SELF-CULTURE: HEALTH REFORM AND SOCIETY IN ATLANTIC CANADA AND THE NORTHEASTERN UNITED STATES

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SELF-CULTURE: HEALTH REFORM AND SOCIETY
IN ATLANTIC CANADA AND THE NORTHEASTERN UNITED STATES.

BY

© Michael Joan Smith, B.A., M.A.

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ABSTRACT

In the last half of the 19th century the quest for health was paramount for North Americans. This dissertation will examine the work of health reformers from 1860 to 1900. Attention will be paid to phrenologists, hydropaths, and physical culture specialists. These reformers believed that the healthy body was symmetrical, that good health was a natural condition for both men and women, and that the best prescriptions were based on nature's laws. Reformers condemned the heroic treatments of medical practitioners, and claimed that their medicines were harmful. Along with their health regimens which stressed knowledge of oneself, proper diet, pure air and water, and exercise, health reformers were prominent in the various reform movements of the day, such as dress reform, communitarianism, women's rights, abolition of slavery, and spiritualism.

Just as health reformers attacked allopathic medicine, so regular doctors denigrated health reform as unscientific. Yet physicians knew that their own therapeutic abilities were limited. As a result they co-opted the health reform regimens claiming them for their own, and at the same time they ignored the ideology that was central to the alternative ideology. The work of the reformers was based on their belief in a tripartite equilibrium of physical, mental, and social health. They felt that the condition of the human body was symbolic of the state of society. They felt that if just one person could
gain physical health, then that would benefit social health. This belief in an equilibrium was representative of an emergent middle-class in Victorian North America. Unfortunately for health reformers, by the turn of the century their ideas had been either denigrated or co-opted by the allopathic opposition; their ideology had become meaningless in the face of early 20th century capitalism; and their contributions to health and society forgotten.
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CHAPTER ONE:
The Genesis of Health Reform

You seek to be rich? then I ask you why: Because you would revel in wealth? What would the world's riches to you signify? If you were deprived of your health?  

In the last half of the nineteenth century the quest for health was analogous to the pursuit of wealth. Throughout Northeastern North America, the steady advance of industrial capitalism brought change to the life of bourgeois and worker alike. One change that affected all people was an alteration in the perception of personal well-being. This dissertation deals with the impact of a variety of health reforms on both individuals and society in Northeastern United States and Atlantic Canada from 1860 to 1900. As rigorous time schedules were enforced, as the speed and dangers of industrial machinery increased, as factory wastes and uncontrolled sewage damaged the air, water, and land, as urbanization and 'civilization' brought increased threats of disease and epidemics, people became aware that health was a precious commodity. As Nova Scotian, James Barry penned:

I am in health but not in wealth  
A better to remain so, -  
Then he in wealth, and not in health  
For then we do complain so.  
For what is wealth compared with health  
You cannot run the parallel  
For if in health, we are in wealth  
Tho' poverty is at our bill.²

Their concerns were enhanced by the common knowledge that the heroic measures of regular or allopathic physicians were often
useless and sometimes dangerous. A large minority made a conscious choice for a different, but equally viable, medical paradigm that stressed the healing benefits of nature and the naturalness of good health. Others utilized both health reform ideas and allopathic treatments in their drive towards improved health. These health regimens, mesmerism and phrenology, hydropathy or water-cure, and diet and exercise formulas, varied in approach and application but were generally concerned about the restoration and maintenance of a natural mental and physical balance. The ideology of health reform, however, went beyond the improvement of personal health; its advocates had a vision not only of alternate cures for the individual, but of remedies for social ills and imbalances. While both contemporaries and hindsight have denigrated the health reformers' influence as a short term fad, or less charitably as quackery, throughout the nineteenth century they played important and significant roles as practitioners, social commentators, and cultural barometers. What they have left for the people of the twentieth century is not only a brief flurry of idiosyncratic and diverse ideas, but also a challenge to the orthodox medical profession, which dared to offer a possible alternative system of health care. That antipodal system of health reform ultimately was either lost to or co-opted by the demands of modern capitalism, intrusive and impersonal state institutions, and an army of
professional experts who have intruded on a formerly private and personal realm.

From the 1830s to 1860s there was a flurry of excitement about the possibilities of the various health reform regimens, so much so that in these early years alternative medicine could be described as a fad or craze. But alternative medicine did not end abruptly with the onset of the Civil War or the professionalization of medicine. Those who supported health reform regimens usually were converted for a lifetime. In addition there were large numbers of patients who tried all sorts of therapies, both regular and irregular, in their search for health. The years 1860 to 1900, therefore, are of particular importance. These are the years in which health reform supposedly declined, but this thesis will demonstrate that for many people some or all of the various regimens were essential components of their health care system. Adherents not only incorporated facets of health reform prescriptions into their lifestyle, but accepted many of the ideological assumptions that were part and parcel of the health reformers' therapies.

This dissertation will deal with those alternative regimens based on four specific criteria: first, a conceptualization that there should be a natural balance of the mental, moral and physical faculties in the body; second, a belief that good health was both a desirable and a natural condition; third, a belief that the secret to good health lay
in natural therapeutics; and fourth, a commitment to the notion that social health was a reflection of individual health. These characteristics of health reformers are important since the boundary between health reform and regular medicine at times was indistinct. On one hand, health reformers often trained at allopathic institutions to gain the authority of a medical degree, even though they ultimately practised using alternative remedies. On the other hand, some allopathic physicians incorporated irregular methods into their practice even though they maintained a steady opposition to health reform itself. The ideas and ideology of health reform though, emerged from the work of phrenologists Gall and Spurzheim, hydropath Priessnitz, and the gymnastic routines based on German and Swedish exercise routines. It was the commitment to health reform, and the opposition to allopathic medicine, that delineates between these border-line cases.

Chapter one will discuss the early history of the health reform movement, which like allopathic medicine, can be traced back to the Hippocratic years. It will also examine the historiography of the reform movement and consider some of the limitations of previous research on the topic. While this area of social history is in its infancy, it is exciting to see the rapid progress made in the field. One of the aims of this dissertation is to bring attention to health reform in the Canadian realm. While a start has been made to touch on relevant subjects, there is still much to be done. Health
reform across Canada, the French Canadian and health reform, a synthetic history of Canadian sport and recreation, and homeopathy in Canada, are just some of the areas that cry out for more exploration. The nucleus of health reform was in the Boston and New York area, but the effects of the movement were felt throughout North America. This thesis adds a new dimension to the history of health reform since it examines the post-1860s impact in regions to date unstudied along with the more populated areas.

Chapter two will examine one of the most important of health reformers' assumptions, the belief that there was a natural tripartite balance in health and in society. Reformers suggested that the healthy human body should maintain a harmonious balance between its moral, mental and physical powers. Health reformers believed that if just one individual attained this balance, then they would contribute in a small measure to improved social harmony and health. The concept of equilibrium extended beyond the notion of a harmonious and symmetrical physical state. It was extrapolated into the social realm where the belief in a balanced world illustrated the aspirations of reformers and the limits of a class vision even as that class emerged during the early onslaught of capitalist development.

The beliefs that good health was a natural condition and that nature was a cure for ill-health, were also a component of health reform. A corollary of the notion of the balanced
body was a long standing belief in women's connection to nature. More creative, more earth-bound, more sensitive, more nurturing, women were considered to be ideally suited as health care givers. This is not to be dismissed as mere maternalism, for the health reformers belief in harmony and balance led them to support the concept of gender equality and greater roles for women. While women never dominated the health reform field, they did hold positions of leadership and equality in it that they were denied in regular medicine. The final section of this chapter will look at social reforms and health reformers' attitudes towards the broader society. While their specific regimen would, in their minds, best contribute to the perfection of health and society, health reformers participated in other reform movements in the hopes of hastening worldly perfection.

The next three sections will focus on case studies of particular health reforms. Chapter three will examine phrenology, an area where health reformers lay down the blueprints for the healthy body. Phrenologists delineated the potential for perfection in health and character and argued that society too, could benefit from their advice. There were many phrenologists who left behind no records for historians to study. Who was the phrenologist, Professor Alexander, who gave a series of lectures in Halifax in 1896? He spoke on topics such as 'human nature' and 'success in life,' and as well, examined several young men. Even more intriguing is "a
Mulatto, by name, Randolph," who lectured at a John McDonald's house near Pictou, Nova Scotia. A diary tells us only that, and the fact that the writer was too busy to attend. What about the Dr. Clark who lectured on physiognomy in a Temperance Hall somewhere in Nova Scotia in August 1873? Another diary, written by an unidentified woman, tells us only that the talk lasted about 90 minutes. He was probably the same Dr. Clark who visited St. John's, Newfoundland and lectured in the Fisherman's Hall in 1871. One of those lectures compared the likeness of men to that of the lower animals. The hall was left open all day so visitors could see the life-size oil paintings of celebrated people. It was "a pleasant, instructive and profitable hour" for those who paid the 6 pence to hear the lecture. During other talks on "Courtship and Marriage" and on the "Nervous System and Mind," he spoke extemporaneously and tended to ramble. Still, the Public Ledger noted it was a valuable presentation that offered information on the organs of the body, and that included a "homely chit chat" on nightmares, dreams, and clairvoyance. In addition, Clark offered character delineations that drew upon the "science of Physiognomy," and he "very truthfully" gave character sketches of well-known figures in the community. Most likely Clark had studied physiognomy at the New York Phrenological Institute, since his format and ideas very much resembled the work of the leaders of that institution. He may even be the reason that the Public Ledger began advertising
and recommending journals such as the *Phrenological Journal*. But the details of his life probably will remain lost, as are the lives of Alexander and Randolph.¹

The Fowler family were the dominant phrenologists in North America. Their merchandising of the product, their generational experience, and their influence through publications, a publishing house, the Institute of Phrenology, and constant personal lectures and delineations were phenomenal. While the family has figured in other studies,² this chapter will concentrate on phrenologist Orson Fowler and his views on sexuality, health and social reform. Orson Fowler was renown as a phrenologist from the 1830s to 1880s. In his last years though, while under attack for his views on sexuality, he began a world tour which ultimately brought about the end of his professional career. Despite this, phrenology continued to gather attention. In a later chapter the 20th century friendship of neurologist Burt Green Wilder and phrenologist Jessie Fowler will be discussed. This material is not only new but relevant to both the longevity of health reform ideas, and to the eventual co-optation of phrenological and health reform ideas.

The focus in Chapter four will be on hydrotherapy and nutrition. These regimens stressed building the healthy body by ingesting the proper foods in the correct manner, by applying various forms of water-therapy, from showers to baths to douches, and by paying attention to preventative therapy.
This chapter will examine some water-cure facilities, their duration, programmes and leaders. It will conclude by discussing the turn-of-the-century transformation of hydro-pathic principles. Like other therapies, hydro-pathic ideas were coopted by allopaths, and transformed by consumers in the pursuit of leisure by the 20th century. Hydropaths, like many other reformers, stressed the importance of appropriate nutrition, and this too will be discussed in this chapter.

While phrenologists promoted a design for improved health and society, and hydropaths established ways to build up the diseased body, physical culture specialists hoped to re-create the physical body through various forms of recreation and exercises. Like other health reformers, physical education supporters argued that healthier bodies would lead to improved social health as moral, physical and mental sensibilities balanced. All three of these chapters will use empirical evidence and case studies to demonstrate, first the ideology of the reforms, second, the links to social health from personal health and third, the client's reception of health reform ideology.

All of these chapters will examine more closely the issue of health reform and social reform, and will discuss the need for harmony in the individual body and the social body. Andrew Jackson Davis, seer and health reformer, articulated the feelings of many health reformers when he stated:

Individual harmony is essential to family harmony; family harmony is essential to social harmony;
social harmony is essential to national harmony; and national harmony is essential to universal harmony among the inhabitants of the earth. The whole proceeds from, and depends upon the soul, and perfection of the individual. 6

Reformers felt that society reflected the human condition, and that both were perfectible if permitted to develop in a harmonious fashion. That notion of equilibrium was common in the nineteenth century and it was central in the health reform ideology.

