: Infant and Child Mortality in the 1860s'⁴⁷ emphasises the high mortality rate of infants and children during typhoid fever epidemics in Brisbane. *The Brisbane Courier* constantly brought this problem to public attention. Helen Gregory and John Thearle in this study have provided striking evidence of how important the community, medical and political responses to typhoid fever epidemics were.

The views of these historians are that sanitation conditions were very poor in colonial Queensland and public health reforms were slow to be implemented. There is also a consensus that the driving force behind public health reform was public agitation in response to epidemics of infectious diseases.

⁴⁶ E. Barclay, *The Public Health Movement in Queensland 1859-1900*, B.A. with Honours, University of Queensland, 1969; E. Barclay, *Aspects of public health in Queensland from 1859-1914*, Master of Arts Thesis, University of Queensland, 1979.

⁴⁷ H. Gregory, and J. Thearle, 'Casualties of Brisbane's Growth: Infant and Child Mortality in the 1860s', *Brisbane: Housing, Health, The River and the Arts*, Brisbane History Group Papers No. 3 1985, pp. 57-70.

There is a theory among Queensland historians that the typhoid fever outbreaks in Toowoomba and Brisbane more than any other outbreaks in the colony were directly responsible for the implementation of sanitation reforms in the colony of Queensland. Historians Enid Barclay, Ross Patrick and Robert Dansie all support such a view in their writings about the typhoid fever outbreak in Toowoomba in 1878 stressing that the outbreak was ‘so extensive and virulent that the government had been frightened into action’.⁴⁸ This action was in the form of a commission appointed to inquire into the causes of typhoid fever in Toowoomba.⁴⁹

Enid Barclay and Ross Patrick stress that the Brisbane typhoid fever outbreaks in 1884 regained the attention of the public and the authorities.⁵⁰

There were a number of infectious disease outbreaks throughout Australia especially in the latter half of the nineteenth century. A major problem facing the medical profession at this time was the inability to identify one disease from another, particularly, fever and dysentery type diseases. Historians such as J H L Cumpston, Douglas Gordon, and Ross Patrick⁵¹ stressed that the confusion that the medical professionals experienced when trying to diagnose a typhoid fever case from a typhus case was nearly impossible before the germ theory was established. Consequently historians are divided on the question of evidence of typhoid fever prior to the establishment of the germ theory because the disease was difficult to diagnose.

⁴⁸ Barclay, ‘Fevers and Stinks’: pp. 3-12; Patrick, *op. cit.*, p. 54; R. Dansie, *A short history of Gowrie Creek*, (Toowoomba Q: Toowoomba City Council, 1998), p. 18.

⁴⁹ Dansie, *op. cit.*, p. 18.

⁵⁰ Barclay, ‘Fevers and Stinks’: pp. 3-12; Patrick, *op. cit.*, p. 56.

⁵¹ Cumpston, *op. cit.*, p. 4; Gordon, *op. cit.*, p. 177; and Patrick, *op. cit.*, p. 192.

The problem of why sanitation reform took so long to be implemented in all of the colonies of Australia is also an issue over which historians are divided. Throughout the literature historians have offered three main themes: firstly, a laissez-faire economic approach by colonial governments; secondly, the argument that internal administrative conflicts slowed official responses; and thirdly, a social movement analysis which suggests governments failed to act unless there was considerable public demand.

ARGUMENT

The secondary sources discussed in the above section give an understanding of typhoid fever in the nineteenth century in Colonial Australia. Many other diseases such as smallpox and cholera have been studied extensively whereas typhoid fever in most instances has only been included in studies about infectious diseases, or public health.⁵²

The major argument of this thesis is to draw upon the evidence of historical primary sources to confirm the work of Patrick and Barclay and to show that the Queensland colonial government were slow to implement public health policies to the detriment of typhoid fever patients. For example, two government inquiries into the causes of the disease and the best means of preventing future epidemics were instigated, but because of the government's parsimonious approach only a minor number of the recommendations were implemented and typhoid fever continued to be a burden to the community, the medical professional and ultimately the government. However,

⁵² Patrick, *op cit.*, pp. 192-265; J. Cumpston, *Health and Disease in Australia: A History*, (Canberra ACT: Australian Government Publishing Service, 1989) pp. 224-49; Barclay, *Aspects of Public Health*, pp 92-126.

it was the vigilance of the community and its agitation for the government to take some social responsibility that finally motivated the government to act but only when typhoid fever outbreaks were of epidemic proportions.

SCOPE

The reason for choosing Toowoomba was that there were three severe epidemics of the disease there in the nineteenth century - 1866, 1878 and 1884. The epidemic in 1878 was so severe that a Board of Health Inquiry was appointed to look into 'The causes of the prevalence of typhoid fever at Toowoomba, and the best means to be adopted for the suppression of the same.' In the case of Brisbane, typhoid fever was sporadic from the time of settlement, but in 1884 an epidemic occurred that prompted a Central Board of Health inquiry into 'The prevalence of typhoid fever in Brisbane and suburbs'. Queensland was not the only colony dealing with typhoid fever; the colony of Victoria also had two inquiries into the disease, and there were severe outbreaks in other colonies as well but the Queensland Colonial Government was reluctant to implement the recommendations of their two inquiries so that conditions contributing to the spread of the disease continued to increase resulting in members of the community becoming sick and dying.

The period covered in this study commences with the establishment of the penal colony of Moreton Bay in 1824 and the development of the Darling Downs from 1840 until 1914. This period is a wide enough scope to follow the disease from its early beginnings, to its severity in the second half of the nineteenth century and finally to its control and prevention in the twentieth century.

SIGNIFICANCE OF THESIS

The significance of the study is two fold. Firstly, it provides a case study of the outbreak of the disease in Toowoomba and Brisbane and the contribution of these two towns to sanitation reforms, which would affect the whole colony. Secondly, the study adds to the already established body of literature regarding infectious diseases by contributing to the evidence regarding public and political pressures behind the reform process.

SOURCES AND METHODS

The evidence gathered and analysed for this thesis is predominantly primary sources from official correspondence of government bodies, parliamentary debates, and reports tabled in both Houses of the Colonial Queensland Parliament. Newspapers were very productive as they contained enriching editorials, and sub-editorials, Letters to the Editor, Minutes of Municipal Council Minutes, and Brisbane Hospital Committee Minutes.

The method of obtaining material was divided into a two-stage process. The first stage was to select material noted in various secondary sources. The second stage was to go through Parliamentary Debates, Votes and Proceedings of Parliament, and newspapers systematically for references to typhoid fever, sanitation, and public health issues. The main methodological issues were interpreting complaints in the form of letters in a highly charged political context.

The response to typhoid fever in Toowoomba was slightly different to that experienced in Brisbane. Toowoomba had the driving force of a community-minded Member of Parliament in William Groom who was willing to take advantage of his position as Mayor of Toowoomba and a parliamentarian, whereas Brisbane had many advocates but not one powerful instigator.

The traditional spelling of Bye-laws as was presented in the primary documents has been utilised in this study.

ORGANISATION

The organisation of this study has been divided into an Introduction, three chapters and a conclusion. Chapter 1 provides a background to the disease and the historical development of Toowoomba and Brisbane. Chapter 2 covers in detail the circumstances that led to outbreaks of the disease in Toowoomba. Chapter 3 discusses the epidemic of 1884 in Brisbane and the ongoing incidents of the disease up until 1900.

The tragedy of typhoid fever was that so many people became sick and lost their lives to a disease that was preventable, particularly in the latter part of the nineteenth century, after the Queensland colonial government inquiry in 1878 that recommended sanitation reforms to prevent further outbreaks of the disease. The experience in the nineteenth century shows that once the knowledge and understanding of a disease has been reached it takes time and political pressure to set up new government infrastructures to deal with the problem.

CHAPTER 1

THE MEDICAL AND HISTORICAL CONTEXT PRE-1859

During the nineteenth century typhoid fever was a disease that was feared by authorities and communities in various parts of the world including, for example, the United States of America and Australia.

In an American study *Typhoid and the Politics of Public Health in Nineteenth-Century Philadelphia*, Michael McCarthy writes:

Typhoid. The disease means little to us today since it is no longer a threat to modern cities, but it frightened the urbanizing world of the late nineteenth century.¹

Authorities in Australia held a similar view, as Enid Barclay pointed out in her study ‘Aspects of public health in Queensland from 1859-1914’:

Because [typhoid fever] affected large numbers of people, many of them in the prime of their working lives, Queensland authorities gradually became aware that they must prevent the spread of this disease at almost any cost.²

Unfortunately, fear and concern about the disease was not enough; authorities and communities needed to understand what caused typhoid fever, and then put in place measures to counteract the disease.

The points of discussion in this chapter will provide a background to the medical and historical environments of typhoid fever from 1824 to 1859. The confusion that the medical profession and government had about the disease and its causation helps to explain how the disease became so prevalent later in the

¹ M. McCarthy, *Typhoid and the Politics of Public Health in Nineteenth-Century Philadelphia*, (American Philosophical Society for its *Memoirs* series, Vol. 179, 1987), p. 1.

² E. Barclay, *Aspects of public health in Queensland from 1859-1914*, Master of Arts Thesis, University of Queensland. (1979), p. 93.

nineteenth century. The development of the settlement at Moreton Bay and its health problems provides an understanding as to how the government regarded public health issues during these early days. The opening up of the interior, in particular, the Darling Downs region, sets the scene for the future when typhoid fever was the enemy of the community. A lot of attention has been placed on the hospital system and medical professionals in Moreton Bay and the Darling Downs region in this chapter because their development is so important to the outcomes of public health issues and typhoid fever later in the nineteenth century.

CAUSATION OF TYPHOID FEVER

There was very little knowledge and a lot of confusion about typhoid fever in the early part of the nineteenth century. Because the medical profession did not know what caused the disease they relied on symptoms alone to make a diagnosis. Nevertheless, the causes of typhoid fever and its environment were to have a devastating effect on communities by the middle to the latter part of the nineteenth century.

Typhoid fever is a member of the enteric fever group and is the most severe of the enteric fevers.³ The disease is caused by *Salmonella typhi*, gram-negative bacteria that invade the walls of the ileum and colon and then gain access to the bloodstream.⁴ Transmission is by hand-to-hand contact or contaminated food, but in most cases the disease spreads when the excreta of an ill person get into the

³ R. McGrew and M. McGrew, *Encyclopedia of Medical History*, (London: Macmillan Press, 1985), p. 347.

⁴ D. Venes, ed. *Taber's Cyclopedic Medical Dictionary*, Edition 19, (Philadelphia: F. A. Davis Company, 2001), p. 2168.

water supply.⁵ Approximately 5 percent of people infected with the disease become long-term carriers even though they are healthy themselves; they carry and transfer the *salmonella* bacillus.⁶ To prevent the disease a water-carriage system of sewage disposal is recommended as are the following: prevention of pollution of water-supplies; prevention of contamination of food, milk and shell-fish with human excreta; chlorination of drinking water; pasteurization of milk; control of house-fly; personal cleanliness; detection of carriers of enteric bacilli.⁷ Symptoms of typhoid fever are a fever, headache, aching limbs, tiredness, diarrhoea, and red spots (called rose spots) appearing on chest and abdomen. *Bronchitis* is sometimes a complication.⁸ Typhoid fever was commonly confused with typhus because both have similar symptoms - fever, headache, aching limbs, and rash on the abdomen and chest.⁹

However, in the early part of the nineteenth century the medical profession, communities and the colonial government were not aware of the true nature of how the disease was spread or the vital role that living conditions, good sanitation, a clean water supply, and personal hygiene played in the cause of the disease. Sir Raphael Cilento explains that ‘diseases were not known to have separate causes at all – their differences were considered to be due to different “constitutions” of the patients or to different degrees of “corruption” of the air they breathed’.¹⁰ This

⁵ McCarthy, *op. cit.*, p. 1.

⁶ McGrew, *op. cit.*, p. 347.

⁷ W. Thomson, *Black's Medical Dictionary*, (London: A. and C. Black (Publishers) Ltd, 1984), p. 318.

⁸ *The Australian Family Health Encyclopaedia*, (Sydney NSW: Quarto Publishing Limited. 1986), p. 287.

⁹ McGrew, *op. cit.*, p. 347; Thomson, *op. cit.*, p. 920.

¹⁰ R. Cilento, ‘Medicine in Queensland’ *Royal Historical Society of Queensland*, Vol. 6, No. 4 (1961-62) Part 1, p. 872.

latter view was known as the 'Miasmatic Theory of Contagion'¹¹ and was widely accepted by the medical profession all over the world. It was not until French chemist Louis Pasteur discovered the germ theory in the latter part of the nineteenth century that the disease of typhoid fever was understood.

It is important to note that in the nineteenth century British Colonies were strongly influenced by past and contemporary experiences of the United Kingdom and the Australian colonies were no exception. For example, in the early nineteenth century in England diseases such as typhoid fever, dysentery and other types of fevers and food and water-borne diseases were widespread and in most cases unidentified. Sanitation was almost non-existent and water supplies were not controlled against pollution.¹² Housing was poorly ventilated and often overcrowded. There were only a small number of hospitals and no registration system of medical officers so the opportunity for charlatans and opportunists to act as medical people went unchecked. Consequently, treatment for such illnesses was very poor.¹³ It is with these conditions and experiences that colonial government members, convicts and free settlers came to Moreton Bay.

The sanitation and clean water supply reforms did not begin to take place in Britain until an outbreak of Cholera in 1831 when a Board of the Poor Law Commission was appointed to examine conditions in cities and towns. Edwin Chadwick a member of the Commission wrote a *Report on the Sanitary Conditions of the Labouring Population of Great Britain* that outlined the terrible

¹¹ R. Patrick, *A History of Health & Medicine in Queensland 1824-1960*, (St Lucia Q: University of Queensland Press. 1987) p. 16.

¹² Cilento, 'Medicine in Queensland', p. 871

¹³ *ibid.* pp. 871-2.

sanitary conditions that the poor were living in. Chadwick spent most of his life advocating reforms in sanitation and hygiene practices.¹⁴ Unfortunately, implementation of such reforms was very slow, and it was not until the 1860s that there was some progress. For Australia such reforms were even a few more years away and in the meantime the rapid growth of Brisbane after 1842 and Toowoomba in the 1850s and 1860s took its toll on the existing sanitation system and water supplies resulting in all types of infectious diseases appearing, especially typhoid fever.

The causes of typhoid fever raise the question of whether it was likely that the disease was present amongst the Indigenous people of Southeast Australia prior to 1824. It is known that Smallpox was introduced to the Indigenous population in 1789 when British observers at Port Jackson noted that Aborigines were suffering from the disease.¹⁵ However, with reference to typhoid fever it would appear that no such observations have been noted. Peter Dowling made the comment:

The disease almost certainly did not exist among the Aboriginal population of Australia prior to 1788. Its history among the Aboriginal people during the colonial period is largely unknown but the deaths reported on the settlements suggest that a typhoid-like disease was present among them although at a minor level.¹⁶

Why then were the Aboriginal people able to escape this disease and the white population a few years later experience epidemics? The answer lies in the construction and lifestyle of Aboriginal society. Population density was low,

¹⁴ R. Hare, *Pomp and Pestilence: Infectious Disease, Its Origins and Conquest*, (London: Victor Gollancz Ltd. 1954), pp. 140-3.

¹⁵ J. Campbell, *Invisible invaders: smallpox and other diseases in Aboriginal Australia, 1780-1880*, (Carlton South V: Melbourne University Press, 2002), p. 9.

¹⁶ P. Dowling, "A great deal of sickness": introduced diseases among the Aboriginal people of colonial southeast Australia 1788-1900, PhD Thesis, Australian National University, (1997), p. 294.

consequently overcrowding in the one area did not occur; residential mobility meant that people moved from place to place; they had clean water and fresh food such as kangaroo, iguana, snakes, bandicoots and lily roots so the food was not contaminated; and a limited degradation of the ecosystem meant that water supplies were not polluted.¹⁷ Peter Dowling in his thesis discussed ‘urban’ or ‘crowd’ infectious diseases such as typhoid, smallpox and many others referring to them as ‘latter diseases’. He wrote, ‘There is no evidence, circumstantial or otherwise, that these latter diseases existed among the Aboriginal population of Southeast Australia before 1788’.¹⁸

If typhoid fever was not present in Queensland prior to 1824 what was the change in circumstances from that time onward that contributed to the introduction of the disease? The commencement of urbanisation from 1824 was the foundation that led to the pollution of the environment by new illnesses especially typhoid fever.

The early period of urbanisation in Australia, and in particular, in Brisbane and the regional area of Toowoomba, is very important when discussing the history of typhoid fever in these two areas. The way urbanisation developed in the colony of Queensland had a direct influence on the rise and development of typhoid fever.

The urbanisation of Australia was different from other New World countries such as the United States of America and Canada because of timing. People who migrated to the United States of America and Canada were mostly from rural

¹⁷ Dowling, *op. cit.*, p. 25; W Ross. Johnston, *A Documentary History of Queensland: from reminiscences, diaries, parliamentary papers, newspapers, letters and photographs*, (St Lucia Q: University of Queensland Press, 1988), p. 101.

¹⁸ Dowling, *op. cit.*, p. 28.

areas of continental Europe and sought their settlement in a rural setting. This meant that these countries had to undergo a transition period from agricultural production for subsistence to capitalistic production.¹⁹ Australian cities, however, did not have such a transition period because, as Sean Glynn in his classic study pointed out, Australian cities were ‘developed in *advance* of their hinterlands’.²⁰ They were ‘*commercial or mercantile* rather than industrial in character’ from the beginning.²¹

The main functions of urbanisation in Australia were penal, administrative and commercial.²² Brisbane is an example of an Australian city established as a penal settlement that became a commercial city.²³ It is the commercial city that had the most influence on the typhoid fever outbreaks in years to come. Parkin and Coghlan state ‘population flocks into the towns of Australia in a proportion not known anywhere else ...[and] has no other parallel among the cities of the old world’.²⁴ All colonial governments, including Queensland, were faced with the problem of water supplies, sewage and drainage and because such facilities were costly the infrastructure did not grow with the population.²⁵ Therefore, the foundation for future epidemics of typhoid fever had been put in place.

¹⁹ I. Burnley, *The Australian Urban System: Growth, change and differentiation*, (Melbourne V: Longman Cheshire Pty Limited. 1980), pp.32-34.

²⁰ S. Glynn, *Urbanisation in Australian History, 1788-1900*, (Melbourne V: Thomas Nelson (Australia) Limited. Second edition 1978), p. 18.

²¹ C. Forster, *Australian Cities: Continuity and Change*, (South Melbourne V: Oxford University Press, Third Edition 2004), p. 5; L. Frost & T. Dingle, *Sustaining suburbia: an historical perspective on Australia’s urban growth*, Discussion Paper No. 23/93, (Bundoora V: Department of Economic History, La Trobe University. 1993), pp. 2-3.

²² Burnley, *op. cit.*, p. 35.

²³ *ibid.* p. 32.

²⁴ G. Parkin, ‘Australian Cities’, in *The Colonial Century*, March 1891, cited in C. Schedvin and J. McCarty, *Urbanization in Australia: The nineteenth century*, (Sydney NSW: Sydney University Press. (1974), pp. 13-14.

²⁵ Glynn, *op. cit.*, pp. 26-28.

WATER AND SANITATION DURING THE PENAL SETTLEMENT AND PRE-SEPARATION PERIODS

The colonial government was well aware of the importance of a fresh water supply and sanitation system when setting up a new settlement so they did everything they could to ensure that both of these issues were addressed.

However, in the case of Moreton Bay their judgment of the water supply appears to have been overestimated.

From the very beginning the public health infrastructure at the first location of Red Cliff Point [*sic*] was very poor. The fresh water supply was not large enough to cope with the growing population. Even though there was fresh water in a chain of water holes, these water holes were not plentiful enough to supply water to the growing number of buildings and people of the settlement. The buildings consisted of the Commandant's house, the guardhouse, the soldiers' barracks, and the prisoners' barracks²⁶ and there were 30 volunteer prisoners, 14 soldiers of the 40th Regiment and their wives.²⁷ (It was the express wish of Earl Bathurst, the Secretary of State for the Colonies, that the Military Commandants and Magistrates should if possible be married men.²⁸)

The problem of water shortage was a constant concern to Lieutenant Miller, the Commandant of the settlement, and he decided to sink a well near the convicts' barracks hoping this would solve the problem.²⁹ However, even with the well

²⁶ J. Steele, 'Redcliffe in 1824' *Queensland Heritage*, Vol. 2, No. 6, May 1972, pp 20-5.

²⁷ J. Steele, *Brisbane Town in Convict Days 1824-1842*, (St Lucia Q: University of Queensland Press. 1975), p. 7.

²⁸ Sir Thomas Brisbane to Earl Bathurst 29 August 1825, *Historical Records of Australia*, Ser. 1, Vol. 11, pp. 807-8.

²⁹ Tasmanian State Archives: Colonial Secretary's Office files – Assignment 1824-1836; CSO1/371/8476; Lieutenant Miller to Lieutenant-Colonel Balfour, 25 April 1826.

there was still a shortage of fresh water. Lieutenant Miller was very concerned about this situation, and he expressed to the Surveyor-General John Oxley that it was 'unhealthy, unsatisfactory and unsafe'.³⁰ Oxley agreed with Miller and recommended to Governor Brisbane that the penal settlement should be moved to another site along the Brisbane River, as it was superior to Red Cliff Point.³¹ In April 1825 Miller received orders from Governor Brisbane to abandon the present site and transfer to the new site.³²

Initially the Brisbane River site was an improvement on the first location and the sinking of two wells produced a good supply of water. One well ran to 1200 gallons daily and the other about half that quantity. There was also a chain of ponds about three quarters of a mile from the settlement and Captain Logan who was the Commandant of the settlement from March 1826 to October 1830 put in a road so that a bullock and water cart could be put into operation if extra water was needed, particularly in the summer months.³³ However, despite the better water supply not everyone was enthusiastic about the site; an article in *The Australian*, dated 18 October 1826, stated that the Brisbane Town site was 'badly watered; a well has been sunk almost to the center of the earth, and ineffectually'.³⁴ There was also speculation from the Colonial Office as to the suitability of this site before Captain Logan arrived in Moreton Bay. The Colonial Secretary Alexander Macleay wrote to Captain Bishop on 8 February 1826 and suggested that the settlement should once again be relocated. Macleay had enclosed a sketch

³⁰ R. Fitzgerald, *A History of Queensland: From the Dreaming to 1915*, (St Lucia Q: University of Queensland Press, 1986), p. 73.

³¹ Steele, *Brisbane Town*, p. 27.

³² *ibid.* p. 37.

³³ *ibid.* p. 78.

³⁴ *ibid.* p. 66.

suggesting a more favourable site for the settlement. Captain Bishop very quickly pointed out that the suggested site was flood land, close to very thick scrub and a long way from fresh water.³⁵

Governor Darling also expressed concern about the Brisbane Town site in a dispatch to Sir George Murray in 1829 when he stated:

I beg to observe that the want of fresh Water at the Penal Settlement, established at Moreton Bay, has obliged me to suspend forwarding any more Prisoners at present to that place ... The Sickness at Moreton Bay was very great during the last Summer, and is considered to have [been] occasioned by the scarcity of water and the bad quality ... My intention therefore is to place the Settlement as near as circumstances will permit, to the Island of "Stradbroke."³⁶

The water supply may have been sufficient for the number of people residing at Moreton Bay in 1826, but the increase in the number of prisoners over the next few years put a strain on supplies.

The success of the penal colony at Moreton Bay largely depended on the health and welfare of the convicts because their labour was necessary for the construction of buildings, 'cutting and sawing of wood, clearing the ground from roots and the cultivation of maize, vegetables, flax, and tobacco, and the collection and preparation of bark'.³⁷ Therefore, the Governors, Commandants

³⁵ C. Bateson, *Patrick Logan: Tyrant of Brisbane Town*, (Sydney NSW: Ure Smith Pty Limited. 1966), p. 50.

³⁶ Mitchell Library, New South Wales – Governor's Despatches to the Secretary of State for the Colonies, Vol. 16, June-Dec. 1829, Item No. ML A1205, Governor Darling to Sir George Murray, 24 June 1829.

³⁷ Johnston, *A Documentary History of Queensland*, p. 32.

and medical personnel ensured as best they could that the health of the convicts and the soldiers were not put at risk by neglecting sanitation at the settlement.³⁸

It was recognised by the British Army that it was nearly impossible to totally avoid disease, but the Army did expect those in command to ensure every precaution was taken in relation to sanitary regimes in a military camp.³⁹ The contemporary understanding of diseases such as dysentery and small pox was ‘from bodily processes being impaired or disrupted by ‘contagion’ – noxious substances ingested with food, water or air’. This explanation was often referred to as the ‘miasmatic’ theory of disease.⁴⁰ With such an understanding Dr William Blair, a highly regarded military surgeon, in 1798 illustrated the importance of preserving the health of military men in an address to the officers of the British Army:

The health of an army must therefore be of equal importance with its existence; or rather, I should say, an army without health is a burden to the state it was intended to serve.⁴¹

Dr Blair went on to discuss the importance of maintaining a healthy lifestyle when setting up camps or settlements. For example, camps should be set up close to a water supply: ‘No situation, upon the whole, seems preferable to the elevated bank of a rapid river’.⁴² He further stated:

The health of an encampment is much connected with its cleanliness; to preserve which, no effort should be omitted. The carcasses of dead

³⁸ P. Turnbull, ‘Theories of Disease in Eighteenth-Century,’ *Medicine, Race and National Identity in Australia*, c. 1830-1920, <http://homes.jcu.edu.au/~hipgt/mind/whiteness/cultivating_lecture.html> (accessed 8 August 2003).

³⁹ W. Blair, *The Soldier’s Friend: or, the means of preserving the health of military men; addressed to the officers of the British Army*, (Canberra ACT: National Library of Australia. Mfm 1651, Reel. 104, No. 24, 1798), p. 3.

⁴⁰ Turnbull, *op. cit.*, p. 3.

⁴¹ Blair, *op. cit.*, p. 1.

⁴² *ibid.* p. 82.

horses ,dogs, with every kind of offal, should be removed to a distance and buried. The privies should be dug deep in the rear of the camp, and every individual should be punished who eased himself elsewhere.⁴³

It was under these circumstances that the settlement at Red Cliff Point and Brisbane Town were established.

There is other evidence to support the theory that the colonial government was seriously committed to ensuring the health of the people of the colony of New South Wales. A publication of a medical article by Thomas Jamison, Principal Surgeon, in the *Sydney Gazette* on 15 October 1804 recommended that parents avail themselves of the offer to have their children inoculated against the disease, Cow Pock.⁴⁴ Appearing in the *Sydney Gazette* on Saturday 15 August 1818 was a notice regarding the sewers and water courses:

The Government and General Orders heretofore issued for the Purpose of preserving the Cleanliness of the Streets of Sydney, and preventing the Sewers and Channels from being obstructed by the throwing of Ashes, Filth, and Dirt therein, to the great Injury of the Streets, not having been duly attended to by the Inhabitants generally, or enforced by the Police; ... Notice is hereby given, that whoever shall henceforth be found trespassing in this Way; will be prosecuted for the same, and the full Penalty of the Law enforced.⁴⁵

The evidence suggests that the Colonial Government did put in place sanitation measures when setting up settlements at Red Cliff Point and Brisbane Town. The reasons why both these settlements encountered problems with disease now has to be explored.

⁴³ *ibid.*

⁴⁴ *Sydney Gazette*, 15 October 1804, p. 2.

⁴⁵ *Sydney Gazette*, 15 August 1818, p. 1.

The Moreton Bay penal settlement was plagued with sickness and health problems from the very beginning, despite whatever sanitation measures had been put in place. Most historians when discussing disease in the convict era agree that the heat, mosquitoes, poor food and water and overcrowding ensured that disease was a huge problem for the settlement.⁴⁶ There were three diseases that afflicted the settlement - dysentery, *febris intermittens*, and ophthalmia or trachoma.⁴⁷

(The problems with diagnosing typhoid fever are discussed later in this chapter.)

Ross Patrick refers to *febris intermittens* as intermittent fever and suggests that the fever may have been malaria therefore it is unlikely that the fever was of a typhoid type.⁴⁸ Dysentery was a disease that could have been a result of overcrowding, poor food and water, and some of these patients may have been suffering from typhoid fever because symptoms were similar. However, in the summer of 1828-1829 the disease reached epidemic proportions. Dr Bowman the Principal Medical Officer and Inspector of Colonial Hospitals wrote to Colonial Secretary Macleay on 13 June 1829 advising him about the health of the community at the settlement. The population in 1829 was just under 1000 people and Dr Bowman stated that in the first two months of 1829 there were 774 admissions to hospital of which 33 deaths had occurred and the prevailing diseases appeared to be dysentery and ophthalmia.⁴⁹ He also mentioned in his letter that there was 'not a running stream of fresh water' and the only water was from ponds that formed in the wet weather, which became stagnant, foul smelling and unfit for use, and in all

⁴⁶ D. Gordon, 'Sickness and Death at the Moreton Bay Convict Settlement' *The Medical Journal of Australia*, Sydney, V11, No. 12, 21 September 1963, p. 474; J. Pearn, *Pioneer Medicine in Australia*, (Brisbane Q: Amphion Press, 1988), pp. 103-9; Cilento, 'Medicine in Queensland', p. 873; Steele, *Brisbane Town*, pp. 37 and 101-2.

⁴⁷ Gordon, 'Sickness and Death', p. 474

⁴⁸ Patrick, *op. cit.*, p. 15

⁴⁹ Steele, *Brisbane Town*, pp. 1 and 109-111; Gordon, 'Sickness and Death', p. 474; Patrick *op. cit.*, p. 14.

probability were the cause of the dysentery in the settlement.⁵⁰ Dr Bowman also expressed his concern about the diet of the people who were suffering from dysentery and suggested that a continuous supply of ‘salted provisions, and a scanty allowance of vegetables’ contributed to their condition.⁵¹ He recommended that patients be supplied ‘with a daily allowance of fresh meat’ and that this could be ‘accomplished by sending cattle and sheep’ to the settlement ‘either by sea or land’ as this would ‘contribute greatly to their health and comfort’.⁵²

Another medical crisis occurred in 1832 when the convict population was 826 and the military personnel numbered 157, and yet 1,125 cases were treated in the hospital. There were 665 cases of ‘intermittent fever’ resulting in four deaths,⁵³ and 46 cases of dysentery resulting in 3 deaths; fortunately there appeared to be a reduction of ophthalmia cases.⁵⁴ Professor Gordon argues in his article ‘Sickness and Death at the Moreton Bay Convict Settlement’ that malnutrition, poor hygiene, and overcrowding were the factors that led to the two epidemics of 1828-1829, and 1832.⁵⁵

It would seem that from the close of the penal settlement the health of the community changed and other diseases and what was referred to as continued fever were ‘exhalations of vegetable miasma and chronic rheumatism and

⁵⁰ Steele, *Brisbane Town*, p. 110-11.

⁵¹ Steele, *Brisbane Town*, p. 111.

⁵² *ibid.*

⁵³ Cilento ‘Medicine in Queensland’, p. 877.

⁵⁴ Patrick, *op. cit.*, p. 15.

⁵⁵ Gordon, ‘Sickness and Death’, p. 478.

influenza by fever became prevalent.⁵⁶ Cumpston notes that the causes given in the 1840s 'exposure to wet and night air'.⁵⁷ The continued fever may have been typhoid fever, but whatever the fever it was becoming a problem for the people of the colony.

The problems that the British experienced at Moreton Bay with disease raise the question as to whether the settlers of the Darling Downs would also encounter such problems.

Allan Cunningham arrived on the Darling Downs in 1827, but the area was not developed by British standards until squatters John Campbell and Patrick Leslie and their stock arrived in March 1840.⁵⁸ The Darling Downs became a region of squatters with small towns such as Dalby, Condamine, Drayton and Warwick emerging to take care of the needs of the squatters and their servants.⁵⁹

The area that was to become Drayton was part of Westbrook station and the squatters called it The Springs.⁶⁰ Sir Raphael Cilento describes this early settlement as being:

⁵⁶ The term 'continued fever' was commonly used in the United Kingdom during the first half of the nineteenth century and is perhaps why the doctors in Australia were also using the term. See Dr Philip H Manson-Bahr's book *Manson's Tropical Disease: A Manual of the Diseases of Warm Climates*.

⁵⁷ J. Cumpston, *Health and Disease in Australia: A History*, (Canberra ACT: Australian Government Publishing Service, 1989), p. 55.

⁵⁸ D. Waterson, *Squatter, Selector, and Storekeeper: A History of the Darling Downs 1859-93*, (Sydney NSW: Sydney University Press, 1968). pp. 9-11

⁵⁹ *ibid.* p. 9.

⁶⁰ R. Pennycuik ed. *A folk history of early Drayton and Toowoomba as told by Jacob Donges*, (Yelarbon Q: Ester Boddington, 1996), p. 12; M. French, *Pubs, Ploughs & 'Peculiar People': Towns, Farms and Social Life*, (Toowoomba Q: USQ Press, 1992), p. 16.

facilitated by the vast tracts of good quality grassland ... which were open or lightly timbered and in many cases served with abundant water by various rivers, creeks, lagoons and springs.⁶¹

With water supplies so plentiful the site of The Springs quickly became the settlement of Drayton. However, it was the township of Cambooya that was originally established as the commercial and administrative centre of the Darling Downs.⁶² This situation was not to continue for in 1846 the Petty Debt Court was opened in Drayton not Cambooya as it was felt that Drayton was a more convenient location being on the main dray route to Moreton Bay.⁶³ Major construction was occurring in Drayton with Thomas Alford shifting his general store, Patrick Flanagan building a blacksmith's shop, and William Horton building a hotel - the Bull's Head Inn.⁶⁴ According to Jacob Donges it was Thomas Alford who changed the name of the town from The Springs to Drayton.⁶⁵ He was the postmaster as well as the storekeeper. He also had the distinction of being the first person to sink a well 'on the bank of the creek, above flood level, and the water was clear'.⁶⁶ The success of this first well encouraged the sinking of other wells particularly as the population increased.⁶⁷ Around 1850 'the police-station, court-house and land offices were transferred from Cambooya to Drayton' and the township continued to grow.

However, Drayton soon became overshadowed by another settlement only 5 miles away, Toowoomba. Waterson wrote, 'Toowoomba was the brash upstart of the

⁶¹ R. Cilento, *Triumph in the Tropics: An Historical Sketch of Queensland*, (Brisbane Q: Smith & Paterson Pty Ltd, 1959), p. 280.

⁶² Waterson, *op. cit.*, p. 79; R. Pennycuick, *The Cambooya Story 1840-1990*, (Greenmount Q: Cambooya Shire Council, 1991), p. 153.

⁶³ Pennycuick, *op. cit.* p. 154.

⁶⁴ Waterson, *op. cit.*, p. 79.

⁶⁵ Pennycuick, *op. cit.*, p. 12.

⁶⁶ *ibid.*

⁶⁷ *ibid.* p. 13.

Downs, the living symbol of the storekeeper's triumph over the squatter'.⁶⁸ Like Drayton Toowoomba also had another name, The Swamps. To understand the significance of this term it is important to explain the geographical characteristics of the area. The town was established near a wetland of Gowrie Creek, which is a small stream of the Condamine River Catchment. There are several sub-creeks with indistinct channels that merged at the site of the township. As well there were many low-lying underground aquifers that were traditionally recharged by the wetlands.⁶⁹ Adding to the plentiful water supply the area was surrounded by timbered ranges. The Toowoomba site had everything that Drayton was lacking.

In April 1849 surveyor J C Burnett surveyed out twelve portions of land from 27 to 40 acres each on the west side of the West Swamp as suburban allotments which were offered for sale.⁷⁰ At the same time a number of people had been forming a community at Drayton which was brought to the attention of the colonial government in a report from Commissioner Rolleston. These developments were mentioned in a letter dated 4 September 1848 from Mr E Deas Thompson, Colonial Secretary to Mr T L Mitchell the Surveyor General:

As it appears from a report received from Mr. Commissioner Rolleston that a number of persons are establishing themselves on the so-called township of Drayton, in the district of Darling Downs without license from the Crown, I am directed by his Excellency the Governor to draw your attention to this subject in order that you may have an early opportunity of causing a township to be marked out in that locality, and bringing the allotments to sale.⁷¹

⁶⁸ Waterson, *op. cit.*, p. 79.

⁶⁹ C. Potter, S. Moles, L. Connors, & P. Postle P, eds. *Conversations on the Condamine: An oral history from the Queensland Murray Darling Basin*, (Annandale NSW: Envirobook, 2002), pp. 13 & 107.

⁷⁰ J. Tolmie, 'Drayton and Toowoomba – Their Early History', in *Queensland Geographical Journal*, 19th Session, Vol XIX, 1903-1904, p. 23.

⁷¹ *ibid*, p. 21.

The Colonial Secretary was concerned that a township was forming without the approval of the Government and moved quickly to ensure that the Government had control of all new settlements. Mr J C Burnett submitted the plans for the township of Drayton in January 1849 and the Government in May of that year confirmed approval. It was not until 1852 that Assistant Surveyor Moriarty, who was stationed in Drayton, informed the Surveyor-General Sir Thomas Mitchell that people who had purchased allotments in the 'Drayton Reserve called the Swamp' were not interested in agriculture but with a view to forming a 'township in opposition to the Government one at Drayton'.⁷² Moriarty also stated:

The Swamp possesses many advantages for a township which Drayton does not. The soil is exceedingly rich, the ground level, and there is abundance of water, and the finest timber for building. Drayton on the contrary is built on a number ravines, and ridges, and possesses no permanent water.⁷³

Once again people were taking the initiative to set up communities in what were regarded as good locations and the colonial government was required to act swiftly to gain control. In a letter dated 26 November 1852 Moriarty was requested to 'make a design for laying out, and measure and mark out some allotments of one and two acres'.⁷⁴

The Land Surveyor was instructed by the New South Wales Government to survey the area on the 'eastern side of the West Swamp',⁷⁵ with the object of establishing a new township. The decision to build the urban centre along the

⁷² *ibid.* p. 22.

⁷³ *ibid.*

⁷⁴ *ibid.*

⁷⁵ Cilento, *Triumph in the Tropics*, pp. 364-5.

swampy valleys instead of the red-soil ridges was to be a costly one for the future citizens of Toowoomba.⁷⁶

Drayton and Toowoomba were relatively free from disease whilst population density was low and the water supply was fresh. However, as the population increased problems began to occur in the 1860s; the swamps became stagnant, the felling of timber resulted in erosion and silting, large numbers of animals were grazed and watered at the Swamps where they churned up and destroyed the verges. On top of all this, waste water and drains from residences flowed into the swamps. Sanitation appeared to be minimal. The result was an environment for the spreading of disease such as typhoid fever.

HOSPITAL AND MEDICAL SERVICES PRE 1859

When the Moreton Bay settlement was first established there were no provisions for a hospital or a doctor. There was a supply of medicines and if the wives of military personnel, children, soldiers, and prisoners became ill Walter Scott, the Commissariat Storekeeper, would treat them. Scott was appointed as the acting surgeon as he had studied medicine at Edinburgh University although it seems he had no formal degree or diploma.⁷⁷ As the settlement grew it became evident that it was necessary to have a resident doctor and a hospital to ensure the health and welfare of the settlement.

⁷⁶ Waterson, *op. cit.*, p. 80.

⁷⁷ J. Tyrer, *History of the Brisbane Hospital and its Affiliates: A Pilgrim's Progress*, (Brisbane Q: Boolarong Press, 1993), p. 2.

The hospital infrastructure of the Moreton Bay settlement was based on information that came out of an inquiry by John Thomas Bigge into the state of the colony of New South Wales in 1822.⁷⁸ Commissioner Bigge considered that such an inquiry should include the condition of hospitals and the health of the colony. D'Arcy Wentworth, the Principal Surgeon of the Colony, gave evidence about the Sydney Hospital as follows:

Were you consulted by Governor Macquarie in the plan of the present Hospital?

I was.

Did you approve of it?

I did, subject to certain additions & conveniences.

Did you not conceive that water closets were an important part of the accommodation of the Hospital as well as of any Hospital?

They were not thought of, or I daresay they wd. have been put up.⁷⁹

Henry Kitchen, a free settler was also concerned about the omission of water closets at hospitals and wrote to Commissioner Bigge on 6 February 1821 pointing out that the General Hospital 'contains neither water-closets – Baths – dispensary – Nurses Apartments &c'. In his letter Kitchen submitted plans for alterations to the Sydney General Hospital, and plans for improvements to the laying out of the streets of Sydney, the wharf, aqueducts, and the common sewers.⁸⁰

In 1822 Commissioner Bigge through his report made numerous recommendations. He made the following in respect to hospitals:

Respecting the hospitals in the colony of New South Wales, I should recommend that the construction of such medical and domestic

⁷⁸ Earl Bathurst to Governor Macquarie, 30 January 1819, *Historical Records of Australia*, Ser. 1, Vol. 10, p. 2.

⁷⁹ J. Ritchie, ed. *The Evidence to the Bigge Reports: New South Wales under Governor Macquarie*, (Melbourne V: Heinemann, 1971, Vol. 1), p. 121.

⁸⁰ *ibid.* pp. 153-4.

accommodations, as may be pointed out by the surgeons, should be attended to both at Sydney and the other stations.⁸¹

Bigge was of the opinion that the plans submitted for alterations to the hospital were viable and should go ahead.⁸²

When Lieutenant Miller was appointed as Commandant of the settlement at Moreton Bay his instructions from Sir Thomas Brisbane, the Governor of New South Wales, did not include the building of a hospital. The sick and injured were either treated in their quarters⁸³ or housed under canvas.⁸⁴ This was the situation when Captain Bishop took over from Lieutenant Miller. It was only a matter of time before he raised the matter of a hospital in his correspondence to Colonial Secretary Macleay on 14 March 1826 pointing out that a 'hospital and quarters for a surgeon attached and a gaol is absolutely necessary'.⁸⁵ Captain Bishop was concerned about the health of the convicts, the soldiers, and the women and children on the settlement, but he was also very nervous about upsetting his superiors and did not pursue the matter rigorously.⁸⁶ It was not until Captain Logan replaced Captain Bishop on 29 March 1826 that the issue of a hospital was raised again. In a letter to Colonial Secretary Macleay, Captain Logan mentioned that he understood that there was a proposal 'to move the site of the buildings, etc., to a low swampy point of land a little below their present situation'.⁸⁷ Logan recommended that the buildings not be moved until 'the more necessary buildings

⁸¹ J. Bigge, *Report into the Colony of New South Wales*, Australian Facsimile Editions No. 70, (Adelaide SA: Libraries of South Australia, 196), p. 111.

⁸² *ibid.*

⁸³ Pearn, *op. cit.*, p. 108.

⁸⁴ Cilento, 'Medicine in Queensland', p. 874.

⁸⁵ Steele, *Brisbane Town*. p. 57.

⁸⁶ Bateson, *op. cit.*, p. 52.

⁸⁷ John Oxley Library, Logan's Letterbook, OM81-97, *Captain Logan to Colonial Secretary Macleay*, 29th March 1826.

are completed, these viz: a prisoners' barrack, gaol, hospital, lumber yard and store could be advantageously placed a little to the right of the military barrack'.⁸⁸

On the same day he wrote another letter enclosing the plans for the gaol and the hospital.⁸⁹ The hospital was completed early in 1827. Dr John Steele claims that 'A serious case of official bungling occurred in relation to the erection of the hospital at Brisbane Town'.⁹⁰ It would appear that Major Ovens the Chief Engineer, who drew up the plans for the hospital, and Colonial Secretary Macleay had underestimated the number of patients that would be admitted to the hospital.

Once the hospital was built the next problem for the government was to supply staff and admit patients. Dr Henry Cowper was already at Moreton Bay when the hospital was opened in early 1827 and other staff was recruited from the convicts with at least two staff members who were free citizens (refer to Table 1.1 on page 43).

Ross Patrick states that when the hospital came into operation the population of Moreton Bay penal settlement was made up of men, women and children. The majority of the children belonged to the soldiers, even though a few convict women had their children with them. There appears to be a strong indication that convicts were admitted to the hospital on a regular basis because of floggings they received as punishment for their various crimes⁹¹ rather than other medical problems until the 'dysentery' epidemic in the summer of 1828-29.

⁸⁸ *ibid.*

⁸⁹ *ibid.*

⁹⁰ Steele, *Brisbane Town*, p. 62.

⁹¹ Steele, *Brisbane Town*, pp. 136; and 139; Gordon 'Sickness and Death', p. 475.

Dr Gordon described the epidemic as a ‘catastrophe’ with the majority of deaths coming from the convict population.⁹² There were no deaths recorded among the soldiers although seven were admitted to hospital with the disease. Unfortunately, it is not known if the patients were correctly diagnosed or whether they were suffering from typhoid fever, but the conditions the convicts were living under at this time are known contributors to the outbreak of the disease and the likelihood that many of these patients were afflicted with typhoid fever is a reasonable conclusion.⁹³

The health of the settlement was also linked to the availability of medical supplies. From the very early days of the settlement a shortage of medical supplies was a problem. On 30 September 1824 Lieutenant Miller wrote to the Colonial Secretary in Sydney only sixteen days after arriving to request that medical supplies be sent urgently. Included with this request was a handwritten list of specific drugs required.⁹⁴ However, it was not until 9 August 1825 that a reasonable supply of medicines arrived.⁹⁵ Taking into account the distance from Moreton Bay to Sydney and the mode of delivery of supplies, by ship, it was still an extremely long delay.

⁹² Gordon, ‘Sickness and Death’, p. 474.

⁹³ *ibid.*

⁹⁴ Pearn, *op. cit.*, p. 99.

⁹⁵ *Lieutenant Henry Miller to Lieutenant Balfour*, April 25, 1826 Colonial Secretary’s Office files – Assignment 1824-1836. Tasmanian State Archives.

Table 1.1 Monthly Returns of Stationary Servants, at H.M. General Hospital, Moreton Bay, from the 1st to the 31 August 1832

No.	Name	Ship	Late Employment	Present Employment	When arrived	When discharged
1	Wm Samuell	(Came free)	Labourer	Dispenser	7 March 1827	-
2	Sarah Payne	Northhampton	Female Factory	Women's Nurse	28 February 1831	14 August 1832
3	H B Haldon	(Came free)	Patient in Hospital	Clerk	27 January 1832	-
4	Thomas Evans	C Harcourt	Laborer	Clerk	13 April 1832	-
5	Wm Peters	C Harcoart	Laborer	Wardsman	8 May 1832	-
6	Joseph Chorden	Roy George	Laborer	Wardsman	29 June 1832	30 August 1832
7	Thomas Styles	Roy George	Laborer	Wardsman	10 July 1832	-
8	S Middleton	Kangaroo	Female Factory	Women's Nurse	14 August 1832	-
9	Steph. Dergon	Larkins	Laborer	Wardsman	21 August 1832	-

Source: Queensland State Archives Ref. Hos 1/11.

The removal of the penal settlement to Brisbane Town did not improve the situation and medical supplies continued to be a problem. However, it should be pointed out that the drugs that were supplied to Moreton Bay were considered to be of a good variety and appropriate by the standards of that period in time, but there was not enough of them to meet the requirements of the penal settlement.⁹⁶ A shortage of medical supplies was still a problem in 1838 when Dr David Ballow, Assistant Surgeon, arrived at Moreton Bay in March of that year, and he was faced with such shortages for the next few years. In May 1841 he received a communication from the Deputy Inspector General advising him that his medical supplies were ‘calculated to cover the entire expenditure for six months’. He was also advised that quarterly returns would be replaced with half yearly returns from the ‘first of October’. The Deputy Inspector General took the opportunity to impress upon him ‘the necessity of the greatest economy and vigilance so as to guard against waste or their malappropriation’ of medicines and suggested that intermediate requisitions be avoided as much as possible.⁹⁷ Dr Ballow was forced to manage as best as he could.

The problem of distance and the underestimation by the Colonial Government in Sydney of what was needed at Moreton Bay resulted in a constant struggle for the medical men to obtain medical supplies.

⁹⁶ Tyrer *op. cit.*, p. 11.

⁹⁷ QSA: Registers of provisions, patients and medicines for the Brisbane General Hospital; and of provisions in the Commissariat Stores, and a general register of the Moreton Bay Settlement, HOS1/11: Circular to D K Ballow from J V Thomson, 7 May 1841.

On 11 February 1842 a proclamation by Sir George Gipps stated:

... that the said District of Moreton Bay is no longer to be considered as a Penal Settlement; and that from and after the date hereof, all Settlers and other Free Persons shall be at liberty to proceed thither in like manner as to any other part of the Colony.⁹⁸

At the time of the proclamation Lieutenant Owen Gorman was the Commandant of Moreton Bay and on 5 April 1842 he handed over the care of the settlement to Dr Stephen Simpson a medical practitioner who was appointed as Magistrate and first Commissioner of Crown Lands.⁹⁹ Simpson was only in command for a few months until the appointment of Captain J C Wickham on 15 November 1842 'as Police Magistrate for the District of Moreton Bay'.¹⁰⁰ However, prior to his appointment Simpson was in charge of the agricultural settlement at Eagle Farm that had been established by Captain Logan. Simpson was at Eagle Farm during the years 1840 to 1841. It was during this period that Simpson built up a reputation for curing illnesses.¹⁰¹ He was interested in homoeopathic medicine and wrote a book about the practice. The medical profession did not accept his interest and beliefs in the practice and he found himself being ostracised by them. However, Simpson's medical and homoeopathic practices did not jeopardise his appointment as Commissioner of Crown Lands for the free settlement at Moreton Bay.¹⁰²

⁹⁸ *New South Wales Government Gazette*, Proclamation of Sir George Gipps, 11 February, 1842, Vol. 2, Number 12, p. 249.

⁹⁹ Steele, *Brisbane Town*, p. 277.

¹⁰⁰ G. Greenwood, & J. Lavery, *Brisbane 1859-1959: A History of Local Government*, (Brisbane Q: The Council of the City of Brisbane), 1959, p. 36; Hendra Secondary College, 'Important Events I Brisbane's History', <http://www.hendrashes.qld.edu.au/australia/bris-timeline.html> (accessed 30 June 2005).

¹⁰¹ Steele, *Brisbane Town*, p. 246.

¹⁰² Cilento, 'Medicine in Queensland', p. 884.

Now that the penal settlement had been officially closed Dr Ballow was in a quandary as to who could be supplied with medicine from the hospital free of charge. In one of his two letters that he wrote to Dr J V Thompson, the Deputy Inspector General, on 28 February 1842 he requested guidance as to ‘what individuals are to be considered as having a claim upon this hospital for medicine and medical treatment gratis’.¹⁰³ On 16 March 1842 Thompson replied to Ballow’s inquiry stating that ‘you will be pleased to continue your Services as heretofore to all the parties entitled by their Commission with Government to your assistance’.¹⁰⁴

Dr Ballow continued to treat patients at the hospital but he was concerned for the health and welfare of people who were experiencing hard times due to the poor economy.

Times were harsh for the free settlers of Moreton Bay and the Darling Downs. This was especially so for the sick, poor, mentally ill and the aged and it was because of such people that the Moreton Bay Benevolent Society was formed in 1844.

Prior to the formation of the Benevolent Society Dr Ballow, who had remained at the convict hospital, was aware that many of the new settlers were very poor and did not have the time or money to build a home or they were assigned servants. Consequently they could not be looked after in their homes, as was the practice in

¹⁰³ QSA: Letterbook 7 November 1836–3 July 1848, HOS1/G3: D K Ballow to J V Thompson, 28 February 1842.

¹⁰⁴ QSA: Letterbook 7 November 1836–3 July 1848, HOS1/G3: J V Thompson to D K Ballow, 16 March 1842.

the early days of free settlement.¹⁰⁵ As a result he was faced with a number of admissions and was unsure what rate should be charged. He wrote to Dr J V Thompson, the Deputy Inspector-General of Hospitals in Sydney, on 28 February 1842 and requested advice if assigned servants and private individuals who could not afford to pay should be admitted to the hospital on condition of their treatment being paid for. He also requested instructions from the Deputy Inspector-General to furnish instructions as to what rate should be charged.¹⁰⁶

Thompson, in his reply on 16 March 1842, instructed him to give medical attention to everyone, and to charge assigned servants ‘a shilling per diem for the first thirty days of Hospital treatment ... rendering monthly accounts in Duplicate of the sums so received to the Commissariat thro’ me’.¹⁰⁷ Another letter arrived from Thompson on 15 August 1842 requesting Ballow to implement a ‘guarantee of payment’ system for patients admitted to hospital.

Wherever a surgeon in charge of an Hospital may admit a patient under a guarantee of payment such guarantee is to be taken in a formal manner and executed by way of Bond before the Police Magistrate or other Justice of the Peace, and every such guarantee is to be given by at least two respectable and substantial householders and transmitted without delay to the Government.¹⁰⁸

This was a harsh and restrictive ruling and a means for the colonial government to control the poorer members of the community.

¹⁰⁵ Patrick, *op. cit.*, pp. 19-20.

¹⁰⁶ QSA: Letterbook 7 November 1836-3 July 1848; HOS1/G3: D K Ballow to J V Thompson, Deputy Inspector General, 28 February 1842.

¹⁰⁷ QSA: Letterbook 7 November 1836-3 July 1848, HOS1/G3: J V Thompson to D K Ballow, 16 March 1842.

¹⁰⁸ QSA: Letterbook 7 November 1836-3 July 1848, HOS1/G3: J V Thompson to D K Ballow, 15 August 1842.

In 1843 Dr Ballow admitted Daniel Long into the hospital in Brisbane as a pauper.¹⁰⁹ He wrote to the Colonial Secretary explaining that Long was afflicted with chronic rheumatism that rendered him a cripple and unable to leave his bed. He was unable to earn a living to support his wife and family and as well as himself his family was suffering from starvation.¹¹⁰

Even to be admitted to hospital as a pauper the doctor was required to seek permission from the Colonial Secretary by applying in writing and the application had to be certified by the Police Magistrate and one other magistrate that the patient was indeed a pauper.

Dr Ballow's concern for the new settlers was accentuated by the severe economic crisis of 1843. When the unemployed became sick they could no longer pay for health treatment for themselves or their families. As a result of the depression propertied members of the community met to form the Moreton Bay Benevolent Society.¹¹¹ Captain Wickham was President, H E Isaac Esq, Vice President, J McConnel Esq, Treasurer and E F Layard Esq, Secretary. Drs Ballow and Kearsey Cannan, general practitioners, were Committee members. The aims of the society were to:

... relieve the poor, the distressed and the aged, and thereby the discontinuance as much as possible of mendacity and vagrancy and to encourage industrious habits among the indigent as well as to afford them religious instruction and consolation in their distress.¹¹²

¹⁰⁹ State Records NSW: Colonial Secretary; CGS 905, Main series of letters received, 1826-1966, [4/2618.1], Dr Ballow to the Colonial Secretary, 21 January 1843

¹¹⁰ State Records Office NSW: Colonial Secretary; CGS 905, Main series of letters received, 1826-1966, [4/2618/1], Dr Ballow to the Colonial Secretary, 4 March 1843.

¹¹¹ W. Ross Johnston, *Brisbane: the first thirty years*, (Bowen Hills Q: Boolarong Publications, 1988), p. 111.

¹¹² QSA: Minutes of the Moreton Bay Benevolent Society, 14 October 1844 - 19 March 1847, HOS1/D1: 12 December, 1844.

Captain Wickham took it upon himself to transfer money collected from fines for drunkenness to the Benevolent Society to pay for hospital treatment for people in most need.¹¹³ The Colonial government did not consider the health crises that occurred due to the economic downturn a high priority. It was considered more of an individual or community problem rather than a government one.¹¹⁴ Historian Ross Johnston suggests that the government displayed only slight concern over health care, whereas the Benevolent Society ‘was a conscience valve for the wealthy’ as their Christian teachings dictated that they should ‘give help to the less fortunate’ and ‘health care was seen as an individual private affair, supplemented by a limited, charitable impulse’.¹¹⁵

The economic crises worsened and the Benevolent Society began to lose the support from the squatters as many ceased to contribute to the Society and the financial responsibility was left to the townspeople, even though ‘three-fourths of Society’s funds were used for the relief of persons from the interior’.¹¹⁶ An article published in the *Moreton Bay Courier* on 25 July 1846 urged the squatters to continue their contributions by suggesting it was ‘highly desirable that some arrangement should be made with the settlers, to induce them to raise contributions from the men at their stations and remit the amount to the society’.¹¹⁷ The Benevolent Society was able to maintain its operation until the Convict Hospital was handed over by the government to the civil authorities when

¹¹³ Johnston, *Brisbane*, p. 111.

¹¹⁴ *ibid.*

¹¹⁵ Johnston, *Brisbane*, p. 111.

¹¹⁶ Tyrer, *op. cit.*, p. 35.

¹¹⁷ *Moreton Bay Courier*, 25 July 1846, p. 2.

it was decided to combine the funds of the Society with the Moreton Bay General Hospital as both organisations had similar objectives.¹¹⁸

The closure of the penal colony raised the issue of what was going to happen to the convict hospital. The population of the settlement had decreased considerably by 1842 as most of the convicts had been removed from Moreton Bay. Initially Deputy Commissary-General Miller considered that the convict hospital should be closed down as the small number of medical cases requiring medical attention could be handled by private practitioners.¹¹⁹ However, the Deputy Inspector of Hospitals, J V Thompson, did not agree with Miller that the hospital should be closed as there were 10 people who were too ill to be moved, five of whom were soldiers and five convicts. There were also 27 military men, 131 convicts and other government personnel still living in the settlement that might have required medical treatment. Dr Thompson advised the Colonial Secretary that it was not possible to close the hospital down because there were too many people in the hospital too sick to be moved.¹²⁰

However, Thompson directed Dr Ballow to close the hospital on 31 March 1843. Dr Ballow wrote to Captain Wickham stating that there were a number of prisoners in Hospital with intermittent fever and patients arriving each day from Limestone (now known as Ipswich) with the disease and so he requested that the hospital stay open until the epidemic had passed.¹²¹ As a result the hospital

¹¹⁸ Tyrer, *op. cit.* p. 39.

¹¹⁹ Tyrer, *op. cit.*, p. 32

¹²⁰ *ibid.*

¹²¹ QSA: Letterbook 7 Novmber 1836-3 July 1848, HOS1/G3: D K Ballow to Captain Wickham, 22 March 1843.

continued under government control until 31 January 1848 when it was abruptly closed. The repercussions of this decision were that patients were discharged from the hospital, and Dr Ballow, a Colonial Assistant Surgeon, was dismissed; his salary from the government ceased and medicines and medical and surgical equipment were to be returned to the Sydney Depot.¹²² Captain Wickham was very concerned about this turn of events and before the medicines and equipment were returned to the Sydney Depot he wrote to the Colonial Secretary in February 1848 outlining his concerns and requesting permission to continue hospital services for patients who could afford to pay and for patients of the Moreton Bay Benevolent Society. He also requested that the hospital at Moreton Bay be given the same assistance from the government as was extended to various other hospitals in New South Wales.¹²³ In his reply dated 7 April 1848 the Colonial Secretary wrote:

I am directed by his Excellency the Governor to inform you that there will be no objection to give the building over to a Committee of gentlemen for the benefit of the district in the event of its being proposed to establish an Hospital under the assistance of voluntary contributions; and to leave the Committee the surgical instruments, stores, &c., now belonging to the Hospital I have, therefore, the honour to request your further report.¹²⁴

Captain Wickham very quickly called a public meeting seeking support from the community to form a civilian committee to raise the money required to ensure the grant of £200 per annum so that the hospital would be handed over to the community.¹²⁵ *The Moreton Bay Courier* was an avid supporter of this venture and in an article published on the 6 May 1848 went to great lengths to point out

¹²² Tyrer, *op. cit.*, p. 36.

¹²³ Tyrer, *op. cit.*, p. 36.

¹²⁴ *Moreton Bay Courier*, 13 May 1845, p. 3.

¹²⁵ Patrick, *op. cit.*, p. 21.

the advantages of a hospital in the community.¹²⁶ With the support of the community the hospital was transferred from the government to civil authorities on 3 October 1848 and was referred to as the Moreton Bay General Hospital.¹²⁷

Dr Ballow was appointed as the Resident Surgeon of the Hospital and on 12 January 1849 he was reappointed to the position for a further 12 months.¹²⁸ He continued in this position until he died in 1850.

HEALTH ISSUES DURING THE PENAL SETTLEMENT AND PRE-SEPARATION PERIODS

The health issues prior to separation from New South Wales were many and varied, and in the early days the soldiers and prisoners depended on the Colonial Government and the Commandant of the penal settlement to provide a hospital and doctor. This situation did not change even when the settlement was opened up to free settlers as a dependency continued on the medical men and the government for support for the health of the community. The Benevolent Society supported the community, but there does not appear to be an active advocacy group for public health conditions at this time.

The main advocates for public health during the period 1824-1842 were the Commandants and medical men of the penal settlement. There does not appear to be evidence that the clergy raised any concerns about the health and conditions of the settlement. An explanation for this revolves around the type of penal

¹²⁶ *Moreton Bay Courier*, 6 May 1848, p. 2.

¹²⁷ Tyrer, *op. cit.*, p. 39.

¹²⁸ QSA: Minute books of committee meetings of the Brisbane General Hospital, 12 January 1849-March 31, 1853, HOS1/D2: 12 January 1849.

settlement that was created at Moreton Bay. Convicts considered to be hardened criminals, for example - convicts who committed a further offence since arriving in New South Wales¹²⁹ - were sent to Moreton Bay. The Colonial Government appointed strong-minded people, such as Captain Patrick Logan, as Commandants of the settlement. Government officials considered to be difficult were also sent to Moreton Bay. Dr Henry Cowper was such a person. He had served in Sydney as Dr Redfern's apprentice for three years and was appointed as an assistant to the Sydney Hospital by Redfern. Whilst at the hospital his record keeping was questioned,¹³⁰ and he was accused of failing in his duty by not forwarding medical supplies to Newcastle Hospital.¹³¹ Dr Redfern complained that he was 'ungrateful and of bad behaviour'.¹³² As a consequence Dr Cowper was appointed as surgeon to Moreton Bay Settlement where he took up his duties on 7 September 1825.

An explanation for the clergy not taking up the issue of public health on the settlement rests with timing. There was no chaplain included in Captain Miller's party in 1824 to Moreton Bay. In 1827 Archdeacon T H Scott recommended to the Colonial Secretary, Alexander Macleay that a place of worship be constructed in Moreton Bay for the benefit of the prisoners. The Colonial Secretary instructed the Commandant, Patrick Logan, to erect a Bark Shed or a temporary building as a place of worship with Dr Cowper the Assistant Surgeon, to read the Church Service and the Funeral Services until a Chaplain was sent to the settlement.¹³³

¹²⁹ K. Rayner, *The History of the Church of England in Queensland*, PhD Thesis. University of Queensland, 1962, p. 27.

¹³⁰ Bigge, *Report into the Colony of New South Wales*, 1966, p. 105.

¹³¹ Patrick, *op. cit.*, p. 5.

¹³² Patrick, *op. cit.*, pp. 4-5.

¹³³ Rayner, *op. cit.* p. 28.

On 29 March 1829 Reverend John Vincent took up his post as Chaplain of Moreton Bay Penal Settlement.¹³⁴ Reverend Vincent was a very reluctant appointee to Moreton Bay as he was well aware of the reputation of the settlement and was very unhappy about being forced to go there. He did not display any enthusiasm for his duties and he clashed strongly with the Commandant, Captain Logan.¹³⁵ His arrival was at the end of the summer of 1829 when the settlement was afflicted with a dysentery epidemic. Even these circumstances failed to bring about a response from Reverend Vincent. It was an opportunity missed to have his ministry marked as making a difference.

Another group who may have advocated better public health conditions was the wives of the soldiers, but no evidence was found to support such action. Douglas Gordon stated that in June 1829 the population of the Moreton Bay settlement was 901. The number of convicts was 718 males and 11 females, there were 10 officers and 5 had their wives with them and from these families there were 11 children. The remaining number was 106 military men of the ranks, 12 of whom were accompanied by their wives and within these families there were 28 children.¹³⁶ There were ten deaths due to dysentery in 1828 and 53 in 1829; all of these deaths were among the convicts. There appears to be no record of children having been admitted to hospital during this period. However, there were seven military men admitted to hospital with dysentery, but all recovered. An explanation for no deaths among the soldiers was that they had 'better facilities for domiciliary treatment'.¹³⁷ Because the military conditions were better the

¹³⁴ *ibid.* p. 29.

¹³⁵ *ibid.* p. 30.

¹³⁶ Gordon, 'Sickness and Death', p. 475.

¹³⁷ *ibid.*

soldiers recovered and so there was no need for the wives to take up the issue of public health.

There were other epidemics at the penal settlement before it closed in 1842.

There was an epidemic of trachoma in November 1828. Dr Cowper had to cope with the dysentery and the trachoma epidemics at the same time. Douglas Gordon has suggested that both diseases were ‘associated with poor hygiene and poor social conditions, [and] the soldiers fared much better than the convicts’.¹³⁸

Another epidemic to attack the settlement was a type of fever and the speculation by doctors and historians has been that the fever was malaria. Gordon supports his theory by stating that Dr Ernest Sandford Jackson, the Medical Superintendent at the Brisbane Hospital from 1886-1898,¹³⁹ also agreed with the diagnoses, his reasoning being that if it had been typhoid fever the number of deaths would have been greater.¹⁴⁰ However, Gordon did point out that a type of fever appeared in other new districts when they were opened and may have been malaria, but he stated ‘we do know, of course, that some of these episodes ... were due to typhoid fever’.¹⁴¹ In 1830 there were 256 patients admitted to hospital with fever, in 1831 admissions with fever rose to 1352. By 1832 the number of admissions to hospital declined, but the disease remained endemic, as did dysentery through the life of the penal settlement,¹⁴² and up until separation from New South Wales.

¹³⁸ *ibid.*

¹³⁹ Tyrer, *op. cit.*, p. 137.

¹⁴⁰ *ibid.* p. 476.

¹⁴¹ *ibid.*

¹⁴² *ibid.*

Despite the epidemics there appears to be no protest from the church, the wives of soldiers or convicts over the health and living conditions of the penal colony, nor from the free settlers from 1842. This may have been because Moreton Bay was so far away from Sydney that a sense of isolation was prevalent among the community.

It is clear that the most concerned group were the medical men, but they were handicapped because they did not have scientific knowledge about dysentery, fevers and typhoid and as a consequence their diagnosis was poor. This was due to the medical thinking of the day being the miasmatic theory as the causation of disease.

According to the medical profession the causation of disease was ‘atmospheric contamination arising from decaying matter’.¹⁴³ This was referred to as the miasmatic theory and up until a French chemist Louis Pasteur discovered the germ theory in 1877 doctors practiced with the assumption that disease was spread through vapours in the air. The doctors at Moreton Bay penal settlement and of the free settlement were no different.

Perhaps the strangest belief held by the medical profession before the establishment of the germ theory was that exotic fruits were the cause of particular diseases. According to Sir Raphael Cilento it was believed:

... that whatever exotic fruits grew abundantly in strange lands were (next to “climate” and “miasmata”) the causes of its particular diseases – and must be avoided at all costs.¹⁴⁴

¹⁴³ Patrick, *op. cit.*, p. 34.

¹⁴⁴ Cilento, ‘Medicine in Queensland’, p. 873.

Diagnosis of illnesses with very similar symptoms was very difficult. For example, Dr Philip H Manson-Bahr, a Senior Physician to the Hospital for Tropical Diseases in London, discussed in his book, *Manson's Tropical Disease: A Manual of the Diseases of Warm Climates*, various fevers including typhoid and typhus fever, and explained that both diseases were grouped together as they could not be separated because of their symptoms. It was not until the work of Murchison and Jenner in England from 1855 to 1862 that a differentiation between the two diseases was found.¹⁴⁵ In England and Wales both of these fevers were grouped together under the title of continued fever.

In Australia during the period 1824 to 1877 typhoid, and typhus fever, and indeed any illness that involved a continued temperature, watery stools, bilious vomiting, abdominal pain, sleeplessness, or a tendency to coma, were grouped together under the generic title of 'fever' by doctors.¹⁴⁶

The problem of diagnosing complaints such as fever raises a question over entries in the Brisbane hospital register. For example, for the period 1 April 1829 to 31 March 1832 the register shows the numbers of out-patients treated for intermittent fever were 150; for fever 87; and for dysentery 76. During the period 8 December 1830 to 7 December 1832 the numbers of cases and treatment for intermittent fever were 363; dysentery 121; and fever 21. Finally for the period

¹⁴⁵ P. Manson-Bahr, *Manson's Tropical Diseases: A Manual of the Diseases of Warm Climates*, Twelfth Edition. (London: Cassell and Company, Ltd, 1948), p. 304.

¹⁴⁶ J. Cumpston, & F. McCallum, *The history of the intestinal infections (and typhus fever) in Australia 1788-1923*, Service publication (Australia. Dept. of Health); No. 36, (Melbourne V: H.J. Green, Government Printer. 1927). pp. 10-12.

22 January 1841 to 21 January 1843 the number of cases and treatment for fever were 11.¹⁴⁷

As well as the confusion over the diagnosis of diseases there was also the issue of doctors and their qualifications. The medical profession was not professionalised and patients were vulnerable to neglect by unqualified doctors.

During the convict and the free settlement periods the qualifications of doctors were varied. Most of the doctors were from Great Britain and the profession was divided into three divisions; physicians, surgeons and apothecaries.¹⁴⁸ They were all referred to as doctor but the differences were distinctive, for example, a physician was regarded as belonging to a learned profession, a surgeon was a person who practiced a craft, and an apothecary followed a trade. However, by 1847 the three divisions were classed under the title of general practitioners.¹⁴⁹ Nevertheless, there were some doctors practicing whose qualifications were dubious. The registration of doctors was not put in place until 1862 so there was no check on people who called themselves a doctor. Sir Raphael Cilento spoke of “Dr” O’Connor stating that his title was a courtesy one; ‘he was a good bonesetter when sober and a nuisance when drunk or suffering from post-alcoholic remorse’.¹⁵⁰ He also mentioned a “Dr” von Stein who was a Prussian medical orderly and combined bone-setting, midwifery and spiritualism as his expertise. He assisted at births in the Murgon and Nanango areas in 1872.¹⁵¹

¹⁴⁷ Tyrer, *op. cit.*, pp. 13-14.

¹⁴⁸ Patrick, *op. cit.*, p. 27.

¹⁴⁹ *ibid.*

¹⁵⁰ Cilento ‘Medicine in Queensland’, p. 893.

¹⁵¹ *ibid.*

It would appear that up until 1862, when registration of doctors was introduced, that medical men with genuine qualifications acted as the watchdogs of the profession. Maurice French states that the doctors of the Darling Downs were very protective of their qualifications, abilities and status. An example was when Dr Wyndham Armstrong took out an advertisement in the *Moreton Bay Courier* on 7 July 1855 against the Government's intention to license certain professionals:

I beg to assert that no Act which it could pass could ever force me to associate in terms of equality, professional or otherwise, with persons who in this country lay claim to a position to which they are on no grounds entitled in their own.¹⁵²

Dr Armstrong may have been protecting his own interests more than those of the community. In June 1855 Dr Jonathan Labatt refused to work with Dr Otto Sachse declaring he was 'not qualified in this country' and he questioned his diagnostic skills as well.¹⁵³ Unfortunately, such a stand resulted in tragedy when Sachse was treating a man injured by a horse and threatened to leave if Labatt was called in as a consultant. Labatt in turn refused to come while Sachse was attending the man. Neither of the men would capitulate, and the patient died.¹⁵⁴

In another case Dr Frederick Ludwig Liepperman, who had German qualifications, set up a practice at Drayton Swamp in 1856, and was accepted by the community for more than a year, but in 1857 he was accused of medical malpractice. A German man named Spangler broke his arm and sent for Liepperman rather than Armstrong. Liepperman set his arm, but Spangler would

¹⁵² French, *op. cit.*, p. 215.