Chapter six will deal with the allopathic opposition to and co-optation of the various health reform regimens. Each therapy encountered opposition from regular medical men, cynics, scientists, and intellectuals. The availability of inexpensive and popular therapies threatened physicians. The reformers' denigration of their allopathic medical expertise insulted regular practitioners who increasingly became intrigued by the possibilities and successes of alternative therapies at a time when they recognized the limitations of their own therapeutic approach. Physicians modified, adapted, and adopted cures that originated with health reformers. This dissertation will detail how many regular physicians began to introduce many of the contributions of health reformers into their own work, managing at the same time to continue to condemn irregular ideas. As orthodox medicine finally started to make therapeutic gains in fields such as bacteriology, in disease prevention, in antiseptic surgery, and in the establishment of hospitals as more than places of death, physicians
gained more and more of the public's trust and legitimated themselves as the true possessors of science. The health reformers, whose notions of individualism and whose anti-intellectual ideology made the establishment of standardized educational facilities unlikely, whose therapies were expropriated by the allopathic physicians, and whose world vision of social harmony was no longer compatible with the inequalities of corporate capitalism, often were marginalized into curiosities valiantly struggling to maintain a no longer viable ideal. At times cooptation may seem like an ideal way for unorthodox ideas—medical or otherwise—to gain exposure and acceptance. In fact, though, cooptation usually means that ideology has been sanitized or lost, and the status quo unaltered. While many health reform ideas became part of allopathic therapeutics the more radical ideology of health reform was lost, the stress on patient participation in treatments vanished, and the push for patient comprehension of disease and health was lost. The threat from and cooptation of alternative medicine encouraged regular practitioners to close their ranks against challenges from outsiders, those untrained in allopathic principles.

The final chapter will discuss the demise of health reform. While other similar movements to improve the human body have emerged, this particular one, with its natural approach and its aspirations of improving social and physical health, sputtered to a stop in the early 20th century. Health
reformers were redundant. They had no more answers for a modern world suffering from the adverse effects of rapid industrialization and the apparent degeneration of individuals and society. The dream of harmony and equilibrium was out-of-place in a social order rent by class divisions. The fear of degeneracy, not the desire and hope for physical, moral, and mental perfection, led the way for the rise of the scientific expert, state interventionism, and altered perceptions of health and physical fitness. A 20th-century way of looking at the human body would evolve in order to reduce the worst excesses of corporate capitalism and to maintain the status quo. New solutions for physical and social degeneracy would emerge as an overt attempt to minimize class differences without challenging the social order. Scientific management, eugenics and eugenics movements, sanitation and public health in part, were an attempt to stem this tide of apparent racial, moral, and physical degeneration. What emerged would be a co-optation of reformers' regimens and their concern with the harmonious social and physical body. This transformation ultimately left the reformers in obscurity, denied the importance of their contributions to modern medicine, and offered up formerly private matters to the gaze of experts and professionals.

The 19th-century concern with health was hardly a new concept. It had a history dating back to Graeco-Roman traditions and involved a philosophical debate on body-mind
relationships. There was an increasing focus, however, on the concept of health in the nineteenth century. Indeed, as Bruce Haley has argued, "no topic more occupied the Victorian mind than Health - not religion, or politics, or improvement, or Darwinism . . . Victorians worshipped the goddess Hygeia." Haley argued that the development of physiology as a distinct science, a growing belief in the interdependence of physical and mental health, and a recognition of the need to educate the total man, all spawned a powerful interest in health matters. In addition Haley noted that in the first half of the century, "the medical world was raising the expectation that treatment of the body could become as exact a science as knowledge of the body." Despite such hope, however, anatomy, pharmacology, and physiology, all advanced without a corresponding acceleration of therapeutic successes. Even though symptoms could be controlled at times, recovery from disease throughout the 19th century was often in spite of allopathic treatment, rather than due to its medicines and heroic treatments.

Everyday life demonstrated at once the need for personal health and its elusiveness in the bourgeois family and the proletarian family. Threats to one's well-being lurked from birth to death. Child-bearing remained a hazardous moment in a fragile life-span as both infant and maternal mortality remained high. Frequent epidemics attacked young and old, rich and poor. In addition there was a growing awareness of
the threat to physical well-being by industrial capitalism, whether from industrial accidents, from the diseases that lurked in over-crowded neighbourhoods, or from the ill-health that resulted from over-work in poorly-ventilated and unheated factories. Nor was the middle class immune to the disabilities that resulted from the ennui of numerous men and women with unaccustomed leisure time, unusual stresses, and an opulent and unhealthy lifestyle. And for both classes there was the ever-present spectre of accidental injury and death - a loose team of horses, an overturned lamp, a fall in an unlit street, an unexpected winter storm; all threatened men, women, and children on a daily basis.

One way to combat and prevent disease and injury was to patronize allopathic physicians, the medical practitioners who ultimately achieved hegemonic control. Aptly termed heroic medicine, most allopathic treatments consisted of heavy bleeding or venisection through lancet or leech, or dosages of antimony, calomel, arsenic, opium, and other drugs which could and did cause severe side effects, disfigurement, and death. In the last half of the 19th century allopaths tried to reduce their use of some of these treatments. In the absence of better cures, though, heroic measures continued to a great degree. Medical doctor William Hooker, for example, argued that medicine "will probably be proved by the tests of a rigid observation to be aimless, but by no means harmless." So commonplace was the feeling of exasperation at the futility
and danger of allopathic therapeutics, however, that many patients chose other methods of health care.

The roots of the various health reforms, as also for allopathic medicine, originated much earlier than the nineteenth century. Hippocratic texts suggest that illness was a result of either environmental factors such as seasonal or temperature changes or to individual excesses of diet, exercise, alcohol, or sexual activity. Harris Coulter and Phillip A. Nicholls have both argued that there were two different paradigms that resulted from the Hippocratic texts. One was the rationalization behind regular medicine: active intervention to alleviate the symptoms of disease. The other was based on the notion of the similar, upon which the ideas of homeopathy, a system of medicine which flourished in the nineteenth century, was based. Homeopathy is a "therapeutic system which argues that in the domain of illness and its treatment, a causal relationship obtains between similars; the administration of a drug, known to produce a symptom complex identical with that manifested in an individual case of illness, will restore the patient to health." For Coulter and Nichols homeopathic treatments were not only a viable alternative to the rigors of heroic allopathic medicine, they also argued that the system had a valid history and a potentially viable future.12

While health reformers were generally opposed to medications, they considered the minute dosages needed for
homeopathic cures far less stressful on the body than the heroic measures of most physicians, and thus, not as objectionable. In fact, many of the characteristics of the homeopathic system and its alternative paradigm were common to the health reform movement. Along with a gentler therapeutic approach, health reformers and homeopaths alike believed in the importance of a holistic approach and the need for lengthy observation of the patient. Both approaches were based on a belief that health - not disease - was a natural condition of humankind and that the human body had natural recuperative or regenerative powers that often eliminated the need for medication. For health reformers phrenology, mesmerism, proper diet, water therapy, and exercise were regimens that would establish the natural and healthy condition of the body.

Mesmerism was one branch of the health reform tree that carried residual elements of an older medical tradition while offering promises for the future. Mesmerism, like other health reforms, was both condemned as quackery and praised as salvation. Franz Anton Mesmer, born in 1734 and trained as a physician, was its founder. He argued that the entire planet was bathed in an unseen fluid that surrounded and penetrated all objects; sickness was merely the obstruction of this fluid's movement through the body. Health and harmony could be restored by "mesmerizing" or massaging critical poles in the body and inducing a "crisis" often a dramatic convulsive state. Mesmer and his followers were able to induce trances
in patients as they massaged the magnets or poles of the body. Robert Darnton has argued that this "proto-science" was a combination of ideas about the occult, modern science, and reason in an age that considered such a blend perfectly acceptable. Mesmerism had detractors, of course, just as it had extremely devout disciples. Even today the debate continues. Robert Darnton, placed Mesmer in the context of the French Enlightenment, and suggested that, "One cannot get close enough to the man to determine whether or not he was a charlatan; if he was, he certainly dwarfed his fellow quacks." More partisan than Darnton, James Wyckoff has argued that Mesmer was not only a physician but also a healer and "principally a discoverer whose discovery was denied in his own day and still is in ours, two centuries later.""14

Despite much opposition, mesmerism attracted attention in France particularly within the middle class, where it was used more as an aid in interpreting the astrological and cosmological mysteries of the universe than for its therapeutic properties. Spurned by most professional medical men, Mesmer and his followers tried to garner popular, egalitarian, and radical support. Such a move seemingly politicized the movement. Along with the taint of immorality associated with the familiar touching of bodies to discover a patient's magnetic poles, this radicalization and the controversy it spawned limited the influence of mesmerists. Mesmerism ultimately lost popularity in France in part due to the
obstacles caused by the opposition, and the political and social dislocations of the late 18th century.\textsuperscript{16}

Despite mesmerism's decline in post-Revolutionary France, the ideas spread across the English Channel and across the Atlantic Ocean.\textsuperscript{17} Once again, as had happened in France, individual interpretations and political and professional objectives transformed mesmerism from its original agenda. In North America mesmeric ideas merged with other health reform ideologies, in particular with phrenological notions. The science of phrenology originated in Vienna under the guidance of Dr. Franz Joseph Gall, who noticed as a boy that persons with certain physical features had similar personality traits, such as the ability to remember. "Proceeding from reflection to reflection, and from observation to observation," said Gall, "it occurred to me that if memory were made evident by external signs it might be so with other talents or intellectual faculties." Gall began lecturing and teaching his ideas in 1796, and many of his lectures were published. Phrenology was based on three principles: the brain was the organ of the mind; the brain was composed of parts, which determined a person's "faculties," or intellectual or moral characteristics, and the size of these parts was related to their development.

In 1805 Dr. Johann Spurzheim, a former student, began to lecture with Gall and in the next eight years they travelled throughout Europe speaking, writing, and exploring the
potential of phrenology. J. Fred Blumenback, an early nineteenth-century medical professor, lauded their accomplishments: "The whole praise of discovery belongs to Dr. Gall, but Dr. Spurzheim has made such advances to have almost equal merit. The science of craniology is entirely theirs; nearly so henceforward will metaphysics be regarded; and anatomy must acknowledge them among its greatest benefactors." There were other contributions of phrenology. It centred the "soul" of man in the brain, a rather radical idea at the time, "one of the nineteenth century's great discoveries and one that has become part of modern natural and social science." Even those not in agreement with phrenological laws, offered praise. Some 100 years later anthropologist Cesare Lombroso would note that:

the system of Dr. Gall may not be considered by all correct in every point, yet at the same time, it has led to the discovery of the cortical centres. However, the work, which comparatively few people know or admire, is, nevertheless, the result of immense and diligent series of studies in the nerve centres (centri perosso), which makes it the precursor of Criminal Anthropology.¹⁸

Phrenology did not become truly popular in North America until 1832 when Spurzheim visited the Boston area. While his tour was cut short by his sudden death, Spurzheim's ideas spread among Americans. A student at Amherst University, Orson Squire Fowler, a poor farm boy who subsidized his studies by carrying firewood for more affluent pupils, was influenced by Spurzheim's ideas and embarked on a life mission of phrenological consultations, lectures, and publications.
He would popularize the ideas of Spurzheim and Gall, as well as his own discoveries about the phrenological laws of health. He was aided by his relatives such as Lorenzo Niles Fowler, his sister-in-law, Dr. Lydia Folger Fowler, and his half-sister Charlotte Fowler Wells. In turn, the Fowler clan began to influence Americans as to the promises and possibilities of phrenological knowledge. Lorenzo Fowler listed the benefits of a study of phrenology:

The advantages of a knowledge of Phrenology are many, viz., it teaches, firstly, self-knowledge; secondly, how to develop the organization as a whole harmoniously. Thirdly, it enables us to govern and education each faculty, to control the propensities, to cultivate and direct the moral feelings. Fourthly, it indicates the particular calling or pursuits by which everyone may succeed in life. Fifth, it enables the parent to be more faithful to the discharge of his duties to his children. Sixthly, it assists in the choice of servants. Seventhly, it is an important aid in the practice of the different professions. Eighthly, it teaches charity for the frailties of others. Ninthly, it makes valuable suggestions for the treatment of criminals. Tenthly, it gives many important hints with regard to the cure and prevention of insanity. Eleventhly, it enables a person to choose an agreeable, congenial companion for life. Twelfthly, it teaches that moral perfection is the most desirable to be attained in this life.

One of the prime concerns of the Fowlers and other phrenologists was that people gain "self-knowledge," an awareness of their personal short-comings or attributes. Once aware of these tendencies, an individual could begin to improve their own personality and health, and, as well, better society. This was one of the prime innovations of North American phrenologists: a person was not limited to the
faculties given at birth but could, with self-knowledge, work to improve the qualities that were deficient or excessive.

Any knowledge is useful, but self-knowledge is of the greatest importance. It helps us to know our grade; our standpoint; our duties and obligations; our bodily and mental powers; our strength and weakness; our mission in this world; our sphere of labour; our relations to others; how much and what to eat and drink; how much to work and study; how much of retirement and company we need; how to select a companion; how to train a family; our best way to get through life; our final destiny; in short, how to live and how to die.21

To live as one should, then, it was imperative that a person have both a phrenological examination and an understanding of its principles. As Lorenzo Fowler stated, "Phrenology makes us acquainted with the laws of life and health. In order to obey these laws we must have a knowledge of them; in fact, if we live in obedience to the dictates of nature, we must know how to live."22 The application of phrenological knowledge to improve both the individual and society became known as "practical phrenology."