¹⁵³ *ibid.*

¹⁵⁴ *ibid.* p. 216.

not do as he was advised and the arm had to be amputated. Liepperman requested Armstrong to do the amputation, as he did not have his instruments with him. Spangler died the next day. At an inquiry conducted by James Taylor 'it was alleged that mortification was the result of Liepperman having incorrectly set the bones'.¹⁵⁵ The foreign doctors not only had to face the hardship of terrain but also of suspicion and hostility in many cases. Dr Sachse claimed he was driven out of Toowoomba by a campaign of harassment.¹⁵⁶

However, it is important to note that there were many cases of doctors displaying duty and diligence even at the risk of their own lives. One such case was that of Dr Ballow who arrived at Moreton Bay in March 1838. The number of prisoners was quite low by this time as the government was winding down the penal settlement. Dr Ballow adapted well to the transition from penal settlement to a free settlement. He became resident surgeon at the hospital, formerly the convict hospital; he was Chairman of the Benevolent Society, coroner, Health officer, surgeon to the gaol, and in 1848 a magistrate of the colony.¹⁵⁷ Dr Ballow met his death in the course of his duty as a medical man. In August 1850 the vessel *Emigrant* arrived in Moreton Bay and it was reported that the disease Typhus was on board. Dr Patrick Mallon was appointed to look after the sick, but he contracted the disease so Dr Ballow took his place. However, it was not long before Dr Ballow was also stricken with the disease, and on 29 September 1850 he died and was buried immediately.¹⁵⁸

¹⁵⁵ *ibid.* p. 217.

¹⁵⁶ French, *op. cit.*, p. 217.

¹⁵⁷ Gordon D, 'Ballow and the "Emigrant" Incident', *The Medical Journal of Australia*, Vol. 1, No. 12, 19 March 1966, pp. 483-5.

¹⁵⁸ *ibid.* p. 484.

The early doctors of the Darling Downs faced very different issues to the doctors of the penal settlement at Moreton Bay. These doctors had a major problem of distance; their patients were spread far and wide. They rode many miles in all types of weather to visit their patients, often putting their lives at risk.

The first professional doctor on the Darling Downs was Dr John Rolland in the early 1840s. He travelled great distances to attend his patients, and he divided his time between caring for the sick and managing his sheep farm.¹⁵⁹ Because he was the only doctor within a distance of 100 miles he was able to demand a 'high fee of £2' for his visits. He retired from the Darling Downs in 1847.¹⁶⁰

The next doctor on the Downs was Dr Charles Miles who arrived in 1847. Like Dr Rolland his patients were spread all over the Darling Downs and he had great distances to cover to attend to them. In 1848 he was faced with an outbreak of fever and ague among shepherds on the Downs and realised that this area desperately needed a hospital.¹⁶¹ Unfortunately Dr Miles died before his intention of establishing a hospital could be met. On returning from attending a patient in Inglewood in 1853 he was thrown from his horse and drowned in a creek.¹⁶²

A succession of medical men followed during the period 1849 to 1859. All of these doctors were faced with primitive conditions and long distances, and

¹⁵⁹ Cilento, 'Medicine in Queensland', p. 890; Patrick, *op. cit.*, p. 29.

¹⁶⁰ French, *op. cit.*, p. 213.

¹⁶¹ *ibid.*

¹⁶² Cilento 'Medicine in Queensland', p. 890; French, *op. cit.*, p. 214.

because they were educated men many doctors were often involved in civic matters and other community activities.¹⁶³

During this time there was great rivalry amongst the British trained doctors and the German trained doctors with the British trained doctors being very protective of their qualifications and abilities. Dr Sasche came under criticism wherever he went; he was described as a 'foreigner' in a murder trial held in Warwick by the defence counsel.¹⁶⁴ In 1859 he reportedly 'demanded pre-payment of fees' before he would attend a patient. Because of this practice Dr Armstrong from Drayton referred to him as 'an amalgamation of doctor and banker' in a letter to the press.¹⁶⁵ There was a reasonably high turn-over of medical practitioners for the Darling Downs area during the period 1842 to 1859 due to accidents, pastoral pursuits and prejudice. Nevertheless, these men played an important part in the development of the Darling Downs area.

The colonial government was very keen to open up the northern part of the colony to free settlement, but was reluctant to establish hospitals in the new areas. This was left to the doctors who settled in the areas. For example, Dr Edward Wilks in July 1847 intended to erect a hospital 'for invalids at Drayton to obviate their travel to Ipswich or Brisbane'.¹⁶⁶ Even though Wilks obtained a builder's licence on 1 July 1845, there is no record that a hospital was built.¹⁶⁷

¹⁶³ Cilento, 'Medicine in Queensland', p. 890.

¹⁶⁴ French, *op. cit.*, p. 216.

¹⁶⁵ French, *op. cit.*, p. 216.

¹⁶⁶ French, *op. cit.*, p. 213.

¹⁶⁷ *ibid.*

Historian Maurice French reports that a private hospital was operating on Hudson's Hill East Warwick in 1847 - 1848, but there is no record of who was operating the hospital.¹⁶⁸

Another doctor who conducted a bush hospital when he arrived on the Darling Downs was Dr Charles Miles in 1847. Later he moved to Warwick where he practiced until his death in 1853. In 1849 Dr Thomas Hopkins set up a practice in Drayton and in 1850 he purchased land and built a 'consulting room and primitive cottage hospital'.¹⁶⁹ In the early 1850s Drs Buchanan and Glissan successively took over the hospital. The hospital was closed down in 1856 and French suggests the closure was probably on sanitary grounds. With the hospital closed pressure mounted for another hospital to be built and resulted in the Toowoomba hospital being completed in 1859.¹⁷⁰

LEADING UP TO SEPARATION AND SELF GOVERNMENT

During the 1850s a debate had arisen about separation from New South Wales and self-government resulting in a Moreton Bay and Northern Districts Separation Association being formed.¹⁷¹ With separation being viewed as inevitable the question of voting rights needed to be sorted out. In New South Wales a liberal franchise was operating that meant all men could vote but when it came to the new Colony of Queensland the 1853 legislation of property qualifications was to be adopted; consequently, people such as itinerants, shepherds, and men without

¹⁶⁸ *ibid.*

¹⁶⁹ *ibid.* p. 214.

¹⁷⁰ *ibid.* pp. 214-15.

¹⁷¹ Fitzgerald, *op. cit.*, p. 108.

property would not be able to vote.¹⁷² Therefore, such legislation ensured that the dominance of the future parliament would be pastoralists whose interests would be more rural than urban and issues of public health in the towns would struggle to be heard.

SUMMARY

Typhoid fever was a disease that caused confusion and fear to all who crossed its path. The lack of knowledge about its causation continually frustrated the medical profession and the colonial government. The absence of the disease amongst the Indigenous People of the southeast Queensland area prior to 1824 suggests that population density was detrimental to the health of the community but a part of the development of the colony. From 1824 to 1859 various epidemics appeared such as dysentery, *febris intermittens* and ophthalmia. By the time of separation from New South Wales in 1859 the rapid growth of Brisbane and Toowoomba meant that these towns were vulnerable to disease, particularly Typhoid Fever, because of growing demand on water supplies and no plans to develop an effective sanitation system. The other problem was that the medical profession still did not have a clear idea of what caused the disease, so they were unable to push for better public health practices. Therefore, the future of public health in the new colony would be left in the hands of the incoming legislators who were largely pastoralists. Would the interests of mundane urban issues such as drainage and sanitation be of vital importance to the new Parliamentarians?

¹⁷² Johnston, *A Documentary History of Queensland*, p. 307.

CHAPTER 2

TYPHOID FEVER IN COLONIAL TOOWOOMBA

Typhoid fever is one of the most ... serious ailments of civilized life. No household is safe against it; there is no family which it may not invade.¹

Unfortunately, for the colony of Queensland this observation was true and no more so than in Toowoomba. From the very early days of separation from New South Wales the colony of Queensland was in trouble with typhoid fever.

The focus of this chapter is to outline the specific factors that caused typhoid fever in Toowoomba in the nineteenth century. From the research five major problems have emerged as contributors to outbreaks of the disease. First was the town's dependence on wells for fresh water. Secondly, cesspits were polluting groundwater, the local wetlands and Gowrie Creek. Thirdly, business enterprises were discharging contaminated wastewater to the wetlands and Gowrie Creek. The fourth problem was the municipality's improper disposal of night soil in Queens Park and the Chinese market gardeners using human manure on their gardens. The final factor was the poor sanitation standard in rail camps, and public institutions, such as the Toowoomba Hospital, schools, leading businesses and public streets.

The discussion in this chapter identifies the problems of polluted waterways and the relationship between the Toowoomba Swamps and sickness in the town and the engineering solution of draining the swamps. It also identifies the role that rapid growth and development of the railway system had on public health and problems of sanitation that resulted in an environment ripe for outbreaks of typhoid fever [refer to

¹ T. Maclagan, 'Is Typhoid Fever Contagious?' *The Nineteenth Century*, No. XXX111, November 1879, p. 809.

map on page 67 for outline of creeks and railway system for Toowoomba]. The population growth stretched the facilities of the Toowoomba Hospital and the school to the limit because these institutions were not equipped to handle large numbers of patients and children in terms of drainage, water closets, and fresh water supplies. The acceptance of the miasmatic theory and concerns about smells and vapours inhibited the medical profession and explains why the government did not consider a longer-term vision in relation to drainage and sewerage. For the Toowoomba Municipal Council to address these public health problems they needed the support of the Queensland Colonial Government but the agenda of the government was to put all their resources and energy into economic development leaving public health as secondary to the growth of the colony. However, Alderman William Henry Groom with the support of the community campaigned strongly to have public health issues recognised and addressed by the government.

The 1878 typhoid fever epidemic in Toowoomba highlights the influence of Alderman Groom and the persistence of the community which voiced concern about the lack of government support for public health reforms; it resulted in a victory for Groom and the community with the formation of a government inquiry into the causes of typhoid fever and the prevention of the disease. The inquiry identified the problem of cesspits to the water supply of the town and made recommendations that earth closets be introduced. However, the recourse to the

² Electoral districts of Toowoomba & Drayton [cartographic material]/engraved for the Queensland Government by Thos. Ham & Co., Call Number: MAP T 695 MAP RaA 15, National Library of Australia, 1865.

dry-earth system was not a long-term solution. Consequently, another outbreak of typhoid fever occurred in 1884 resulting in a public debate about public nuisances.

The experience of typhoid fever in Toowoomba demonstrates the government's reluctance to commit resources to public health reforms and despite public pressure it lacked the vision and commitment to look after its greatest resource, the people.

TOOWOOMBA AND TYPHOID FEVER BEFORE 1878

If ever a town was predisposed to typhoid fever Toowoomba would be the town because of its geographical environment and the rapid growth of settlement. What was seen as an advantage for the development of a new town by the early Colonial Government - a plentiful supply of freshwater - quickly turned into a disaster because of contamination by the settlement.

The new settlers did not understand the complex interactions of the long established ecosystem on the Darling Downs.³ They did not have the understanding of the Indigenous people who, even though they gathered in great numbers on the Darling Downs and the catchment of the Condamine River, did not upset the ecosystem.⁴ The animals used by the Indigenous people grazed differently to the pastoralists' stock which had hard hooves, and their 'movements were more confined and more

³ A. Scott, *Water erosion in the Murray-Darling Basin: Learning from the past*, CSIRO Land and Water, Canberra, Technical Report 43/01, November 2001, p. 22.

⁴ C. Potter, S. Moles, L. Connors, & P. Postle, *Conversations on the Condamine: An oral history from the Queensland Murray Darling Basin*, (Annandale NSW: Envirobook, 2002) p. 22.

directed'.⁵ As Anthony Scott pointed out in a CSIRO Land and Water Technical Report:

The pastoralists were dealing with an environment vastly different to that in Europe with which they were familiar and their methods did not always successfully transfer from one environment to another.⁶

Unfortunately, the pastoralists did not realise that their land clearing would have such dire consequences in years to come. Urban residents also contributed to the deterioration of the ecosystem when they chopped down trees for the purpose of planting orchards. Removal of native trees caused water tables to rise and the spread of swampy land.⁷ In addition the growth of commercial enterprises such as slaughterhouses and tanneries and the practice of disposing of animal refuse directly into Gowrie Creek ensured that it very quickly became contaminated.⁸ Another residential problem was the cesspits in the backyards of residents. When heavy rains occurred many of these pits overflowed into the creek with human excrement polluting the surface water supplies.⁹ The continued growth and change to the environment ensured that Toowoomba was destined to experience serious public health epidemics. Scholars such as Maurice French and Bob Dansie have charted the pattern of deterioration of the area.¹⁰

⁵ Scott, *op. cit.*, p. 22.

⁶ *ibid.*

⁷ Potter et al, *op. cit.*, p. 107.

⁸ *ibid.*

⁹ Interview with Dr Ian Willett, Research Scientist in Soils Chemistry, Australian Centre for International Research, Canberra, Thursday, 16 June 2005.

¹⁰ M. French, *Pubs, Ploughs & 'Peculiar People': Towns, Farms and Social Life*, (Toowoomba Q: USQ Press, 1992), pp. 68-9; B. Dansie, *A short history of Gowrie Creek*, (Toowoomba Q: Toowoomba City Council, 1998), p. 22.

In 1864 Alderman William Henry Groom of the Toowoomba Municipal Council claimed that the swamps were a health risk to the community.¹¹ Groom was guided by the acceptance within the medical profession and the community of the miasmatic theory for the spread of disease. The smells and vapours coming from the polluted swamps would have reinforced for him the view that the conditions of the swamps endangered the health of the community. He sought an engineering solution to solve public health problems in Toowoomba. The complete acceptance of the germ theory by the Queensland Medical Profession did not occur until the 1890s, although there were a few doctors in the 1880s who accepted the germ theory.¹²

Groom used his position as an Alderman and a Member of Parliament to ensure that the community and the government were aware of public health issues in Toowoomba, especially the conditions of the swamps. The election of the Municipal Council after Toowoomba was proclaimed a municipality on 19 November 1860 was held on 4 January the following year and on the same evening a meeting of the Council was held. Groom was elected as the first Mayor of Toowoomba (refer to Appendix 1).¹³ He became more involved with politics when he was elected to the Queensland Parliament on 12 August 1862 as the Member for Drayton and Toowoomba.¹⁴ James Tolmie MLA in his address before the Royal Geographical Society in 1903¹⁵ referred to ‘the late Hon. W. H. Groom ... [who was] identified with almost every social movement in the district up to the time of his death’.¹⁶

There is no doubt that Groom was in an ideal position to coordinate responses to

¹¹ *ibid*, p. 31.

¹² Patrick, *op. cit.*, pp, 195-7.

¹³ French, *op cit.*, p. 133; J. Tolmie, ‘Drayton and Toowoomba – Their Early History’, in *Queensland Geographical Journal*, 19th Session , 1903-1904, Vol. XIX, p. 31.

¹⁴ R. Marriott, ed, *100 years of progress: the story of Toowoomba*, (Toowoomba Q: Toowoomba City Council, 1960), p. 8.

¹⁵ Tolmie, *op. cit.*, p. 18.

¹⁶ Tolmie, *op. cit.*, p. 28.

public health problems, especially in his own constituency, being a member of two levels of government, and the owner of the local newspaper the *Toowoomba Chronicle*. Groom was elected Mayor of Toowoomba six times, 1861, 1862, 1864, 1867, 1883, and 1884.¹⁷ He was elected to the Legislative Assembly as member for Drayton and Toowoomba from 18 August 1862 to 4 June 1901 serving as Speaker of the Legislative Assembly from 7 November 1883 to 4 April 1888 and finally as Member of the House of Representatives, Darling Downs (Federal) 30 March to 8 August 1901.¹⁸ In 1874 Groom purchased *The Toowoomba Chronicle* in partnership with G A Davenport and became sole proprietor in 1876. The Groom family had ownership of the newspaper until it was sold in 1923.¹⁹

Groom sought to demonstrate his commitment to the town at a meeting held in April 1860 to discuss the proposed amalgamation of Drayton and Toowoomba as a joint municipality. He boasted that in Toowoomba ‘its present healthy and flourishing condition is entirely owing to the industry, untiring perseverance, and indomitable courage of the Toowoombians themselves’.²⁰ Groom believed it to be in the interests of both communities to amalgamate, but the people of Drayton fought against such a scheme and amalgamation did not take place. Drayton was ‘proclaimed a municipality on 19 June 1862’.²¹

Toowoomba continued to grow and by 1865 conditions in the town had changed dramatically. Toowoomba was no longer a healthy township and Groom blamed the

¹⁷ *Mayors of Toowoomba: From Township to City 1861-1904*, (Toowoomba Q: The Toowoomba and Darling Downs Family History Society Inc. 2004).

¹⁸ D. Waterson, *A Biographical Register of the Queensland Parliament 1860-1929*, (Canberra ACT: Australian National University Press, 1972), 76.

¹⁹ *ibid.*

²⁰ *ibid.*, p. 30.

²¹ French, *op cit.*, p. 135.

state of the swamps as contributing to the ill health of the children and the increased number of incidents of other diseases. In the Legislative Assembly on 27 June 1865 Groom described the swamps as ‘to a great extent, cesspools’²² and he argued that in the interests of the health of the community the swamps needed to be drained. He pointed out that the Municipal Council of Toowoomba was unable to undertake a task of such magnitude, as the Council did not have the funds. He said he thought the Queensland Government should allocate funds in the sum of £4000 from the Supplementary Estimates of 1865.²³ However, he did offer a compromise: ‘the Municipal Council ... would defray the cost of draining the swamps, if the Government, ... would consent to grant them the land that might be reclaimed’.²⁴ James Taylor, the Member for Western Downs, suggested that the amount should be reduced to £2,500, but the Honorable Arthur MacAlister, Secretary for Lands and Works (Member for Ipswich), argued against the motion and suggested that an engineer be sent to survey the swamps and produce a report. When the motion was put to the vote, it was defeated by twenty-three to five.²⁵ Despite this decision Groom did not let the matter rest there and he continued to campaign for the swamps to be drained as he was convinced the deterioration of the swamps was detrimental to public health.

Unfortunately, his campaign lost momentum and the issue only appeared sporadically throughout the next seven years. One example was in 1868 when the Engineer-in-Chief of Railways in a report to the Legislative Assembly suggested that by draining the West Swamp and by laying ‘a few additional subsiding drains, the

²² *Queensland Parliamentary Debates*, 27 June 1865, Vol. 11, p. 257.

²³ *Votes and Proceedings*, 27 June 1865, p. 100.

²⁴ *ibid.*

²⁵ *ibid.*

whole of the west swamp can be reclaimed, and the land rendered saleable'.²⁶ He further suggested that similar works had been undertaken in other towns in the colony at the expense of the Government.²⁷ The argument for draining the swamps for monetary gain did not convince the members of the Legislative Assembly any more than the risks the swamps posed to public health.

It is not clear what finally convinced the Colonial Government to offer the loan, but in December 1872 the *Toowoomba Chronicle* reported that the application by the Municipal Council of Toowoomba for a loan of £4000 had been bestowed upon them 'to drain the swamps within the municipality of Toowoomba'.²⁸ The proposed loan generated community concern that was played out in the columns of the local newspaper, the *Toowoomba Chronicle*. There appeared to be general agreement that the swamps needed to be drained in the interests of public health and the continued prosperity of the town.²⁹ Prosperity required a healthy town to attract a 'most desirable class of residents'.³⁰ The concern was about the generation of a costly public debt. In a number of editorials alternative methods of dealing with the problem of the swamps was offered, from cutting drains with occasional cross drains to take off the surface water suggesting that such a method would be 'infinitesimally small'³¹ to creating a temporary dam at a narrow point across the swamp; the latter required a barge to be pulled to the middle of the swamp above the dam with labourers aboard to scoop up mud and when the barge was full to transport the mud to the dam. Once again the editorial suggested that the cost would be small

²⁶ *Votes and Proceedings*, Session of 1868-9, p. 500.

²⁷ *ibid.*

²⁸ *Toowoomba Chronicle and Queensland Advertiser*, Saturday 21 December 1872, p.2 (hereafter referred to as *Chronicle*).

²⁹ *Chronicle*, Editorial, Saturday 29 March 1873, p. 2, Saturday 26 April 1873, p. 2, Saturday 10 May 1873, p. 2,

³⁰ *Chronicle*, Saturday 29 March 1873, p. 2,

³¹ *ibid.*

compared to the loan.³² There was also a division within the Municipal Council about the loan, because of the conditions applied to it; these included the 7% interest and the paying back of a former loan of £501.³³

Another contentious issue was whether or not the swamps were injurious to the health of the community. Robert Aland, Alderman for North Ward, declared that the swamps were not as 'unhealthy as was generally imagined'. He also suggested that there was as much sickness at a distance from the swamps as next to them.³⁴ Nevertheless, he advocated that a 'competent engineer be employed' to give a costing of draining the swamps. Aland appeared to be more concerned about the cost of such a project and not the public health of the community. However, Henry Spiro, Alderman for Central Ward, supported the theory that the swamps in their present state were a health risk and suggested that the Government should be approached for a separate loan of £2000. There was also the parochial claim by James Farquharson, Alderman for South Ward, that if the loan was accepted and the swamps drained the residents of South Ward would not benefit at all but a portion of the Ward's revenue would be used to pay the debt.³⁵ Nonetheless, Groom was not swayed by these arguments and remained adamant that public health must come first.

By March 1873 Groom realised that the likelihood of the Council accepting the loan was becoming remote and at a meeting held on 6 March 1873 it was reported:

He understood the Council did not intend to accept the proffered loan of £4000, a decision with which he did not agree, seeing it was a work of necessity if the town was to be rendered healthy, and attract people from

³² *Chronicle*, Saturday 26 April 1873, p. 2,

³³ *Chronicle*, Saturday 21 December 1872, p. 2,

³⁴ *Chronicle*, Saturday 8 February 1873, p. 2.

³⁵ *ibid.*

other localities. He considered the swamps should be vested in the Council for the benefit of the town, but without the right to dispose of the land. He trusted this important work would be entered on, if not completed during 1873.³⁶

Groom continued to campaign strongly for the drainage of the swamps and pressed the point that the health of the community was paramount. He also advocated that the prosperity of the town rested on the swamps being drained. However, he did realise that he needed to change tack with his campaign if he was going to influence the Council to accept the Government loan, and in an editorial in the *Toowoomba Chronicle*, Saturday 29 March 1873 he acknowledged concern about the public debt and suggested a modified work schedule to clean up the swamps.³⁷

The Government loan was finally accepted at a meeting held on 2 April 1873, although not before strong arguments were again put forward by Alderman Farquharson and Alderman Aland against the loan.³⁸ At the next Council meeting held on 7 May 1873 it was decided to invite tenders from engineers to submit plans, specifications and costing for the draining of the swamps, with an award of £100 for the best design.³⁹ This move created as much controversy amongst the community as the swamps themselves. A comment from a group of citizens published in the *Toowoomba Chronicle* suggested that ratepayers would prefer that amount of money be spent on labour programs for opening up central drains to ensure that improvements would be beneficial for several years to come.⁴⁰ There was also debate at Council meetings about how the loan was to be dispersed.⁴¹ Members of

³⁶ *Chronicle*, Saturday 8 March 1873, p. 2,

³⁷ *Chronicle*, Saturday 29 March 1873, pp. 2-3.

³⁸ *Chronicle*, Saturday 5 April 1873, p. 3.

³⁹ *Chronicle*, Saturday 10 May 1873, p. 3.

⁴⁰ *Chronicle*, Saturday 26 April 1873, p. 2; Saturday 10 May 1873, p. 2.

⁴¹ *Chronicle*, Saturday 5 July 1873, Editorial, p. 2.

the Council were divided with half of Council members wanting to spend the entire loan on draining the swamps and the other half on paying off previous government loans.⁴² These disputes persisted for a further five months until Alderman Gargett moved a Notice of Motion at the Council meeting held on 5 November 1873. The Motion read as follows:

That the drainage of one section (15 chains) of the Swamp, commencing at the Railway Bridge, be proceeded with at once by day labour, which will test the character of the ground, and thereby afford reliable information and greater facility for further operations and a guide for the Engineer in preparing his designs.⁴³

By putting the Motion on Notice Alderman Gargett brought the debate to a conclusion and the strategy of draining one section of the swamp ensured that work would at least commence. The motion was discussed at the December meeting and ‘carried without dissent’.⁴⁴

The draining of the swamps was completed in 1876 and with the new drainage system the health of the community looked assured; however, by 1878 the town of Toowoomba was engulfed by an epidemic of typhoid fever that was to have tragic consequences. Draining the swamps had not solved other problems of urban pollution such as outfalls to Gowrie Creek, the provision of a town water supply that did not draw on the local groundwater, or more importantly the lack of a sewerage system for the town and its environs. These factors ensured the persistence of typhoid fever. While the town relied on cesspits and wells, the groundwater

⁴² *Chronicle*, Saturday, 14 June 1873, p. 3; Saturday, 5 July 1873, p. 3; Saturday, 12 July 1873, pp. 3-4; Saturday 16 August 187, p. 2; Saturday, 13 September 1873, p. 3; Saturday 20 September 1873, p. 2

⁴³ *Chronicle*, Saturday, 8 November 1873, p. 3.

⁴⁴ *Chronicle*, Saturday, 6 December 1873, p. 3.

continued to become contaminated in heavy rain and in droughts, and the public health of the Toowoomba community continued to be at risk.

The initial debate about the draining of the swamps was the result of concern in the community with the number of deaths, many of them children, from typhoid fever, diphtheria and whooping cough during the period 1865 to 1867.⁴⁵ The year 1866 was of particular concern as an epidemic of typhoid fever broke out amongst the railway workers living in the railway camps between Ipswich and Toowoomba.⁴⁶

In 1866 the population growth of Toowoomba exceeded any other town in the colony of Queensland.⁴⁷ This growth was attributed to an influx of labourers employed by contractors and subcontractors to build a railway line from Ipswich to Toowoomba.⁴⁸

These workers were referred to as “Navvies” and this term ‘was adopted from England where labourers who built the canals were jokingly called “navigators”’.⁴⁹ Navvies were sought from the British Isles and Germany with the offer of ‘free passage and pay rates between six shillings and 12 shillings a day’.⁵⁰ Upon arrival the labourers and their families were allocated to a railway camp depending on the stage of construction (refer to Appendix 2).

⁴⁵ Toowoomba Historical Society, *Toowoomba's Story – in brief*, 2003, p. 20.

⁴⁶ B. Dansie, *Hospitals and Health*, (Toowoomba Q: Toowoomba Education Centre, 1989), p. 6.

⁴⁷ *Darling Downs Gazette*, 16 January 1866, p. 3.

⁴⁸ B. Dansie, *Letters to the Editor*, (Toowoomba Q: Toowoomba Education Centre, 1990), p. 12.

⁴⁹ M. Bitomsky and L. Mylne, *Living on the Line: A Celebration of Queensland Rail Workers and their Families*, (Brisbane Q: CopyRight Publishing Company Pty Ltd, 1995), p. 16.

⁵⁰ *ibid*, p. 17.

Holme's Construction Camp, 1867



Source: The Workshops Rail Museum, Brisbane⁵¹

Married Quarters View showing camp life, 1867



Source: The Workshops Rail Museum, Brisbane⁵²

⁵¹ Ipswich Toowoomba Const. View of Holme's Construction Camp, 1867, Image Negative Number X1229, The Workshops Rail Museum, Brisbane.

⁵² Ipswich Toowoomba Const. Married Quarters View showing camp life, 1867, Image Negative Number X1263, The Workshops Rail Museum, Brisbane.

The railway camps were established near waterholes or creeks⁵³ and very quickly each camp became a temporary township (refer to photographs on page 78). For example, at Fountain's Camp, located on the lower section of the Main Range near Murphy's Creek, there were 'five stores, three butcher shops, and two bakers, a "full blown" sausage maker and tripe dealer, and vegetable carts which arrived weekly from Ipswich and Toowoomba'.⁵⁴ The engineer or contractor and commercial townspeople lived in weatherboard houses, but the navvies and their families were housed in canvas and bark humpies. A third of the immigrant navvies were married and many had seven or eight children.⁵⁵ The camps were overcrowded with 'no attention to sewerage' or clean water facilities to maintain cleanliness.⁵⁶ A year earlier in 1865 the navvies went on strike to obtain shorter working hours and better pay as many of the families were in poor health and starving.⁵⁷ They did not win their case and by 1866 they were faced with even greater hardships. Drought conditions created a problem with water supplies and the workers had to travel further and further to obtain water before they went to work.

The influx of labourers arriving in Toowoomba resulted in an over-supply of workers⁵⁸ who were looking for work at a time when the Queensland colonial government was facing an economic crisis with the collapse of the Agra and Masterman's Bank in London in July 1866. The London based bank handled the finances of the government so there was no money to pay the contractors and their

⁵³ *ibid*, p. 17

⁵⁴ *ibid*, p. 3.

⁵⁵ The main range to Toowoomba, <http://www.sunsteam.org.au/volume 1.htm>, 30/1/2004. p. 3.

⁵⁶ *Darling Downs Gazette*, 16 January 1866, p. 3.

⁵⁷ J. Kerr, *Triumph of Narrow Gauge: A history of Queensland Railways*, (Brisbane Q: Boolarong Press, 1998), p. 15.

⁵⁸ Dansie, *Letters to the Editor*, p. 12.

workers.⁵⁹ Approximately 1500 navvies found themselves out of work and it wasn't until October 1866 that the government obtained secure new loans to reinstate the workers (although the numbers had declined as many had left for the goldfields in New South Wales).⁶⁰ So, as a result of the drought and of the economic crises, the people living in the railway camps were extremely vulnerable to disease and in particular typhoid fever.

It is unfortunate that the Toowoomba Hospital records have been lost so there is no way to confirm the exact number of navvies admitted to the hospital with typhoid fever in 1866. However, the loss of the records was highlighted in an editorial published in *The Darling Downs Gazette* in August 1899:

It is a matter for regret to all that the old records connected with the Toowoomba Hospital have been lost. The only means of learning of its early inception is through the files of the "Darling Downs Gazette".⁶¹

Unfortunately, there was only a small paragraph devoted to the impact of typhoid fever on the navvies stating that the disease had broken out amongst the navy population in 1866 resulting in an unusually great number of deaths.⁶² Although there is a lack of hospital records, James Taylor (Alderman and Member for Western Downs) pointed out during a debate of the Legislative Assembly on 25 September 1866 that 'before the railway works were commenced, there was only about fifteen patients weekly in the Toowoomba Hospital, and since the works were commenced the number had increased to between fifty and sixty weekly'.⁶³

⁵⁹ Kerr, *op. cit.* p. 15; R. Fitzgerald, *A History of Queensland: From the Dreaming to 1915*, (St Lucia Q: University of Queensland Press, 1982), p. 128; D. Murphy, R. Joyce, & M. Cribb, Eds. *The Premiers of Queensland*, (St Lucia Q: University of Queensland Press, 1990), p. 61.

⁶⁰ The Main Range to Toowoomba, <http://www.sunsteam.org.au/volume1.htm>, 30/01/2004.

⁶¹ *The Darling Downs Gazette*, Wednesday, 16 August 1899, p. 3.

⁶² *ibid.*

⁶³ *Queensland Parliamentary Debates*, 25 September 1866, Vol. 111, p. 672.

In 1866 there did not appear to be any organised groups raising public awareness about poor living conditions and health issues in Toowoomba, but individuals were taking it upon themselves to voice their concerns through the newspapers. An example of how strongly individuals felt about Toowoomba and the health of its people was illustrated in a letter to the Editor of the *Darling Downs Gazette* published on Tuesday, 16 January 1866 from 'Frangipani':

It is a curious circumstance, but nevertheless a fact that nothing is so essential to the health of the residents in a town, than a proper system of sewerage; and nothing is so generally neglected until sickness make its appearance in the shape of pestilential disease, and a few victims are carried off in its thinly populated localities. Then, and only then, the public attention is aroused ... [and] precautionary measures are adopted to protect the remainder.⁶⁴

This member of the public was advocating that a system of sewerage was essential for the colony, but the government was not listening. Frangipani continued to point out that all large towns in the colony of Queensland and neighbouring colonies experienced the same attitude to public health and declared that 'it must be borne in mind that expenses are greatly increased when public works interfere with vested interests'.⁶⁵ Frangipani also criticised the Inspectors of Nuisances suggesting they were not diligent enough in their duties.⁶⁶ The issue of the Inspectors of Nuisances was also raised by another member of the public in a Letter to the Editor of the *Toowoomba Chronicle and Queensland Advertiser* published on Wednesday, 8 August 1866, asking 'Where is the Inspector of Nuisances':

Sir – I beg to call your attention to a most disagreeable stench in Ruthven-street, and of all improper places near to the Hospital, arising from the carcass of a dead dog almost as big as a young lion. It has been there for at least four or five days, and surely the

⁶⁴ *The Darling Downs Gazette*, 16 January 1866, p. 3.

⁶⁵ *ibid.*

⁶⁶ *ibid.*

Police must have passed it many times, if only on their ordinary daily beats.

Yours truly,
A SUBSCRIBER.⁶⁷

There were other Letters to the Editor from members of the community expressing their concern about all types of nuisances in Toowoomba, from goods being placed under street awnings by storekeepers that created obstructions to the public,⁶⁸ to the dumping of packing cases in the street.⁶⁹

Editorials and articles in the *Toowoomba Chronicle* also raised the issue of public health and the problems that Toowoomba was facing with pestilence and disease.⁷⁰ In particular, one editorial published on 14 December 1865 raised concern about the number of navvies admitted to hospital, and the number of deaths due to fever and dysentery.⁷¹

Another forum where the navvies and the public health situation in Toowoomba were raised was the Select Committee on the Hospitals of the Colony inquiry. On 16 May 1866 whilst giving his evidence James Taylor, the treasurer of the Toowoomba Hospital, was asked about the arrival of the navvies in Toowoomba and the presence of disease:

Did you know of fever being in Toowoomba before the navvies came there? [James Taylor replied] Never, We have had a great amount of illness since the navvies came there. Almost all the railway patients come in with fever.⁷²

⁶⁷ *Chronicle*, Wednesday, 8 August 1866, p. 3.

⁶⁸ *Chronicle*, Thursday, 2 November 1865, p. 3.

⁶⁹ *Chronicle*, Thursday, 28 June 1866, p. 2.

⁷⁰ *Chronicle*, Thursday, 16 January 1866, p.2.

⁷¹ *Chronicle*, Thursday, 4 December 1865, p.3.

⁷² *Votes and Proceedings*, 'Minutes of evidence taken before the select committee of the Hospitals of the Colony', 16 May 1866, p. 1653.

It would appear that the Select Committee and members of Toowoomba Hospital Committee were of the view that the navvies were responsible for the surge of illness that was being experienced in Toowoomba. In fairness to the navvies Dr Hugh Bell, the visiting surgeon to the Brisbane Hospital, stated in his evidence that it was due to extenuating circumstances that fever was so prevalent amongst the navvies, for example, 'their exposure to wet and cold coming out in the ships, and not having their ordinary diet, and from exposure to the heat'.⁷³ Dr Bell also stressed to the Committee that it was his opinion that it was wrong to attribute the severity of the disease to the navvies, but more likely to the 'want of drainage'. This was the real issue for the navvies - not having access to uncontaminated water, and the likely fecal contamination from latrines in the camps.⁷⁴ However, the Committee did not appear to be convinced of Dr Bell's opinion because the Chairman of the Select Committee, W H Groom, stated in his report that the extent of typhoid fever or colonial fever in 1866 was considerable resulting in numerous deaths and was directly related to the 'large number of immigrants, of the poorer class' arriving in various towns throughout the Colony.⁷⁵ Mr Groom compared the situation in Brisbane, Ipswich, Toowoomba and Rockhampton with 'the town of Warwick' when he stated:

... few immigrants find their way [to Warwick], and where no navvies are at work on railways, not a single case of this "fever" has occurred during the past year, and the inhabitants are singularly free from any kind of disease.⁷⁶

Groom did not display any interest in the conditions that the navvies were living under. To him, the cases of "fever" occurring in Toowoomba meant that the influx

⁷³ *Votes and Proceedings Hospitals of the Colony*, p. 1650.

⁷⁴ *ibid.*

⁷⁵ *Votes and Proceedings, Hospitals of the Colony*, p. 1616.

⁷⁶ *Votes and Proceedings, Hospitals of the Colony*, p. 1616.

of railway workers explained the situation, even though a year earlier he had blamed the swamps as a cause of health risks to the community.

Unlike many colonial hospitals the Toowoomba Hospital was under the management and control of the Queensland Colonial Government. The Inquiry into the Hospitals of the Colony revealed that it was well managed and ‘largely assisted by the public’, but was in desperate need of funds to maintain its services. In 1865 the number of fever cases that were admitted to the hospital stretched its facilities to such an extent that overcrowding occurred. Of great concern at this time was the condition of the existing water closets⁷⁷ and that the hospital had ‘no provision for drainage’.⁷⁸

James Taylor was asked by the Chairman William Groom the following:

Are the water closets attached to the hospital offensive?

Yes: very offensive, ... [where they are] at present located, and there is no means of removing them. They are the only thing about the hospital that is offensive; and we have no means of removing them, unless we stick them against the National School. The smell is most offensive.⁷⁹

In his evidence Taylor acknowledged the sanitation problems at the hospital but as Treasurer of the Hospital Committee was defensive about its sanitation.

He also gave evidence that there was ‘no way of constructing sewerage’ because drains would have to be carried through ‘great amounts of private property’.⁸⁰ Even if the drains were implemented the water supply was not good enough to provide a sewerage system. The hospital was supplied with water by a well, but due to the drought it became dry, and in November 1865 the Hospital Committee accepted the tender of Mr Larkins to deepen the well in the hope of finding at least ten feet of

⁷⁷ *Votes and Proceedings*, Hospitals of the Colony, p. 1653.

⁷⁸ *Votes and Proceedings*, Hospitals of the Colony, p. 1649.

⁷⁹ *ibid.*

⁸⁰ *Votes and Proceedings*, Hospitals of the Colony, p. 1653.

water.⁸¹ In the meantime the Hospital Committee was still purchasing water at the time of the Inquiry into the Hospitals of the Colony. The hospital funds were ‘barely sufficient to pay for existing liabilities’ and when the Committee had to purchase water, there was no way they could afford to undertake drainage and sewerage work without the help of the Colonial Government.⁸² Richard George Suter, an architect with considerable experience in the construction of hospitals in England, spoke about earthclosets in his evidence to the Inquiry stating that earth closets were injurious to public health, because the closets ‘are liable to accident, it is tantamount to a failure’.⁸³ He also stressed that the discharge of water sewerage into neighboring tidal streams would be wrong, particularly because of the climate in Queensland. He said there is nothing ‘better than the old system of cesspools, which should be emptied periodically’.⁸⁴

J B Hoare, the Resident Dispenser, raised other concerns about the hospital in November 1865 in a report to the Hospital Committee. He stated that the bedsteads were in a very dilapidated state, bedding was in a horrible condition and unfit for use and would have to be destroyed, two rooms beside the kitchen were neither ceiled nor lined and were in a filthy condition, swarming with bugs, and there were no medicines in the hospital, the number of patients were thirty-six in-door and five out-door and if further patients were to arrive there was no place to put them.⁸⁵ The lack of funds was becoming a real problem for the Committee.

⁸¹ *Chronicle*, Thursday, 16 November 1865, p. 2.

⁸² *The Brisbane Courier*, Saturday 11 November 1865, p. 5.

⁸³ *Votes and Proceedings*, Hospitals of the Colony, p. 1668

⁸⁴ *Votes and Proceedings*, Hospitals of the Colony, p. 1668.

⁸⁵ *The Brisbane Courier*, Saturday 11 November 1865, p. 5.

The location of the hospital next to the National School was also raised in a Report of the Board of General Education for the year 1865 presented to both Houses of Parliament in 1866 by R MacDonnell, General Inspector. He referred to the location of the hospital in relation to the Toowoomba (Vested) School:

The situation being close to the hospital, is injurious to the reputation of the school, and pupils have been removed from this cause alone.⁸⁶

The General Inspector of Schools asserted the reason children were being removed from the school was because the hospital and its offensive smell were so close that parents were concerned about the health of their children. They emphasised that there was no problem with the school itself.

Groom also raised the issue in Parliament about the school being so close to the hospital when he moved that a select committee be appointed to enquire into the workings of the hospitals of the colony. He said:

... several parents had been compelled to take their children away from the school in Toowoomba, on account of the fever in the hospital, and the close proximity of the building.⁸⁷

Groom realised the public needed reassurance that the government was concerned about the public health of the community, especially the welfare of children.

This was the background to the parliamentary inquiry into the colony's hospitals. Groom believed an inquiry into the conditions of hospitals in the Colony would bring to light exactly what the situation was and offer recommendations in the interests of

⁸⁶ *Votes and Proceedings of the Legislative Assembly (Queensland Legislative Assembly)*, 1866, 'Report of the Board of General Education, for the year 1865', pp. 770-7.

⁸⁷ *Queensland Parliamentary Debates*, Vol. 111, 24 April 1866, p. 81.

public health. The motion was passed and seven members were appointed to serve on the Inquiry.⁸⁸ The committee consisted of Charles Coxen, Member for Northern Downs, Robert Herbert, Member for Western Moreton, James Taylor, Member for Western Downs, Frederick Forbes, Member for Warrego, Robert Mackenzie, Colonial Secretary, Member for Burnett, John Watts, Member for Western Downs, and William Groom, Member for Drayton and Toowoomba, with Mr Groom as Chairman. Dr Challinor, Member for Ipswich, was added to the Select Committee on 1 May 1866, the first day of sitting.

The Darling Downs was well represented on this select committee and the recommendation that additional funds be placed upon the Supplementary Estimates to ensure the hospital did not close down was good news to the community in Toowoomba.⁸⁹ However, by way of contrast, the Ipswich Hospital came under criticism because there was no sewerage and drainage provision, and the recommendation of the Inquiry was for the Colonial Architect to ‘carry out whatever improvements are deemed necessary for the safety of the patients and the health of the town inhabitants’.⁹⁰ The major difference between the two hospitals was that Toowoomba Hospital was under the management and control of the Government and Ipswich Hospital and all other hospitals in the colony were under the management and control of local committees.⁹¹ It would appear that the Inquiry was not prepared to criticise a government hospital. Historian Ross Patrick noted that the Committee did not visit any hospital to see for themselves the conditions and workings of the

⁸⁸ *ibid*, p. 82.

⁸⁹ *Votes and Proceedings*, Hospitals of the Colony, p. 1615.

⁹⁰ *Votes and Proceedings*, Hospitals of the Colony, p. 1614.

⁹¹ *Votes and Proceedings*, Hospitals of the Colony, p. 1640.

hospitals. Instead they reached their conclusions from the evidence delivered and one written submission.⁹²

THE TYPHOID FEVER EPIDEMIC OF 1878

In the Hospitals of the Colony Report it was noted that typhoid fever was a disease that had 'proved fatal in numerous instances' and that 1866 was a particularly bad year for 'Brisbane, Ipswich, Toowoomba and Rockhampton'.⁹³ Thankfully, the situation improved over the next few years, and in 1873 during the quarter ended 31 March the District Registrar, Mr T P Haslam, advised the *Toowoomba Chronicle and Queensland Advertiser* that nine deaths were registered but only one of those was from typhoid fever.⁹⁴ Unfortunately, this improvement was not to last and in the summer of 1877/1878 Toowoomba found itself in the grip of a typhoid fever epidemic of huge proportions.

On 16 May 1877 Groom raised in Parliament the issue of sickness and destitution that was rampant in the camps along the Dalby line. He referred to the sickness as fever, ague and dysentery and stated that the amount of sickness had reached an epidemic level. He advised the Members of the House that the extent of the epidemic was more than they could imagine and a medical gentleman suggested that 'the worst of the epidemic had not yet appeared'.⁹⁵ Groom was of the belief that the Government had a responsibility to the immigrants to do everything within its power to save their lives when an unexpected epidemic occurred that threatened their lives.

⁹² Patrick, *op. cit.*, pp. 45-6.

⁹³ *Votes and Proceedings*, Hospitals of the Colony, p. 1616.

⁹⁴ *Chronicle*, Saturday 12 April 1873, p.3.

⁹⁵ *Queensland Parliamentary Debates*, Vol. XX111, 16 May 1877, p. 26.

Consequently, he argued strongly and persistently for Government intervention in this situation, by asking for an expenditure of £100 or £200 to assist the sick to obtain the necessary medical attention they needed.⁹⁶ Unfortunately, after much debate Groom was forced to withdraw his motion through lack of support.

Nevertheless, his action alerted the Government and the public to the seriousness of the health situation along the Dalby Railway line.

As a result of the epidemic the Committee of the Toowoomba Hospital was faced with financial and physical problems. The number of beds in the Hospital was thirty-five and very quickly these beds filled with patients from the Dalby camps; another seventeen patients were placed on the hospital floor. When additional patients were taken to Toowoomba they had to be delivered to the Immigration Depot as there was no room for them at the hospital. The patients did not have the money to pay for their care; therefore, it was up to the Committee to find the money. Unfortunately, for the Committee the crisis they were going through in May 1877 was to become worse as the summer approached.

The summer of 1877/1878 was particularly troublesome for the community of Toowoomba. The reputation of the town as healthy had deteriorated dramatically⁹⁷ to a town with problems of sanitation, and a typhoid fever epidemic. The extent of

⁹⁶ *ibid.*

⁹⁷ *Votes & Proceedings*, Report with Minutes of Evidence taken before The Board appointed to inquire into The causes of the prevalence of typhoid fever at Toowoomba, and the best means to be adopted for the suppression of the same, 1878, p. 774.

such problems was outlined in a letter to the editor of the *Toowoomba Chronicle* under the pseudonym of ‘An Unofficial Inspector of Nuisances’:

... how an inspector [of nuisances] can walk down Ruthvern-street [sic] and not smell - even if he had his eyes shut - several nuisances in the main thoroughfare, I cannot imagine ... the effluvia arising from the foul and fetid, filthy refuse [is] allowed to flow in the gutters on the east side of Ruthven-street at its intersection with Russell-street east. ... Our town had a name for healthiness and cleanliness, but this is fast becoming a thing of the past. ... There are scores of closets full to overflowing and in this tropical climate, these are nothing less than fever-breeding nuclei.⁹⁸

The public perception was that the local government’s strategy of employing an ‘Inspector of Nuisances’ to safeguard the health of the town was not working. It was clear that the local government was not equipped to cope with the population increases of the town either environmentally or physically.⁹⁹

The decade 1871 to 1881 was a period of rapid growth with the European population increasing by more than 40%. Table 2.1 illustrates this growth which was then followed by a slight decline. Nevertheless the overall increase in numbers in these decades put a strain on the local government.

Table 2.1 Population for Census District of Drayton and Toowoomba

Census District	1871 Persons	1876 Persons	1881 Persons	1886 Persons
Drayton & Toowoomba	7,079	9,499	10,004	9,428

Source: 1877, Queensland, Fifth Census of Queensland, 1876, p. 61; 1882, Queensland, Sixth Census of the Colony of Queensland, 1881, p. 9; 1887, Queensland, Seventh Census of the Colony of Queensland, 1886, p. 11.

⁹⁸ *Chronicle*, Tuesday, 9 April 1878, p. 3.

⁹⁹ Potter et al, *op. cit.*, p. 107.

The census figures for the years 1871, 1876, 1881 and 1886 indicate that the town sustained an established commercial and professional sector although the bulk of the inhabitants were industrial and rural workers and domestic servants (refer to Tables 2.2 and 2.3 on page 92).

The data collected in 1876 did not include the category of 'Domestic Workers' and the grouping of employment in this year is not directly comparable with other years. In 1881 the English system of collecting data was adopted resulting in changes in categories.

To add to the problems of Toowoomba the colony was in the middle of a severe drought much to the grave concern of selectors and townspeople.¹⁰⁰ For the townspeople the drought was particularly disastrous because they were dependent on the fresh aquifers for their every day water supply. The drought meant that the watertable was lowered because of decreases in rainfall and the aquifers were now vulnerable to contamination because they were lower than the cesspits that were in common use, and not being cemented, therefore, prone to leaking sewage matter into them.¹⁰¹ As a result of such an environment more and more people became sick with typhoid fever with many of them dying.

¹⁰⁰ *Chronicle*, Saturday 1 January 1878, p. 3.

¹⁰¹ *Votes and Proceedings*, Prevalence of typhoid fever, p. 779.

Table 2.2 Category of occupations in Census District of Drayton and Toowoomba, 1876

1876	Principal Officers	Accountants, Clerks, etc	Messengers, Laborers, etc.	Police	Unspecified	Railway, Post Office, & Telegraph Clerks	Railway, Post Office, & Telegraph Mechanics	Railway, Post Office, & Telegraph Laborers	Law	Medicine	Divinity	Literature, Art, Science, etc
Male	0	20	15	21	1	10	11	40	7	13	11	51
Female	0	4	0	3				4		1	6	40

Source: 1877 Queensland Fifth Census of Queensland, 1876

Table 2.3 Category of occupations for the District of Drayton and Toowoomba, 1881 and 1886

Census Year	Professional Class	Domestic Class	Commercial Class	Agricultural Class	Industrial Class	Indefinite and Non-productive Class
1881						
Male	119	2561	339	1068	698	210
Female	66	4365	20	305	182	71
1886						
Male	143	1982	368	857	958	331
Female	82	3834	45	515	228	85

Source: 1882 Queensland Sixth Census of the Colony of Queensland, 1881, p. 162; 1887 Queensland Seventh Census of the Colony of Queensland, 1886, p. 222.

The drought increased the alarm of the community about the health of the town and many within the community were not prepared to accept the situation and raised their concerns by writing letters to the newspapers. The *Toowoomba Chronicle* received a stream of letters week after week strongly objecting to the disgusting state of the town, which increased the risk of people contracting typhoid fever.¹⁰² Such views were supported by the *Toowoomba Chronicle* as evidenced in an editorial published on 2 April 1878 when the Editor wrote:

During the past week two or three medical gentlemen from Brisbane have visited Toowoomba, and they have not hesitated to affirm that they were not at all surprised to hear that typhoid fever was prevalent amongst the population. Indeed they would have been surprised to have heard that it did not prevail.¹⁰³

The Editor of the *Toowoomba Chronicle* wanted to make the public aware of the seriousness of the situation, and knew that the community would respect and accept the views of medical men more readily. As in earlier times people were reluctant to use their names when writing to newspapers; instead they used a pseudonym such as ‘Typhoid’; ‘A Patient In Deed’; ‘A Constant Reader of the “Chronicle”’; and ‘Amateur’.¹⁰⁴ Nevertheless, there is no doubt that concern among the community was widespread because of the number of people becoming ill and dying and because conditions in the town were not improving.

As the epidemic worsened parents became fearful about the safety of their children whilst attending school and this fear was not unwarranted. Mr T McIntyre Esq made inspections of schools in Toowoomba and reported in the Annual Report of

¹⁰² *Chronicle*, Tuesday, 29 January 1878, p. 3; Thursday, 31 January 1878, p. 3; Thursday, 9 March 1878, p. 3; Thursday, 16 March 1878, p. 3; Tuesday, 2 April, 1878, p. 3; Thursday, 4 April 1878, p. 3.

¹⁰³ *Chronicle*, Tuesday, 2 April 1878, p. 3.

¹⁰⁴ *Chronicle*, Tuesday, 9 April 1878, p. 3; Tuesday, 30 April 1878, p. 4; Thursday, 2 May 1878, p. 3; Saturday, 4 May 1878, p. 3; Tuesday, 7 May 1878, p. 3.

Inspection for 1877 the following observations and recommendations for a number of schools: The Middle Toowoomba (Mixed) School (a total of 256 children on the roll) was observed as having a bad water supply; the North Toowoomba (Boys) School (a total of 256 children on the roll) required a new water-closet; the North Toowoomba (Girls and Infants) School (a total of 395 children on the roll) needed more lavatories; the South Toowoomba (Girls) School (a total of 185 children on the roll) also had a bad water supply, and the premises were too small and uncomfortable due to overcrowding. The ventilation was unsatisfactory, and only one closet was in use and another one was recommended; the premises of Toowoomba N.V. R.C. (Girls and Infants) School (a total of 313 children on the roll) were too small, resulting in overcrowding being excessive, and the water supply was bad; the building of Middle Toowoomba (Girls and Infants) School (a total of 127 children on the roll) was spacious, well ventilated, and suitable; and the South Toowoomba (Boys) School (a total of 282 children on the roll) was reported as being in good condition.¹⁰⁵ Unfortunately, the recommendations of the Inspector were not acted upon as a Toowoomba Newspaper Correspondent in *The Brisbane Courier* pointed out ‘how careless the Minister for Education has been in not attending to the recommendation[s]’,¹⁰⁶ of the report.

The 1878 Inspection of Schools report supports the assertions of the Toowoomba Correspondent because the schools were in the same situation as in 1877. Middle Toowoomba (Girls) School (a total of 125 children on the roll), and the Middle Toowoomba (Infants) School (a total of 205 children on the roll) were inspected at

¹⁰⁵ *Votes and Proceedings*, Annual Report of Inspection, 1877. – (T. McIntyre, Esq.) to The Under Secretary, Department of Public Instruction. pp. 1077-8.

¹⁰⁶ *The Brisbane Courier*, Saturday, 11 May 1878, p. 6.

different times even though they were both housed at the former School of Arts building. The girls' accommodation was found to be untidy but suitable whereas the infants' accommodation was found to be in a school room that was 'unlined and unceiled', without a verandah on the western side, subject to extremes of heat and cold, and one lavatory common to both departments. The North Toowoomba (Boys) School (a total of 195 children on the roll) had no lavatory and 'the general condition of the school cannot be considered satisfactory'. North Toowoomba (Girls and Infants) School (a total of 352 children on the roll) was recorded as having crowded accommodation, water laid on, but no lavatory; Toowoomba, R.C. (Girls and Infants) School (a total of 240 children on the roll) was reported as 'moderately satisfactory'; South Toowoomba (Boys) School (a total of 281 children on the roll) required necessary repairs to 'school-rooms, outbuildings, and fences were under consideration'. Four out of the six schools in 1878 were found to have irregular attendance and this was attributed to 'the consequence of the sickness prevalent in the neighbourhood'.¹⁰⁷ Patrick Perkins, Member for Aubigny, raised the matter regarding the typhoid fever outbreak in Parliament on 1 May 1878, and it was reported in the *Official Record of the Debates of the Legislative Assembly* as follows:

With regard to the outbreak itself, he had traced it to the school on the Mort Estate, where, he was sorry to say, the accommodation for the pupils was something abominable, 300 children using one apartment for the calls of nature. They could thus easily understand how the disease had spread.¹⁰⁸

Even though Mr Perkins was convinced that the outbreak of the disease originated from the Mort Estate School he was reluctant to criticise the Minister of Public Instruction; he suggested that if the Minister knew about the disgraceful condition of

¹⁰⁷ *Votes and Proceedings*, Annual Report of Inspection, 1878. (J.J. Caine, Esq.) to The Under Secretary, Department of Public Instruction. pp.115-6.

¹⁰⁸ *Official Record of the Debates of the Legislative Assembly*, Fifth Session, Seventh Parliament, Vol. XXV, 1878, p. 74.

the school 'he would not permit it to exist.' However, the Annual Report of Inspections for 1877 clearly stated that the Mort Estate Boys School required a new water-closet and the girls' school needed lavatories, therefore, the Minister should have been aware of the importance of implementing the recommendations of the report, particularly with the population growth of the area and the increased number of children attending the school.

Because the government was not addressing the issue it was up to the parents to do something about the sanitation conditions of the schools and with the support of the *Toowoomba Chronicle* they lobbied the Minister for Public Instruction for the closure of schools for a short period of time in order for necessary sanitary works to be undertaken.¹⁰⁹ The response from the Minister, Mr Griffith, was to close public schools on Wednesday 24 April 1878 for two weeks and during this time certain sanitary arrangements were to be carried out in the interests of the health of children and teachers.¹¹⁰ The Mort Estate Primary School was closed for approximately four weeks with a notice appearing in the *Toowoomba Chronicle* on Saturday 18 May 1878 advising parents that the Mort Estate Primary School was to be reopened on Monday 20 May 1878 as the latrines were finished and the school was ready to accept children.

It was whilst the schools were closed that the Mayor of Toowoomba, John Garget, received a letter from Fred Rawlins, the Under Colonial Secretary, advising him that Mr W H Groom, Dr Thomson and himself had been appointed as a Board to enquire into 'the causes of the prevalence of Typhoid Fever at Toowoomba, and also to

¹⁰⁹ *Chronicle*, Saturday, 20 April 1878, p. 4.

¹¹⁰ *Chronicle*, Saturday, 27 April 1878, p. 3.

report as to the best means to be adopted for the suppression of the same'.¹¹¹ The appointments were primarily the result of a push from Premier John Douglas who as owner of the Talgai run on the Darling Downs from 1855 and Member of the Legislative Council from 22 February to 25 July 1866 and Member of the Legislative Assembly for Darling Downs (NSW) in 1859¹¹² had a special interest in the Darling Downs area and was very concerned about the number of typhoid fever cases in Toowoomba.¹¹³ It would also be fair to say that the highly publicised view of the general public through the Toowoomba newspapers was also an influential factor.

The Board lost no time in getting the Inquiry underway and it was decided to divide the method of investigation into two areas: one, by direct evidence to the Board from selected members of the community; and two, inspections of public institutions, business premises and residences. Minutes of Evidence were taken on Thursday 2 May 1878 from three doctors - Dr Edwin Roberts a medical practitioner in Toowoomba for ten and a-half years, Dr Stephen Flood a medical practitioner in Toowoomba for approximately 20 months, and Dr James Howlin, a medical practitioner in Toowoomba for two and a-half years. Members of the public interviewed were Charles Oakley Richardson the resident dispenser at the Toowoomba Hospital for fourteen months; Police Inspector William Harris stationed at Toowoomba; William Thompson, Foreman of Works and Inspector of Nuisances for the Municipality of Toowoomba and James Nathan, the nightman and chimney sweep of Toowoomba. Inspections were carried out at the Gaol, Grammar School, Hospital, Immigration Depot, Police Station, Police Court, Post Office and residence,

¹¹¹ Under Colonial Secretary to John Garget in *Votes and Proceedings*, 1878, Vol. 11, p. 768; QSA: Executive Council Minutes, EXE/E40 in-letter No. 78/26, 25 April 1878.

¹¹² Waterson, *Biographical Register*, p. 49.

¹¹³ E. Barclay, *Aspects of public health in Queensland from 1859-1914*, Master of Arts Thesis, University of Queensland, 1979 p. 99.

Railway Station, North Toowoomba Boys and Girls State Schools, Telegraph Office, hotels, and various other businesses and residences. The Board was ensuring they had as much information as could be gathered to submit an accurate account of the situation and to present constructive recommendations on how to suppress the disease as quickly as possible.

The Board met on Thursday, 2 May 1878 and by all accounts each of the six members of the community selected was heard on that day. The 'Minutes of Evidence Taken' were not divided into questions and answers, but delivered as a report to the Board. The evidence of the doctors showed that there was not a general consensus about the typhoid fever epidemic. Dr Roberts and Dr Howlin were in agreement that the number of typhoid fever cases they treated during the 1877/1878-year had increased, whereas Dr Flood considered that there was no increase in the number of patients with the disease and it was no more 'prevalent than usual'.¹¹⁴ Dr Roberts stated he 'had about forty cases since 1 January 1878, of which seven proved fatal'. Dr Howlin stated he 'had about eighteen cases at private residences, and seven hospital cases during the year, of which nine had proved fatal.' However, Dr Flood stated he had treated eleven cases of the disease this year but he had treated eleven cases the year before and in either year not one of his patients died.¹¹⁵

¹¹⁴ *Votes and Proceedings*, 1878, Vol. 11, pp 778-80.

¹¹⁵ *ibid.*

The evidence of Charles Richardson, the resident dispenser at the Toowoomba Hospital, supports the statements of Drs Roberts and Howlin:

There were sixteen cases of typhoid fever in the hospital a few days ago, six males and ten females. All the males have been discharged but one, who is convalescent; but only one female discharged, the other nine being convalescent. These appear to be largely in excess of the local cases for the same time last year. I have also supplied outdoor relief to cases, which appear about double the number during the same term last year.¹¹⁶

Richardson also stated that of the 25 cases of fever admitted to hospital during February, March and April of 1878 three were fatal. Dr Flood's experience does not appear to reflect the broader situation in Toowoomba in 1878.

Even though there was a difference of opinion about the epidemic amongst the medical men, there was an overwhelming agreement from everyone who gave evidence to the Board that the state of sanitary conditions in Toowoomba was appalling and such conditions were responsible for the amount of sickness in Toowoomba. However, the evidence from James Nathan, the nightman and chimney sweep, was most disturbing. He told the Committee he was an employee of the Municipal Council but negotiated terms with members of the public for emptying closets. He commenced his work at 11.00pm and finished between 4.00 and 5.00am. He used a horse and dray with two casks covered with bags and delivered the load 'to the large hole in the Queen's Park', and once the night soil had been unloaded he covered it with 'earth to prevent any stench'. He went on further to say that he had been dumping night soil in Queen's Park for six years.¹¹⁷ It would appear that the Municipal Council was aware of Nathan's disposal methods in Queen's Park but did

¹¹⁶ *ibid.*

¹¹⁷ *Votes and Proceedings*, Vol. 22, p. 781.

not intervene in the improper practice, despite the belief at this time that the miasmatic theory of foul smells in the air spread disease.

The inspections carried out by the Committee revealed that a large number of the hotels did not have sufficient closet accommodation and what they did have was housed within 15 feet to 25 feet of the water supply wells. The closets were described as ‘in a filthy state’, or ‘very dirty, wants immediate attention’. Pig-sties and fowl houses were in back yards in defective conditions close to water supply wells. Drains that carried dirty washing water and soap-suds were filthy.¹¹⁸

The inspection of business premises and residences did not fare any better. Closets were very close to water supply wells, pig-sties and fowl houses close to houses and wells, drains in a filthy condition, and ground and yards in a filthy state. However, it was the result of the inspection of the public buildings that was horrifying and surprising. The Hospital was described as ‘Sanitary arrangements very defective’, ‘Sundry heaps of ashes and rubbish considered very objectionable’, and the dry-earth closet was in a most defective state.¹¹⁹ The Immigration Depot was stated as being ‘unfit for habitation’. The Police Station had ‘cesspits about 12 feet from kitchen’. The Post Office and Residence had ‘Large cesspit, two entrances, within 17 feet of well’. The Railway Station had ‘3 earth closets, all of which were broken and useless’. The Telegraph Office had a ‘Well within 15 feet of cesspit, and unfit for use’. The Boys State School, North Toowoomba, had ‘one closet used by the boys of the school (about 200)’. Girls School had ‘One closet here, also with an average attendance of 200 girls and infants’. The Gaol was the only public building that

¹¹⁸ *ibid.*

¹¹⁹ *ibid.*

received an overall rating of ‘excellent condition, everything clean and tidy’. The Grammar School was considered ‘in excellent order’ with the exception that there was no apparent provision for the closets to be cleaned.¹²⁰ Members of the Board were shocked at what they found and in their report they stated: ‘The wonder is, not that there has been so much fever, but that there has been so little’.¹²¹

The report by the Board dated 26 April 1878 presented to both Houses of Parliament on Thursday 9 May 1878 concluded that the causes of typhoid fever at Toowoomba were drought, well water contamination, total neglect of ordinary cleanliness, and ignorance.¹²² Their recommendations were:

- The Proclamation of the district under “*The Health Act of 1872*.”
- The nomination of a medical gentleman, either as a member or an officer of the Local Board of Health, and the appointment of a qualified Inspector.
- The total abolition of all cesspits.
- The substitution of the dry-earth system.
- The proper disposal of slop water
- The stopping of the present well-water supply, and the immediate use of reservoir water or rain water.
- The supervision of Chinamen’s gardens.
- The banishment of all pigs from within the municipality.
- The registration of disease.
- The instruction of the young at school.¹²³

The Board suggested that if the above recommendations were adopted then typhoid fever would be suppressed in the future. Enid Barclay in her thesis stated that the government delayed proclamation of Toowoomba under the Health Act,¹²⁴ but the Municipality of Toowoomba came under *The Health Act of 1872* by a Proclamation dated 17 May 1878 for a period of six months. An announcement appeared in *The*

¹²⁰ *ibid.*

¹²¹ *ibid.*

¹²² *ibid*; *Chronicle*, Saturday, 11 May 1878, p. 3.

¹²³ *ibid.*

¹²⁴ Barclay, *op. cit.*, p. 102.

Darling Downs Gazette on Wednesday, 22 May 1878 stating that ‘the provisions of the Central Board of Health have been extended to Toowoomba’.¹²⁵ The Proclamation was renewed for a further six months on 15 November 1878.¹²⁶ Now that Toowoomba was under the Health Act the Municipal Council appointed a Local Board of Health at the next Council meeting.¹²⁷ However, the *Toowoomba Chronicle* was far from pleased about the implementation of the Board’s recommendations and reported that it had been rumoured that ‘no further action is to be taken to improve the sanitary condition of the town on the ground that the Municipal revenue is small, and will not bear the expense necessary to save human life and prevent contagious diseases’. It was also pointed out that if the Local Board of Health refused to perform its duties then the Central Board of Health in Brisbane, having been gazetted and approved by Parliament as part of the Health Act, could undertake the required duties and have the incurred expenses paid by the Municipal Council.¹²⁸ The editorial finished by saying:

If they neglect or refuse to act on the Board it will be the duty of the inhabitants to call to their assistance the Central Board at Brisbane.¹²⁹

The report of the Board Inquiry into typhoid fever had been well received in the community and the *Toowoomba Chronicle* wanted to ensure that the Municipal Council made sanitary reforms a priority. *The Brisbane Courier* devoted an editorial to the report and discussed the findings in detail and stated that recommendations made in the report ‘deserved the attention of sanitary authorities, as well as of the

¹²⁵ *The Darling Downs Gazette*, Wednesday, 22 May 1878, p. 3.

¹²⁶ QSA: Minutes of Executive Council, 14 November 1878, EXE/E42 Item PRV812/1/42, File No. 78/86.

¹²⁷ *Chronicle*, Thursday, 20 June 1878, pp. 2-3.

¹²⁸ *ibid.*

¹²⁹ *ibid.*

public generally'.¹³⁰ However, *The Darling Downs Gazette* did not accept that the typhoid fever epidemic was as bad as was being reported in the *Toowoomba Chronicle*, when in a sub-editorial (before the report was presented to both Houses of Parliament) they insisted that the amount of sickness occurring in Toowoomba was exaggerated.¹³¹ In response to the Editorial two letters were published, one from S G Stephens, Honourable Secretary of Drayton and Toowoomba Cemetery, and the other from 'Paterfamilias', a member of the public who resided outside of Toowoomba, but conducted business in the town. Both agreed that the amount of sickness was exaggerated and attacked Groom and the *Toowoomba Chronicle* for their sensationalism.¹³² However, in the returns detailing the total number of deaths registered in Toowoomba District for enteric diseases (diarrhoea, dysentery, and typhoid fever) for the year 1874 there were 24 deaths (17%) from a total of 140 deaths registered; in 1875 there were 65 deaths (28%) from a total of 229 deaths registered; in 1876 there were 24 deaths (14%) from a total of 173 deaths registered; in 1877 there were 40 deaths (21%) from a total of 189 deaths registered; and in 1878 there were 41 deaths (37%) from a total of 112 deaths registered (refer to Appendices 3 & 4). These returns indicate that the typhoid fever crisis was not exaggerated but indeed very serious. What is clear from the evidence, despite the debate led by *The Darling Downs Gazette* is that critical health issues such as urban pollution require effective government regulation to ensure that businesses and residents meet basic standards. The proclamation of Toowoomba under the Health Act was a victory for Groom as he had been campaigning consistently over a long period of time and finally his efforts were rewarded. The *Toowoomba Chronicle*

¹³⁰ *The Brisbane Courier*, Thursday, 16 May 1878, p. 2.

¹³¹ *The Darling Downs Gazette*, Wednesday, 1 May 1878, p. 3.

¹³² *The Darling Downs Gazette*, Saturday, 4 May 1878, p. 5; Wednesday, 8 May 1878, p. 3; Wednesday, 29 May 1878, p. 3; Saturday, 1 June 1878, p. 4.

continued to keep a vigilant eye on the Local Board of Health and over the next few months published Letters that found the Board wanting.¹³³

The sixth recommendation by the Inquiry Committee to stop using well water and to use reservoir or rain water instead was implemented by 1880.¹³⁴ Historian Bob Dansie noted that ‘water was pumped from the underground aquifers along the bed of west Creek’.¹³⁵ The demand for more water a few years later resulted in a reservoir being constructed to impound the spring water at Kearney’s Springs, and a pipeline laid to the reservoir in Stephen Street’.¹³⁶ Near the end of the nineteenth century there were at least two water schemes evaluated but were abandoned because of the economic cost and the realization that neither scheme would ‘yield sufficient water’.¹³⁷ Therefore, the water supply to Toowoomba continued to be from the underground aquifers ‘associated with the east and west branches of the headwaters of Gowrie Creek until the completion of the Cooby Creek Dam in 1940’.¹³⁸ However, the Committee did make the point that ‘when the germs are conveyed by water, the infection is much more certain’ indicating a shift towards the new science discovery of Pasteur’s germ theory but not a total acceptance of its validity.

The seventh recommendation by the Inquiry Committee was for an Inspector to supervise Chinese market gardens.¹³⁹ The Chinese were very experienced in growing fruit and vegetables and chose environments of ‘banks of rivers and creeks

¹³³ *Chronicle*, Saturday, 22 June 1878, p. 3; Tuesday, 2 July 1878, p. 3; Tuesday, 6 August 1878, p. 3.

¹³⁴ *Votes and Proceedings*, 1878, Vol. 11, p. 770.

¹³⁵ B. Dansie, *A short history of Gowrie Creek*, (Toowoomba Q: Toowoomba City Council, 1998), p. 4.

¹³⁶ *ibid.*

¹³⁷ *ibid.*

¹³⁸ *ibid.*

¹³⁹ *Votes and Proceedings*, 1878, Vol. 22, p. 770.

and in swampy areas close to the tiny towns of southern inland Queensland'.¹⁴⁰ The Chinese market gardeners in Toowoomba cleared and drained the boggy swamps area and set up viable methods of growing fruit and vegetables. One such method was to make liquid manure from the contents of cesspits and to distribute the manure over the garden beds. This practice was brought to the notice of the Inquiry Committee and they concluded that the 'manufacture of fluid manure' should be avoided because of the considerable danger to health of the community. It was also recommended that the establishment of Chinese market gardens should not be permitted in 'close proximity to thickly populated portions of the town'.¹⁴¹ Since human manure would have been a source of pathogens it was an important recommendation, but it raises the question of why the Committee had not opposed the disposal of nightsoil in Queens Park as the area was a site for recreational use and in close proximity to a residential location.

Despite the new water arrangements and the supervision of the Chinese market gardens, and these were indeed good measures, the problem of water contamination and the spreading of germs continued in Toowoomba resulting in another outbreak of typhoid fever in 1884.

THE OUTBREAK OF TYPHOID FEVER 1884

There were early indications that typhoid fever was far from being under control. In 1880 the Registrar-General's Report – Vital Statistics stated that the number of

¹⁴⁰ A. Fisher, *The forgotten Pioneers: The Chinese in Southern Inland Queensland (1848 to Circa. 1914)*, Master of Arts in Asian Studies Thesis, University of Southern Queensland, p. 38.

¹⁴¹ Dansie, *Gowrie Creek*, p. 20.

deaths from typhoid fever in 1879 were 99 in the colony of Queensland.¹⁴² For the Toowoomba Municipal Council indication that trouble was looming was when in June 1883 the McIlwraith government refused to extend the provisions of the Health Act to Toowoomba. Shortly after this refusal a change of government occurred and when the new government came to power the Municipal Council tried again. On 7 January 1884 it sent a communication to the Colonial Secretary's office to have the bye-laws – sent to the Colonial Secretary in October the year before – confirmed by the Governor-in-Council. Unfortunately, there was no reply to this communication either. Without the approval of the bye-laws the Municipal Council was powerless to enforce the removal of dangerous nuisances.¹⁴³

Nevertheless, what was encouraging since the 1878 report into typhoid fever was the attention paid to the schools in the area, in particular, the closets. In the Legislative Assembly the report, 'Schedule of the Buildings and Repairs effected by the Education Department during the years 1882 and 1883', showed that the Toowoomba South and Toowoomba North Schools underwent repairs to the closets.¹⁴⁴ The Education Department appeared at least to be taking responsibility for the health of children in its care.