Besides self-knowledge there were other aspects of phrenology which linked the science to other emergent health reforms. To obtain a true "harmony between the one part of the system and the whole," it was also necessary that people be aware of the laws of physiology, health, and hygiene. Bad food or an inadequate exercise routine could harm the human organism mentally, morally, and physically. Even improper study habits could harm the growing child. "We should know how to feed and keep the body full of life and vitality, to
give every function its due attention, to take sufficient exercise, so that the muscular system shall continue active while life lasts, should understand the nervous system so that the brain will not wear out the body. A person has the full control of himself in proportion as all of his powers are brought into use," said Lorenzo Fowler, as he urged patients to cultivate their character and physical bodies. "Perfection depends upon a full development, legitimate use, and right direction of the whole mind, the superior part taking the lead . . . . It should be the aim of us all to arrive as near perfection as possible, for the more disciplined and developed we are in this life, the better shall we be prepared for our eternal existence."23 Perfection then was possible, if one was prepared to live according to the laws of nature and incorporate the health reform principles into one's lifestyle.

Other health reformers, besides phrenologists, advocated a variety of regimens as the means to a healthy body. In the 1830s Sylvester Graham was the first to publish on the new ideas and anxieties about physiology and to proffer a regimen to promote good health. He forwarded a central thesis that stimulation led to debility, and used this idea along with the ideas of eighteenth-century physicians and theorists to "arrive at a rationale for temperance, a vegetarian diet, and sexual continence." Now immortalized as the founder of Graham crackers (although he probably would not have approved the modern product), Graham found much acceptance in his time.
His ideas on healthy living "were adopted, directly and virtually intact, by the Seventh-Day Adventists; and on a more secular level they ultimately led to the rise of the modern American breakfast cereal industry . . . [and influenced] a diverse group of spiritualists, British socialists (including George Bernard Shaw and H. G. Wells), and Indian pacifists including Mahatma Gandhi." 24

There was more associated with Grahamism, however, than vegetarianism and sexual continence. Graham boarding houses were established in a number of areas. These were private homes where boarders were expected to follow the Graham dietary reforms. These houses were often the center of reform activity, in particular the anti-slavery activities of William Garrison and his followers. In 1833 William S. Taylor of Amherst College called one house "a sort of Club des Jacobins, . . . where the radicals of the day could assemble over a convivial cup of cold water, and plan the coming of their kingdom." In a letter of the Liberator, Garrison recorded his views on Graham:

This is the residence of Sylvester Graham, who has encountered his share of the world's obloquy for attempting to reform it from some of its beastly habits, but who has displayed a martyr's spirit and front in giving utterance to his convictions of truth, as it relates to the bodily as well as spiritual redemption of mankind. Though not a convert to all of his views, I admire his firmness, his courage, and his manifest desire to bless mankind by showing them how, in his opinion, they best can 'glorify God in their bodies and spirits, which are his.' Comparatively few have been found disposed to adopt his dietetic theory, in all its minutiae; but tens of thousands of persons have
been happily affected by his letters and writings, though, of this great multitude, few, I am apprehensive, are disposed of acknowledge their indebtedness to him. Shame on them for their lack of gratitude and magnanimity! But this is the fate of every reformer, in his day and generation. Time and posterity will take care of his memory.25

William Andrus Alcott, a cousin of philosopher and educational reformer, Bronson Alcott, and a medical doctor, also popularised dietary ideas including vegetarianism and opposition to tea and coffee at about the same time as Graham. Alcott believed that good health should be a part of every day life. Like many other reformers he reached beyond his specific reform to offer solutions to contemporary social problems such as educational reform. For example, he won a prize offered by the American Institution of Instruction for an essay entitled On the Construction of Schoolhouses which examined the hygienic and construction qualities of schoolhouses. Renowned education reformer Horace Mann appended this paper to his 1838 report as Secretary of the Massachusetts Board of Education.26

A third prominent dietary reformer was Horace Fletcher. He argued that "Right eating and right food are, then, the all-important considerations of health, as far as the tissues are concerned; and, as the tissues are themselves the stored food or fuel of the brain and nerve centers, the importance of perfect nutrition extends to the most vital functions and interests of life."27 For Fletcher, right eating involved more than just consuming the correct foods. He was also
concerned that people learn to properly masticate their food; to "Fletcherize" was to chew one's food until the taste had disappeared and the nutrient value was extracted. "While any taste is left in a mouthful of food in process of mastication or sucking, it is not yet in condition to be passed on to the stomach; and what remains after taste has ceased is not fit for the stomach." Fletcher advocated that water was the only natural drink, and that it should be only used to quench thirst. "Don't drink soup! Don't drink milk! Don't drink beer! Don't drink wine! Don't drink syruped sodas for the taste of the syrups!" he cautioned as he promoted the virtues of pure water. In addition to rules on what and how to eat and drink he warned that those who overate could not be respected as a lady or a gentleman. Along with his dietary theories Fletcher argued that "Menticulture," or mental fitness, could be cultivated by attacking the "germs" that caused poor mental health. These germs were anger which included envy, spite, revenge, impatience, annoyance, selfishness, prejudice, and unrest, and worry which included jealousy, fear, the belittling of self, the blues, and depression. Like other health reformers, Fletcher tried to improve the whole person, in order to create a more perfect and harmonious society.

Hand-in-hand with phrenology, mesmerism, and diet regimens went hydrotherapy. Hydrotherapy, or water-cure, had similar roots to other health reforms. Its proponents
believed that the body had a natural equilibrium between the mental, moral, and physical facilities, and many were committed to the significant social reforms of the nineteenth century. One of the leading advocates of water-cure was a Sicilian peasant, Vincent Priessnitz, who first used the therapy on himself, and then practised on others. Water-cure was introduced to North America in the 1840s, and quickly developed into a major health reform. It became of particular importance to many women, attracted by its claims of easier and healthier childbirth. By 1852, The Water-Cure Journal, devoted to spreading the gospel of health, had 50,000 readers; it existed until 1913 under a variety of names. Water cure specialists, like Rachel Brooks Gleason of Elmira, New York, were often committed as much to social reforms as to the improvement of their clients' health. Many of these hydropaths, supported specific dietary regimes, especially vegetarianism and thus, diet will be discussed in tandem with water-cure.

Health reformers, from diet reformers like Fletcher to phrenologists like Orson and Lorenzo Fowler, advocated that patients incorporate some form of exercise into their daily routine. Like other health reforms, physical culture had its roots in antiquity, but the climate of the nineteenth century helped to mould it into new forms. There was a number of exercise systems, each with its own supporters. Exercise regimens contrived to promote a harmonious balance between
mental and physical powers. They consisted of sporting and athletic events as well as systematic exercises.

The two major exercise systems were German and Swedish gymnastics. Each attracted devoted followers. Despite their similar origins, testy disputes over the benefits and detractions of each system often ensued. In 1774 Johann Bernhard Basedow incorporated exercise programs into the curriculum of the Philanthropinum at Dessau in the German Duchy of Anhalt. Here the notion of the mutual training of mind and body was taught through Greek exercises such as the Pentathlon, German sports such as swimming, rowing, skating, and through the "knightly" exercises of fencing, vaulting, riding, and dancing. One of Basedow's disciples was Johann Christoph Friedrich GutsMuth, who argued that the two aims of exercise were "work in the garb of youthful play" and bodily perfection. An important follower of the first tenet was Friedrich Ludwig Jahn, who was deeply involved in the political culture of Germany and believed that physical training would help in the regeneration of Germany. His first Turnplatz, gymnastic festival, opened in 1811 and attracted about 500 followers in its first year. German gymnastics apparently arrived in North America in 1826 and 1827 with the arrival of two German exiles, Dr. Pollen and Dr. Francis Lieber. This system was significant in North America from the mid-1860s onward, ultimately influencing trends in schooling, organizations such as the American Playground Association, and the development of
gymnasiums, which sprang up, first at the Boston Gymnasium in Washington Gardens, and then at Yale, Williams, Amherst, Brown and other schools. With increased German immigration and the establishment of the Turngemeinden in larger cities, an increase in trained teachers, and the establishment of journals such as Mind and Body, the German system of gymnastics was incorporated into the lives of many North Americans. 31

Peter Henry Ling, also a student of Basedow, promoted a different system of gymnastics, known as the Swedish system. The two systems, despite occasional acrimony, were similar and involved apparatus work, games, and free exercises. The major difference was that Swedish gymnastics included a medical application of exercise and massage. Like Jahn, Ling was fiercely patriotic and believed that gymnastics were important to the field of national defence. He also promoted the importance of exercise to the medical and educational fields, ideas which were developed further by his followers. In the United States, Baron Nils Posse introduced Swedish gymnastics by promoting the system in the common schools, by establishing the Posse Gymnasium in 1890 and by lecturing and writing on the subject. 32

A third exercise system originated in France. Although the German and Swedish systems were known in that country, three distinct groups began to agitate for a system that promoted national physical fitness. One group favoured the
Swedish system, one preferred the English system of athletic games, and the third promoted a study of "self-expression." The latter approach was responsible for the development of exercise regimens that emphasized natural movement. George Demeny, who studied men and animals in motion, felt that movements should be easily accomplished, fluid, and continuous to best benefit health and development. Francois Delsarte developed movement exercises that demonstrated emotions. A form of Delsarte's work was popularized in North America through the work of Emily Bishop and Annie Payson Call. Delsarte's "self-expression by movement" eventually became popular among mainly middle class women. In the 1930s Emil Jacques Dalcroze exploited Delsarte's ideas and used music and tempo changes with exercise to promote what was known as eurhythmic gymnastics.33

All of these exercise systems, with the addition of athletic sports, were popular in late nineteenth-century Northeastern North America. Supporters of physical culture urged not only the regeneration of personal physical health but also the cultivation of a harmonious mind-body relationship. In addition many physical culturists suggested that improved physical health would bring stronger social health. The nationalist agenda of Jahns, Ling, and others changed over time, but that politicization remained evident in the ideology of the various exercise regimens, just as it existed in other health reforms.
There were other regimens of health care that were alternative to the allopathic or regular system of medicine and that enjoyed popularity in nineteenth-century North America. In the 1830s and 1840s there was a tremendous surge of support for Thomsonian medicine, which was based on natural herbal remedies. Although Thomsonians denounced the harshness and extremes of allopathic medicine, their system relied on herbal dosages that were often as severe as heroic remedies. Some medical people known as Eclectics, combined the homeopathic and allopathic systems, as well as health reform regimens, hoping to garner the best of all traditions. In addition there were many people who relied on folk medicines or patent medicines to bring about a cure. Often times the patient was perfectly aware of either the dangers of such self-dosing, of the high alcohol content of preparatory medicine, and even of the uselessness of the potion. That knowledge rarely stopped the use of patent medicines, especially since some remedies could ameliorate symptoms if nothing else. Nova Scotian miller, James Barry, poured bottle after bottle of patent medicine into his body to cure his numerous aches and pains. He swallowed Watson's dyspepsia pills in vain: "humbug," "cheat," claimed the miller. Holloways Pills and Ayres Cherry Pictoral also failed, "I suppose they do not suit together." Still ill, the miller commented on his abuse of medicines and tried a different tact. He sent a neighbour to town for a quart of brandy.
After all, a hopeful Barry reasoned, "I think it a good medicine if properly used." Still Barry's ill health would continue to plague him. "God help me, I say for the doctors and quack medicine mongers. I may say as Job - 'miserable comforters are ye all.'" 

If the most obvious objective of this dissertation is to restore to health reform its place in history and medicine, there is also an equally important underlying theme that argues that health reformers and health reform participated in the making and remaking of the culture of the period. During the 1830s and 1840s these reforms were at the height of their popularity. Yet, unlike most fads, they did not disperse quickly. Instead from the 1860s they played an integrated role in home treatments. Leading health reformers continued to gather in clients and to introduce their ideology, and medical doctors, aware of their therapeutic limitations, began to claim some irregular practices as their own. Issues of class, problems of industrialization, reformist ideas about education, politics, professionalization, and women's rights, and conflicts between individualism and communalism were all part of the active debate within the health reform movement, as in the broader society. The controversies and debates not only altered the movement but also transformed nineteenth-century culture. An examination of the movement clearly shows the emergent and residual elements of a cultural form as
evolving scientific ideas and traditional ideas met, mingled, and were transformed within the health reform movement.  