Unfortunately, this was not enough to stop another outbreak of typhoid fever and in January 1884 the situation was brought home to the community through an article in the *Toowoomba Chronicle* about a family in an appalling situation due to sickness. The newspaper called upon the Ladies' Benevolent Society to help them as the family lived in a 'hut', the father was in hospital with fever, the mother and her

¹⁴² *Votes and Proceedings*, 1880, Vol. 22, p. 149.

¹⁴³ *Chronicle*, Tuesday, 22 January 1884, p. 3.

¹⁴⁴ *Votes and Proceedings*, 1884, p. 1348.

fifteen year old daughter were also stricken but were at home and had responsibility for seven or eight other little children. The only income the family had was from one of the young children who earned 8s. a week.¹⁴⁵ On this occasion both newspapers were in agreement and supported this stricken family by making the community aware of their plight and that typhoid fever was a threat to the community once again.¹⁴⁶

Dr Thomas Garde reiterated the view that typhoid fever was indeed well established in Toowoomba in a Letter to the Editor of the Toowoomba *Chronicle*:

Now that typhoid fever has fairly established itself in the town, and almost assumed the form of an epidemic, it is quite time that the municipal body (who now represent the Board of Health) should awake from their long sleep, and do something to improve the sanitary condition of the town, and so protect our inhabitants from the dangers of so tedious and fatal a disease.¹⁴⁷

It was inevitable that typhoid fever would present itself again given the inadequacies of the 1878 inquiry report. The recommendation of earth closets was only a small improvement on a huge problem, and in time increased the night soil problem. What was required to ensure that typhoid fever never reached epidemic proportions again was a proper sewerage system for the city. Consequently, the Toowoomba community was going through the same situation as they had in 1878.

At the monthly meeting of the Municipal Council in February the Nuisance Inspector reported that during his usual visits he found ‘that the earth closets were not properly supplied with earth, and that night-soil men did not supply it’. He said that a ‘great

¹⁴⁵ *Chronicle*, Tuesday, 8 January 1884, p. 2.

¹⁴⁶ *Chronicle*, Saturday, 12 January 1884, pp. 2-3; Saturday, 19 January 1884, p. 3; Thursday, 24 January 1884, p. 2; Tuesday, 1 April 1884, p. 2; Saturday, 19 March 1884, pp. 2-3.

¹⁴⁷ *Chronicle*, Tuesday, 22 January 1884, p. 3. A number of Letters to the Editor were published in the newspaper from Dr Garde and Mr Thomas Hawkins over the next few publications.

deal of dissatisfaction existed between the night-soil men and the ratepayers, but until the new bye-laws were passed he should do nothing'.¹⁴⁸ However, there were occasions when the Municipal Council was able to bring to bear its powers and this was illustrated in the case of George Macintosh, a night soil contractor who was summoned under the 65th section of the Municipal Bye-law, No. 7, for causing to be deposited on his premises a quantity of filthy matter detrimental to the public health. The case was brought to the police court in February 1884 and the Bench fined Macintosh £4, and all costs amounting in the total to £6.19s.¹⁴⁹ The matter was discussed at the March Municipal Council meeting and Alderman Campbell considered it was time that some restriction was put on Macintosh. However, the Mayor stated that as soon as the bye-laws were confirmed they would have the required powers to deal with night soil contractors such as Macintosh. It was at this time that the Toowoomba Hospital Committee released its report and revealed that during January, of the 20 cases of typhoid fever admitted to hospital one death had occurred. In February there were four deaths due to typhoid fever of the 21 cases admitted.¹⁵⁰ The next monthly meeting held in April revealed that in March one death had occurred due to disease out of the 10 cases admitted to hospital. It was noted 'that [there was] a considerable decrease as compared with the number of admissions from the same cause the two previous months'.¹⁵¹ Even though the number of people admitted to hospital with typhoid fever had decreased Groom was not satisfied that the crisis was over and on 28 April 1884 he sent a telegram to the

¹⁴⁸ *Chronicle*, Thursday, 14 February 1884, p. 2.

¹⁴⁹ *Chronicle*, Saturday, 1 March 1884, p. 2.

¹⁵⁰ *Chronicle*, Tuesday, 11 March 1884, p. 2.

¹⁵¹ *Chronicle*, Tuesday, 22 April 1884, p. 2.

Colonial Secretary with a passionate plea for the confirmation of the bye-laws:

I respect to say that in consequence of the nonconfirmation of the byelaws sent to the Colonial Secretary office in October and the withdrawal of the proclamation extending the health act to Toowoomba Typhoid fever is again prevalent and the earth closets are in a most disgraceful condition. When will byelaws be confirmed. [signed] W H Groom Mayor¹⁵²

He firmly believed that the dreadful condition of the earth closets were the contributing factor for the outbreak of the disease, and he was clearly very frustrated with the government for delaying confirmation of the bye-laws. It is not known how much influence Groom's telegram had, but at the May monthly meeting of the Municipal Council it was noted that correspondence had been received from the Colonial Secretary's office stating that the new bye-laws had been approved by his Excellency the Governor-in-Council.¹⁵³

By this time the disease had infected many residents. R Aland, MLA was reported in the *Toowoomba Chronicle* as being 'confined to his bed from an attack of fever, partaking very much of typhoid' and Leonard G Board, formerly with the Toowoomba Lands Office and Land Commissioner for Gympie and Maryborough, was a 'victim to typhoid fever ... [he] is unfortunately an addition to the already lengthy list of local officials stricken down by typhoid fever'.¹⁵⁴ At the May meeting of the Toowoomba Hospital it was reported that a fifteen-year-old girl had died of the disease, and for the period 1 May to 12 May nine cases of typhoid fever had been admitted to the hospital.¹⁵⁵ It would appear that Groom's view that the typhoid fever

¹⁵² QSA: In-telegram, W H Groom to Colonial Secretary, 28 April 1884, COI/A388, Item No. 3112.

¹⁵³ *Chronicle*, Thursday, 8 May 1884, pp. 2-3.

¹⁵⁴ *Chronicle*, Tuesday, 13 May 1884, p. 2. Confirmation of the bye-laws was published in *the Supplement to the Queensland Government Gazette*, Vol. XXXIV, No. 72, Tuesday, 29 April, 1884, pp. 1295–1314.

¹⁵⁵ *Chronicle*, Tuesday, 13 May 1884, p. 2.

crisis was not over was correct. Now it was up to the Council to ensure that sanitary reforms were put in place as quickly as possible.

While the Municipal Council and the community were waiting for the bye-laws to be confirmed by the government, a debate was occurring between two very prominent members of the community, Dr Thomas Garde a medical practitioner, and Thomas Hawkins a former alderman, through Letters to the Editor at the *Toowoomba Chronicle*. Garde's first letter was published on 22 January 1884 with a complaint about the storage of hides, their state of decomposition and the putrefying gases emanating from the rear of the tannery premises of a J S McIntyre in the centre of town.¹⁵⁶ On 24 January 1884 Hawkins in his letter refuted Garde's allegations and called him 'the scared physician'.¹⁵⁷ Then on the 26 January 1884 Garde's letter said he had witnesses to the dreadful state of the hides and the stench that accompanied them.¹⁵⁸ The letters continued and came under the heading of the 'Hide Case' with the occasional letter in support of Dr Garde's allegations.¹⁵⁹ However, as soon as the Municipal Council received confirmation of the approval of the bye-laws seven members of the Council met on Thursday morning 15 May 1884 and proceeded to inspect the rear of McIntyre's establishment. The premises were found clean and devoid of anything offensive; nevertheless, the Council members realised that there was potential for offensive smells and a nuisance to those residing in the vicinity and advised McIntyre to remove the hide house to another locality. He promised to comply with this suggestion.¹⁶⁰ Approximately two weeks after this

¹⁵⁶ *Chronicle*, Tuesday, 22 January 1884, p. 3.

¹⁵⁷ *Chronicle*, Thursday, 24 January 1884, p. 3.

¹⁵⁸ *Chronicle*, Saturday, 26 January 1884, p. 7.

¹⁵⁹ *Chronicle*, Saturday, 26 January 1884, p. 7. As well as Dr Garde's letter there was another Letter to the Editor signed Alexander & Munro; Thursday, 15 May 1884, p. 3; Tuesday, May 20, 1884, p. 2.

¹⁶⁰ *Chronicle*, Saturday, 17 May 1884, p. 2.

Council decision a Letter to the Editor was published in the *Toowoomba Chronicle* that was very blunt, but powerful in its words about the sanitary condition of the town. The writer, signed as 'Viator', appealed to the Council as sensible and experienced men controlling the affairs of Toowoomba to undertake sanitary reform in the interests of 'the health of nine or ten thousand people'.¹⁶¹

The debate that was taking place in the newspaper was also extended to the Municipal Council when at the June meeting of the Municipal Council a number of ratepayers wrote to the Council complaining about the 'abominable stench arising from the night-soil depot'. The Nuisance Inspector supported the ratepayers and stated in his report that the situation was out of control. It was decided that every aspect of the Nuisance Inspector's report should be acted upon and a special committee of three aldermen was appointed. The Committee was to report to the Council at the next meeting. There was correspondence from the Under-Secretary of Public Instruction pointing out that the state school earth closets were neglected and in a filthy state. The Town Clerk replied that the contractor responsible was advised that if such neglect continued 'the bye-laws would be enforced'.¹⁶² The confirmation of the bye-laws appears to have given the Municipal Council confidence; however, for people stricken with typhoid fever it was too late. In the report of the monthly meeting of the Hospital Committee for May it was noted that, of the 16 people admitted with the disease, three had died.¹⁶³

¹⁶¹ *Chronicle*, Thursday 5 June 1884, p. 3.

¹⁶² *Chronicle*, Tuesday, 3 June 1884, p. 3.

¹⁶³ *Chronicle*, Saturday, 14 June 1884, p. 2.

From June onwards the number of patients admitted to hospital with typhoid fever began to decrease.¹⁶⁴ However, the Municipal Council continued to deal with sanitary reform and members of the community continued to write to the newspaper about unsavory sanitation conditions. This type of public advocacy was essential to promote sanitation reform and ensure the public health of the community, but it needed a campaign with a bolder vision and one prepared to tackle the expense of a sewerage system for the city.

CONCLUSION

If ever there was an example of a beautiful pristine environment suffering the effects of development, Toowoomba in the 1860s, 70s, and 80s would be the place. The destruction of water holes and swamps due to urbanization resulted in typhoid fever running rampant in Toowoomba during this period. The agenda of the Queensland Colonial Government during this time was for development as quickly as possible, with a low priority for public health matters. This lopsided governance was a dangerous mix for the community of Toowoomba.

Fortunately, for Toowoomba they had a strong and powerful advocate for public health in William Groom, Toowoomba's first mayor and a Member of Parliament. He was also the owner of the local newspaper *The Toowoomba Chronicle* from 1874 and he used his political connections and his newspaper to campaign for public health reform at every opportunity. He supported development and regional growth, but realised that development and public health issues had to be considered and addressed together, not one without the other.

¹⁶⁴ *Chronicle*, Tuesday, 15 July 1884, p. 3; Tuesday, 12 August 1884, p. 2.

At the same time the Queensland Colonial Government's cautious approach to public health put many people at risk of contracting typhoid fever especially in Toowoomba. The development of the Ipswich to Toowoomba railway line resulted in an influx of emigrant navy labourers to the region to be housed in camps along the line. Sanitation was poor and fresh water supplies inadequate and many people were struck with typhoid fever. The ripple effect set in as most of these people were sent to the Toowoomba Hospital for care, and the hospital was not equipped to cater for such large numbers of patients.

Toowoomba's dependence on wells for fresh water supplies and its reliance on cesspits was disastrous. Cesspits polluting groundwater, wetlands and Gowrie Creek and businesses disposing of their waste into the local wetlands resulted in water supplies being contaminated and the risk of outbreaks of typhoid fever were a continued threat to the community.

In 1878 Toowoomba was gripped by an epidemic of typhoid fever and it was through the persistence of William Groom that an Inquiry was instigated to look into the cause of the outbreak. Unfortunately, the Inquiry Committee, still under the influence of miasmatic theory, lacked the vision and courage required to recommend the necessity of a proper sewerage system for the town. Its Report made some important recommendations for ensuring that typhoid fever epidemics did not occur in the future, but not all were implemented, many people lost their lives, and typhoid fever continued to be a threat to the people of Toowoomba for many years to come.

CHAPTER 3

TYPHOID FEVER IN COLONIAL BRISBANE

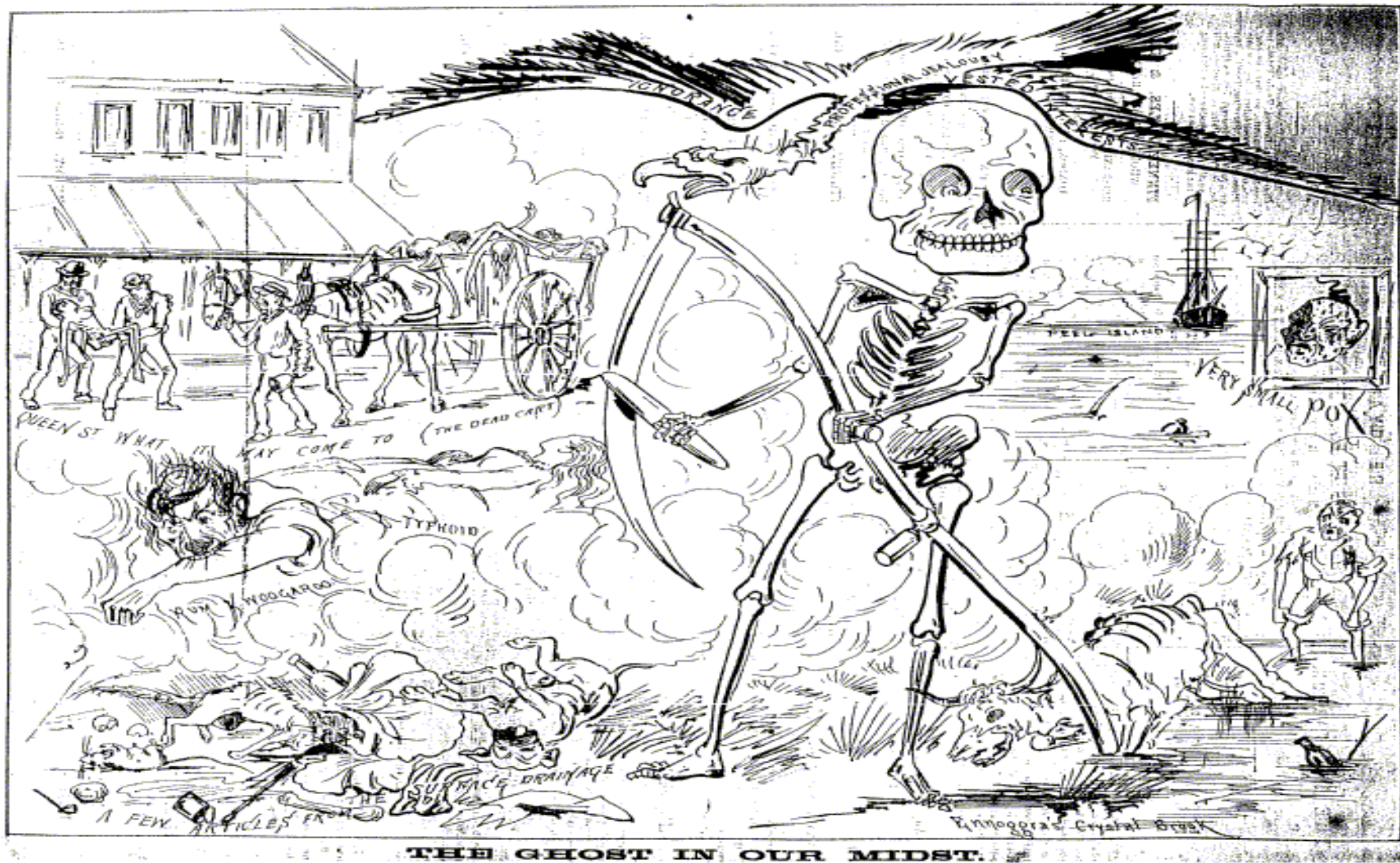
Typhoid fever [is] a permanent plague in most towns of the colony.¹

This was how typhoid fever was described in an editorial of *The Brisbane Courier*. The editor used the scenario of typhoid fever as an example of what happened when living conditions of ‘dirt and overcrowding’ were not addressed. What circumstances had occurred in Queensland and, in particular, in Brisbane during the period 1859 to 1885 for the editor to accept that typhoid fever was a ‘permanent plague’ especially when in 1859 public health was relatively good? The answer can be found in the rapid growth in population and industry during this period, and the geographical layout of Brisbane being marked by hills, gullies and creeks, plus the environmental conditions that developed due to such growth.

Brisbane faced as many problems as Toowoomba did when it came to typhoid fever. The infrastructure development was slow due to the Queensland Colonial Government’s cautious approach. Sanitation and its management, particularly in the sub-tropical conditions of Brisbane, were always at the forefront for Brisbane municipal councils. The community of Brisbane with the support of *The Brisbane Courier* was as vigilant as the Toowoomba community and its newspaper *The Toowoomba Chronicle* when it came to typhoid fever and the health of the people. As discussed in Chapter 2 Toowoomba had a major advocate in William Groom who also owned the newspaper *The Toowoomba Chronicle*, and Brisbane had at least two advocates who were medical men and Members of Parliament: Dr Henry Challinor - even though he was the Member for Ipswich he was an advocate of public health for

¹ *The Brisbane Courier*, Friday, 11 December 1885, p. 4.

TYPHOID FEVER IN THE MIDST OF BRISBANE



Source: *Queensland Figaro*

Brisbane and the whole Colony; and Dr Kevin O'Doherty, Member for North Brisbane. Along with these Members of Parliament two other prominent doctors of Brisbane were advocates of public health - Dr John Thomson, visiting surgeon to the Brisbane Hospital, and Dr Kearsley Cannan, the surgeon-superintendent of the Lunatic Asylum at Woogaroo.

The themes for this chapter are highlighted in a *Queensland Figaro* cartoon titled 'Typhoid Fever in the Midst of Brisbane' published on Saturday, 15 September 1883 (refer to cartoon on page 113). The death cart and its inscription - 'Queens St, What it may come to' - is a melodramatic prediction of the 1884 typhoid fever epidemic. The depiction of death from typhoid and the words 'Rumy Woogaroo' referring to Woogaroo Asylum reflect the potential for the spread of typhoid in government-run institutions where citizens were forced to congregate such as the prison system, schools and Diamantina orphanage. The powerful bird with the label 'Ignorance Professional Jealousy Vested Interests' alludes to 'Ignorance' within the community and their opposition to the Fever Hospital at Green Hills, and the 'Ignorance' of the Colonial Secretary, Sir Thomas McIlwraith in refusing to acknowledge the danger to public health caused by the manure depot. 'Professional Jealousy' is to the fore in the debate over treatment of typhoid fever patients among the medical profession, and 'Vested Interests' sums up the buck-passing between the Central Board of Health and the Local Board of Health. 'A few articles from the surface draining' shows a dead dog and other nuisances referring to the risk to the community for the spread of typhoid fever from dumping refuse into water-ways.

This chapter discusses these themes. It first of all outlines the development of Brisbane and the state of its hospital facilities. This is followed by the sanitary standard of Brisbane institutions, the epidemic of 1884 and the environmental factors that contributed to it. Next it explores the inadequate response of governments to the crisis, and lastly the success of medical treatment in its aftermath.

Responses to typhoid fever were affected by two overarching factors; changes in medical knowledge and near economic collapse. Sir Raphael Cilento described the period of 1859 (the time of separation from New South Wales) to 1894 as a period 'of scientific discovery, clarification, and medical organisation'.² It was also a time of sickness, particularly typhoid fever, and death. The scientific discovery that Cilento referred to was Pasteur's germ theory as discussed in Chapter 1, and the clarification was the discovery of the typhoid fever germ in 1880 by Dr Karl Erberth³ who established the disease as a bacterial infection.⁴ There were many other medical discoveries during this period such as the source of tuberculosis in 1882 and bubonic plague in 1894.⁵ Cilento's reference to medical organisation was the passing of legislation in the Queensland Parliament in 1861 proclaiming that qualified medical practitioners were required to register with the Medical Board to enable them to practice in the colony of Queensland.⁶

² R. Cilento, 'Medicine in Queensland, Part 1: (1824-1894)', *Royal Historical Society of Queensland*, Vol. 6, No. 4, 1961-62, p. 897.

³ R. McGrew, *Encyclopedia of Medical History*, (London: The Macmillan Press Ltd, 1985), p. 349.

⁴ R. Patrick, *A History of Health & Medicine in Queensland 1824-1960*, (St Lucia Q: University of Queensland Press, 1987), p. 193.

⁵ Cilento, *op. cit.*, p. 898.

⁶ Patrick, *Health & Medicine*, pp. 39-40.

George Bowen, Queensland's first Governor, complained of 'having only 7½d. in treasury'⁷ and, as historian W Ross Johnston points out, the situation was even worse because the New South Wales Government passed on a debt for public works already carried out in the northern regions of Queensland amounting to £20,000.⁸ However, what the Queensland colony did have was plenty of crown land and in 1859 there were approximately two million sheep, 30,000 cattle and 20,000 horses;⁹ pastoralism would drive Queensland's economy.¹⁰ There being only a small number of 'smooth-surface' roads outside of populated areas such as Brisbane and Toowoomba the government believed that the development of a railway network was absolutely vital to the growth and development of the colony.¹¹ The government was not in a position to finance such a project, but it was not averse to borrowing money to ensure that the construction of the railway took place. Funds were obtained from the British bank Agra and Masterman and the work on the line from Ipswich to Toowoomba began. However, in 1866 major European financial houses collapsed including the British bank Agra and Masterman.¹² This collapse had regional repercussions as discussed in Chapter 2. This was a huge blow to Queensland as the colony was now threatened with bankruptcy.¹³ The Government had to curtail projects and arrange for new loans to get out of trouble. It was absolutely vital for the government to proceed ahead in a responsible and cautious manner and this approach was supported by some members of the community as was evidenced in

⁷ W. Ross Johnston, *The Call of the land: A History of Queensland to the Present Day*, (Milton Q: The Jacaranda Press, 1982), p. 95.

⁸ *ibid*; R. Fitzgerald, *From the Dreaming to 1915: A History of Queensland*, (St Lucia Q, University of Queensland Press, 1982), p. 127.

⁹ J. Scott, R. Laurie, B. Stevens, and P. Weller, *The Engine Room of Government: The Queensland Premier's Department 1859-2001*, (St Lucia Q: University of Queensland Press, 2001), p. 1.

¹⁰ Fitzgerald, *op. cit.*, p. 127.

¹¹ *ibid*, p. 263

¹² Scott *et al*, *op cit.*, p.17.

¹³ *ibid*; Fitzgerald, *op cit.*, p. 128; Johnston, *op cit.*, p. 98

Letters to the Editor of *The Brisbane Courier*, for example, a letter published on Monday, 28 May 1866 signed by ‘Finance’ wrote:

So much has of late been written about the financial condition of Queensland that I expect your readers are nearly full *ad nauseum* of it; but ... every one seems to agree that our financial position is such as to require the greatest caution to prevent us from drifting helplessly on the rock of debt.¹⁴

As the author indicated, *The Brisbane Courier* reported on the financial crises of the colony of Queensland on a regular basis through editorials and Letters to the Editor. Unfortunately for the people of Brisbane it was in this economic environment that typhoid fever was becoming more prevalent.

Adding to the capital’s problems was rapid population growth without matching infrastructure development (refer to Table 3.1).

Table 3.1 Population for Census District of Brisbane

Census District	1871 Persons	1876 Persons	1881 Persons	1886 Persons
Brisbane	18,455	26,953	31,109	51,689

Source: Queensland, 1877 Fifth Census of Queensland, 1876, p. 61, Queensland, 1882, Sixth Census of the Colony of Queensland, 1881, p. 9; Queensland, 1887, Seventh Census of the Colony of Queensland, 1886, p. 11.

Brisbane’s occupational profile indicated much larger white collar and industrial sectors, and a smaller rural workforce, in comparison with Toowoomba. As mentioned in Chapter 2 the recording of such data was different in 1876 to that of 1881 and 1886 (refer to Tables 3.2 and 3.3 on page 120).

¹⁴ *The Brisbane Courier*, Monday, 28 May 1866, p. 3.

Table 3.2 Category of occupations in Census District of Brisbane, 1876

1876	Principal Officers	Accountants, Clerks, etc	Messengers, Labores, etc.	Police	Unspecified	Railway, Post Office, & Telegraph Clerks	Railway, Post Office, & Telegraph Mechanics	Railway, Post Office, & Telegraph Laborers	Law	Medicine	Divinity	Literature, Art, Science, etc
Male	22	214	112	121	16	53	23	65	79	67	49	179
Female	0	46	9	4	0	0	0	0	0	7	26	129

Source: 1877 Queensland Fifth Census of Queensland, 1876, p. 67.

Table 3.3 Category of occupations for the District of Brisbane, 1881 and 1886

Census Year	Professional Class	Domestic Class	Commercial Class	Agricultural Class	Industrial Class	Indefinite and Non-productive Class
1881						
Male	864	6,521	2,076	394	4,321	1,120
Female	340	13,986	58	11	1,130	288
1886						
Male	1,504	8,995	4,547	792	9,373	2,347
Female	490	21,171	181	52	1,903	334

Source: 1882 Queensland Sixth Census of the Colony of Queensland, 1881, p. 162; 1887 Queensland Seventh Census of the Colony of Queensland, 1886, p. 222.

In Brisbane in the nineteenth century typhoid fever was a disease that was known and accepted as inevitable by the government and the community. The difference between the two bodies was that the community refused to accept that everything that could be done was being done to counteract the disease and the government refused to give public health a high priority.

COLONIAL BRISBANE AND POPULATION GROWTH

The 1861 census showed that the European population of Brisbane was 6,051 and by 1881 the number had risen to 31,109 (refer to Table 3.1 on page 119).¹⁵ Such a growth of Brisbane brought with it two major problems for the fledgling Brisbane Municipal Council, that of drainage and sanitation. At the time of separation from New South Wales the 'drainage system was virtually non-existent' as the population had 'relied upon the natural contours of the land to run off the water into the river'.¹⁶ The Council decided to address the most urgent problem areas first before attempting to put in place a systematic drainage plan for the whole of Brisbane. The low-lying area in the heart of the city that sloped down towards the river was considered to be an unbearable nuisance. The layout of the area was 'Queen Street, Albert and Edward Streets [that] ran downhill towards the Gardens, intersected by Elizabeth, Charlotte, Mary, Margaret and Alice Streets which dipped into the hollow from George street', and was referred to as Frogs' Hollow.¹⁷ The environment of Frogs' Hollow was a 'swampy creek that had its source where two gullies met near the

¹⁵ G. Greenwood and J. Laverty, *Brisbane 1859-1959: A history of local government*, (Brisbane Q: The Council of the City of Brisbane, 1959), p. 137.

¹⁶ *ibid*, pp. 174-5.

¹⁷ R. Fisher, 'Old Frogs Hollow: Devoid of interest, or a den of iniquity?' *Brisbane in 1888: The Historical Perspective*, (Brisbane Q: Brisbane History Group Papers, No. 18, 1988). p. 19.

intersection of Albert and Charlotte Streets. It extended south-eastward to Margaret Street where it merged with a tidal creek which led to the river'.¹⁸ The Council had plans and specifications drawn up to place permanent drains in Albert Street, but the contractor did not finish the work so the Council arranged for drains from Albert Street to Margaret Street to join the creek and in time progress to the river.¹⁹ Owing to the failure of the first contractor the work was very costly and even though there was some improvement the drainage problem was not solved due to Frogs' Hollow being 'too low to be drained in this way'.²⁰ The sub-tropical climate of Brisbane with its heavy torrential rain in the summer and regular flooding of the low lying areas was also a factor as to why the drainage system did not work. The area was finally drained and filled in 'to about two metres above the high water mark'.²¹ However, before this work was undertaken the drainage problem became very serious, and in 1866 a severe storm resulted in many premises being flooded. Ratepayers were very angry and blamed the Brisbane Council for their plight and presented a number of petitions to the Council demanding a better drainage system be put in place.²² The Council applied to the Queensland Colonial Government for grants of land to enable them to undertake such work. In the meantime they tried to keep the 'creek bed free from rubbish' by flushing it out on a regular basis.²³ It was a common practice to dump refuse in creeks and channels with the belief that the storm water would carry it away. To add to the confusion of the day the thinking of the Brisbane Council was that drainage and sewerage were the same problem, and it

¹⁸ Greenwood *et. al*, *op cit*, p. 175.

¹⁹ *ibid*, p. 175.

²⁰ *ibid*.

²¹ Greenwood *et. al*, *op cit*., p. 175; Fisher, *op cit.*, p. 19.1

²² *The Brisbane Courier*, Thursday, 2 February 1866. p. 2.

²³ Greenwood *et al*, *op cit.*, p. 176.

was only after a Letter to the Editor appeared in *The Brisbane Courier* in February 1866 that this proposition was challenged:

... we have to decide in *limine* whether the system adopted is to be single or double; in other words, whether our drains shall be sewers to take off the contents of our closets, and also the surface water from our streets, or whether the two requirements shall be kept entirely distinct, each having its separate and respective outlet.²⁴

Even though the Council was open to the suggestion, they did not fully embrace the idea until 1868 when they established two systems - a 'systematic drainage scheme' and a 'sanitary service based on the earth closet principle'.²⁵ The Council was taking its time to come to terms with the drainage and sewerage problems of Brisbane, but they could ill afford the time because of the rate of population growth.

To understand the full implication of the growth in the population and demands on the infrastructure of Brisbane it is important to point out that established industries such as tanneries, sawmills and rope-works were expanding, relocating, or stimulated in some way by new personnel and new capital.²⁶ Hotels and boarding houses were built to accommodate the rising population. Whilst the growth in population and industries was occurring so too was the disposal of refuse such as rubbish, animal carcasses, and night-soil into the water-ways.²⁷ It was the responsibility of the Brisbane Municipal Council to manage the disposal of human effluence, but they were not responsible for animal effluence and there is no indication that such effluence was a means of spreading typhoid fever. It would appear that live animals were only mechanical transmitters of the actual cause of infection, human faeces. Animals such as pigs and dogs will eat human faeces and defecate later on in some

²⁴ *The Brisbane Courier*, Friday 9 February 1866 p. 5.

²⁵ Greenwood *et al*, *op cit.*, p. 177.

²⁶ *ibid*, p. 144.

²⁷ *ibid*, pp. 142 and 180.

other area; therefore, the cause of infection is spread to a broader area. However, animals do not themselves contract typhoid fever.²⁸ It was the disposal of refuses accumulated by humans that was the major concern for the Council, not animal effluence.

The refuse in the water-ways had an ironic twist because members of the public were distressed about the situation but, as Greenwood and Lavery suggest, people ‘were to some extent responsible for their own predicament because they had placed impediments in the creek which prevented the free flow of water’. They also state that the Council was ‘handicapped by the fact that it had no authority to compel removal’.²⁹ As environmental conditions were changed, the creeks and gullies became so polluted that they were a public health risk to the community. Nowhere was this more so than Frogs’ Hollow in the heart of Brisbane where environmental conditions deteriorated dramatically. The area was so bad that the Editor of *The Brisbane Courier* stated; ‘Frog Hollow remains the same lethiferous sink – a forcing-bed of disease’.³⁰ Despite the protests of the community the colonial government delayed the badly needed legislation granting powers to Local Government Authorities to enable them to control the dumping of refuse in the water-ways.

EARLY CONCERNS ABOUT TYPHOID FEVER

Prior to the European financial collapse the government appointed a Select Committee ‘to enquire into the workings of the Hospitals of the Colony, and the

²⁸ Interview with Dr John Copland, Veterinary Scientist, Australian Centre for International Agricultural Research, Canberra, Tuesday, 7 December 2004.

²⁹ Greenwood *et al*, *op. cit.*, p. 176.

³⁰ *The Brisbane Courier*, Friday, 16 September 1864, p. 2.

expediency of framing and passing an Act for the future management of Hospitals'.³¹

It was stimulated by the need to gain an understanding of why many hospital committees in the colony were experiencing financial difficulties.³² (Additional details of the Select Committee were outlined in Chapter 2.) Part of the Select Committee's investigation was the increasing number of fever cases in Brisbane.

Early in Dr Joseph Lansdowne's evidence he was asked if the patients admitted to hospital with fever were actually suffering from colonial fever and he replied, yes. As part of his evidence Lansdowne outlined an endemic form of colonial fever and stated:

It is a local disease, but it is augmented by other features, and it has changed its type from that cause. We get mild remittent forms still here. We have it in a typhoid form, as also in a mild remittent form.³³

He also reported on the nature and location of its spread in Brisbane stating that the disease was not contagious in the same way that scarlet fever, measles and small-pox were, but 'a person who is in bad health is ready to take it' and that there was a great deal of colonial fever in Petrie Terrace.³⁴ The Select Committee was taking the opportunity to find out as much as possible about how serious the fever situation was in Brisbane. Reverend Edward Griffith, a clergyman who resided in Brisbane and a member of the Committee of the Brisbane Hospital, informed the Committee that the increase in the number of fever cases admitted to Brisbane Hospital was putting an

³¹ *Queensland Votes and Proceedings of the Legislative of Assembly*, 1866, p. 1613; *Queensland Parliamentary Debates*, 24 April 1866, pp. 79-82.

³² Patrick, *Health & Medicine*, p. 45.

³³ *Votes and Proceedings*, 1866, p. 1622.

³⁴ *ibid.*

expensive strain on the hospital.³⁵ Another witness, the Honorable John Douglas, MLC, a member of the committee of the Brisbane Hospital, revealed that there was an increase in the number of out-door patients due to ‘a sort of low typhoid fever’ and added that ‘ever since I have been connected with the Hospital I have known of cases of typhoid fever’.³⁶ The Select Committee was looking for answers about the increased number of fever cases. This view was supported in their report when they stated that the disease known as “colonial fever” was traced to the immigrants who arrived in ‘crowded and ill-managed vessels’.³⁷

Although the Select Committee’s final report focused on an institutionalized system of charity for the colony two of its recommendations had reform implications for the colony’s hospitals:

That it should not, when avoidable, form part of the functions of a Hospital Committee to administer other than medical relief; and ... in all cases where it may be deemed necessary to relieve, such relief should be given in the shape of cheap and wholesome rations rather than by way of orders upon tradesmen.

That it is highly desirable a Bill be introduced to amend and consolidate the Acts now in force, and make better provision for the management of Hospitals. Your Committee have had such a measure under their consideration, and hope that it may be ready for introduction at an early day.³⁸

The Chairman of the Select Committee, William Groom, tabled the report in the Colonial Queensland Parliament on Thursday, 12 July 1866.³⁹

³⁵ *ibid*, p. 1628; Reverend Edward Griffith was the father of Sir Samuel Griffith the premier of Queensland from 13 November 1883 to 13 June 1888, and 12 August 1890 to 13 March 1893. Reverend Griffith dedicated his life to working as a pastor and an evangelist, and so contributed to the social structure of the city where he was dwelling (see Memorials of the Rev. Edward Griffith. By his daughter, R S Hewes & Co., Brisbane 1892, p. 23)

³⁶ *ibid*, p. 1638.

³⁷ *ibid*, p. 1616.

³⁸ *Votes and Proceedings*, 1866 pp. 1616-17

³⁹ *ibid*, p. 1607

The report had ramifications for the funding and management of the new Brisbane Hospital then under construction. The debate that followed the motion to adopt the report focused on the subsidy or grant for the new hospital on Bowen Bridge Road of £20,000. Groom, the Member for Toowoomba, argued that the cost of the hospital raised a serious financial question even though he recommended having the report adopted. The Colonial Secretary, Robert MacKenzie, Member for Burnett, defended the cost by informing the House that included in the £20,000 was a fever hospital and the ‘whole cost of drainage’.⁴⁰ Taking into account that this government was very cautious and reluctant to spend money on health issues MacKenzie’s defence of the cost involved suggests he was concerned about typhoid fever and its effects on the community. Dr Challinor, the Member for Ipswich, agreed with Groom that the cost was great, but he supported the motion to adopt the report.⁴¹ The motion was agreed to and the report adopted,⁴² but the debate showed that while some local members were concerned about public health, on the whole the government was parsimonious. The Select Committee failed to get its recommended legislation passed.⁴³

COMMUNITY DEBATE ABOUT TREATMENT PRIOR TO PASTEUR

The fever hospital that MacKenzie mentioned during the debate in Parliament was not a new concept. As early as 1862 a fever hospital was established at Green Hills⁴⁴

⁴⁰ *ibid*, p. 669

⁴¹ *ibid*, p. 673.

⁴² *Queensland Parliamentary Debates*, 25 September 1866, pp. 664-73.

⁴³ Patrick R, ‘Health Administration 1860-1910’ in Cohen K & Wiltshire K, eds, *People, Places and Policies: Aspects of Queensland Government Administration 1985-1920* (Brisbane Q: University of Queensland Press, 1995), p. 250.

⁴⁴ The area of Green Hills is described by historian Anthony Smith in his article ‘Woolloongabba transported: Its changing face’ in *Brisbane: People, Place and Progress* as the location of Petrie Terrace and Spring Hill; and historian Rod Fisher in his book *Petrie-Terrace Brisbane 1858-1988: ‘Its ups and downs’* portrays the ‘Green Hills’ as ‘the haunt of escaped convicts and marauding Aborigines’.

after an outbreak of fever in August of that year.⁴⁵ The Brisbane Hospital was already overcrowded when the outbreak occurred and the government had instructed the House Surgeon not to admit fever patients as a means of protecting patients already in hospital.⁴⁶ Because of the crisis the Hospital Committee applied to the government for a grant of £350 plus ‘a portion of land, in the rear of the Cricket Ground’ at Green Hills to build a temporary fever hospital to alleviate the pressure from the main hospital.⁴⁷ The colonial government supported the application and the money and land was granted for the fever hospital in October 1862.⁴⁸ The Brisbane Hospital House Surgeon admitted and treated fever patients at the new fever hospital, and the Hospital Committee regularly inspected the premises.⁴⁹ However, the suitability of such a location was questioned by a member of the community in a Letter to the Editor to *The Brisbane Courier* in October 1862:

It was stated in the Municipal Council yesterday ... that the Government have placed the Fever Hospital on the Watershed of the Brisbane reservoir, immediately adjoining the cricket ground, between the Gaol and the populous neighborhood of Spring Hill, and on the hottest side of the valley, where it is entirely shut out from the sea breeze.⁵⁰

This location may have had disadvantages but the Colonial Government needed to respond quickly to the request from the Hospital Committee and the Green Hills location enabled them to do this ‘for the purposes of a temporary Fever Hospital’.⁵¹

⁴⁵ J. Tyrer, *History of the Brisbane Hospital and its affiliates: A pilgrim’s progress*, (Brisbane Q: Boolarong Publications, 1993) p. 85.

⁴⁶ *The Brisbane Courier*, Friday, 16 January 1863, p. 2.

⁴⁷ *ibid.*

⁴⁸ *The Brisbane Courier*, Wednesday, 23 October 1862, p. 2.

⁴⁹ QSA: *Brisbane Hospital – Committee Meeting*, 15 March 1866, HOS1/D, Item PRV5921-1-6. At this meeting it was discussed that the ‘patients could be attended in the same manner as at the late Fever Hospital, allowing the House Surgeon forage and a slight gratuity for the extra services he will have to perform’.

⁵⁰ *The Brisbane Courier*, Wednesday, 23 October 1862, p. 2.

⁵¹ *The Brisbane Courier*, Friday, 16 January 1863, p. 2.

The government accepted that fever patients needed to be isolated from other patients but limited resources meant they were restricted in what they could do; hence the government opted for a short-term measure. The temporary Fever Hospital was referred to as the Little Hospital and throughout various Brisbane Hospital Committee Meeting Minutes the Little Hospital is mentioned. For example, at the Committee Meeting, held on 5 November 1863 an animated discussion took place about the admittance of a fever patient named Anne Hughes who was suffering from scarlet fever. Drs Cannan and Belle, both members of the Hospital Committee, objected to her admittance arguing that the hospital was built for fever of a typhoid character not scarlet fever or measles. Their concern was that if an outbreak of typhoid fever occurred and typhoid fever and scarlet fever cases were admitted to hospital at the same time the ‘result probably would be that those of scarlet fever cases would prove fatal’.⁵² They went on to claim that the ‘misconception on the part of the Committee arose from their not understanding the various forms of fever, as some were almost harmless and others highly dangerous’. Dr Cannan proposed a resolution, seconded by Dr Belle ‘That the case of Anne Hughes, admitted into the fever hospital be not considered a precedent’. The resolution was carried unanimously.⁵³ The Little Hospital continued to operate for a further two years giving priority to typhoid fever patients, and was closed in 1865. Following the closure of the Little Hospital the premises were used as an orphan school in July of that same year.⁵⁴

⁵² QSA: Brisbane Hospital Committee Meeting, 5 November 1863, HOS1/D6, Item PRV5921-1-5.

⁵³ QSA: Brisbane Hospital Committee Meeting, 5 November 1863, HOS1/D6, Item PRV5921-1-5.

⁵⁴ ‘The Brisbane Hospital Annual Meeting for 1865’ in *The Brisbane Courier*, Friday, 19 January 1866, pp. 2 and 3; Tyrer, *op. cit.*, p. 85.

Separate accommodation for fever patients surfaced again early in March 1866 during the typhoid fever outbreak of that year when Dr Joseph Lansdowne, the House Surgeon of the Brisbane Hospital reported to the Colonial Government on 7 March 1866 that a large number of fever patients had been admitted to the hospital and he recommended that these patients be housed in separate premises as many of the fever cases ‘were of a bad type; that there were about 40 altogether’ indicating that an emergency situation had developed.⁵⁵ The response of the Queensland government was confirmed at the Brisbane Hospital Special Meeting on 12 March 1866 by ‘an unsigned memorandum ... received from the Colonial Secretary’s Office’ authorising the Hospital Committee to rent suitable premises that would serve as a fever hospital.⁵⁶ The premises the Committee selected was a building in Petrie Terrace that had been built some months earlier as a public house, but the proprietors were unable to obtain a licence, therefore, they were willing to rent the building to the Hospital Committee for a period of 12 months.⁵⁷ Unfortunately, not everyone was happy with this arrangement, particularly one resident in Petrie Terrace who took his concerns and fears to *The Brisbane Courier*.

Like the response from the Colonial Government the response from the community was very quick as was evidenced in a Letter to the Editor published in *The Brisbane Courier* on Wednesday 14 March 1866:

The occupants of private property ought not to be exposed to such dangers, especially when there are plenty of suitable places farther off from the center of a thickly populated locality.

⁵⁵ QSA: Brisbane Hospital Special Meeting, 12 March 1866, HOS1/D7, Item PRV5921-1-6; *The Brisbane Courier*, Friday, 23 March 1866, p. 2.

⁵⁶ QSA: HOS1/D7, Item PRV5921-1-6 *op. cit.*, 12 March 1866.

⁵⁷ *The Brisbane Courier*, Wednesday, 14 March 1866, p. 2. *ibid*, Monday, 19 March 1866, p. 3.

I trust therefore that the committee will reconsider the step they have taken, if such is their decision, and that the inhabitants of Petrie Terrace will awake, in time to check the impending danger. [signed] E Hooker.⁵⁸

Hooker also wrote to Reverend Edward Griffith the Treasurer of the Committee of the Brisbane Hospital, 'remonstrating against the establishment of a convalescent hospital in Petrie Terrace'. He requested the Committee 'to reconsider their decision'. The Secretary of the Committee wrote to Hooker acknowledging receipt of his letter, but there was no commitment to reconsider their decision.⁵⁹

It would appear that Hooker and other community members believed there was time to protest and therefore influence the Committee about their decision. However, it was not the case because the premises had already been rented and patients were installed into the cottage immediately and upon realising this Hooker acknowledged in another Letter to the Editor, published on Monday, 19 March 1866 that what he thought was a rumor was now an established fact.⁶⁰ This resident was determined not to let the matter rest there and continued to write to *The Brisbane Courier* and the newspaper continued to publish his letters. He was not the only one concerned about the fever hospital being located in a residential area as was evidenced in another letter published on the same day:

They [the hospital authorities] have done what I will be bound to say has never been attempted before in any city in the world. They have established a fever ward in a house having neither fence nor gateway, but standing on a public road in the midst of a populous neighborhood! The house is free of access to any one, at all hours, and not having been designed for such a purpose, presents a spectacle the like of which was never before seen in a civilized community.⁶¹

⁵⁸ *The Brisbane Courier*, Wednesday, 14 March 1866, p. 2.

⁵⁹ QSA: Brisbane Hospital, Committee Meeting, 15 March 1866, HOS1/D7, Item PRV5921-1-6.

⁶⁰ *The Brisbane Courier*, Monday, 19 March 1866, p. 3.

⁶¹ *The Brisbane Courier*, Monday, 19 March 1866, p. 3. This letter was signed 'Up Our Way'.

It is clear from both of these letters that members of the community were not going to accept the establishment of a fever hospital in their area. As well as concern about the fever there was also concern about property values if the fever hospital was to stay and it was this combination that roused the Petrie Terrace residents to form a public meeting 'to consider the best means to be adopted to secure the immediate removal of the Fever Hospital' from the locality of Petrie Terrace.⁶² The meeting was held on Tuesday 20 March 1866 in the Baptist Chapel in Petrie Terrace and was attended by a large and 'enthusiastic audience'. Alderman Jeays chaired the meeting, but it was Hooker who spoke to the meeting and put forward a resolution to be voted upon. He told the meeting he had written to the hospital committee about the fever hospital and received 'a curt reply' to his correspondence and concluded that the matter needed to be raised to 'higher quarters'.⁶³ He also stated he was sympathetic to the plight of the Hospital Committee with the 'numerous cases of disease demanding their care', but in his opinion moving patients from one place to another place was 'a means of spreading the disease rather than staying its progress'.⁶⁴ The resolution that Hooker put to the meeting was as follows:

That this meeting views with fear and alarm the establishment of a convalescent ward for fever patients from the Brisbane Hospital on Petrie Terrace, and resolve that a memorial be drawn up and transmitted to the Executive Government, setting forth its opinions and wishes in the matter.⁶⁵

There was overwhelming support for the resolution with one dissentient and he put forward a request to be allowed to speak to the meeting. He stated that his wife was suffering with colonial fever and he did not believe that the disease was infectious and therefore there were no grounds for people to be concerned or fearful about the

⁶² *The Brisbane Courier*, Wednesday, 21 March 1866, p. 2.

⁶³ *ibid.*

⁶⁴ *ibid.*

⁶⁵ *ibid.*

spread of the disease in the community.⁶⁶ The controversy about whether Colonial Fever was contagious or infectious was debated at this public meeting. *The Brisbane Courier* report stated that a gentleman begged permission to read to the meeting the views of ‘one of the best authorities of the day’ (although it was not stated who this authority was) that ‘all fever without exception was more or less infectious.’ Another speaker told the meeting upon speaking to Dr Kevin O’Doherty (a Visiting Surgeon to the Brisbane Hospital from 1866-1882 and Member for North Brisbane of the Legislative Assembly of Queensland)⁶⁷ he was told ‘that the colonial fever now raging in Brisbane so extensively was infectious.’ This view was supported by a gentleman who stated Dr O’Doherty was attending to his child who was suffering with colonial fever and he was advised to keep his other children away from the patient for fear they may come down with the disease as well. The memorial was drawn up and approximately 50 signatures were collected at the meeting.⁶⁸

The miasmatic theory would have contributed to the concerns of the people attending the meeting about having a fever hospital in their midst. This factor, combined with the disagreement amongst the medical profession as to cause and transmission of the disease, created a sense of danger so that this community protest was more than an expression of what in contemporary terms would be categorized as ‘nimby’ objections.

⁶⁶ *ibid.*

⁶⁷ Tyrer, *op. cit.*, p. 113.

⁶⁸ *The Brisbane Courier*, Wednesday, 21 March 1866, p. 2.

On the same day that the report of the meeting was published in *The Brisbane Courier* there was a more sympathetic editorial about the outbreak of colonial fever, the fever hospital, and residents of Petrie Terrace. It acknowledged that the residents of Petrie Terrace had a grievance that was well-founded as the building ‘originally intended for a public-house, and situated on one of the most salubrious points of “The Terrace” had been rented to the Hospital Committee to be used as a fever hospital. There was also an acknowledgement that colonial fever was rife and was raging all over the city. Nevertheless, it was pointed out that the real sufferers in this situation were ‘the unfortunate people who have been removed’ from the hospital and taken to the fever hospital to convalesce. The editor supported the hospital’s decision about the fever hospital, stating that:

... the Committee of the Hospital acted in accordance with the exigency of the time, and availed themselves of the use of a structure which they considered to be from its position, most fitted to the purposes for which it was required.⁶⁹

The Brisbane Courier was not convinced that colonial fever was contagious or infectious and put its faith in the expertise of the Hospital Committee until proven otherwise. The debate continued and other letters against the fever hospital were published in *The Brisbane Courier*, but the community appeared to have accepted defeat when the response of the Executive Council of the Government to the petition was that ‘it could not legally interfere with the proceedings of the Hospital committee’.⁷⁰

A long term solution was proposed by a deputation from the Brisbane Hospital who waited on the Colonial Secretary and the Minister for Lands and Works later in

⁶⁹ *The Brisbane Courier*, Wednesday, 21 March 1866, p. 2.

⁷⁰ *The Brisbane Courier*, Friday, 23 March 1866, p. 2. There were two letters published in this issue.

March 1866. The response of the Colonial Secretary was to promise ‘to have a Fever Hospital immediately erected at Bowen Bridge and have the drainage of the Hospital attended to, and for the latter purpose a sum of money would be granted’.⁷¹ As a result of this promise Mr Wettenhale the owner of the premises of the fever hospital, requested the Hospital Committee to ‘give up possession of the present Convalescent Hospital rented from him. If Mr Petrie had the new Fever Hospital ready for occupation, possession could be given on the 1st of June’.⁷² While this controversy about fever patients and fever wards was going on the Brisbane Hospital was facing other problems such as the growing population that increased the demands on the hospital resulting in overcrowding in buildings that were old and in a state of decay.⁷³

FACILITIES FOR THE TREATMENT OF TYPHOID FEVER

The inquiry into the management of hospitals of the colony in 1866 found that the Brisbane Hospital was well managed but they did recognise that large demands were made on the hospital by the increased number of patient admissions due to population growth.⁷⁴ There was also an increase in the ‘administration of out-door relief to the sick and destitute of the metropolitan district’.⁷⁵ The Committee went on to say ‘that the Metropolitan Hospital should, as much as possible, assume a national character and be well supported’.⁷⁶ However, the colonial government refused to take full responsibility for Queensland’s main hospital; the ongoing costs

⁷¹ QSA: Brisbane Hospital Committee Meeting 29 March 1866, HOS1/D7, Item PRV5921-1-6; *The Brisbane Courier*, Thursday, 26 March 1866, p. 2; Tyrer, *op. cit.*, p. 87

⁷² QSA: Brisbane Hospital Committee Meeting, 17 May 1866, HOS/D7, Item PRV5921-1-6.

⁷³ Tyrer, *op. cit.*, p. 78.

⁷⁴ *ibid.*

⁷⁵ *Votes and Proceedings*, 1866, p. 1613.

⁷⁶ *Votes and Proceedings*, 1866, pp. 1613-14.

had to be met by subscribers.⁷⁷ The only support the government gave was to meet the costs of furnishings and equipment, and the costs for the provision of an experienced matron and competent nurses.⁷⁸ The government was displaying a guarded approach, but the Brisbane Hospital and the community would pay a heavy price while it did so.

During the early part of the 1870s a struggle between the Queensland government and the elected hospital committee of the Brisbane Hospital developed over the management of the hospital. The situation became very heated in 1872 when ‘after a spirited debate in the Legislative Assembly on the Brisbane Hospital estimates’ the government threatened to place the hospital under its control. It was only after a deputation of hospital representatives consulted with the Colonial Secretary that a compromise was agreed to ‘whereby a joint government and subscribers’ committee would administer the hospital in the future’.⁷⁹ The community on the other hand was not always in agreement with the government or the hospital committee as was evidenced in a Letter to the Editor published in *The Brisbane Courier* in January 1866. The author Samuel Davis suggested that the Board of Management of the Brisbane Hospital did not have the support of the community due to its lack of ‘energy and perseverance’ and the remedy offered was for the Board to ‘canvass the town and suburbs at least once a year for subscriptions and donations’. Davis went on to suggest that ‘good management’ would produce an ‘institution in a position to

⁷⁷ R. Patrick, ‘Health Administration 1860-1910’ Cohen K & Wiltshire K, *People, Places and Policies: Aspects of Queensland Government Administration 1859-1920*, (St Lucia Q: University of Queensland Press, 1995), pp. 250-51.

⁷⁸ ‘Report from the Select Committee on the Hospitals of the Colony, together with the Proceedings of the Committee and Minutes of Evidence,’ *Votes and Proceedings*, 1866, p. 1614

⁷⁹ Patrick, ‘Health Administration’, pp. 253-4.

do a considerable amount more of good'.⁸⁰ However, according to the Annual Reports of the Brisbane Hospital from 1864 to 1867, there was a steady increase in subscriptions and donations although the hospital started 1867 in debt due to increased expenditure in 1866 and the expenditure would continue to increase due to 'an enlarged establishment'. The Committee reported that the Governors of the Brisbane Hospital had applied for a grant from the Government that 'enabled them to carry on the institution'.⁸¹ The hospital maintained its level of subscriptions and donations; however, the increase in population meant that they needed to do better than maintain such levels.⁸²

Table 3.4 Brisbane Hospital

Name of Hospital	Location	Opened	Closed
Convict Hospital	Moreton Bay	1842	1848
Moreton Bay General Hospital	Moreton Bay	1849	1850
Brisbane Hospital	Name change only	1850	1866
Fever Hospital	Green Hills	1863	1865
Brisbane Hospital	Bowen Bridge Road, Herston	1867	Still operating
Fever Hospital (detached from the Brisbane Hospital)	Bowen Bridge Road, Herston	1875	1876

Source: J. Tyrer, *History of The Brisbane Hospital: A Pilgrim's Progress*, 1993; Annual Reports of Brisbane Hospital.

⁸⁰ *The Brisbane Courier*, Thursday, 18 January 1866, p. 3.

⁸¹ *The Brisbane Courier*, Friday, 17 January 1868, p. 3.

⁸² *The Brisbane Courier*, Friday, 22 January 1864, p. 2; Friday, 20 January 1865, p. 2; Friday, 19 January 1866, p. 2; Friday, 18 January 1867, p. 2; Friday, 18 January 1867, p. 2; Friday, 17 January 1868, p. 3; Friday, 29 January 1869, p. 2.

During the 1860s the diseases of diarrhoea, dysentery and fever stretched the resources of the hospital considerably. The Annual Report of the Brisbane Hospital for the year 1863 showed there were 21 cases of diarrhoea of which three people died; 6 cases of dysentery resulting in one death; and from the 5 cases of fever two deaths occurred. In these early days it is hard to know for sure whether the cases of diarrhoea, dysentery or fever were typhoid fever or not as there were problems diagnosing the diseases treated in the hospital, but there was special mention of the establishment of the Fever Hospital at Petrie Terrace and the amount of additional work this created for the House Surgeon of the Brisbane Hospital. In the report for 1865 the number of diarrhoea cases had decreased to 14, with dysentery cases increasing to 15, and fever cases had increased considerably to 38. In the report it was noted that there were 64 deaths, but there was no indication of causes of death. For the year 1865 there was a marked increase in all three diseases: diarrhoea to 23, dysentery to 42 and fever to 61. As in the previous report there were 70 deaths recorded, but not the causes of death. Unfortunately, for the year 1866 the Annual Report published in *The Brisbane Courier* did not include returns of the number of patients treated or the classification of disease. However, there was a large increase in the numbers of deaths that year to 110 with the following clarification:

In reference to the number of deaths which have occurred during the past year, the committee desire to draw attention to the fact that many of these cases are brought in in a dying state, or die before any medical treatment can be of avail.⁸³

As it was indicated in the Hospitals of the Colony Inquiry this was a particularly bad year for colonial fever (typhoid fever), and the rise in the number of deaths would suggest that the increase in the death rate was due to the disease. The Annual Report

⁸³ *The Brisbane Courier*, Friday, 18 January 1867, p. 2.

for the year 1867 reflected on the lower rate of death for that year with 47 deaths recorded, and the report stated that the 'marked difference' from 1866 was due to the 'cessation of immigration' that resulted in 'fewer cases in the very last stage of disease' being admitted to hospital.⁸⁴ The Annual Report for the year 1868 made no reference to the number of deaths or the classification of diseases treated in the hospital that year.⁸⁵

In 1870 the Hospital Committee reported that the Government had issued instructions for a fever hospital to be built consisting of two buildings to accommodate male and female patients. The Committee acknowledged the support and commitment that the Government had shown to the hospital and the patients.

This has long been felt to be a desideratum, and the subscribers are under obligation to the Colonial Secretary (the Hon. A. H. Palmer, Esq.), not only for the promptitude with which the request of the committee was acceded to in this instance, but for his liberal acknowledgment of the claims of the institution on many occasions.⁸⁶

However, in the Annual Report for 1871 there was no mention of a fever hospital being built, and in 1872 the Hospital Committee advised that strong representations were made to the Government to 'afford additional and separate wards for fever cases'.⁸⁷ It would appear that the Government's instructions for a fever hospital were not carried out.

Throughout the 1870s the Hospital Committee was continually faced with cash flow problems. An example of such problems was highlighted in the Annual Report for

⁸⁴ *The Brisbane Courier*, Friday, 17 January 1868, p. 3.

⁸⁵ *The Brisbane Courier*, Friday, 29 January 1869, p. 2.

⁸⁶ *The Brisbane Courier*, Friday, 20 January 1871, pp. 2-3.

⁸⁷ 'Annual meeting of subscribers to the Brisbane Hospital for 1872', *The Brisbane Courier*, Friday, 20 February 1874, p. 4.

the year 1871 when it was noted that on ‘more than one occasion’ the Hospital Committee had difficulty providing funds to make payments of monthly accounts on time. The Hospital Committee depended heavily on the annual Government Grant to ‘administer the affairs’ of the hospital, but the grant was dependent on the number of subscriptions received at the hospital by the general public, and the Hospital Committee reminded subscribers and the public of these conditions set by the government:

The Committee would therefore take this opportunity of impressing upon Subscribers and the public at large the fact, that the annual grant from the Government in aid of the Hospital is available only in proportion to the amount obtained from voluntary contributions. And while the Committee hesitate not to say that this rule should not apply to the Metropolitan Hospital, which, as is shown above, is not merely a local institution, they would at the same time point out the necessity there thus exists that subscriptions should not only be liberal and regular, but also given by a larger and increasing number of persons every year, so as to enable the Committee to administer the affairs of the institution in a manner at once creditable to the capital of the colony, and beneficial to the patients.⁸⁸

The government policy of aligning funding with voluntary contributions was in line with their ideological opposition to state responsibility for health; this cautious approach ultimately shifted the responsibility to the Hospital Committee to acquire their own funding.

By 1874 the Hospital Committee had changed their tack and stated that the Brisbane Hospital was an:

... institution so thoroughly national, and intended to afford relief to every form of human suffering, much expense, as well as forethought and care, is required. Fortunately, the Government have always shown a desire to aid the committee in providing the necessary buildings. The present handsome and costly range of wards and offices, although possessing many advantages are still deficient of conveniences necessary for hospital work. At the

⁸⁸ ‘Annual Meeting of the Brisbane Hospital for 1871’ in *The Brisbane Courier*, Friday, 16 February 1872, pp. 2 and 3.

representation of the committee, the Government are building a new fever ward. Other isolated buildings will be necessary to prevent cases of a contagious character from spreading.⁸⁹

By acknowledging that the Brisbane Hospital was the national hospital for the Colony of Queensland the Hospital Committee hoped the government would provide more support than they were on a day to day basis. The Committee advised that the number of typhoid fever cases had increased by the end of 1874, and in anticipation of a possible epidemic in 1875 they sought funds from the government to build ‘an additional and detached building, suitable for the proper treatment of fever patients’.⁹⁰ Unfortunately, ‘the fever wards were not fit for occupation until the worst form of the epidemic had passed away’.⁹¹ Once again the government was too slow and the typhoid fever patients were the ones to suffer. However, when the wards were finished the Committee acknowledged that they were ‘the most cool and comfortable of the wards, and only require the completion of the servants’ rooms ... and some fixed apparatus, to make the isolation from the rest of the patients as perfect as possible’.⁹² Even though the Committee was willing to acknowledge the help of the government in times of a threatened epidemic, the government was not offering support for the large number of patients treated from country areas, and the Hospital Committee continued to highlight this situation. In 1875 the number of patients admitted to hospital was 962 and 510 were from towns that offered hospital services.

⁸⁹ ‘Annual meeting of subscribers to the Brisbane Hospital for 1874’ in *The Brisbane Courier*, Friday, 19 February 1875, p. 3.

⁹⁰ ‘Annual meeting of subscribers to the Brisbane Hospital for 1875’ in *The Brisbane Courier*, Wednesday, 23 February 1876, p. 3.

⁹¹ *ibid.*

⁹² *ibid.*

In 1876 the number of fever cases had decreased considerably and rather than leave the fever ward empty it was used for female patients. During this year 1033 patients were admitted to hospital with 465 patients coming from country areas. The trend continued in 1877 with approximately ‘one-third of the patients ... from districts beyond Brisbane, many of them having passed several other hospitals on their way to [Brisbane Hospital]’.⁹³

The question of fever wards was raised once again in 1878; since 1876 the old fever wards had been absorbed into the general ward system, but an influx of fever patients from Dalby (109) created a situation of overcrowding with every bed being occupied. In response to this situation an amount of £3000 had been placed upon the Estimates for the following year ‘towards the erection of fever wards’.⁹⁴ The new fever wards were completed in early 1880 at a cost of approximately ‘£5000 (the amount liberally voted by the Legislature)’.⁹⁵ Once again the government had supported the Brisbane Hospital Committee in a time of crisis, but it was still left up to the subscribers to subsidise patients from country areas. In the reports for 1879 and 1880 the number of typhoid fever cases had decreased to such an extent that Brisbane was considered by the Hospital Committee as being ‘comparatively free from fever during the past two years’.⁹⁶ Unfortunately, this situation was not to continue and in 1882 typhoid fever was once again a threat to the Brisbane community. Of the 1461 patients

⁹³ ‘Annual meeting of subscribers to the Brisbane Hospital for 1877’, in *The Brisbane Courier*, Friday, 22 February 1878, p. 3.

⁹⁴ ‘Annual meeting of subscribers to the Brisbane Hospital for 1878’, in *The Brisbane Courier*, Thursday, 20 February 1879, p. 3.

⁹⁵ ‘Annual meeting of subscribers to the Brisbane Hospital for 1879’, in *The Brisbane Courier*, Wednesday, 18 February 1880, p. 5.

⁹⁶ ‘Annual meeting of subscribers to the Brisbane Hospital for 1880,’ in *The Brisbane Courier*, Friday, 18 February 1881, p. 3.

admitted during this year 33 died from typhoid fever.⁹⁷ In 1883 the number of patients admitted to hospital was 1642 with 33 dying from typhoid fever.⁹⁸ In the Annual Report for 1884 the Hospital Committee stated:

The number of admissions during the past year has been unusually high, showing an increase of one-fourth on the total admitted in the previous year; and among the large number applying it was found necessary (owing to the pressure of space) to reject some of the less severe cases who could attend as out-patients. Thus the Hospital was to a greater extent than in former years reserved only for the severer cases.

A large number of persons (750) suffered from Fever and other Miasmatic disease, the mortality being very great.⁹⁹

Of the 1904 patients admitted to hospital 91 died from typhoid fever. The hospital was facing a crisis that they alone could not manage; they needed more resources and looked to the Queensland Colonial Government for a speedy response.

It was during this period that the *Queensland Figaro* newspaper questioned the Brisbane Hospital Committee and the government as to why the recently constructed 'Female Fever Ward' in the Brisbane Hospital had not been used for typhoid fever cases. The article suggested that 'the excuse pleaded' was economic.¹⁰⁰ Much to the delight of the editor he advised the public in November that his article had resulted in the Female Fever Ward being opened for 'active use'.¹⁰¹ *The Brisbane Courier* also raised questions about the disease in editorials, for example, suggesting that the serious outbreak and the tragic loss of life 'had one beneficial effect in directing

⁹⁷ *Thirty-Fourth Annual Report of the Brisbane Hospital Committee for 1882*, Herston Library, Royal Brisbane Hospital, pp. 1-9.

⁹⁸ *Thirty-Fifth Annual Report of the Brisbane Hospital Committee for 1883*, Herston Library, Royal Brisbane Hospital, pp. 1-11.

⁹⁹ *Thirty-Sixth Annual Report of the Brisbane Hospital Committee for 1884*, Herston Library, Royal Brisbane Hospital, pp. 1-21

¹⁰⁰ *Queensland Figaro*, Saturday, 18 October 1884, p. 482.

¹⁰¹ *Queensland Figaro*, Saturday, 1 November 1884, p. 547.

attention to the wretched sanitary conditions of our towns'.¹⁰² Members of the public also expressed their concern about the disease and raised questions about the sanitary conditions in Brisbane as was evidenced in Letters to the Editor. One author lamented his hope that the publication of his letter would 'move the health authorities, if there are any, to action, and that public opinion may be brought to bear on the subject'.¹⁰³ There was real fear and annoyance in the community about the outbreak of typhoid fever because it was a preventable disease and it was felt that the Queensland government and the Brisbane Municipal Council were not doing enough to implement sanitary reforms.

The resources at the Brisbane Hospital were severely stretched during 1884 and 1885 was also a difficult year even though it was revealed in the Annual Report that the 'number of fever, and miasmatic cases generally was considerably less than in 1884'.¹⁰⁴ However, there were 15 deaths from typhoid fever, and 30 deaths from Febris Enterica.¹⁰⁵ The hospital continued to battle with receiving many patients from 'up-country hospitals and elsewhere' within the Colony, and as with past years the Colonial Government continued to ignore the plight of the Brisbane Hospital.

From 1886 to 1902 typhoid fever fluctuated in the number of admissions to hospital and the number of deaths (Table 4.2 on page 142).

¹⁰² *The Brisbane Courier*, Saturday, 2 February 1884, p. 4.

¹⁰³ *The Brisbane Courier*, Tuesday, 13 May 1884, p. 5.

¹⁰⁴ *Thirty-Seventh Annual Report of the Brisbane Hospital Committee for 1885*, Herston Library, Royal Brisbane Hospital, pp. 1-11

¹⁰⁵ *Thirty-Seventh Annual Report of the Brisbane Hospital Committee*, 1886, Herston Library, Royal Brisbane Hospital, pp. 8-11.

The Annual Reports of the Brisbane Hospital Committee indicate that typhoid fever was an on-going problem for the government, the medical profession and the community. To what extent government-run institutions, which regulated large numbers of people in confined spaces with only rudimentary toilet and waste facilities, were contributing to Brisbane's typhoid epidemics is the subject of this Chapter's next inquiry.

Table 3.5 Typhoid fever patients admitted to Brisbane Hospital and number of deaths from the disease 1882-1899

Year	Number of patients admitted with typhoid fever	Number of deaths due to typhoid fever
1882	Not listed	33
1883	Not listed	33
1884	750	91
1885	Not listed	15
1886	(Miasmatic 594; Malarial 31) 625	59
1887	285	27
1888	341	24
1889	648	44
1890	200	16
1891	168	8
1892	119	7
1893	63	2
1894	89	0
1895	111	7
1896	171	9
1897	266	21
1898	147	12
1899	150	5
1900	146	10
1901	151	14
1902	187	7

Source: Annual Reports of the Brisbane Hospital Committee¹⁰⁶

¹⁰⁶ Annual Reports of the Brisbane Hospital Committee, Herston Library; Annual Reports of the Brisbane Hospital Committee in *The Brisbane Courier*.

STATE INSTITUTIONS HARBOURING TYPHOID FEVER

Prisons

The closing of the penal settlement and the establishment of free settlement paved the way for such institutions as the Brisbane Hospital and the Brisbane Gaol. The first Brisbane gaol was the old convict female factory that was refurbished in 1849 and opened in 1850 in Queen Street on the site of the Post Office.¹⁰⁷ The second Brisbane gaol was built at Petrie Terrace in 1860 and operated until 1883.¹⁰⁸

Historian Dr Rod Fisher referred to the gaol as follows:

The social outcasts – criminals, lunatics, prostitutes, drunkards, Chinese and blacks – could be seen daily using the external staircases, and the hard labour gang working on the roads ... Also the hangings, at eight o'clock on Monday mornings, when the bell tolled and local children were sent to play at the bottom of the yard, out of sight of the gaol.¹⁰⁹

Petrie Terrace gaol was a forbidding place but throughout its life the sanitation conditions were reported as being satisfactory with very little sickness within the institution. Evidence from a special inquiry on gaols suggests these official reports may have been glossing over conditions. For example, the *Report with Minutes of Evidence taken before The Board of Inquiry appointed to inquire into the general management of the gaols, penal establishments and lockups of the Colony of Queensland*¹¹⁰ in 1887 showed how problematic the sanitation conditions of the new Boggo Road Gaol were. A drain to a reserve at the back of the prison carried the urine, kitchen slops, and washing water, with the 'sewerage' spreading over the

¹⁰⁷ E. Connors, *The birth of the prison and the death of convictism: The operation of the law in pre-separation Queensland 1839 to 1859*, PhD, University of Queensland, 1990, pp. 53 and 55.

¹⁰⁸ Greenwood G & Lavery J, *Brisbane 1859-1959: A history of local government*, (Brisbane Q: The Council of the City of Brisbane, 1959), p. 74.

¹⁰⁹ R. Fisher & S. Woolcock, *Petrie-Terrace Brisbane 1858-1988: 'Its ups and downs'* (Brisbane Q: Boolarong Publications, 1988), p. 6.

¹¹⁰ 'Report with Minutes of Evidence taken before The Board of Inquiry appointed to inquire into the general management of the gaols, penal establishments, and lockups of the Colony of Queensland,' *Votes and Proceedings*, Vol. 1, 1887, pp. 675-856.

paddock and down a slope towards Woolloongabba Road.¹¹¹ It was stated that the smell in summer-time was bad, ‘and the soil must in course of time be surcharged and become a fever bed’. When prisoners were locked in their cells for the night the only facility they had was a night-bucket that was collected every morning.

A prisoner (who was identified only by his prison number in the report) in his evidence stated that ‘The nightsoil men do not take away the excreta from the night buckets. It is pounded in the yard with water and sent away down the drain’ on to the paddock.¹¹² This practice meant that the likelihood of faecal contamination was high and the risk of spreading disease to the community outside of the gaol was great.

Because Petrie Terrace gaol became overcrowded an additional penal institution was established on the island of St Helena in 1866. Prisoners had originally been used as a labour force for the construction of buildings for a quarantine station; however, the buildings on the island were instead used as a prison for long term prisoners who were sent there. The prison was known as the ‘hard-labour prison settlement’ and in 1869 the number of prisoners on the island numbered over 300.¹¹³

Throughout the 1870s the gaol at St Helena did not appear to experience outbreaks of typhoid fever and this may have been due to the fact that the gaol was not overcrowded during this period. Also, according to the Plan of Prison Buildings on St Helena there were a number of outside water closets suggesting that the sanitary conditions were better than in Brisbane.¹¹⁴ The plan does not show what the

¹¹¹ *ibid*, p. 719.

¹¹² *ibid*, pp. 719, and 835.

¹¹³ Saint Helena Island, www.ucaqld.com.au/~piula/Placenames/page57.htm. Accessed 20/09/2004.

¹¹⁴ *Votes and Proceedings*, 1869, Vol. 1. pp. between 904 and 905.

situation was once prisoners were locked in their cells for the night; probably slop buckets were used and emptied out each morning, but the advantage of being on a small island was the ease with which drains emptying directly into Moreton Bay could be built. During this period the Annual Reports suggest that the health of the prisoners and sanitary conditions were good. For example, in a 'Report from the Superintendent of the gaols of the colony for the year 1876' to the Colonial Secretary the gaol at St Helena had 'an increased water supply' resulting in a constant and full supply of water at all times, 'which tends greatly to the healthy condition of the prisoners'.¹¹⁵ There was a large iron tank placed on walls eight feet high containing a reserve of water in case there were problems with the water pipes. Under the tank was a bathroom with four shower-baths for the use of the prisoners and it was stated in the report as being 'beneficial as a sanitary and cleanly measure'.¹¹⁶ The sanitary state of the St Helena Gaol was reported as 'highly satisfactory', and the buildings were in good repair and capable of accommodating a much greater number of prisoners than were confined there.¹¹⁷ There was no report of typhoid fever or any other disease within the gaol.