The need for an analysis that focuses on class is also demanded in a study of nineteenth century health reform and society. While health reformers were often part of a developing middle class, they tried to attract a broad phalanx of converts. Both working-class and middle-class patients responded to the health reformers' ideas, although not always in the way they expected. This cross-class approach helps in understanding health reform as practitioners and patients responded to industrial capitalism and the resultant changes in class relations, class construction, and class conflict. As Raymond Williams has argued:

the real dynamics of the socio-cultural process are most evident in the transformations of 'popular', which moved not only along a trajectory from late forms of 'folk' culture to new and partly self-organizing forms of urban popular culture, but also along a trajectory of extended - and finally mass-ively extended - production of 'popular' culture by the bourgeois market and by state educational and political systems.  

Just as one cannot understand regular medicine without considering its supporters and detractors, one must understand interclass tensions, conflicts, and compromises to understand health reform or, indeed, any other cultural activity. It is most important to note that an examination of class interaction does not eliminate the need for a class analysis but is merely a broadening of considerations; middle class and working class people made their own histories in their own
ways for their own reasons. A similar pattern of cultural activity will not mean the same thing to each class, given the differing composition, consciousness, and history of each at any given time. The self-culture of health reform, with its residual and emergent elements, its conflicting individualistic and cooperative stance, its contradictory quest for a hegemonic and alternative position, can never be discussed in a synthetic manner when looked at as a one-class or classless phenomena. Neither can culture.

Basic though William's etiology of culture is to an understanding of health reform, there is also much that is relevant in anthropological discourse. Mary Douglas has argued that there is no way of looking at the human body that does not involve looking at the society with which it interacts. Other theoretical work by anthropologists aid in broadening the concept of culture. For anthropologist Clifford Geertz, the practise of cultural theory, "is to draw large conclusions from small but very densely textured facts; to support broad assertions about the role of culture in the construction of collective life by engaging them exactly with complex specifics." Looking at the symbols of a society - how the health of the body supposedly indicated the health of the society, for instance - helps to immerse the historian in the whole society. As a reference point for cultural analysis anthropological concepts add the dimension of both "analytical clarity" and "useful vocabulary." The study of symbolism,
though, cannot be a totality in itself, isolated from processes of time, of human agency, and of the realities of power, conflict, and domination. Geertz argued for an awareness of this concept of process when he likened cultural change to the disjointed movements of an octopus as it somehow changes direction.

It is through cultural patterns, ordered clusters of significant symbols, that man makes sense of the events through which he lives. The study of culture, the accumulated totality of such patterns, is thus the study of the machinery individuals and groups of individuals employ to orient themselves in a world otherwise opaque.

To listen truly to one’s sources, historical analysis needs an awareness of symbolic meaning.33

Examining the symbolism of the human body within the health reform movement in the Northeastern United States and Atlantic Canada will help to demystify the cultural reality of the late nineteenth century, and the importance of health reform. This movement centered in New York and Boston, and most work on the topic concentrates on these vital metropolitan areas. But just as the health reform movement was not restricted to a single class it was not isolated in one region. The movement spread rapidly via the lecture circuit, the massive volume of articles, books, and pamphlets that supporters published, and by private correspondence and word-of-mouth. The daily or weekly press kept even those not ordinarily inclined to participate in the movement abreast of new ideas and new activities. Sometimes the press itself
actively promoted health reform; the Public Ledger of St. John's, Newfoundland not only carried advertisements for journals on health reform, but also recommended them and reprinted articles from their pages. In addition, by an arrangement with the publishers, the newspaper offered its new subscribers bonus issues of The Phrenological Journal.

It is impossible to determine the exact number of health reformers. First, people's commitment varied over time. When one's health was not in imminent danger, support for alternative medicine was less of a priority. Second, some patients were more committed to trying anything than they were to supporting a certain regimen. Thus, some would dose themselves with medicines as well as try nature's prescriptions. Even allopaths could cross the border between alternative and regular medicine. Third, it is impossible to tell how many families treated themselves at home, without recourse to a visit by an alternative healer. Still support for alternative medicine was widespread. Hydropath James Jackson treated over 20,000 patients and over 200 inmates could stay at his Home on the Hillside. In addition he advised patients by mail and claimed an overall cure rate of 95 per cent. In 1872, for example, he treated 300 patients from 35 states and 5 British provinces. Phrenologist Orson Fowler noted in 1851 that his book, Maternity, was in its 61st edition. Some 5,000 copies of the 1st edition had sold in 3 months, and 10,000 copies of the 2nd edition were purchased in
four months. Over 3,000 copies of a pamphlet responding to objections to phrenology were sold. More than 2,000 copies of the 12th edition of a Fowler book, Amativeness, sold while a pamphlet on venereal disease had several thousand purchasers each month; one New York seller sold 3,000 copies in just one month. Dr. Footes' New Plain Home Talk sold 250,000 copies in 1857 to 1859 despite a depressed economy. Some 2,000 copies were sold each month in 1869 and for the next 30 years 100,000 letters were received commenting on the book or asking questions. The Water-Cure Journal claimed 25,000 subscribers in June 1851 and double that the next year. They projected 100,000 subscribers for 1860 and confidently asserted - and encouraged - that each copy of the journal was read by 10 people. In 1858 there were 400 practitioners of water-cure alone, plus some 300 female physicians who, with their exclusion in allopathic medical schools, no doubt offered alternative methods. As Susan Cayleff has argued, "Despite charges of quackery the water-cure movement enjoyed widespread acceptance among the American populace." Between hydropathy, phrenology, diet, and exercise proponents, considerable support for health reformers existed not only in the northeastern United States but throughout Atlantic Canada.

Political boundaries did not affect this exchange of information nor did they halt the sojourns of health reformers intent on bringing the salvation of health to possible converts. The migration of Atlantic Canadians to the Boston
States in the last half of the century ensured a continuous exchange of information despite distances as families and friends maintained communications. News to and from home spread quickly. A lecture given by Rev. Moses Harvey, in St. John's, for instance, was published and soon circulated among the many Newfoundlanders living in New York City. Alan Brookes established the close connections between the Maritime Provinces and the Boston area. In twelve weeks of 1857 Brookes found that 487 vessels travelled to Boston from Nova Scotia, New Brunswick and Prince Edward Island while 452 travelled back to the Maritimes. During twelve weeks of 1883 he discovered 421 vessels cleared to voyage from Boston to the provinces and 289 which arrived in Boston from the three provinces in 12 weeks of 1883. These not insignificant numbers indicate the considerable transportation and communication links which existed between the regions despite distance and different political structures. In both Eastern Canada and the Northeastern United States the advance of industrial capitalism spawned urban areas with the concomitant problems of migration, massive population increases, and overcrowding, and a growing awareness of both class consciousness and class conflict. Nor were the rural regions of both areas unaffected by the dramatic convulsions of industrialization that had transformed both the immediate and the Western world in the nineteenth century. Throughout the area the development, the conflicts, the problems, were one; often the
language was the same. The difference between the economic base of both regions was one of degree, not of kind.42

As part of the social relations of nineteenth century life, health reform underwent the same contortions and conflicts as the society which surrounded it. Carefully sifting through the layers, what Geertz characterizes as "thick description," will show not only the change in health reform from 1860 to 1900, but it will also demonstrate cultural processes. Just as the health reform movement changed over time, so did the culture. As Raymond Williams has persuasively and eloquently argued residual and emergent dynamics are always present in a culture. Ideas about the health reform movement had their gestation in Graeco-Roman times; today's burgeoning health reform movements have the residual tentacles of the early movement. Like culture, health reform's only constant was its inconsistency. A photograph fails to capture what happened before and after; a snapshot of history can have the same limitations if there is not a constant consideration of the dynamics over time. Even though this dissertation looks at a specific period of time, 1860 to 1900 it is important to remember that health reform itself was never static.43

The health reform movement has received only glancing attention in historiography, and often appears as a side-bar to an analysis of the more successful and professionalized
regular medical tradition. Still historian Hamilton Cravens, has argued:

Phenology belongs to a group of mid-century "sciences" and "crusades." Some have been studied, like diet reform, others are largely forgotten or ignored by historians, including mesmerism, animal magnetism, and hydropathy (nor can it be said, for that matter, that we have enough studies of phrenology or even of dietary reform). . . . Many of these movements attracted many followers who thought their doctrines eminently "scientific." Here seems an excellent opportunity for examining the problems of "professional" and "popular" science in new ways."

While both feminist history and social history have made an examination of health reformers and their practices more acceptable, the predominant themes in the history of medical practices emphasize aspects of professionalization, scientific advances, and the institutions of allopathic medicine. The almost complete omission of an entire tradition of self-help and natural regimens is reminiscent of the nineteenth-century allopathic medical profession's own denigration of their competition.

One of the few medical historians of the past who examined aspects of the health reform movement in a professional manner was Richard Shryock. Shryock's work was complemented by several popular and descriptive studies on aspects of health reform. Henry Sigerest wrote several articles on the early history of spas and water-cure. Sigerest, himself a medical doctor, regretted not only that the spas had developed into leisure retreats and gambling places, but that the value of hydrotherapy had never been
studied scientifically. As a result, 20th century North American doctors have ignored the potential remedies in water-cure out of ignorance. In Europe things were—and have been—different. Throughout the 20th century spas have offered excellent medical facilities, specialists and amenities. One estimate suggested that 100,000 Americans had spent $100,000,000 at European spas in 1930. In West Germany in 1956, the government funded doctor-recommended spa visits lasting 1 to 3 weeks every three years; about 8 million people per year visited the spas. Since 1989 patients were required to pay 10 per cent of the costs plus food and lodging for their treatments.66

While Shryock opened the door to research on the movement, it was William Walker's dissertation on health reform that legitimized the field for academics. Walker treated health reformers as participants in a sincere and important, albeit obscure, medical history. Walker argued that many of the health reform ideas were influential in the development of regular medicine. Now dated, Walker's work is a valuable start to understanding the gestation of the health reform movement in pre-Civil War America. This dissertation will reexamine Walker's argument that the movement ended with the war. The health reform movement was always in a state of transformation; the ideology of health reform was much different in 1900 than in 1860 or 1830, but the movement had never disappeared. Indeed, it was at least as significant in
1900 as in an earlier time, in part because of its influence on regular medicine, but also due to its incorporation into the vocabulary and culture of nineteenth-century North America. A second argument of Walker's that will be disputed in this dissertation is his contention that "the relationship of these medical sects to the reform movement remained incomplete, for they were largely unaffected by the ferment of ideas which provoked and sustained the prevailing modes of thought." This dissertation will argue that health reform partially emerged out of the ferment of nineteenth-century reform ideas. Not only were health reformers supportive to some degree of other non-allopathic medical sects but they were also concerned with advocating social change and challenging prevalent notions of race, class, and gender relations. Finally while Walker noted that the writing of regular medical doctors influenced the early health reform movement, his time-frame did not permit an examination of the influence of health reformers on regular medicine, which co-opted, adapted or adopted reform ideas as much as it disputed and disclaimed them.47

Besides Walker's dissertation, there are two recent monographs which pertain directly to the health reform movement. Harvey Green, in Fit for America, considers health reform from the early 1800s to recent times; this monograph complemented an exhibition of a variety of medicines and medical devices. That in itself is a tremendous undertaking
and the result is a sympathetic recitation of a multitude of
cures. The lack of any analytical framework, however, reduces
health reform to mere individual idiosyncrasies, rather than
the widespread movement that it was. The greatest contribu-
tion to Green's book, therefore, is in his union of material
culture with written records and advertisements to draw a
picture of various treatments. James Whorton's 1982 monograph
is an equally sympathetic treatment of health reform.
Crusaders for Fitness, despite its occasional tongue-in-cheek
style, is a far better history. Whorton established a common
biography for health reformers; the typical reformer suffered
from disease and dissipation, and was seemingly miraculously
cured after years of suffering and ineffective treatments
followed by a committed zeal for health reform. Yet even with
his focus on the broader health reform movement Whorton
stresses the importance of diet reform above all others.
Whorton automatically relegates other reforms to a less
important position. This, then, is a major problem. Health
reformers were extremely prolific writers and popular
lecturers; some even maintained publishing houses to promote
their own work and the work of other health and social
reformers. The bulk of the material left behind by health
reformers makes it easy to be overwhelmed by the detail and to
interpret one specific reform as being unique or most popular.
This dissertation tries to avoid that by looking at health
reform in its totality and its overall impact on society and culture.