It was in 1880 that the system began to change as the Sheriff's report on gaols showed. It was noted in the report for that year that the old Petrie Terrace Gaol was being pulled down and was a receiving gaol only - at least one wing and some other buildings had been demolished leaving only one wing standing.¹¹⁸ The prisoners in this gaol were awaiting trial, debtors, criminal lunatics, and prisoners who were the cooks and cleaners who kept the gaol clean and in order. All other prisoners were

¹¹⁵ *Votes and Proceedings*, 1877, p. 417

¹¹⁶ *Votes and Proceedings*, 1877, p. 417.

¹¹⁷ *Votes and Proceedings*, 1877, p. 418.

¹¹⁸ *Votes and Proceedings*, 1881, p. 229; *Votes and Proceedings*, 1882, p. 201

sent to the penal establishment on St Helena.¹¹⁹ In 1881 this establishment maintained its good sanitary record and the healthy condition of its prisoners.¹²⁰ However, in 1882 the healthy condition of prisoners began to change. In the 1882 report it was noted that the penal establishment on St Helena reported a few cases of diarrhoea and dysentery, although it was generally accepted that the health of the prisoners was good.¹²¹ Unfortunately, one year later in the report of 1883 the Superintendent, William Townley, stated:

I cannot claim for the Establishment exemption from the disease which was so rife and deadly in Brisbane and other parts of the colony, for we had several cases of typhoid fever during the hot season, and although some of them were very critical I have fortunately no deaths to record. The general health of the Establishment has been very good.¹²²

There is no explanation in this report for the outbreak of typhoid fever in the penal establishment other than the reference to the disease being rife throughout the colony. This institution had a good history of sanitation and healthy prisoners, and being located on an island separated from the rest of the population was able to maintain this situation. So why was there an outbreak of the disease? It appears more than likely that some of the new prisoners had contracted the disease before being sent to the St Helena establishment and with the increased number of prisoners overcrowding was becoming a problem resulting in possible faecal contamination spreading the disease to other prisoners.

In the same report it was stated that the 'old gaol on Petrie Terrace was vacated on the 2 July, 1883, and the prisoners, 56 in number, were transferred to the new gaol at

¹¹⁹ *Votes and Proceedings*, 1881, p. 229.

¹²⁰ *Votes and Proceedings*, 1881, p. 217.

¹²¹ *Votes and Proceedings*, 1883, p. 181.

¹²² *Votes and Proceedings*, 1884, p. 345.

Woolloongabba'.¹²³ This became the State's main prison for a century and was euphemistically referred to as "Boggo Road Gaol". As stated previously the facilities in the cells was very primitive and unhealthy. There were shelter-sheds, baths, and earth closets outside in the yards, but the sheds were very small and in wet weather prisoners sought shelter from the rain in the closets. The practice of emptying the night-buckets in the prison yard to be washed away into the drain was discontinued in 1887. A yard had been established for the placement of large tubs into which the night-buckets were emptied each morning to be emptied by the 'city scavengers twice a week'. Unfortunately, this yard was also the area where the prisoners 'had to take their food and exercise'. The earth closets in the yards were also emptied twice a week.¹²⁴ Prison regulations stated that prisoners were required to have a bath on arrival and 'one every week thereafter'. The bathing regulation was not strictly enforced and some prisoners did not have a bath for months. The Board of Inquiry noted that there was 'an epidemic of mild typhoid', but the doctor alleged that the disease was brought into the gaol, and did not arise from any defects of sanitation.¹²⁵ However, the Board pointed out that there was a rule that 'all prisoners shall, upon their admission, be inspected by the surgeon, and be thoroughly washed and cleaned previous to being placed with other prisoners'. The object of the rule was to prevent contagious or infectious disease being imported into the gaol, and the Board stated that the epidemic of typhoid must have occurred by 'non-observance of the rule'.¹²⁶

¹²³ *Votes and Proceedings*, 1884, p. 361.

¹²⁴ 'Report with Minutes of Evidence taken before The Board of Inquiry appointed to inquire into the general management of the gaols, penal establishments, and lockups of the Colony of Queensland,' *Votes and Proceedings*, Vol. 1, 1887, p. 719.

¹²⁵ *ibid.* 720.

¹²⁶ 'Report with Minutes of Evidence taken before The Board of Inquiry appointed to inquire into the general management of the gaols, penal establishments, and lockups of the Colony of Queensland,' *Votes and Proceedings*, Vol. 1, 1887, p. 720.

Sanitary conditions were clearly not satisfactory, but the Annual Reports did not convey the real situation to the Government and the community. However, the report for the year 1884 did indicate that the new gaol had a few sanitation problems. There was a 25 per cent increase in the number of prisoners confined in the gaol creating a problem of overcrowding. For example, during the heat of summer there were 125 prisoners in the gaol, but only 62 single cells to accommodate them resulting in 42 prisoners sleeping in the corridors, 13 in the hospital, and the remainder were placed in the single cells with up to 3 people in cells designed for one person.¹²⁷ There was no report of disease or health problems only a statement from the Superintendent saying ‘the consequences might have been most disastrous’.¹²⁸ Unfortunately, the situation became worse and in December 1885 Arthur E Halloran, the Sheriff of Queensland and Inspector of Prisons, wrote to the Under Colonial Secretary about the situation requesting that prisoners be removed from the Brisbane Gaol to the Penal Establishment on St Helena because of overcrowding. He wrote:

On Wednesday last there were 113 prisoners ... 45 being confined in 15 single cells or 3 in each cell intended for only one prisoner. The foul smells arising from the 15 cells in each of which the three prisoners are confined is unbearable and must inevitably cause fever, in this very hot weather - and I beg strongly to recommend that as many prisoners as can be accommodated at St Helena may be sent to that place. There is at present one case of dysentery and one case of fever – in the Gaol hospital.¹²⁹

It is clear from the Sheriff’s comments that he was influenced by the still common belief of the day of miasmas infecting the atmosphere resulting in the spread of fever. The overcrowding at the Brisbane Gaol needed to be addressed, and removing prisoners to St Helena would solve the problem. It was not only the Sheriff who was

¹²⁷ *Votes and Proceedings*, 1885, p. 379.

¹²⁸ *Votes and Proceedings*, 1885, p. 379.

¹²⁹ QSA: Sheriff to Under Col Sec. COL/A447 in-letter No. 9271, 5 December 1885

concerned about this issue, in 1885 the Editor of the newspaper *Queensland Figaro* wrote a scathing article about the situation and the inadequate closet facilities for the number of prisoners who were managing with only 'ordinary slop-buckets' and suggested that the 'offensive odours generated and circulated in such an over-crowded building may be imagined'.¹³⁰

The Queensland government's concern for prisoners was a low priority and because of this approach a crisis situation soon arose. The prison population increased rapidly, and it was only when overcrowding was so severe that the government began to reassess the situation. There was also pressure from the newspaper editors of the *Queensland Figaro* and *The Boomerang* for the government to be accountable for the health and welfare of prisoners. Because of the overcrowding and inadequate sanitary facilities the gaols had the potential to be a source of typhoid fever.

CHILDREN'S INSTITUTIONS

Schools and orphanages had responsibility for congregating large numbers of Brisbane children and so the Board of General Education reports have been investigated during the 1860s, 1870s, and 1880s with the focus predominantly on Brisbane Normal School, and South Brisbane School and the Diamantina Orphanage.

In 1860 an Act was passed in Parliament to provide for primary education in the Colony. As a result of this Act a Board of General Education was formed to meet all education requirements with the Board having the power to make rules and bye-laws to be approved by the Governor and Executive Council, and presented to both

¹³⁰ *Queensland Figaro*, Saturday, 26 September 1885, pp. 490-91.

Houses of Parliament for the ‘better provision for the establishment and maintenance of schools, and for the promotion of primary education’. The Board was also required to assist any primary school submitted to its supervision and inspection to conform to its rules and bye-laws.¹³¹ Consequently, the Board of General Education submitted Annual Reports to Parliament giving the General Inspector’s Report, District Inspectors’ Reports of school within their districts, and statistical information on teachers and pupils.

In the Board of General Education report for 1862 it was mentioned that ‘Schools were opened in buildings of a temporary or unsuitable character’ because the government felt it incumbent upon them to establish a school wherever the need was demonstrated rather than wait for a school building to be completed.¹³² The problem with such a temporary measure was that it was more than likely to have poor standard or ill-suited toilet facilities, although at first there was no mention of disease or sanitation problems.

In 1864 the Brisbane Normal School reported that a new class-room was completed, and would be ready for the infants of the school at the commencement of the school year in 1865. The Brisbane South School was located ‘in a single apartment, which was rented from the Committee of the School of Arts’ which meant that area was very crowded, but the progress of the pupils was steady and ‘worthy of

¹³¹ Board of General Education, *Queensland Parliamentary Debates*, 16 August 1864, pp. 285-6; Board of Education, *Queensland Parliamentary Debates*, 26 August 1864, pp. 311-12.

¹³² Third Annual Report of the Board of General Education, for the Year, 1862, *Votes and Proceedings*, 1863, p. 3.

commendation'.¹³³ As in 1862 there was no mention of disease or sanitation problems.

By 1866 the number of schools operating in the Colony of Queensland had grown to 49 and in the report of the Board of General Education it was stated that a number of other schools may have been established, but because of failing resources it was deemed expedient 'to curtail operations as far as the building of schools was concerned, and to incur no new liability that could possibly be avoided or postponed'.¹³⁴ Again fiscal crises inhibited provision of basic services. The Brisbane Normal School reported that the attendance of boys was down due to the 'hardness of the times' and the parents were 'unable to pay the school fee'. The South Brisbane School also reported that the attendance level was down due to a good deal of sickness that 'prevailed in South Brisbane in the early part of the year'. However, by the middle of September attendance began to improve.¹³⁵ There was no identification in the report of what type of sickness the children were suffering from, but typhoid fever was prevalent in the colony in 1866, therefore, it is highly possible that the children were suffering from the disease and that under-resourced schools may have facilitated its spread.

In the Annual Reports from 1871 to 1873 very little attention was paid to the sanitation conditions and the health of the children and teaching staff of the schools. It was stated that most of the schools of the Colony were overcrowded and 'increased

¹³³ Report of the Board of General Education for the Year 1864, *Votes and Proceedings*, 1865, p. 470

¹³⁴ Report of the Board of General Education for the Year 1866, *Votes and Proceedings*, 1867, pp. 193-4.

¹³⁵ Report of the Board of General Education for the Year 1866, *Votes and Proceedings*, 1867, p.199.

accommodation' was 'indispensably necessary'.¹³⁶ However, the government did not respond to this observation and each year overcrowding was a problem.

By 1876 it became apparent that the General Inspector J Gerard Anderson was beginning to focus more on sanitation conditions in schools and in his report of that year he stated that in some schools the closets did not always receive the amount of attention that they should and that the urinals were often in an unsatisfactory condition. This was followed with a qualification that in 'some places it would be difficult to procure labor for this work'. There was also reference that in 1875 attendance was down due to the 'prevalent epidemic disease'.¹³⁷ It is not mentioned what this disease was, but it is more than likely to have been the typhoid fever listed in the Hospital Reports for that year and discussed earlier. Because the closets were not cleaned out on a regular basis the risk of faecal contamination from inadequate school facilities would have been high resulting in children contracting typhoid fever.¹³⁸

The other institution that brought children together was the orphanage. The schools report for 1879 outlined that a Statute entitled *An Act to make better Provision for the Establishment and Management of Asylums for Orphans and Deserted and Neglected Children* had received the approval of the Governor on 2 October 1879. The report on the health of the children of Diamantina Orphanage in Brisbane stated that Ophthalmia had prevailed amongst the children of the orphanage and these children had been removed to Peel Island along with other sickly children for a

¹³⁶ Report of the Board of General Education for the Year 1873, *Votes and Proceedings*, 1874, p. 14.

¹³⁷ Report of the Secretary for Public Instruction in Queensland, for the year ended 31 December 1876, *Votes and Proceedings*, 1877, p. 278.

¹³⁸ *ibid.*

period of two months whereupon the disease disappeared from the orphanage.¹³⁹

There was no indication from the report what the other sickly children were suffering from. Since ‘ophthalmia’ was an eye disease associated with poverty and lack of hygiene this suggests conditions conducive to typhoid fever, scarlet fever, dysentery, or some other childhood illnesses that were also caused by poor sanitation and cross-contamination and infection could have been present.

The following year (1880) it was mentioned in the report that the Diamantina Orphanage required better accommodation as the buildings were of a poor quality; it claimed that the remarkable health of the children was due to the care and vigilance of the Matron and her subordinates plus the attention from the members of the Ladies’ Committee.¹⁴⁰

The official report for the year 1881 was similarly bland stating that the children in the Diamantina Orphanage continued to experience good health and ‘very few deaths’ occurred.¹⁴¹ There was no mention as to the specific number of deaths and what they died from.

During the year of 1882 there was much sickness amongst Brisbane children from juvenile diseases resulting in a decrease in the average attendance at schools. There was very little comment about the sanitary conditions of the schools except to say that increased care was being placed on the ‘amount and quality of the water supply,

¹³⁹ Fourth Report of the Secretary for Public Instruction in Queensland, being for the year ended 31 December, 1879, *Queensland Journals of the Legislative Council*, 1880, Vol. XXIX – Part 11, p. 255.

¹⁴⁰ Fifth Report of the Secretary for Public Instruction, for the year 1880, *Queensland Journals of the Legislative Council*, 1881, Vol. XXX – Part 1, p. 851.

¹⁴¹ Sixth Report of the Secretary for Public Instruction, for the year 1881, *Queensland Journals of the Legislative Council*, 1882, Vol. XXXI-Part 11, pp. 367.

and the cleanliness and arrangement of the outhouses'.¹⁴² The lack of concern about the sanitary conditions indicates that the General Inspector did not view sanitation conditions as having high priority. In the Report about the Diamantina Orphanage in Brisbane it was noted that two deaths had occurred during the year, but there was no mention of what caused these deaths. It was particularly disturbing to read that the Infants' Home had reported that the mortality rate had reached the high level of 27.03 per cent and offered the reason for the deaths was the 'loss of their mothers' when admitted to the Home or were suffering from 'inherited disease, or by previous neglect'. There was no discussion about the sanitary conditions of the Infants' Home.¹⁴³ The Report leans towards a very positive position in relation to the education and health and welfare of the children, but the number of deaths that occurred throughout the year raises questions about how valid this view was.

The average school attendance of children improved for the year 1883 because there was not as much sickness throughout the year. The annual report stated that the health of the children in the Diamantina Orphanage was excellent, but of the 448 children 4 of them had died. As in other years there was no mention as to the causes of these deaths. The most disturbing part of this year's report showed that in the North-East Moreton District 17 out of the 18 provisional schools were not provided with lavatories and water supplies. In the South-East Moreton District it was reported that most of the State school buildings were over-crowded, however,

¹⁴² Seventh Report of the Secretary for Public Instruction for the year 1882, *Queensland Journals of the Legislative Council*, 1883-4, Vol. XXX111, p. 746.

¹⁴³ *ibid*, p. 717

‘school buildings, school houses, residences and closets were found to be in a generally satisfactory state of repair’.¹⁴⁴

It was at this time that a five-member deputation waited upon the Secretary for Education, the Honourable A Archer, in relation to the drinking water supplied to the public school in the Bulimba District. The Chairman of the group informed Archer that ‘about twelve months ago several of the children attending the State schools suffered from typhoid fever, and ... it was believed the sickness was caused by the unwholesome water supplied’. The deputation advised Archer that the water had been analysed and was found to have been the likely cause for the illness. Archer replied ‘that it was a gross thing that children should have to drink impure water’ and he would ‘see if he could discover a remedy for the evil complained of’.¹⁴⁵

The Diamantina Orphanage continued to have an increase in the death rate during 1884. Of the 445 children at the orphanage 10 had died. In the report the following was stated:

This cannot be considered a high death rate considering the inherited and contracted disease from which some of the children are likely to suffer when admitted, but it is more than double the rate for 1883.¹⁴⁶

The Inspector General’s explanation that the death rate could not be considered high because some of the children were suffering from some form of disease when admitted to the orphanage is quite disturbing because of the indication of risk for the other children already in the orphanage. The report fails to demonstrate what the

¹⁴⁴ Eighth Report of the Secretary for Public Instruction for the year 1883, *Queensland Journals of the Legislative Council*, 1884, Vol. XXXIV-Part 1, pp. 1014, 1056, and 1059.

¹⁴⁵ *The Brisbane Courier*, Friday, 16 February 1883, p. 4.

¹⁴⁶ Ninth Report of the Secretary for Public Instruction for the year 1884, *Queensland Journals of the Legislative Council*, 1885, Vol. XXXV-Part 1, p. 1218.

causes of death were but, the year 1884 was the year of the Brisbane typhoid fever epidemic and it is more than likely that some of the children admitted to the orphanage became orphans due to the death of their parents from the disease and possibly also then succumbed themselves.

The situation of lavatories not being provided at State schools continued in 1884 with six (North-East Moreton District) still in this position, and five (South-East Moreton District) schools having no urinals. There is no mention in the report of where and how this situation was to be addressed other than to say that ‘the number of schools not so supplied is gradually decreasing year by year’. The overall view was that the State school buildings were in a fair condition.¹⁴⁷

The general reporting system from the former Board of General Education and the Secretary for Public Instruction highlighted to the government the health conditions to which the children and teachers were subjected. However, what is evident from these reports is that the growth of population may have made Brisbane children vulnerable to typhoid fever because of inadequate sanitary facilities, just as school toilets had in Toowoomba. The schools that were not provided with lavatories and had problems with fresh water supplies were extremely vulnerable in 1884 because a typhoid fever epidemic had broken out and the sanitation conditions of these schools put the children at a high risk of contracting and spreading the disease. The real problem, however, appeared to be urban pollution.

¹⁴⁷ *ibid*, pp. 1260 and 1263.

1884 TYPHOID FEVER EPIDEMIC

The Registrar-General's Report of 1880 listed the diseases of typhus and typhoid separately and explained why this occurred:

These have usually appeared under the head of typhus, which is not strictly correct; indeed some physicians appear to be of the opinion that no real case of typhus has yet presented itself in Queensland. During the past year, however, 6 deaths have been returned in the colony as having been caused by typhus. There are 99 deaths from typhoid, and 27 from infantile fever, making 132 under the above general heading, as against 197 in the former year.¹⁴⁸

The separation of the diseases gave a true indication of the seriousness of typhoid fever, and highlighted that in 1880 the majority of deaths were due to the disease.

During the year of 1882 it was noted in the Annual Report of the Brisbane Hospital Committee that a large number of fever patients had been sent to the hospital and that such patients were referred to the new Fever Wards. It was also stated 'that Fever Patients are the most expensive class in the Hospital, and entail a far larger cost than any others'. The number of patients who died in hospital from typhoid fever that year was 31.¹⁴⁹ Unfortunately for Brisbane, typhoid fever cases were on the increase and in 1883 the number of deaths in hospital from typhoid fever had increased to 34. It should be noted that the Brisbane Hospital Committee suggested that 'the number of deaths bears a small proportion to the number of cases admitted' to hospital suggesting that the disease was widespread in 1883.¹⁵⁰ The *Queensland Figaro* newspaper stated in an editorial that 'Typhoid fever ... is cropping out in all directions' and that it would 'wager that there is not one Brisbane citizen but has

¹⁴⁸ *Votes and Proceedings*, 1880, Vol. 11, p. 149.

¹⁴⁹ *Thirty-Fourth Annual Report of the Brisbane Hospital Committee*, 1882, Herston Library, Royal Brisbane Hospital, pp. 4, and 7-9.

¹⁵⁰ *Thirty-Fifth Annual Report of the Brisbane Hospital Committee*, 1883, Herston Library, Royal Brisbane Hospital, pp. 4, and 7-10.

heard of at least one case of typhoid as existing among his circle of acquaintances'.¹⁵¹ Along with this article there was the gruesome cartoon with which this chapter commenced and which was published to emphasise the point.¹⁵²

The year 1884 was a particularly bad year for the people of Brisbane as more and more people contracted typhoid fever and the number of deaths more than doubled for the previous year.¹⁵³ Typhoid fever was prevalent in the community and the various nuisances that occurred in Brisbane only helped to spread the disease.

URBAN POLLUTION AND SPREAD OF TYPHOID FEVER

With so many people stricken with typhoid fever the community became even more involved by demanding the eradication of the causes of the disease, and to improve living conditions. Unfortunately, the discovery of the typhoid fever germ in 1880 by Dr Karl Erberth¹⁵⁴ and his establishment of the disease as a bacterial infection¹⁵⁵ was not yet widely accepted. There were indications of some awareness of new ideas within the community leading to occasional demands for sewerage. However, until the acceptance of Erberth's findings, agreement about eradication of the causes of the disease would take longer.

The Brisbane Courier raised awareness of the problems that nuisances created and the potential for spreading disease, particularly typhoid fever. They published

¹⁵¹ *Queensland Figaro*, Saturday, 15 September 1883, p. 665.

¹⁵² *ibid*, p. 673

¹⁵³ *Thirty-Sixth Annual Report of the Brisbane Hospital Committee*, 1883, Herston Library, Royal Brisbane Hospital, p. 3.

¹⁵⁴ McGrew, *Encyclopedia of Medical History*, p. 349.

¹⁵⁵ Patrick, *Health & Medicine*, p. 193.

articles and Letters to the Editor at every opportunity. An example of their vigilance was the campaign to have the City Manure Depot removed. The manure depot was the dumping ground for all types of refuse, for example, nightsoil and was located 'on Ithaca creek about 3 miles [4.3 kilometers] from the Town Hall' and contoured an area of approximately 40 acres [16.19 hectares].¹⁵⁶ Originally this location was considered by the government to be far enough away from the residential area of Brisbane not to warrant a health risk to the community. However, as the population grew the residential area expanded towards the depot and in 1883 the residents took their concerns to the government and newspapers. A manure depot close to a residential area and on a creek that flowed through several suburbs had the potential to spread typhoid fever amongst the community.

Dr Kearsey Cannan the Chairman of the Sub-committee wrote in his report about the Sub-committee's visit to the manure depot:

[The manure depot] is at present used by two Contractors Messrs. Baker and Pibworth, and W. Holmes, but may be used by any other Contractors to whom the Municipal Council may grant a licence – said licences are renewable yearly.

Messrs. Baker and Pibworth are the only persons licenced by the Municipal Council at the present time to remove Night soil – W. Holmes is permitted to perform certain work for the Government without a licence.

Messrs. Baker and Pibworth hold a lease of depot from Municipal Council until July 1866. (sic)

They employ 20 vehicles for the removal of Night soil, said vehicles consisting of 17 Carts into which the contents of pans are emptied, and these replaced in privy, and 3 Waggon which remove the pans and contents a fresh pan being substituted in Privy – They also employ 35 Horses and 56 Men. W. Holmes employs 1. Horse and 2. Carts.

¹⁵⁶ *Central Board of Health Queensland, Memoranda of Sub-committee's visit to Manure Depot, Brisbane 16th May, 1884, QSA: COL/A390, No. 3526. Patrick quoted Kelvin Grove as the location of the Manure Depot, p. 56.*

For the reception of Night soil pits are dug in regular rows about 4 ft deep, and 5 ft square, the earth being thrown upon side, the contents of both night carts and wagons are emptied into the pits until pits are filled to within about a foot of the level of the ground, the earth previously thrown up is then spread over the manure till the whole is leveled, should any of the material ooze through the surface more earth is spread over till the whole becomes a consolidated mass – in the course of about eighteen months Green crops are grown on the soil thus prepared.

An average of about 25 Tons of Nightsoil is thus disposed of nightly.¹⁵⁷

This explanation has been quoted in full since it gives a clear understanding of the purpose of the manure depot and the process of treating the manure.

The Brisbane Courier reported on the deputation from the Booroodabin and Ithaca Divisional Boards who waited on the Colonial Secretary to bring to his attention ‘the nuisance caused by the city manure depot, and to request its removal’. A petition from residents residing within the vicinity of the depot was presented to the Colonial Secretary, Sir Thomas McIlwraith. Mr Beattie, a member of the deputation, advised the Colonial Secretary that a petition had been presented to the City Corporation but it was ignored and the Corporation went on to expand the depot by obtaining a further grant of twenty-six acres [10.53 hectares] of land from the Government so instead of the situation being abated it was intensified. The deputation advocated that the depot should be located in a farming district not a populous suburb. The Colonial Secretary said he ‘had no doubt the depot was a nuisance’.¹⁵⁸ Just how extensive a ‘nuisance’ it was, was put in writing for the premier:

That your petitioners the residents and freeholders in the Divisions of Booroodabin and Ithaca on and near Breakfast Creek are seriously inconvenienced by the continued existence in their neighbourhood of the Manure Depot where all the Faeces matter of the City and Suburbs of Brisbane; (not only from Earth closets but also from Cesspits) is deposited, as

¹⁵⁷ *ibid*

¹⁵⁸ *The Brisbane Courier*, Friday, 9 March 1883, p. 5.

well as the dead animals and general refuse greatly to the discomfort and prejudice of the inhabitants to the peril of their health ... owing to the manner in which the Depot is managed, the Creek is so polluted that the residents are no longer able to use the water in the Creek for Bathing and other purposes ... the effluvium is so perceptible and obnoxious that some of the residents have been compelled to leave their houses and others will do so as soon as possible unless the nuisance is removed.¹⁵⁹

The petition was discussed at the next monthly meeting (held the day after receiving the document) of the Central Board of Health. The Colonial Secretary advised the Board that he had inspected the depot and come to the conclusion that it was impossible to do anything in the matter because it was beyond the power of the Board as they only had 'power to take steps where there was immediate danger to life'. He said 'he would like to see the board do what they could for the good of the whole community', but it was up to the town council to find a solution. He proposed that a reply be forwarded to the petitioners advising them that 'the board were not competent to deal with the matter'.¹⁶⁰ It was shortly after this event that the Under Colonial Secretary wrote to the Central Board of Health declaring the removal of the local boards of health from the provisions of the Health Act of 1872 stating that the Premier, Thomas McIlwraith, was of the opinion that the matter of 'public health should be left entirely to the local bodies elected by the ratepayers'.¹⁶¹ This statement seems to affirm Enid Barclay's claim that McIlwraith was 'alarmed by the centralising tendencies of the Health Act'; it certainly indicates that as Colonial Secretary he did not want responsibility for public health.¹⁶² Sir Thomas McIlwraith was Premier of Queensland from 21 January 1879 to 13 November 1883, 13 June to

¹⁵⁹ QSA: Petition, Residents of Enoggera to Sir Thomas McIlwraith, KCMG, 1883, COL/A355 Letter No. 1239/1883.

¹⁶⁰ *ibid.*

¹⁶¹ QSA: Under Colonial Secretary to Central Board of Health, 28 April 1883, COL/G20, Letter No. 83/750.

¹⁶² E. Barclay, Aspects of public health in Queensland from 1859-1914, Master of Arts Thesis, University of Queensland, 1979 p. 335.

30 November 1888, and 27 March to 27 October 1893.¹⁶³ He had a reputation for using 'his public position to further the interests of his family's shipping company',¹⁶⁴ rather than the interests of public health.

McIlwraith appears to have been influenced by the political debate surrounding proposed amendments to the Health Act during the Toowoomba epidemic of 1878. Proponents of the amendments had wanted to give the Central Board of Health 'power to make regulations ... as well as repealing the restrictive section of proclaiming the [1872 Health] act every six months'. Brisbane Municipal Council had objected to these amendments, on the grounds that it 'feared that too much power was being given to a board not directly under the control of the government'.¹⁶⁵ The *Brisbane Courier* in an editorial had pointed out the real issue worrying the aldermen - if the Bill was passed then the Municipal Council would be responsible for the expenses incurred by the 'local Boards of Health' and if there were insufficient funds then a levy was to be put in place to pay for the expenses.¹⁶⁶ In May 1878 a meeting of the Brisbane Municipal Council had acknowledged that the concern about the Health Amendment Bill was how it would 'materially affect the finances of the city'.¹⁶⁷ Additionally the Local Board of Health had held a special meeting to discuss the Health Act Amendment Bill and decided it was not 'advisable to extend the powers of the Central Board of Health as suggested'.¹⁶⁸ As a result of this opposition the amendments were defeated in the House. Even in the aftermath of the 1878 epidemic *The Toowoomba Chronicle* expressed concern that

¹⁶³ D. Waterson, *A Biographical Register of the Queensland Parliament 1860-1929*, (Canberra ACT: Australian National University Press, 1972), pp. 117-18.

¹⁶⁴ D. Waterson, *Personality, Profit and Politics: Thomas McIlwraith in Queensland, 1866-1894*, 'The John Murtagh Macrossan Lecture, 1978, (St Lucia Q: University of Queensland Press, 1984), p. 8.

¹⁶⁵ Patrick, *Health & Medicine*, p. 55.

¹⁶⁶ *The Brisbane Courier*, Friday, 10 May 1878, p. 2.

¹⁶⁷ *The Brisbane Courier*, Tuesday, 14 May 1878, p. 3.

¹⁶⁸ *ibid.*

the Toowoomba Municipal Council were not going to implement the Local Board's recommendations because of their cost, as discussed in chapter two. Patrick suggests that 'continued protest from Brisbane Municipal Council' caused McIlwraith to capitulate in 1883.¹⁶⁹

Public opinion, however, had moved on. McIlwraith's refusal to act on the concerns of Brisbane residents about the manure depot led to a public outcry. Following the article about the deputation and the report of the meeting of the Central Board of Health, a number of Letters to the Editor were published condemning the Central Board of Health for not acting on the petition.¹⁷⁰ In one letter the author wrote:

As to the fever, let me ask the board whether a man did not die a few months ago at the depot from typhoid fever? Did not a much-respected resident (Mr. Lorimer) die from fever? Have there not been recent cases of fever at Mrs. Hart's house, at Mr. Irving's, and at Ballymore?¹⁷¹

The members of the community who wrote these letters were obviously angry that the Central Board of Health did not consider that the manure depot was dangerous to the health of the people living close to the depot. Members of the community kept writing Letters to the Editor of *The Brisbane Courier* and they kept publishing them, particularly if the letters were about nuisances or typhoid fever or appealing to the Municipal Council or the Central Board of Health to take immediate action to remedy the situation.¹⁷² Throughout 1883 and 1884 *The Brisbane Courier*

¹⁶⁹ Patrick, *Health & Medicine*, p.55; *The Toowoomba Chronicle and Darling Downs General Advertiser*, Thursday, 20 June, 1878, pp. 2-3; *ibid*, Saturday 22 June 1878, p. 3; QSA: Under Colonial Secretary to Central Board of Health, 28 April 1883, COL/G20, Letter No. 1883/750.

¹⁷⁰ *The Brisbane Courier*, Monday, 12 March 1883, p. 5; *ibid*, Tuesday, 13 March 1883, p. 5; *ibid*, Thursday, 15 March 1883, p. 5.

¹⁷¹ *ibid*, Monday, 12 March 1883, p. 5.

¹⁷² *ibid*, Monday, 2 April 1883, p. 3; *ibid*, Monday, 23 April 1883, p. 6; *ibid*, Friday, 29 June 1883, p. 3; *ibid*, Monday, 5 November 1883, p. 3; *ibid*, Tuesday, 6 November 1883, p. 5; *ibid*, Thursday, 20 December 1883, p. 5;

maintained pressure by publishing many editorials and articles about the deplorable sanitary conditions in Brisbane, the typhoid fever epidemic, and the push for local government bodies and the colonial government to be accountable for the situation.¹⁷³ The pressure by *The Brisbane Courier* and the community was effective as was evidenced at a meeting of the Brisbane Local Board of Health in April 1883. Their response was an about face on their public position in 1878. The Chairman, Alderman Porter spoke about the Editorial that appeared in that morning's issue of the newspaper. The focus of the Editorial was on the unsatisfactory sanitary conditions of Brisbane and its environs, the 'cases of death from preventable causes' and the existence of a number of fever-breeding spots'.¹⁷⁴ Alderman Porter remarked that:

... he thought there was a good deal of truth in the article, that he considered the board had been very lax for some time, and that the inspection of the various premises under its jurisdiction had been very imperfect. The time had arrived when there should be a more complete supervision, and if the work was too much for the board's inspector, he should make a representation to that effect, and assistance, if necessary, should be given to him.¹⁷⁵

The acknowledgment by the Chairman that the Board was found wanting would have encouraged the community and *The Brisbane Courier* to carry on their campaign, particularly as the newspaper published the minutes of the monthly Central Board of Health, Local Board of Health and Municipal Council meetings. The *Queensland Figaro* newspaper targeted the Mayor of Brisbane and the Health Committee by

¹⁷³ *ibid*, Wednesday, 11 April 1883, p. 4; *ibid*, Tuesday, 17 April 1883, p. 4; *ibid*, Friday, 12 October 1883, p. 4; *ibid*, Tuesday, 18 December 1883, p. 4; *ibid*, Thursday, 20 December 1883, p. 3; *ibid*, Saturday, 2 February 1884, p. 4; *ibid*, Saturday, 10 May 1884, p. 2; *ibid*, Monday, 2 June 1884, p. 4; *ibid*, Friday, 13 June 1884, p. 4; *ibid*, Wednesday, 21 October 1885, p. 4:

¹⁷⁴ *ibid*, Wednesday, 11 April 1883, p. 4.

¹⁷⁵ *ibid*, Thursday, 12 April 1883, p. 5.

The Brisbane Nightman's Song



RESPECTFULLY DEDICATED TO HIS WORSHIP THE MAYOR.

The Brisbane Nightman's Song.

(See Cartoon.)

(Dedicated to the Mayor and Health Committee.)

I 'm a jolly, jolly nightman, and murder is my trade,
All under Municipal Council's sanction,
In the dismal, dismal, night-time, my evil tricks are played ;
No matter what, I never can a prank shun.
My cart will creep and creak along, and wake folks from their
sleep,
And greet their noses with a bold affection,
Spreading typhus breath-stinks round in an ever-widening
sweep,
And poisoning the air in each direction.
I can muff the pans so neatly, and change along the line,
That no one ever has the least suspicion ;
By changing clean with fevered, though there be no outer
sign,
The poison-germs perform their deadly mission.
It's easy to forget a place that's healthy for a week,
It's easy to forget to bring the earth,
There are a thousand easy ways of which I here could speak,
By which a nightman can give typhoid birth.
It's grand to ponder on the power entrusted to my grade,
I've always various sorts of poison-breath ;
I'm a jolly, jolly nightman, and murder is my trade,
For clients hold I keys of life or death.

Source: *Queensland Figaro*, 21 June 1884

publishing a denigrating cartoon and the Nightman's Song illustrating the dangers to public health from the night-cart system (refer to cartoon on page 167).

The Central Board of Health also brought up the matter of *The Brisbane Courier* editorial at their April meeting, and acknowledged their concern over the sanitary conditions of Brisbane. Dr Thomson told the meeting that he 'had previously reported three cases of typhoid in Athole-lane, and now he had a fourth'. Dr Cannan said 'he also had a case there and he had at once got the patient away'. Dr Thomson asked if the 'Central Board would communicate with the local board on the subject'. The Chairman said 'they wanted power to do more than talk about these things.' Dr Thomson replied 'While we talk the patients die'.¹⁷⁶

The Central Board of Health wrote to the Local Board of Health about 'nuisances dangerous to health existing' in:

1. A brick house in Constant-street, Valley immediately facing Alfred-street, Typhoid fever prevails here, owing to the burial of nightsoil in the garden.
2. Dunmore boarding-house, Adelaide-street; condition of back premises conducive to typhoid fever.
3. Condition of houses in Athole Lane, off Wickham-terrace, where typhoid fever prevails in consequence of deficient sanitary arrangements.¹⁷⁷

¹⁷⁶ *ibid*, Saturday April 14, 1883, p. 5.

¹⁷⁷ *The Brisbane Courier*, Friday, 20 April 1883, p. 6.

They went on to point out:

The Central Board of Health view with dismay the ever-increasing cases of typhoid and enteric fever, traceable entirely to deficient local sanitary arrangements; and as these matters are entirely under the control of your board, they most earnestly call upon you to use every effort to thoroughly eradicate the numbers of existing fever beds within this municipality.¹⁷⁸

The Secretary of the Board requested Inspector Hardgrave to carry out inspections on premises in the areas indicated and report back to the Board. The Secretary also carried out inspections.

The Local Board's report agreed that the sanitary conditions were very poor.

However, the response of the local authority was to produce a polite reply to the Central Board of Health along the lines of suggesting that the Central Board seek to have passed an Amendment Act that framed new regulations as the present Act was very defective.¹⁷⁹ In the midst of the build up to the 1884 epidemic the two levels of government were buck-passing and it was only once Samuel Griffith came to power in November 1883¹⁸⁰ that a comprehensive Health Act was passed through both Houses of Parliament in 1884.¹⁸¹

Sir Samuel Walker Griffith was premier of Queensland from 13 November 1883 to 13 June 1888, and 12 August 1890 to 13 March 1893. Griffith was referred to as 'the friend of the workers' but the sugar growers and squatters had another name for him 'D S G or Damn Sam Griffith' because his reforms made it harder for indentured

¹⁷⁸ *ibid*, Friday, 20 April 1883, p. 6.

¹⁷⁹ *ibid*.

¹⁸⁰ Waterson, *Biographical Register*, p. 74.

¹⁸¹ *Queensland Government Gazette*, pp. 1415-51.

Melanesian workers to enter Queensland.¹⁸² Waterson referred to McIlwraith and Griffith as dominating 'Queensland politics in a personal sense that was, by and large, unknown in the other colonies' during the 1880s and 1890s.¹⁸³ His new Health Act of 1884 'was effective in all populous areas of the colony' including Brisbane.¹⁸⁴ Local authorities such as the Brisbane Municipal Council were responsible for implementation of the Act. Patrick stated:

The act was aimed at diseases of filth, and power was given to the local authorities to take action for the removal of refuse, drainage, the management of slaughter houses and the prevention of nuisances.¹⁸⁵

The Brisbane Municipal Council was finally in a position to force people to remove refuse from problem dwellings and sites. Some improvement in public health occurred, but the Council continued to have a very casual approach to enforcement.¹⁸⁶

Under the initiative of Samuel Griffith the Honorable Dr W F Taylor, M.L.C., Honorary Visiting Staff at the Brisbane Hospital, was requested to investigate the system of sanitation and disposal of sewage during his visit to England in 1884 and to furnish a full report to the Government upon his return.¹⁸⁷ In his letter of appointment the Colonial Secretary enclosed a copy of a Bill that was before Parliament 'to make better provision for securing and maintaining ... Public Health'. He stated that the Bill had been passed by the lower branch of the Legislature and in

¹⁸² R. Forward, *Great Australians: Samuel Griffith*, (Melbourne V: Oxford University Press, 1964), pp. 13-14.

¹⁸³ Waterson, *Personality*, p. 7.

¹⁸⁴ Patrick, 'Health Administration', p. 258.

¹⁸⁵ Patrick, *Health & Medicine*, p. 57.

¹⁸⁶ Patrick, 'Health Administration', p. 258.

¹⁸⁷ *Thirty-Eighth Annual Report of the Brisbane Hospital Committee*, 1886, Herston Library, Royal Brisbane Hospital, p. 3.

probability would ‘obtain the force of law during the present Session.’¹⁸⁸ He wanted as much information as possible about ‘sanitary matters’ in England ‘with a view’ to successfully administering the new Act.¹⁸⁹

The Bill referred to was of course the new Health Act of 1884 the successful introduction of which still faced many obstacles. For while there had been little opposition to it in the lower house there was a lot of debate as to which municipalities and divisions, the provisions of the Act would be applicable. Clause 5 of the proposed Bill stated as follows:

The provisions of the third and fourth parts of this Act extend to, and are in force in, the municipalities of Brisbane, Bundaberg, Charters Towers, Cooktown, Gympie, Ipswich, Maryborough, Rockhampton, Roma, Toowong, Toowoomba, Townsville, and Warwick; and the divisions of Booroodabin, Toombul, and Woollongabba, so far as such provisions are respectively applicable thereto.¹⁹⁰

Griffith proposed that only the ‘larger and older municipal corporations of the colony’ be included¹⁹¹ to overcome the financial concerns of the smaller municipalities, including those of the capital. Another administrative problem that was debated was that of sewers to adjoining districts; these required the agreement of all parties involved and the sanction of the Central Board of Health to ensure that the sewers would ‘communicate with the sewers of the local authority of each adjoining district.’ If a dispute arose then the Central Board of Health was to settle the matter.¹⁹² Even the definition of ‘drain’ and ‘sewer’ caused considerable debate.

¹⁸⁸ S W Griffith, Colonial Secretary, to W F Taylor, Esquire, MD., &c., Brisbane, 15 September 1884, Report on water supply and sewage disposal, *Queensland Journals of the Legislative Council*, 1885, Vol. XXXV-Part 11, p. 667

¹⁸⁹ *ibid.*

¹⁹⁰ *Queensland Official Record of the Debates of the Legislative Assembly*, Vol. XLIII, 3 September 1884, p. 543.

¹⁹¹ *ibid* p. 544.

¹⁹² *ibid*, 4 September 1884, pp. 558-59.

As well as these concerns there were those members who argued for stronger measures. The Honourable William Pettigrew of the Legislative Council raised the question of the recommendations made in a Board of Health report ‘The Prevalence of Typhoid Fever in Brisbane and Suburbs’ stating that ‘there is nothing at all in this Bill dealing with the matter to which [the report] refers’.¹⁹³ Pettigrew specifically called attention to the recommendation for ‘more open spaces in all crowded localities for ventilation ... houses built on dry and wholesome foundations and constructed with all the modern advantages of drainage’.¹⁹⁴ Henry Jordan, Member for South Brisbane, went so far as to say:

Before this Bill can be made effective to put a stop to preventable disease, I believe we should have a system of national sewerage through all the towns of the colony. That will cost something like a million of money, but it will be money well expended.¹⁹⁵

It is apparent there were no strong objections to the proposed Bill and that at last members of parliament were ready to commit significant spending on public health infrastructure, although this Bill would not deliver anything as ambitious as Jordan’s proposal.

In the meantime Dr Taylor devoted seven months on his investigation into the system of sanitation and disposal of sewage in the United Kingdom, and his report was presented to both Houses of Parliament in August 1885. In his covering letter he stated that the information contained in the report would meet the requirements of every town in Queensland regarding the ‘disposal of sewage and the question of a

¹⁹³ *Queensland Official Record of the Debates of the Legislative Council*, Vol. XLII, 1 October, 1884, p. 139.

¹⁹⁴ *ibid.*

¹⁹⁵ *Queensland Parliamentary Debates*, Vol. XLIII, 1884, p. 507.

pure water supply'.¹⁹⁶ He reported that sanitary improvements in England had resulted in lowering the number of deaths from typhoid fever.¹⁹⁷ Taylor acknowledged in this report that the 'typhoid bacillus' was 'generally admitted to be' the cause of the disease, indicating a growing acceptance of the germ theory and Erberth's discovery of the causal organism for the disease by 1885. As well he indicated that human sewage was the essential factor which contaminated water supplies to spread the disease. To illustrate his point he referred to experiments undertaken by Pasteur:

...one is led to infer from the experiments of Professor Pasteur, that burying the stools of a typhoid patient in the earth is a means of preserving the vitality of the organism or of protecting its resting spores ... It is therefore very advisable to thoroughly disinfect the stools with a solution of chloride of lime or corrosive sublimate, carbolic acid, &c., and then bury sufficiently far from any dwelling as to render the chances of subsequent infection, either by means of drinking water or by the air, as remote as possible. The burying in the ground should not be regarded as a means of *getting rid of the evil effectually*, but as *one of the best means at our disposal for doing so*.¹⁹⁸

Despite Taylor's extensive report and its recommendations that he divided into three areas - water supply, disposal of sewage and house refuse, and house sanitation¹⁹⁹ - there was no effective action from the government of the day. The city of Brisbane had to wait until the 1920s for the development of a sewerage system that was funded by the Queensland Government under the auspices of the Metropolitan Water Supply and Sewerage Board²⁰⁰ but Taylor's work had laid the policy groundwork forty years earlier.

Whilst this investigation was going on in England the typhoid fever epidemic in Brisbane was at a critical stage. The number of people contracting the disease was

¹⁹⁶ *ibid*, pp. 667-706.

¹⁹⁷ *ibid*, pp.674 and 697.

¹⁹⁸ *ibid*, p. 677.

¹⁹⁹ *Ibid*, p. 667.

²⁰⁰ Greenwood and Lavery, *op cit.*, p. 581.

overwhelming and it was evident early in the year that Brisbane and its community were faced with a deadly health problem. Barclay suggests the epidemic in Brisbane forced ‘the always reluctant chairman of the Central Board of Health, Samuel Griffith’ to appoint a Committee of Central Board of Health to investigate ‘The prevalence of typhoid fever in Brisbane and Suburbs’.²⁰¹ Barclay implies criticism of Griffith but the year would see him introduce the new 1884 Health Act and initiate Taylor’s sanitation inquiry. It seems that other community pressure was contributing to the pressure on his government to give serious consideration to health matters. At this time there was also agitation around the ‘Contagious Diseases Act’. In November 1884 Henry Jordan, Member for South Brisbane, moved a motion in Parliament ‘that this House disapproves of the compulsory examination of women’ under the Act.

It would appear that in 1884 political awareness had been heightened regarding the need for action in relation to all avenues of public health, and the investigation into typhoid fever in Brisbane and suburbs followed by the passing of the Health Act of 1884 support this shift.²⁰²

TYPHOID FEVER IN BRISBANE AND SUBURBS INQUIRY: THE FAILURE OF REGULATION

While Taylor was undertaking his investigation abroad the typhoid fever epidemic in Brisbane was at a critical stage. At home the government appointed a committee of the Central Board of Health to investigate ‘The Prevalence of Typhoid Fever in

²⁰¹ Barclay, ‘Aspects of Health’, p. 113.

²⁰² *The Health Act of 1884* was assented to on 21 October 1884. *Queensland Government Gazette*, Vol. 35, pp. 1415-59.

Brisbane and suburbs'. A sub-committee of three was selected - Dr Kearsley Cannan, Dr Chas F Marks, and Dr John Thomson with Dr Cannan as Chairman - to undertake this inquiry. The terms of reference were to inquire into the causes of the prevalence of typhoid fever and the means by which it had been propagated. The sub committee's method of investigation was to inspect a number of lodging and boarding houses in the most populous parts of the Brisbane, and to inspect the manure depot and its workings.²⁰³

Mid-way through the investigation Dr Cannan forwarded a progress report to the Colonial Secretary in May 1884 advising him that the sub-committee had inspected the manure depot and it was their opinion that the workings of the contractors was satisfactory, but the cause of disease was coming from 'the retention of refuse in ashpits, cesspits, and old drains'; therefore, the fast removal of the refuse was imperative. The sub-committee suggested that the dry earth system, with duplicate pans, would accomplish such a result.²⁰⁴ They stated that they were confident that the 'death rate and the amount of sickness would be greatly reduced if the house and street drainage was good, the availability of an abundant supply of clean water, and strong enforcement of bye-laws against overcrowding in dwellings such as lodging and boarding houses'.²⁰⁵

The final report was presented to both Houses of Parliament in August 1884 and the findings were that the dwellings inspected were in the 'very worst sanitary condition'

²⁰³ Report of Committee of Central Board of Health, *Queensland Votes and Proceedings*, 1884, pp. 885-6; QSA: Letter from Central Board of Health, Brisbane to The Colonial Secretary, 16 May, 1884, COL/A390 Letter No. 3526, pp. 1-9; *Toowoomba Chronicle and Darling Downs General Advertiser*, Thursday, 22 May 1884, p. 2.

²⁰⁴ QSA: Letter from Central Board of Health, Brisbane to The Colonial Secretary, 16 May 1884, COL/A390 Letter No. 3526, pp. 1-9

²⁰⁵ *ibid.*

and ‘required immediate attention’. The Committee recommended that public baths, wash-houses, and public laundries with proper conveniences be established. They also stated that with ‘a pure water supply outbreaks of typhoid fever would be ‘impossible’.²⁰⁶ The Committee acknowledged that typhoid fever was a ‘filth fever’ and therefore a preventable disease and public measures could ensure the public health of the community.²⁰⁷ So far the system of local regulation had clearly been inadequate.

TREATMENT OF TYPHOID FEVER

There was not much available to the medical profession for treatment of typhoid fever. Historian Ross Patrick indicates that for dysentery a Catechu Mixture was prescribed and mercury subchloride, or even rhubarb and chalk were given for diarrhoea.²⁰⁸ He also states that quinine was given to patients with fever.²⁰⁹ However, it was Dr Frances E Hare, the Resident Medical Officer to the Brisbane Hospital from 1885 to 1891, who developed the radical cold-bath treatment for typhoid fever.²¹⁰

The Brisbane Hospital had managed with only one Resident Medical Officer quite satisfactorily until 1884, and in that year 750 fever cases were admitted to the hospital of which 575 patients had typhoid fever and 91 of these patients died from

²⁰⁶ Report of Committee of Central Board of Health, *Queensland Votes and Proceedings*, 1884, pp. 885-6

²⁰⁷ *ibid.*

²⁰⁸ Patrick, *Health & Medicine*, p. 17.

²⁰⁹ *ibid.*, p. 32.

²¹⁰ Tyrer, *op cit.*, p. 148; Thirty-Seventh Annual Report of the Brisbane Hospital Committee, 1885, Herston Library, Royal Brisbane Hospital, p. 3; In 1898 Dr Hare published a book titled *The Cold-Bath Treatment of Typhoid Fever*.

the disease.²¹¹ To illustrate the significance of these figures to the hospital it is useful to look at the figures in 1880. The death rate from typhoid fever per 10,000 of Mean Population was 2.03 and in 1884 it was 18.15. Queensland had the highest proportions of death from the disease of any Australian Colony. According to the Registrar-General's Report the statistics were as follows: Victoria 5.30, New South Wales 5.63, South Australia 5.03, and Tasmania 2.98. Western Australia was not mentioned in the report.²¹² The increase in the number of typhoid fever cases clearly indicated that one Resident Medical Officer was not sufficient to handle the workload, and it was in this environment that the Brisbane Hospital Committee decided to employ another Resident Medical Officer.

Dr Francis E Hare 'was selected from a number of competitors' for the position of Assistant Resident Surgeon, and this selection was reported in the Thirty-Seventh Annual Report of the Brisbane Hospital Committee as 'justified by the better attention afforded to patients, and the relief to Dr. Jackson, who, heretofore, was frequently in failing health through overwork'.²¹³ Dr E Sandford Jackson was the Resident Surgeon.

Dr Hare was born in Dublin in 1857 and in 1884 he graduated from Durham University in England with a Bachelor of Medicine degree.²¹⁴ Immediately upon his appointment to the Brisbane Hospital he was allocated the responsibility of the fever

²¹¹ M. Thearle, 'Dr F.W.E. Hare and the Cold Bath Treatment of Typhoid Fever' in Attwood H & Kenny G, eds, *Reflections on medical history and health in Australia: Third National Conference on Medical History and Health in Australia 1986*, (Parkville V: University of Melbourne, 1986), p. 152; *Thirty-Sixth Annual Report of the Committee of the Brisbane Hospital together with the List of Subscribers for 1884, 1885*, Herston Library, Royal Brisbane Hospital, pp. 3-11.

²¹² Registrar-General's Report-Vital Statistics, *Queensland Journals of the Legislative Council*, 1885, Vol. XXXV. Part 1, p. 1115.

²¹³ *Thirty-Seventh Annual Report of the Brisbane Hospital Committee*, 1886, (Herston Library, Royal Brisbane Hospital, pp. 3-4.

²¹⁴ Thearle, *op cit.*, p. 153.

wards. It was the exposure to typhoid fever and the fluctuating death rate that urged Hare to find a treatment for the disease that entailed more than good nursing. He studied the work of Dr Ernest Brand of Germany who had developed a treatment known as the cold bath treatment and with his own modification he recommended these procedures to the Brisbane Hospital Board. The Board gave their consent and on 1 January 1887 the cold bath treatment was introduced for patients who had been diagnosed clinically with the disease. Dr Brand's treatment 'consisted in total immersion in water at 65°F and the pouring of cold water over the neck and shoulders'.²¹⁵ Hare adhered to Brand's rule of taking the patient's temperature every three hours day and night and if it rose or exceeded 102.2°F then the patient was placed in a bath of water at a temperature between 70°F and 80°F for a period of approximately 10 minutes.²¹⁶ If the temperature of the patient had not fallen below 101°F then the treatment was repeated every three hours until the temperature was reduced.²¹⁷ Dr Hare recommended that cold bath treatment to occur between 7.00am and 10.30pm and cold sponging to be used during the night. He also recommended that the patient be placed on a strict diet of milk, beef tea and iced water.²¹⁸ Dr Hare claimed that this treatment reduced the death rate of typhoid fever considerably. In 1886, before the cold bath treatment was used, 464 patients were admitted to the Brisbane Hospital with typhoid fever of whom 68 died a mortality rate of 14.6 per cent. In 1888 there were 339 admissions and 23 deaths, a mortality rate of 6.8 per cent.²¹⁹

²¹⁵ *ibid*, p. 167

²¹⁶ *ibid*, pp. 155-59.

²¹⁷ F. Hare, 'A case of typhoid, treated by cold baths,' *The Australasian Medical Gazette*, Vol. V11, December 1887, pp. 60-63.

²¹⁸ *ibid*, p. 60.

²¹⁹ F. Hare, 'The influence of the cold bath treatment on the hospital mortality of typhoid', *The Australasian Medical Gazette*, Vol. V11, July, 1889, pp. 265-68.

Dr Hare's published works about the treatment were well received and many institutions in Australia introduced the method with favourable results.²²⁰

Historian John Tyrer stated that Hare's treatment was aimed to counter the injurious bodily effects of the high fever experienced with the disease.²²¹ Nevertheless, not everyone was impressed with his treatment. Dr Thomas Lucas of Brisbane produced a pamphlet titled *Shall they die? Statistics of the Brisbane Hospital* in 1889²²² vehemently challenging the scientific and humane basis of the treatment. He used phrases such as 'The terrors of the ice system hang over the Brisbane Hospital' and 'Ice baths lay the foundation of dire disease'. He referred to Hare's position in the hospital as 'an almost autocratic power [that] has been committed to the Resident Medical Staff'. He maintained that the treatment did not shorten the period of the disease for the patient, but extended it by weeks and months.²²³ The attack by Lucas was very strong and directed specifically at Hare and the Brisbane Hospital. There was also disagreement about the treatment amongst the medical men of Brisbane as was illustrated in various Letters to the Editor of the *Australasian Medical Gazette* beginning with Dr Thomas Bancroft who wrote:

... that the good which resulted was attributable partly, if not wholly, to the better nursing. Were the Bath Treatment at the Brisbane Hospital now abandoned, it is possible that a still lower mortality would be the result.²²⁴

²²⁰ H. Rabl, 'Treatment of typhoid fever by cold baths' *The Australasian Medical Gazette*, Vol. V111, September 1889, pp. 311-314; J. Colpe, 'The position of medical practitioners in Germany and the treatment of typhoid fever by ice baths' Letters to the Editor, *The Australasian Medical Gazette*, Vol. V111, September 1889, p. 338; Thearle, *op cit.*, p. 159.

²²¹ Tyrer, *op cit.*, p. 148.

²²² QSA: *Shall they die? Statistics of the Brisbane Hospital*, Committee Meeting Brisbane General Hospital, Letter from Lucas and copy of pamphlet attached, 11 June 1889, HOS1/D12, Item No. PRV5921-1-11.

²²³ *ibid.*

²²⁴ T. Bancroft, 'Cold bath treatment of typhoid fever at the Brisbane Hospital', Letter to the Editor, *The Australasian Medical Gazette*, Vol. XV1, April 1897, p. 198.

Dr E Sandford Jackson replied to this statement with the following:

I freely acknowledge that much of the good results are due to the skilful nursing of the past ten years; but a sudden improvement in mortality-results took place immediately after the treatment was begun, without any change in the staff, medical or nursing.²²⁵

Bancroft then responded by saying:

In deciding upon the merits or otherwise of the bath treatment in the Brisbane Hospital, it must be remembered that prior to its introduction immigration was at its height, and that many of the new arrivals fell victims to typhoid; the mortality with them was exceptionally high.²²⁶

It is clear there was support for Hare's cold bath treatment, but changes in nursing and the health problems on migrant ships arriving in Brisbane threw doubt on its success. Today the medical profession accepts Hare's principles; as John Thearle points out: 'Whatever the answer, the cold water treatment is occasionally applied today in a moderated form with tepid baths for febrile children'.²²⁷

CONCLUSION

Typhoid fever was a constant threat to the community of Brisbane. The financial crises that the Queensland government experienced after separation from New South Wales limited government funds, but the demand for a modern health system did not abate. The Hospitals' Inquiry in 1866 and the provision of a Fever Hospital from as early as 1862 for typhoid fever, and other fever type patients, illustrated the concern of the community. Outbreaks of typhoid fever and times of crisis forced the

²²⁵ E. Jackson, 'Dr Thomas Bancroft's inaccuracy' Letter to the Editor, *The Australasian Medical Gazette*, Vol. XV1, May 1897, p. 243.

²²⁶ T. Bancroft, 'The cold-bath treatment of typhoid fever in the Brisbane Hospital', Letter to the Editor, *The Australasian Medical Gazette*, Vol. XV1, June 1897, p. 297.

²²⁷ Thearle, *op cit.*, p. 166.

government to invest in the new hospital in Brisbane that assumed the mantle of the Metropolitan Hospital for the Colony of Queensland in 1866. The rapid growth of the population of Brisbane was a constant challenge to both levels of government, and there were times when the population outgrew the infrastructure. However, public outcry and media-based campaigns were relentless in bringing to the notice of the government public health issues such as nuisances that contributed to the spread of disease, particularly typhoid fever.

The economic conditions and ideological opposition to proper funding for government institutions meant that the hospital was under-supported and that the gaols and childhood institutions had the potential to harbour typhoid fever through poor sanitation.

The 1884 typhoid fever epidemic in Brisbane with its devastating death toll energised the community but the McIlwraith Government, to the detriment of the community, was not committed to public health. Official complaints to the Boards of Health ensured that the government was aware of the problem of Brisbane's sanitation, but the government refused to take action. This epidemic enabled the Griffith Government to triumph over the former McIlwraith Government by passing the *Health Act* of 1884 to empower the Brisbane Municipal Council to enforce higher sanitation standards and pollution control. The community's vigilance was rewarded.

The 1884 epidemic frustrated the medical profession as there was not a proven form of treatment for typhoid fever patients, and that is why Dr Hare developed his

method of the cold-bath therapy. However, there was considerable amount of controversy amongst the medical profession as to how effective this treatment was. The Queensland government and the community did not appear to enter into this debate; they left it to the medical profession to come up with the best method to treat the disease.

Throughout this period the Brisbane public remained vigilant about public health and with the support of major newspapers such as *The Brisbane Courier* and *Queensland Figaro* they ensured that the public and the government were at all times aware of public dissatisfaction. Until the Griffith Government's reforms the Queensland government continued their negligent approach to public health matters.

Unfortunately for the community typhoid fever did not wait for anyone and the Queensland death rate was the highest among the Australian colonies. Even after the 1884 epidemic had passed the Brisbane Hospital reported 287 deaths from typhoid fever up to 1902. Public health still required significant infrastructure expenditure on urban sewerage systems and centralized oversight and responsibility.

CONCLUSION

After 1859 Queensland was a fledgling colony with inherent financial problems and the government was determined that population and infrastructure growth such as road, railway lines and industry were to be the first and most important priority to ensure the prosperity of the colony. However, the infrastructure of drainage and sewerage was deemed secondary to other developments. Evidence suggests that because initially little was known about typhoid fever and its cause and that it was difficult to diagnose, the government and medical professions did not know what to target to ensure the health and welfare of the community. Nevertheless, typhoid fever was not prevalent among the Indigenous communities during the early part of the nineteenth century. Prior to 1850 – before the boom of urbanisation – there was also very little evidence that the disease was established in the White community although the convicts had suffered appalling death rates at the height of the penal settlement. Therefore, the development of urbanisation and typhoid fever worked side by side, and the government failed to recognise the danger of population growth without public health policies to protect the people of Queensland.

Once the interior of the colony was opened up to settlers in 1840 it was not long before villages began to appear and one such settlement was Toowoomba that was surrounded by rich and fertile countryside. A good climate and the existence of shallow aquifers plus a plentiful supply of timber ensured the success of Toowoomba as a growth centre.¹ Unfortunately, its geographical environment and urbanisation did not mix, and population growth and development without drainage and sewerage infrastructure left the community in a vulnerable position that was ripe for disease,

¹ Dansie R, *A short history of Gowrie Creek*, (Toowoomba Q: Toowoomba City Council, 1998), p. 2.

especially typhoid fever. It was in 1878 that the inevitable happened and typhoid fever rose to epidemic proportions with tragic consequences for the community. The Mayor of Toowoomba and Member of Parliament William Groom (also the owner of the local newspaper *The Toowoomba Chronicle*) realised that public health was not high on the list of priorities for the government and he set out with the support of the community to raise the profile of the situation. One of the first issues that Groom raised was the condition of the swamps surrounding Toowoomba as he believed they were a public health risk and that the engineering solution of draining the swamps was in the public interest. After a long campaign the government agreed for the swamps to be drained in 1873. Unfortunately, the wetlands were destroyed but future outbreaks of typhoid fever were not prevented. Groom continued his campaign to bring to the notice of the government the poor public health situation in Toowoomba and combined with the support of the community a government inquiry into 'The causes of the prevalence of typhoid fever at Toowoomba and the best means to be adopted for the suppression of the same' was established in 1878. It was found that drought; well water contamination; and 'total neglect of ordinary cleanliness,' and 'ignorance' were the causes of the disease. Two of the recommendations were to proclaim Toowoomba and district under *The Health Act of 1872*, and to abolish all cesspits and substitute with dry-earth systems. The proclamation of Toowoomba under the Health Act occurred, but only for a 12 month period, and (on economic grounds) no action was taken to implement the abolition of cesspits. Even though the Queensland Government and the municipal council had the evidence of the Inquiry and its recommendations for the prevention of further epidemics of typhoid fever public health remained a low priority level in terms of

governance. Therefore, not surprisingly the community was faced with typhoid fever once again in the early 1880s.

The city of Brisbane had as many problems as Toowoomba when it came to typhoid fever. Brisbane did not have an advocate with as much power and privilege as Toowoomba did in William Groom, but there were advocates, particularly medical men, and the community itself was very concerned about the number of typhoid fever cases and took their concerns to the newspapers. *The Brisbane Courier* and the *Queensland Figaro* were enthusiastically behind the push for sanitation reform and never missed an opportunity to publish their views. Meanwhile in the 1860s, as the number of typhoid fever cases increased, the resources of the hospital system were exhausted and the medical men looked to the government to establish a special fever hospital to take care of the typhoid fever patients. This move brought out the fear and prejudice the community harboured about typhoid fever; on the one hand they wanted the government to supply a fever hospital, but not in their back yard. A debate was played out in the newspapers with Letters to the Editor and editorials but the government was not swayed and a fever hospital was opened in Green Hills in 1863 and operated until 1865.

Unfortunately, lessons were not learnt from the Toowoomba experience of 1878 and in the 1880s Brisbane was in the midst of its own typhoid fever outbreak. In 1884 the situation had deteriorated and 91 people lost their lives with countless other people becoming sick. The community was outraged with the numbers stricken with the disease and voiced their displeasure through the newspapers about the lack of sanitation, and poor drainage resulting in the government finally appointing a

Committee to Inquire into the Prevalence of Typhoid Fever in Brisbane and Suburbs. At this time the Queensland Government led by Thomas McIlwraith refused to take responsibility for public health matters and insisted that public health should be left entirely to the local bodies elected by the ratepayers. So once again recommendations of an Inquiry were not implemented and typhoid fever continued to claim many lives. It was not until Samuel Walker Griffith came to power in 1883 that public health gained a little attention from the government. Griffith appointed Dr W F Taylor, a Member of the Legislative Council, to investigate the system of sanitation and disposal of sewage in Great Britain during his visit there. Taylor's report was extensive and acknowledged the growing acceptance of the germ theory. On this occasion the government did not take up his recommendations, but his report laid the groundwork for the sewerage system that was developed for the city of Brisbane in the 1920s. The 1884 typhoid fever outbreak was perhaps the turning point for public health when the Griffith government introduced the new Health Act in the same year.

A positive outcome from the Brisbane typhoid fever crisis was the development of treatment for the disease. Dr Frances Hare, Resident Medical Officer to the Brisbane Hospital, devised and implemented the radical cold-bath treatment for typhoid fever patients. Not everyone in the medical profession was convinced that his methods were beneficial to patients. Dr Hare's published works about the treatment were well received in other colonies of Australia, but the medical men of Brisbane were divided. This led to a public debate in the newspapers with Hare strongly defending his treatment.

This study has affirmed the work of Barclay and Patrick but also contributed to our understanding of the reaction to typhoid fever by investigating the extent of communities' responses to the threat of the disease. They were not always focused on prevention but capable of "nimby" reactions and also politicisation of hospital committees and boards so that even the best treatment became a political debate owing to professional jealousy.

The political leadership of Groom proved an asset but not a long term solution to the sanitation problems experienced in Toowoomba. The Brisbane scenario highlighted how easy it was to play municipal against colonial government levels, politician against politician and doctor against doctor. Unfortunately, community voices were not strong enough in Brisbane to overcome political fractiousness. It took another dreadful epidemic in Brisbane, that of plague in 1900, to prompt the colonial government to appoint a Commissioner of Public Health with greater powers than the old Central Board of Health to solve the problem.²

This study has contributed to a better understanding of the social conditions of Toowoomba and Brisbane in the nineteenth century. It has also illustrated that poor public health policy by all levels of government has a devastating effect on communities. However, there remains much more work to be undertaken before the chapter on typhoid fever can be closed. One area would be the examination of immigration and if it contributed to typhoid fever remaining endemic in the colony of Queensland. Another area would be to investigate the effect that carriers of the disease had on various outbreaks.

² R. Patrick, *A History of Health & Medicine in Queensland 1824-1960*, (St Lucia Q, University of Queensland Press, 1987), p. 58. The assent of the Health Act of 1900 was published in the *Queensland Government Gazette* on 20 November 1900.

The shame of the typhoid fever experience in Toowoomba and Brisbane was that it was a preventable disease especially by the late nineteenth century yet the Queensland government refused to take responsibility to ensure the health and welfare of its people. As historian Enid Barclay stated, if only the government had ‘grasped the principle that prevention ... is the ultimate aim of public health programmes’.³

It may be asked why a study into typhoid fever would be relevant in today’s society. With the advent of modern day epidemics such as SARS and AIDS valuable lessons from the past can be learnt. The most important lesson from typhoid fever in the nineteenth century is that all levels of government must ensure that public health receives high priority in governance at all times and that it often requires strong public advocacy campaigns to force governments to take up this responsibility. Typhoid fever was a preventable disease but a cautious approach and low priority public health policy by the Queensland colonial government ensured that the disease remained endemic and the risk of epidemics was inevitable.

³ E. Barclay. Aspects of public health in Queensland from 1859-1914, Master of Arts Thesis, University of Queensland, 1979, p. 408.

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APPENDIX 1
MAYORS OF TOOWOOMBA 1861 - 1904

YEAR	NAME
1861	William Henry GROOM
1862	William Henry GROOM
1863	Abraham Hamilton THOMPSON
1864	William Henry GROOM
1865	Thomas George ROBINSON
1866	Edwin Woodward ROBINSON
1867	William Henry GROOM
1868	Joseph WONDERLEY
1869	Joseph WONDERLEY
1870	Henry SPIRO
1871	Michael POWER
1872	Richard GODSALL
1873	Henry SPIRO
1874	Robert ALAND
1875	Robert ALAND
1876	John GARGET
1877	John GARGET
1878	John GARGET
1879	Richard GODSALL
1880	Joseph S McINTYRE
1881	John Poole McLEISH
1882.	James CAMPBELL
1883	William Henry GROOM
1884	William Henry GROOM
1885	John GARGET
1886	Charles CAMPBELL
1887	John FOGARTY
1888	Thomas TREVETHAN
1889	Edmund BOLAND
1890	James TAYLOR
1891	Gilbert Gostwick CORY
1892	John FOGARTY
1893	William THORN
1894	Archibald MUNRO
1895	Malcolm GEDDES
1896	Alexander MAYES
1897	Edmund BOLAND
1898	Robert SINCLAIR
1899	Hugh Campbell POINTER
1900	Mathew KEEFFE
1901.	Charles ROWBOTHAM
1902	Charles ROWBATHAM
1903	Alexander MAYES
1904	Thomas Stephen BURSTOW

Source: The Toowoomba and Darling Downs Family History Society Inc.

APPENDIX 2

WORKMEN AND QUARTERS AT FOUNTAIN'S CAMP



Source: The Workshops Rail Museum, Brisbane¹

¹ Ipswich Toowoomba Const. Workmen & Quarters at Fountain's Camp, 1867, Image Negative Number X1263, The Workshops Rail Museum, Brisbane.

APPENDIX 3

Return showing the Total Number of Deaths Registered in Toowoomba District since the beginning of the Year 1874; also showing Certified Causes of Deaths in the same District, and for the same period, under the headings Diarrhoea, Dysentery, and Typhoid Fever.

	1874					1875					1876					1877					1878				
	ENTERIC DISEASES				Total Deaths Registered from all Causes	ENTERIC DISEASES				Total Deaths Registered from all Causes	ENTERIC DISEASES				Total Deaths Registered from all Causes	ENTERIC DISEASES				Total Deaths Registered from all Causes	ENTERIC DISEASES				Total Deaths Registered from all Causes
	Diarrhoea	Dysentery	Typhoid Fever	Total Enteric Diseases		Diarrhoea	Dysentery	Typhoid Fever	Total Enteric Diseases		Diarrhoea	Dysentery	Typhoid Fever	Total Enteric Diseases		Diarrhoea	Dysentery	Typhoid Fever	Total Enteric Diseases		Diarrhoea	Dysentery	Typhoid Fever	Total Enteric Diseases	
January	6			6	15	2	1		3	13			2	2	21	2			2	16	1	7	1	9	24
February	2			2	14		1		1	15					9	1			1	12	1	2	2	5	16
March	2		1	3	14	2	4		6	22		1	2	3	14	3	1	3	7	27	3	4	2	9	25
April					7	2	2		4	11		2	1	3	14	2	4	2	8	22	4	3	11	18	47
May			1	1	14			3	3	18		5		5	13		2		2	14					
June					6					11		1		1	13	1	1	1	3	18					
July					10	1	1	1	3	23					23					10					
August					9		4		4	14			2	2	11	1			1	12					
September	1			1	6	1	5	3	9	18			1	1	16				3						
October	3			3	16	2	10		12	27			1	1	15	2	2		4	16					
November	2		1	3	14	2	7	1	10	32	1	1	1	3	12	6	3		9	23					
December	4	1		5	15	2	8		10	25		3		3	12	1	2		3	16					
	20	1	3	24	140	14	43	8	65	229	1	13	10	24	173	19	15	6	40	189	9	16	16	41	112

Source: *Votes and Proceedings*, 1878, p. 775.

APPENDIX 4

Return showing Percentage of Deaths certified as from Enteric Causes, in general Death Rate for the Months of January, February, March, and April, in each year.		
	Four First Months.	Month of April only.
1874	22 per cent.	0 per cent.
1875	23 "	36 "
1876	14 "	21 "
1877	23 "	36 "
1878	36 "	38 "

Return showing Percentage of Deaths certified as from Typhoid Fever in general Death Rate, for the Months of January, February, March, and April, in each year.		
	Four First Months.	Month of April only.
1874	2 per cent.	0 per cent.
1875	0 "	0 "
1876	9 "	7 "
1877	6 "	9 "
1878	14 "	23 "

Source: Votes and Proceedings, 1878, p. 775.