There are an increasing number of collections on health reform which at once legitimize the study of the movement and demonstrate the need for a synthetic treatment of health reformers. Medicine Without Doctors: Home Health Care in American History is one such compilation. This early attempt to look at domestic medicine contained articles on the need for self-treatment and the failures of regular medicine, domestic medical books, women and water-cure, herbal treatments, and patent medicine. While each article makes its own contribution, the purpose of the monograph was to stimulate further interest in the field. Since then there has been a proliferation of articles dealing with health issues, the history of the body, and irregular medicine. Roger Cooter, in an introduction to a recent collection of essays, has attempted to examine British health reform within the context of industrial capitalism. Norman Gevitz has produced a monograph on osteopaths and their attempts to professionalize. James Harvey Young has completed work on the impact of patent medicine. While all of these have value they neglect the central issue of this dissertation: the importance of the health reform movement in its totality.

Much of the recent work on health reform has been in a biographical mode, either the history of a particular health reformer or the biography of a specific regimen. One of the
earlier works of this type was Madeleine Sterns, Heads and Headlines, a biographical account of Orson Fowler and his family's lengthy involvement in phrenology. While Sterns incorporated much of the family's voluminous writing, she added little social context, and indeed the family's life-work was portrayed as an interesting quirk of Victorian society.51 Even less sympathetic to the contributions of phrenology is the monograph by John Davies, Phrenology: Fad or Science. A more analytical work than Sterns, Davies is critical of phrenologists and fails to credit them with their contributions to medical science.52 Treating phrenologists or health reformers in general as aberrations denies the many contributions that they have made to their field or to culture. The various health reforms were neither as absolutely right as their supporters claimed, nor as ridiculous, unimportant, or ineffective as their detractors suggested. In the same manner, allopathic medicine must be considered in the same balanced manner; despite its eventual domination of the medical field, it too carried a mixture of rational and scientific ideas as well as irrational and idiosyncratic notions. So although the common view of phrenology is the reading of a gullible person's "bumps," the science made valuable contributions to present day knowledge. Anne Harrington contended in her recent monograph, Medicine, Mind, and the Double Brain, that not only did phrenologists lead the way into cerebral localization research, but in some ways they
anticipated allopathic physicians in determining that the composite of parts which make up the brain each serve a distinct task-specific "faculty." 

While Harrington's book dealt with phrenology only in so far as it pertained to her subject, a scientific and historical examination of the mind and double brain, it was still one of the few monographs that discussed the subject in a serious fashion. In an equally scholarly fashion, Roger Cooter examined the British phrenological experience and connected phrenology to both nineteenth-century science and society. Cooter noted not only the later osmosis of phrenological thought into popular culture but also the strength of anti-intellectual feeling, often experienced through a denigration and dismissal of allopathic institutions and practitioners. 

The literature on mesmerism is equally scarce, and often written in a popular and descriptive vein. A serious study on mesmerism by Robert Darnton examined its origins within French society, while T. M. Parssenren's article on "Mesmeric Performances" looked briefly at the impact of mesmerism in Britain. There also have been recent examinations of nineteenth-century nutrition and diet. Whorton's efforts in this field have been complemented by Steven Nissenbaum's work on Sylvester Graham. Nissenbaum placed that reformer into the context of early nineteenth-century culture. This was not a mere descriptive study of a rather eccentric personality who influenced some people by happenstance and good luck.
Nissenbaum argued that to "study Graham's ideology is to study Victorian physiological theory and practice in the very act of coming into being." Nissenbaum traced the influences on Graham, particularly that of eighteenth-century physician Benjamin Rush and French physiological theorists, and examined the symbolic conflict between the health reformer who fought to preserve the family in the face of the emergence of industrial capitalism. For Graham, the preservation of pre-industrial methods of breadmaking, was not merely a health measure but symbolic of the needed restoration of a society that was veering in the wrong direction. 

Sylvester Graham has also attracted the attention of Jayme A. Sokolow who studied the implications of the Grahamite belief that uncontrolled sexual excesses were responsible for the debility and disease that seemed to threaten American society. Sokolow tied this concern to the "modernization process," or urbanization, industrialization, commercialization, and increased mobility. Sokolow argued that this vaguely defined process "made Graham and the health-reform movement not only fearful and repressive, but also optimistic and perfectionist." Graham's attitude towards human sexuality - a prescription for abstinence both within and without marriage except for reproduction - was extreme; it was also hardly representative of all health reformers' attitudes. Throughout the book Sokolow has depended on the concept of "modernization" to guide him through the complex-
ities of class formation, class conflict, and capitalist development. Thus limited, many of his conclusions are hasty and neglect the issues that permeated health reform. Sokolow argued that Grahamites "spurned society and judged it irrelevant to human purposes" and moved to make the self "the repository of society." Yet did Grahamites and health reformers want "the freedom to imagine themselves as having the power to dispose of the whole world?" If so, why did they worry about the moral, physical, and mental condition of other peoples? Health reformers were torn by the residual threads of a past disappearing into nostalgia, an imperfect present, and the lure of the possibilities of a future world. Their discouragement about the present led them to be optimistic about the future. Believing that improving the individual human body would bring social health and perhaps social perfection, they were never as exclusively self-absorbed, or indeed suicidal, as Sokolow implies.\(^7\)

In trying to examine a central figure of health reform, both Sokolow and Nissenbaum found it necessary to drift into a discussion of other regimens since the various interconnections were so strong. Others have examined specific reforms, rather than individuals. Jane B. Donegan and Susan E. Cayleff have contributed two recent monographs on hydrotherapy. Both books are important offerings to the history of the health reform movement; their concentration on the role of women within the health reform tradition both
enhances and limits them. While the integration of women into this movement was significant both in terms of their personal contributions to the ideology of health reform and in the releasing of many of their gender from their domestic destiny to a professional career, there simply were more male health reformers than female. So while the role of female health reformers was dramatically greater than in society, truly to examine the movement one cannot look at only one gender. One however, must be aware of the importance of gender issues. Many health reformers had a commitment to women's rights and women's public role that was far more generous than the attitudes of many regular physicians. So Cayleff and Donegan have both added a dimension to health reform but at the same time have shown the need for a broader perspective.58

This synthetic perspective should not only include women, but also examine more than one specific reform and should include the broader social context. Ignoring the cultural elements of health reform forces authors to either ignore or simplify the interconnections of health regimens to society. Cayleff, for example, has squeezed discussions of the hydropaths' reform activities, physical education, vegetarianism, temperance, marriage and dress reform, and the women's movement into a single chapter. Another historian who looked specifically at women's role in the health reform movement, Martha H. Verbrugge has a similar limitation in her monograph on personal health in Boston. By concentrating only on women,
only in Boston, and more specifically on the Ladies Physiological Institute and the Normal School of Gymnastics Verbrugge has ignored the broader implications of health reform. For example, despite the fact that phrenologists, O. S. Fowler, J. J. Grimes and mesmerist and phrenologist Mrs. Fergus, lectured at the Institute, the subject is barely mentioned in the book, an omission which obscures Fowler's importance to the health movement, and, indeed the Institute's relationship with him. Professor J. J. Grimes donated a package of tickets to his evening lectures, and, as well, gave a lecture on the human brain, passing one such organ around the audience. In a subsequent lecture he volunteered his hall for a meeting, at which he described and dissected a brain. The undissected half was donated to the institute; in return, the women purchased two copies of a book on phrenology and one of Grimes' phrenological busts. Orson Fowler donated books to the library, conditional on the women subscribing to the Water-Cure Journal and the Phrenological Journal. He lectured a number of times on subjects such as "Parturition," "Midwifery," and "Love or the Feminine Principle." Dr. Lydia Folger Fowler, Orson Fowler's sister-in-law, also lectured at the institute; the members wished that "success will crown her efforts in the noble work of ameliorating the condition of our sex, and in developing and perfecting of humanity." Both she and Mrs. Orson Fowler became honourary club members. These books by Cayleff, Verbrugge, and Donegan are important
contributions; their limitations, however, do hinder a more comprehensive understanding of the broader nineteenth-century health reform and society.59

As in the other health reforms, historians have given the development of physical education only sporadic attention. It is only in recent years that sport history has been given serious attention, and then, usually the work has concentrated on male athletic events. Women's sports and physical training, have been relegated to the background just as their contributions to sports and athletics have been denigrated.60 One area that has been neglected for both male and female athletics has been a history of their origins. This dissertation will explore some of the early ideas about physical fitness, and trace the development in re-creating stronger male and female bodies. All health reforms advocated improved physical fitness to some degree, and there were reformers who advocated physical culture as their primary therapy for physical and social ill-health. Concerned for the harmonious state of the body and society, health reformers argued that exercise programmes of various types could improve health, develop manliness or femininity, strengthen moral standards and heighten patriotism, loyalty, work habits. Many of their ideas, however, have been neglected by historians, both those working on health reform, and those working on sports. While Verbrugge does explore the Boston Normal School of Gymnastics in her monograph, and Whorton and Green study physical culture
in their works on health reform, most historians are more concerned with sport teams and their victories. Alan Metcalf, for example, in an important work on the development of sport in Canada, neglects women, the Atlantic region, and the ideology behind many of the sports that he examines. Donald Mrozek has taken a very narrow look at elite sports, and contributes only a token chapter to the sports of elite women. Helen Lenskyj addressed the issue of gender but the lack of historical context and a clear idea of class has marred her work. Historians of leisure have explored some of the ideas about class and gender that are pertinent to this dissertation, but for the most part, they ignore the importance of health and physical activity to recreational activities and festivities. The chapter on the re-creation of the body through recreational activities will examine those linkages between health and physical activity and their significance to the development of the harmonious physical body and social body.

In conclusion, this dissertation will examine the rationale for an alternative system of health care, one that did not depend on the heroic therapies and professionalism of the allopathic physician, but which stemmed from a different paradigm that suggested that good health was a natural state, that it could be attained by men and women following natural procedures and therapies, and that this newly achieved physical, mental and moral health would lead to a more perfect
and stable society. After the closing exercises at McKay's Gymnasium in Halifax, the *Acadian Recorder* noted:

Mr. McKay is doing splendid work in his unpretentious but thoroughly-managed institution. It was impossible to note the juveniles at work last evening, without feeling that they were laying a foundation of health and vigor more enduring than wealth, and in its way educative in a most enabling sense of developing into perfect physical manhood.  

The next chapter will look at the health reformers' concept of nature, at their insistence on a tripartite physical and social balance, at their belief that women, in partnership with men, had a role in the cultivation of both self and society and at the connections between health reform and other reform movements.
Notes

1. Public Ledger, St. John's, (hereafter PL), 3 February 1875.

2. Biography: James Barry Diary, Public Archives of Nova Scotia, (hereafter PANS), MG 1 V.1216-1223, Reel 1, 11 April 1853.


23. Fowler, Ibid., p. 16.


29. Horace Fletcher, Menticulture or the A-B-C of True Living, (Chicago/New York: 1898), pp. 10, 13. Fletcher was one of the few health reformers whose popularity, and life, lasted into the 20th century. Eugenists used his ideas on nutrition. This will be discussed in Chapter 7.

30. Susan Cayleff, Wash and Be Healed: The Water-Cure Movement and Women's Health, (Philadelphia: 1987); Jane B. Donegan, Hydropathic Highway to Health. Women and Water-Cure in Antebellum America, (Westport, Conn.: 1986). See Cayleff, Wash and Be Healed, for the various name changes of the Water Cure Journal, p. 236. Both of these monographs have included descriptions of the techniques involved in using water to cure ailments; for that reason I have not included a similar discussion in this dissertation.


33. McKenzie, Exercise. See E. Jacques-Dalcroze, Eurhythmics, Art and Education, Frederic Rothwell, Trans., Cynthia Cox, ed. (London: 1930); Annie Payson Call, "The Greatest Need for College Girls," Atlantic Monthly, LXIX (1892), pp. 102-9; Martha Van Rensselaer, "Chautauqua Reading Course for Housewives: Physical Education Allied to Housework." The Chautauquan, 34 (February 1902), pp. 529-33; Annie Payson Call, Power Through Repose, (Boston: 1891); Annie Payson Call, Nerves and Common Sense, (Boston: 1916). Annie Payson Call was an author and a teacher of nerve training in Boston. Emily Bishop was a lecturer at the Chautauqua Institute, New York State; she was the director of the health culture department and the co-principal of the School of Expression. See "Emily Bishop," Who's Who in America, 1908-9, p. 157; "Annie Payson Call," Ibid., p. 287.


36. Williams, Culture, esp. pp. 181-233; Raymond Williams, Keywords: A Vocabulary of Culture and Society, (New York: 1983), pp. 76-82; Raymond Williams, Marxism and Literature, pp. 121-7.


39. PL, 5 April 1872, 21 June 1872. See also Ibid., 4 July 1871, 20 February 1873, 12 December 1873, 6 March 1874, for other references to the Phrenological Journal.


43. Williams, Marxism and Literature, pp. 108-27; Thompson, English Working Class, esp. pp. 8-13; Geetz, The Interpretation of Culture, pp. 3-32.


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47. Walker, "Health Reform."

48. This proliferation is particularly true of the Fowler dynasty. See Stern, Heads and Headlines. Whorton, Crusaders for Fitness; Harvey Green, Fit for America: Health Fitness Sport and American Society, (New York: 1986).

49. Rissee et al., Medicine Without Doctors.

50. Roger Cooter, History of Alternative Medicine, pp. x-xx; Gevitz, Other Healers; Young, Medical Messiahs; Young, Toadstool Millionaires; Young, Self-Dosage Medicines. See also Susan Reverby and David Rosner, eds., Health Care in America: Essays in Social History, (Philadelphia: 1979).

51. Stern, Heads and Headlines.


53. Harrington, Medicine, Mind and Double Brain.


55. Darnton, Mesmerism, Parssinen, "Mesmeric Performances."

56. Nissenbaum, Sex, Diet and Debility.

58. Cayleff, Wash and Be Healed; Donegan, Hydropathic Highway.

59. Cayleff, Wash and Be Healed, pp. 109-39; Verbrugge, Able-Bodied Womanhood, pp. 11, 52, 57; Minutes, Ladies Physiological Institute, Arthur M. and Elizabeth Schlesinger Library on the History of Women in America, Radcliffe College, MC 236 Box 1-3v, 20 November 1850, 4, 5 December 1850, 3 September 1851, 26 November 1851, 15 December 1851, 14, 30 January 1852, 11, 25 February 1851, 3, 17, 26, March 1852, 2 March 1853; Fourth Annual Report of the Secretary, Ibid.


61. Verbrugge, Able-Bodied Womanhood, pp. 162-91; Whorton, Crusaders for Fitness, esp. pp. 92-131, 270-303; Green, Fit For America, pp. 95-100, 181-258; Whorton, Crusaders for Fitness; Verbrugge, Able-Bodied Womanhood.


64. Ac Rec, 7 June 1887.
CHAPTER TWO:

"The Flawless Symmetry of Man":

The Ideology of Balance in Health and Society

Take the open air, -
The more you take the better;
Follow Nature's laws
To the very letter.

Let the doctors go
To the Bay of Biscay;
Let alone the gin,
The brandy and the whisky.

Freely exercise
Keep your spirits cheerful;
Let no dread of sickness
Make you ever fearful.

Eat the simplest food;
Drink the pure cold water;
Then you will be well,
Or at least you ought to.1

In 1882 A. C. MacKenzie, a native of Rustico, Prince Edward Island and a student at the Halifax Medical College, succumbed to brain fever. His demise was attributed to overwork caused by the exertion of studying in the winter and the strain of working in Boston in the summer. In 1891, a missing eighteen-year-old New Brunswick girl was discovered in Penobsquis not only wearing male attire but working as a farm hand. Shocked residents read in the press that this sexual deviation was caused by over-stimulation due to excessive novel reading. Several years later, in 1895, Winfield Scott, vice-president of the Century Club of Pittsburgh, and one of the most prominent cyclists in the western part of the state, died of spinal meningitis caused by what was reportedly an
over-indulgence in bicycling. These three cases, excessive brain-work, unchecked sexuality, and muscular over-exertion, were illustrative of the very thing that North Americans feared: an unhealthy balance in the mental, moral, and physical faculties.

This chapter will establish the importance of that tripartite harmony between faculties within the body and the related extension of this notion to society at large. While most regular physicians and health reformers alike agreed on the need for a healthy and balanced physiology, health reformers extended the argument. They claimed that this harmonious state was not only natural, but that health only could be attained and maintained through adherence to Nature's laws. Knowledge of oneself, proper food, fresh air, pure water, and regular, but non-strenuous, physical and mental stimulation would help everyone develop and possibly perfect their physical and mental health. That achievement would, in turn, improve, and even perfect, society.

This chapter will also focus on women, and how their supposed affinity with Nature, helped them carve out a niche in the health reform tradition. With Nature on her side, with the supposed maternal qualities of her gender, and with a knowledge of family and female health problems, many a woman could develop a career in the health reform camp. Many women did just that, and while they never gained total control over the field, they not only found employment in a field denied to
them by regular medicine, but they also helped to bring women's issues and concerns to the public, and, in the process, supported their sister-patients in their ongoing Victorian quest for good health.

Health reformers believed that their particular regimen would be the best way for individuals to reach their full potential. Most, however, also supported the ideas of their fellow practitioners, although there was never universal agreement on the value of the various cures or their possible results. Health reformers also were concerned about the quality of life, and thus, many of them were committed to social changes that went beyond their particular therapy. Health reformers were active advocates of improvements such as temperance, women's rights, abolition, dress reform, and, as well, they also advocated educational and institutional reforms, and other social causes that were popular in the nineteenth century. This work, while it never surpassed their dedication to their particular regimen, kept them at the forefront, not on the fringe, of North American society. As such, they were allies and friends with most of the prominent social reformers of the nineteenth-century. The final part of this chapter will examine some of health reformers' contributions to social health. Just as their names and commitments to the improvement of medical treatment have been forgotten over time, their role in social reform has been neglected by historians. This commitment to social improvement is a direct
result of their belief that society potentially was perfectible if everyone lived an appropriate and balanced lifestyle. In order to do their part to achieve what in hindsight appears utopian, health reformers were committed to both their special therapy and social improvement, and to the concept of physical and social equilibrium.

In The Birth of the Clinic, Michel Foucault noted the development of a new concern for the healthy body that emerged with the Enlightenment and that flourished in the Victorian period. This new interest revealed itself in the rise of the clinic, where earlier theoretical or metaphysical approaches to therapy gave way to clinical investigation. In scouring the body either to discover the ways in which it worked, or to understand the disease process, Victorian doctors, and their patients as well, became preoccupied with the notion of the healthy man and woman. While Victorians were hardly the first to worry about personal health, Bruce Haley has argued that there were particular reasons for its rising importance in nineteenth-century thought. First, the development of physiology as a separate and distinct science suggested to Victorians "that the laws of life could be learned in their relation to human beings." Second, there was a growing realization that the workings of the mind and body were interdependent. And third, a belief in the value of education spawned the hope that a better person could be developed, one
who was not only physically fit, but who was morally and mentally in top condition.

In some ways, as Haley has argued, health was a form of personal religion for Victorians. T. J. Jackson Lears has analyzed this 'religion' and demonstrated how it permeated and affected the social relations of Victorian society. In particular, Lears argued that many reformers were involved in a programme of social 'uplift,' using the message of health salvation to turn the ill-groomed and ill-mannered proletarian into a clean-living, God-fearing, respectable citizen. William Leach also has demonstrated how the health reform movement and images of the body served a social purpose. Victorians, Leach argued, particularly were enamoured with the symmetrical body. This concept of a symmetrically developed body is reflected in the Victorian belief in the necessity of maintaining a balance between the physical, mental, and moral faculties. Leach suggested that this was a new middle-class physiological conception. This notion of equilibrium, with its roots in a long-standing Graeco-Roman tradition, derived in part from the eighteenth-century shift from religion to health, and from environmentalism and the growing importance of the impact of physical surroundings upon the human condition. In post-Civil War North America, Leach suggested, reformers modified these views by incorporating the doctrine of inheritability of acquired characteristics. In addition, enduring beliefs in the humoral theory of medicine, the notion
that the vital fluids of the healthy body were in balance, contributed to the belief that the mental, moral, and physical faculties needed to be in a state of equilibrium. Health reformers increasingly insisted that obedience to nature’s laws could lead to perfect health and physical and mental harmony. The human body could be perfected if hygienic laws were obeyed. The religion of health could lead to the physical and moral salvation of the individual. Said the Water-Cure Journal, “Wonderfully plain are the teachings of the ever-open volumes of nature’s book. Every page tells us of the laws of life, the conditions of health, the essentials of a better individuality, of a higher personality.”

Health reformers, though, were concerned not only for personal health; they also were conscious of the need to reform the physical condition of society. William Leach has argued that health reformers conceived of their society in organic terms: "as a mirror image of the symmetrical body." This social organism, therefore, could be perfected if, and only if, it developed in a harmonious fashion. Health reformers considered excessive competition, extreme specialization, gender conflict, class antagonism, and immoderate and deviant sexuality, as examples of social degeneration and imbalance. "The man who is himself in false relations to everything else will pronounce the whole universe to be chaos. The person who is in harmony with all other objects will find order, beauty, happiness, everywhere." Not everyone who
professed to be some type of health reformer subscribed to these ideals. At New York's Champion Music Hall, New Year's Eve 1864, for example, a Professor Wheeler, "a lean, cadaverous, woe-begone looking personage," offered character readings to the patrons who had gathered to drink, to watch dancing women, to listen to music, and to participate in shooting demonstrations. Many health reformers would have been shocked to have seen phrenology practised in such intemperate surroundings. While people were free to oppose and resist the various medical remedies, and moral tenets of health reform, the nature-based prescriptions for individuals and for society increasingly were accepted. When pugilist hero Tom Sayers died, for example, the New York Clipper, a sporting newspaper that did not condemn alcohol, issued a warning similar to those of the health reformer, advising balance and moderation.

Life can be enjoyed without going into excesses; drink, if you will touch the convivial bowl, in moderation; eat regularly and prudently; pass a portion of your time in the pleasant society of virtuous women; enjoy yourself at the theater, at the minstrel hall, at the circus, at the museum; take daily exercise, not too much, but take it regularly; sleep seven to eight hours every night, have some legitimate business to attend to, and neglect it not. In this way you will enjoy life, you will preserve your health and strength; you will be sound in body and clear in mind; you will be more able to ward off the attack of disease should an epidemic visit us; in fact, you will be a happy man, while our "fast" friend is hurrying onto an untimely death.7

The physical and social application of the concept of balance and symmetry is most important in any study of the nineteenth century, and it holds a central position in this
dissertation. In a biological sense, symmetry was important as there was a mistaken belief that the healthy body was symmetrical in its left/right development. This concept broadened into the belief in a healthy tripartate harmony of physical, moral and mental powers. In a political sense the notion of harmony and symmetry related to concepts of individualism and collectivism in a society increasingly rent by class divisions. Historians, such as Alison Prentice, David Montgomery, and Steven Nissenbaum, as well as Leach, quite consciously have used the concept of symmetry and balance in their work. This notion of symmetry is so cardinal to this period that historians have often accepted its existence without probing into either its origins or its persistence. The notion of social harmony and equilibrium, however, persisted throughout the nineteenth century. For health reformers there was particular importance in the social concept of equilibrium, and they extended their vision beyond the individual body, to argue that a healthy society also needed harmony and equilibrium. David Montgomery has commented on the strength of this notion of social equilibrium and symmetry in the post-Civil war years. He has argued that rather than any nostalgic longing for a supposed past, its persistence was an attempt to add moral values to the commercialism of the market economy. The concept of symmetry emerged out of an attack on possessive individualism, the belief that each human being was in possession of his or her
self and had no moral obligation to society; the political world existed to protect this individual and to maintain the relations of exchange between these proprietors. Possessive individualism, thus, was a remnant of an earlier and simpler marketplace where all persons could exchange possessions on an equal basis. Jacksonian individualism and support for the 'self-made man' propelled the concept of possessive individualism through to the end of the nineteenth century, although it would become increasingly inappropriate with the onslaught of industrial capitalism. Throughout the 1800s, and especially with the end of the Civil War, though, many people, including health reformers, supported the principle - if not the reality - of rationality, equality, harmony, and equilibrium in a new non-slave world. Martin Butler, socialist editor of Butler's Journal, for example, agreed that there was a need for harmony - even during those most disharmonious events - strikes that pitted one class against the other. Butler realized "the working man is a man, and the equal of the capitalist, no matter what are his possessions and has at least a right to a decent living." At the same time he noticed that post-strike harmony was jeopardized by "hard, selfish exacting" corporations on one side and "ill-advised and unreasonable" working men on the other.

By the end of the century, though, the marketplace itself had undergone dramatic change, and the absence of both equality and harmony was apparent. There were tensions between
the health reformers' stress on self-culture and the role of the individual, the attack on possessive individualism, and the stirrings of a drive towards mutualism and collectivism. While individualism has most often been associated with the concept of bourgeois ideology, some historians have made convincing arguments that it was also part of peasant and later working-class struggles for equality and freedom.

In their own historically specific ways, these struggles have contributed not merely to individualism as the dominant ideology or value in capitalist society, but to individualism as a class-differentially lived and experienced set of relations, practices, values and ideas. From this perspective individualism is viewed as characterized by the tensions and contradictions one might expect of ruling and, occasionally, hegemonic processes which have 'continually to be renewed, recreated, defended, and modified', because they have been continually resisted, limited, altered, [and] challenged by pressures not all [their] own'.

Individualism, as a peasant or working-class motif, aided in the resistance to dependence, exploitation and inequality. C. B. MacPherson has argued it was the articulation of the working-class experience that ultimately caused the deterioration of possessive individualism, but at mid-century that voice was both soft and unpersuasive. This was, in part, due to that long-time working-class defence of individualism, and its interdependence with freedom and equality. As Herbert Gutman argued, there was a central tension, rarely explored, between individualist and collectivist "ways of dealing with, and sometimes over-coming, dependence and inequality." Sean Wilentz, though, more recently discussed the artisanal
democratic "assaults on political and religious deference, their professed respect for individual initiative, and their efforts in support of the economic interests of the trades, [which] all made them appear champions of those Franklin-esque virtues that have long been interpreted as the germ of bourgeois propriety." Wilentz maintained, however, that the artisanal republicans offered a fusion of independent liberties and personal sovereignty with social and corporate responsibilities...[a] collective individualism." This "collective individualism" is at the heart of the health reform ideology, and is the basis for their argument that the healthy and balanced individual would contribute to a healthy and balanced society. The commitment to social re-creation, as well as personal improvement, evolved out of that collective individualism, and at the same time, the strength of that belief prevented them from formulating an ideology that would challenge the asymmetry of the economic and political status quo. Health reformers, then, with their contradictory commitment to individualism, collectivism, and their drive for personal and social equilibrium were part of an emergent middle-class, still undergoing the process of creation, while maintaining the residual linkages from their recent past.

In an article, aptly entitled "The Religion of Health," Elizabeth Blackwell, the first woman in North America to receive a degree in medicine, spoke on the need to maintain a "balance of power" within the body. The healthy body, she
argued needed to develop in a harmonious and natural fashion. Many Victorians identified asymmetrical development as an indicator of disequilibrium in a person’s mental and physical condition. Similarly, the notion that unbalanced and excessive passions, emotions, and anti-social behaviour were typical of a degenerate and unstable personality was commonplace to Victorian health reformers and physicians. In fact, many of these ideas would become essential ingredients of the emerging field of criminal anthropology. In the latter part of the nineteenth century psychologists and criminal anthropologists argued that distorted, asymmetrical or unnatural physical features were expressions of mental defectiveness, moral degeneracy, and hereditary weakness. Persons with a criminal nature, therefore, could be detected by their facial features or physical deformities. One of the earliest advocates of criminal anthropology, the Italian scientist, Cesare Lombroso, defined the criminal as "an atavistic being who reproduces in his person the ferocious instincts of primitive humanity and the inferior animals." Physical characteristics such as "enormous jaws, high cheekbones, prominent superciliary arches, solitary lines in palms, extreme size of the orbits, handle or sessile [shaped] ears found in criminals, savages or apes, insensitivity to pain, extremely acute sight, tattooing, excessive idleness, love of orgies, and the irresistible craving for evil for its own sake" were all identifying marks of a criminal nature.
Lombroso also noted that the features of criminals were often asymmetrical. These ideas of criminal anthropology and the belief that the healthy body was symmetrically balanced were widely accepted in eastern Canada and the Northeastern United States. Dr. O. J. McCully of Saint John, New Brunswick, reported, for example, that large ears, a heavy jaw, small eyes, abnormally shaped noses, and in the case of females, excessive hairiness, were all indications of criminal temperament.

The belief that the natural body was symmetrically developed and that the faculties of the body had a natural balance, was also important for those who studied the transmission of crime from generation to generation. Victorian doctors suggested that the psychological makeup of children was close to that of the criminal. In their evolutionary progress children (and sometimes women) rested somewhere between animals and adult men; children often displayed the unbalanced characteristics that were common to criminals such as strong emotions, excessive passions, and a propensity to commit criminal acts. Development of the child's proper equilibrium could be arrested at any stage of life. If evolution was checked during infancy only the animal instincts would exist and the child would remain an idiot or imbecile. Development that stopped after childhood was reached would result in a person having intelligence but no moral sense. The connection between criminality and childhood that many
Victorians assumed influenced the turn-of-the-century drive for playgrounds. Reformers felt that undirected play served only to release the uncivilized animal in the child. Supervised play was a way to build character, instill moral ideas, and accustom the child to appropriate behaviour. The growth of the mental, moral, and physical child thus would not only serve to prevent crime, but also to create a symmetrically developed and balanced young citizen.20

Once armed with these new scientific methods of identifying a deviant, whether adult or child, health reformers and physicians alike soon noticed a proliferation of such degenerate beings. Society, it seemed, was composed of very few healthy and moral citizens. As the numbers of unhealthy, and even vicious, persons multiplied before their eyes, reformers became convinced that social degeneration was imminent. Something had to be done. Before the millennium arrived, warned the Phrenological Journal, both men and women "must be organized nearer perfection, and more fully developed than at present."21

The concept of a tri-partite harmony, within the body and without, appears to be neither class exclusive nor gender neutral; health problems, after all, affected both working-class and middle-class men and women. At a temperance conference in New York, Dr. Stephen Smith spoke on the issue of intemperance in women. It was not, he cautioned, just "poor wretches," who succumbed to "such depravity." It was
also the "high-bred" women who supplied wine in social settings or sipped at prescribed tonics in the privacy or their homes who threatened both personal health and social harmony. Socialist editor Martin Butler extended his belief in harmony beyond class relations to arguments about personal health. One of his readers had forwarded to him an article on the historic use and evil effects of tobacco. Butler agreed with much of the report, but he suggested that the author exaggerated the problem when he claimed that tobacco smoking led to drunkenness. Butler felt that many drunkards smoked, but he believed that all smokers did not necessarily drink alcohol. Obviously out of a genuine concern for his subject, the pamphlet writer had missed the need for temperance, balance, and rationality in his own argument.

Health reformers and physicians emphasized that care must be taken to prevent excesses and imbalances, and the resultant disequilibrium between the mental, moral, and physical faculties. A marked degree of over-development in any of these categories could lead to social depravity, bodily degeneration, insanity, or death. Dr. Henry Maudsley, physician to the West London Hospital, and former resident physician of the Manchester Royal Lunatic Asylum, for example noted in 1867 that mental illness stemmed from excessive functional imbalances resulting from overwork, emotional upset, depressing passions, and physical exhaustion. Elizabeth Blackwell, who trained in allopathic medicine, yet was
treated at Preiznitz's water cure, agreed with Maudsley's notion. "If the proper distribution of force is disturbed in any individual," Blackwell claimed,

by the neglect to exercise important portions of our nature, an antagonism of faculties springs up, one part growing at the expense of another part. Thus the emotional may destroy the intellectual life in an individual who is subjected to undue excitement of the passions.... The other faculties will rapidly lose their power. The intellect suffers, judgement is lost, and mental condition pronounced, which is really a species of insanity.24

Such ideas were not new; they emerged out of the concern with balance and symmetry. That tri-partite balance was becoming increasingly important with the late 19th-century dislocations. Concern mounted among doctors, parents, educators, and health reformers that the strain of modern methods of education, for example, might cause physical, mental, or moral degeneration. British sanitarian, Edwin Chadwick, expressed concern in 1860 about the dangers of over-study and the sedentary character of education on "the proverbial puce-facedness of the young scholar." The complaint was not unknown on the other side of the Atlantic. In 1882, for example, a New Brunswick dry goods merchant and Canadian member of Parliament, The Hon. John Boyd, lectured in the large hall of the Messrs. Jordan Marsh and Company, Boston, upon the "high pressure" competitive nature of education which "shattered or partially destroyed [the] health of so many young men and women." That same year a Newfoundland newspaper editorialized about the problem of
"Brain and Overwork." Stressing that the laws of health could not "be disobeyed with impunity," the article commented on the "fatal prevalence of nervous disorders" caused by overworking that "delicate piece of mechanism," the brain. Brainworkers and college students who were mentally overburdened often fell victim to nervous problems and death. To alleviate this danger the newspaper cautioned that they, like any good machinist, must take care of their "tools." An " eminent scholar" then gave rules for protecting the mental and physical faculties:

First, avoid excitement and emotional disturbances as far as possible; second, take proper rest, one proportionate to the labor, third, keep in order the instruments with which the brain works; fourth, avoid unnecessary labor and worry; and fifth, avoid overtaxing the immature brain.\(^{25}\)

If any of these five rules were broken, then the results could be disastrous for the individual and society.

Time saved at the cost of normal sleeping patterns, warned Hall's Journal of Health, hurt the mind, the body, and the estate. A proper balance was needed between mental and physical labour. Graduating classes, cautioned J. G. Holland, in Scribner's Magazine in September 1872, contained few healthy bodies as students engaged in overly-competitive brain work. Maintaining a balance was best in mental and physical work. Holland noted that some institutions had gone to extremes. Too many athletics and excessive physical activity had replaced too much brain work. "The tendency in all these educational matters is to extremes. We have no sympathy with
the aim which is fostered in some institutions of making athletes of students. Baseball matches, and rowing matches are well enough for those who have no brain to cultivate...but they are not the thing for studious young men." The physical strain could hurt the ability to study: moderation in exercise, in study, in eating, in social activities, these would make healthy symmetrical men and women.26

It was a contradictory era. Health reformers committed to establishing a balance between the mental, physical and moral faculties, risked losing their credibility if they promoted their case to excess. The concern for the health and well-being of students, though, gave the reformers an edge in reaching the public's ear. The unhealthy aspects of modern educational "cramming" and the corresponding mental and physical disturbances plagued parents, educators, doctors, and health reformers. In New England, an 1890 article in the New York Evangelist criticized the "hotbed system of education" which created "mental weakness" and "feeble folk." The Boston Saturday Evening Gazette, while commenting on an 1891 state government debate on overstudy, suggested that perhaps it was only the idler or weakling who suffered from mental overwork. The struggle for existence that accompanied civilization, the newspaper claimed, favoured the average student. Degeneracy was apparent in both the imbecile and the genius. Those students below average would naturally be left behind by the educational system; those above average must learn to "face
fate alone" beyond the "area of the herd." Even though the 
Gazette felt that the educational system did not create as 
much physical, mental, or moral imbalance as was commonly 
claimed, it did suggest that improved student health would 
alleviate the cases of overpressure that did occur. "A 
healthy body is the basis of all civilization," suggested the 
editorial, "and civilization, unhappily gives birth to much 
unhealthiness." Physicians seconded the health reformers' 
concerns. Dr. Edward Farrell, a prominent Halifax physician, 
spoke to the Dalhousie University class of 1895 and noted that 
a true education involved the "harmonious development and 
growth of all the powers of soul and body." There had been a 
tendency in the past, he claimed, to pay too much attention to 
mental development "at the expense of health and bodily 
vigour." In that same year, Dr. William Bayard of Saint John, 
New Brunswick, delivered the presidential address to the 
Canadian Medical Association and warned of "the injurious 
effects of the high pressure system of education upon the 
rising generation; particularly upon those who are to become 
mothers and our future race." 

Educational reform was one way to preserve the health of 
students, and, increasingly medical practitioners began to 
clamour for the same reforms that health reformers had been 
promoting for decades. The major difference in their crusade 
was that they advocated that physicians alone should control 
the process. In 1902, for example, the Acadian Recorder
claimed that moral, physical, and mental hygiene needed equal consideration in the public schools. Even though teachers were introducing various courses of physical education into schools the "nervous and anaemic girls and dyspeptic and hollow-chested boys" demonstrated medical supervision was needed in schools. After all, the article suggested, only medical doctors were trained to notice "the impending breakdown in the child." Dr. A. B. Atherton of Fredericton, New Brunswick, President of the Maritime Medical Association in 1907, suggested that public schools be closed to pubescent girls during the one or two years of critical physiological development. Horses, he fretted, received better care at this crucial period than did children. Dr. G. E. DeWitt, of Wolfville, Nova Scotia, former supervisor of the Mount Hope Insane Asylum, commented in 1908 that the strenuous academic course and "the lash of competition and urging from the teacher" made the system of the "neurotic, chlorotic or anaemic" schoolchild "rich productive soil" for disease. Modern methods of sanitation and public health, and a more individualistic education system, he suggested, would help alleviate the disequilibrium between the body's faculties. 29

This linkage between physicians and health reformers was not unusual by the turn of the century. Medical practitioners for years had confronted their own therapeutic inadequacies, and had begun a cooptation of health reform ideas. Communing with Nature, claimed George Lincoln Walton, a Massachusetts
neurologist, as he echoed the claims of health reformers a generation earlier, "has a peculiarity soothing effect on tired and jangled nerves." Walks, baths, gymnastics would overcome sleeplessness, he suggested, quoting Delsartian exercise expert Annie Payson Call on the need for repose to achieve a balanced state. "Rest must be complete when taken and must balance the effort in work-rest meaning after some form of recreation as well as the passive rest of sleep." 30

The Phrenological Journal also praised the benefits of this mild exercise programme.

The aim of the Delsartian gymnastics is to give symmetrical physical development, and to take out the angles and discords, the left over pulls of past worries and sorrows, to reduce the body to a natural, passive state, and from that point to train it to move in harmony with nature's laws. 31

Moderation in all things was the key to health. Maintaining and restoring the equilibrium of the body through natural living and better education was the first step towards a healthy body suggested health reformers and echoed by medical doctors. To cultivate a symmetrical body and to promote personal and social regeneration, patients needed a hygienic lifestyle. The stresses of life in an industrial society obviously took its toll in shattered and unbalanced lives. To compensate, Victorians turned to physical education to aid in the development of a symmetrical and balanced body. "The golden fleece of mental culture," argued Alice Tweedy, a physical culture supporter, "will not create for us the symmetrical man or woman." Exercise, prescribed in appropri-
ate amounts, particularly for women, would help restore the mental and physical balance. The real objective of athletics, argued Dr. Lewis W. Pendleton in an address to the 1890 graduating class of Albany Medical College, "is to have a well-poised and symmetrical frame, a heart that never weakens in its regular pulsation, a nervous system that will withhold vigor under the surprises and depressions of real life." A 1901 article in The Boston Medical and Surgical Journal praised physical education and noted that "the whole movement towards bringing about a symmetrical development, beginning with the very young, is in every way commendable." In a similar fashion, James H. McBride, claimed in a 1904 issue of The Alienist and Neurologist that "there never was a time when physical robustness counted for more than at the present time."

One popular exercise system was the "New Gymnastics" invented by Dr. Dioclesian Lewis of Boston and based on Swedish and German techniques. Lewis's system quickly spread; schools in North America, Russia, Scotland, India, and England adopted his methods. In Halifax, for example, James S. McKay, director of a Sackville Street gymnasium, the Hall of Health, used Lewis's techniques to develop symmetrical and balanced bodies and to secure "attention, enthusiasm, accuracy and a good balance and gait." McKay, who also taught physical culture at several Halifax schools, offered charts which revealed the advanced physical development of those who
attended regularly. The various measurements of these boys proved to McKay that exercise greatly improved the development of the human physique. McKay also claimed that his measurements of manual workers proved them to be asymmetrically developed on the right side only and thus that they required compensatory physical education to develop into "perfect physical manhood." McKay argued, in Lewis's exact words, that the body was an "exceedingly complicated machine, the symmetrical development of which requires discriminating studied management." 33

Throughout late nineteenth century North America physical education was used to establish a natural balance of mental and physical work. It was promoted in gymnasiums, private classes, schools, and in the home. Delsarte exercises, which interpreted emotions through form, poise, gesture and elocution were eagerly accepted by young ladies and middle class housewives who attempted to bring mind and body to a balanced and relaxed state. One relaxation exercise described by Emily Bishop, a Delsarte instructor at the Chatauqua, New York Summer School had several benefits: it developed singleness of attention, stupefried the brain, soothed the nerves, and produced sleepiness.

Delsartism was also promoted as an excellent programme for the busy housewife, since housework depleted the store of energy without actually benefitting the body. Emily Bishop argued that exercise could be incorporated into house work.
"When [the housewife] learns to keep her body erect and to bend at the knees who feels no sense of fatigue, and doubtless in place of a sigh she says, 'I am thankful I have a husband to pick up for.'" Wrong muscle development, a cause of asymmetrical development, Bishop continued, not only affected the physical condition, but lowered the nervous tone and induced weakness. What women needed most, urged another Delsarte promoter, Annie Payson Call, was "training to rest." This meant exercise to quiet the nerves, relax the muscles, give spring and grace to the body, and especially to restore the body's natural balance after mental exertion. At the Halifax Ladies' College in 1894 the benefits of both Delsarte and Swedish gymnastics were taught by a professional gymnast, a Miss Whiteside. The course aimed for the development and elasticity for the muscles, control of the nervous system, a graceful bearing and culture, and proper elocution. A Prince Edward Island student also supported the notion of balance when he argued the need for a gymnasium claiming that physical education would make better students. Students on the Island, he suggested, suffered from an imbalance caused by excessive brainwork and not enough physical work. The mind and body needed to work as one. "Athletics is a process artificially applied to the body, as something is artificially done to the brain," he argued, "the two they call education." 

Systematic approaches to physical culture not only had an extremely broad range of support but they fulfilled another
social requirement besides improving the health of Victorians: they assisted in the training of those perceived as "socially deviant." John MacDonald, for example, was an important graduate of Nils Posse's gymnasium in Boston. Despite blindness he had graduated at the head of the 1904 class. MacDonald had studied French at the Berlitz School and oratory at Boston's Everett School and was considered an "all round educationalist." He took a position at the Halifax School for the Blind, teaching gymnastics, French, massage, and oratory. Dr. C. F. Fraser, Supervisor of the School for the Blind, praised the gymnastic work done at the school. This training of "muscle and nerve," he argued, helped students in their other subjects in addition to maintaining a balanced healthy physiology. Massage was considered an excellent trade for blind students. An 1897 article by Dr. Arthur G. Bennett of Buffalo, an instructor in eye and ear diseases, was repeated in the Canada Lancet. Bennett noted that both male and female students could be employed in massage, that their wages, although lower than those of sighted masseuses, could nevertheless make them employable in rural areas, and that their disability would make them less objectionable to those whose morals were offended by disrobing in front of a sighted operator. Courses like those offered by the Posse School were most beneficial. The educated blind child, Dr. Fraser argued in Halifax, would not grow up to be "a helpless drag on the slender resources of a laboring man's family."
By the turn-of-the-century physical culture was also expected to bring about social balance by 'uplifting' the working classes in addition to improving the individual harmonious body. In 1900, for example, the supervisors at the Halifax Industrial School (primarily for delinquent boys) found that the shoemaking shop could no longer compete with large manufactories. Instead of learning a trade the boys could learn equally important values through physical education. Sergeant Major Long directed the boys in the use of horizontal parallel bars, the vaulting horse, and dumbbells, and the students also learned to march with a "manly tread." Not only would these students develop their bodies through physical exercise, but they would also learn the appropriate social values needed to develop into socially responsible and balanced individuals, values such as commitment, perseverance, discipline, and obedience to authority. At the turn of the century, such military training was important especially for boys.37

In 1903 the Manhattan Trade School for Girls opened. This school was designed not only to teach skills, but to uplift the girls "mentally, morally, physically, and economically." At the school, following physical examinations which included feet impressions, scalp, hair, and tonsil examinations, the girls learned Swedish gymnastics. The exercise program was designed to treat asymmetry and posture problems, as well as to instill a love of wholesome exercise. In
addition the girls were taught the principles of hygienic living and the necessity of bathing. Many girls, it was claimed, were "sewed into their clothes for the winter and . . . frankly admit they only bathe in the summer." It was imperative that these girls receive physical training and learn the importance of the hygienic and balanced body. Mary Porter Beegle, a former physical director at the school argued:

> Bodily efficiency must be the fundamental principle of their education. In order that they may become skilled and useful members in their professions they must be made to realize the value of good health as working capital and be able by intelligent, hygienic living to adjust themselves to their new environment in the work room.\(^3\)

Natural body, social body, Victorians feared an unnatural disequilibrium in both.

While health reformers were concerned that excessive brain-work caused a disruption in the natural balance of the body, and hence in society, they were also worried that the opposite of overwork - boredom and monotony - could be equally harmful. A Prince Edward Island newspaper, for example, claimed that monotony was often a cause of madness. It induced disinterestedness, depression, melancholia, and ultimately, insanity. The newspaper suggested that there was a higher incidence of madness in farmers than in other people, and that labourers in other monotonous jobs could be similarly afflicted. A proper mental and physical balance was necessary to alleviate both a monotonous job and a sedentary lifestyle,
"Healthy recreation keeps more people out of the madhouse than anything doctors could do. Nature demands a certain amount of balance and she will have it or be revenged," claimed the article. The emphasis on the necessity of maintaining a properly balanced system therefore worked both ways: too much brainwork with too little body work, or too much physical work without mental stimulation, could harm the natural workings of the body.39

If farmers, labourers, and schoolchildren were at risk because of physical and mental imbalances, pubescent girls and adult women were even more so. According to medical doctors the functioning of the female reproductive system was easily disturbed, particularly during the three critical stages of a woman's life: puberty, childbirth, and menopause. The disruptions of early womanhood in particular, could lead to severe physical and mental distress if aggravated by over-study. In his book Sex in Education or A Fair Change For the Girls, 1873, Boston doctor Edward H. Clarke claimed that excessive mental activity caused a derangement of that "delicate and complex mechanism," the female reproductive system. Young girls, Clarke explained, "are urged to meditate a lesson and drive a machine simultaneously, and to do them with all their force." Clarke suggested that pubescent girls needed plenty of sleep, good nutrition, and carefully nurtured reproductive organs. Because of the delicate physiology of young women, Clarke advised against their tackling higher
education, since he believed that this threatened both their reproductive potential and their mental stability. His point of view would cause concern for some time.\textsuperscript{46}

By the turn of the century the need to protect the physical and mental equilibrium of young girls was particularly important. The Canada Lancet, for example, cautioned in 1895 that an imbalance between physical and mental training was disturbing the menstrual cycle of young girls and turning them into "beautiful bundles of nerves." In a similar vein Dr. George J. Englemann, president of the American Gynaeiological Society argued in 1900 that "many a young life is battered and forever crippled in the breakers of puberty," and claimed that this time of life was when many young women first felt the blow of ill health due to the strain of emotional and physical imbalances. Dr. Edward C. Hill of Denver argued that "the present civilized modes of living" caused an imbalance in the development of young girls. Their cerebral development was "fostered and forced to a degree that deprives the remaining tissues and organs of their necessary nutrition." Too often, he continued, doctors had to treat sickly girls who appeared "like buds blasted in the blooming." Rest from study during puberty, he suggested, would lessen the chance of lifelong diseases.\textsuperscript{41} These turn of the century concerns were connected to fears that the 'best' North American women were either not willing or not able to reproduce.
Much of this concern over the physical and mental overstimulation and the subsequent degeneration of young girls resulted from the exposure women's rights advocates would bring to their gender's new public role. A British article reprinted in Newfoundland's Public Leader, claimed that women should complement men, not rival them. "That to many women the present educational advantages are of immense value I do not deny:" claimed the writer, "but these it may almost be said, are exceptions; we can count on our fingers our lady-doctors or our lady-lawyers; our known lady-artists are not numerous; and the world would be better without some of our lady writers." While women, of course, needed education to be governesses, the writer persisted, they must not over-strain themself in educational matters if they are to be "pleasant" companions and mothers.62

The disorder that doctors and health reformers worried most about was neurasthenia, a term popularized by New York neurologist George M. Beard to describe nervous exhaustion. Beard suggested in 1881 that the chief cause of nervousness in America was modern civilization and the pressures it inflicted on men and women. While Beard admitted that secondary influences such as climate, personal indulgence, and lifestyle could lay a groundwork for nervous exhaustion, they could not be a cause in themselves without the influences of modern life. Neurasthenia thus became a disease of civilization, the product of "the fierce struggle for life of the nineteenth
century," and a reflection of the lack of balance in the 19th-century life. Despite the fact that neurasthenia was considered an "upper-class malady" there were also lower class neurasthenics. Medical practitioners considered this due to the degeneration of their moral, mental, and physical faculties. While lower class women were apparent victims of overwork, often the blame for lower class male neurasthenia fell on the patient's supposed indulgence in immoral and animalistic behaviour. Such excesses, many suggested, not only characterized the lower class, but led to physical and mental decline of the individual and to even greater social degeneration. 43

Just as there was confusion about the class basis of neurasthenia there were also a variety of apparent symptoms and cures. Most cures sought to re-establish a correct balance in the body, although there was never a clear consensus about exactly what was unbalanced, or how it should be treated. Dr. S. Weir Mitchell, who treated early cases in Pennsylvania, made his patients remain in bed for up to eight weeks, often with a meagre diet of two tablespoons of milk every two hours. Mitchell reported that usually after this treatment, the patient was both hungry and happy to resume his or her duties. The Canada Lancet in 1894 claimed that the principle manifestations of neurasthenia were headache, vertigo, insomnia, sensory troubles, poor circulation, muscular weakness, genital difficulties from sexual infirmity,
and in males, excess of coitus and masturbation. In 1904 one doctor suggested that neurasthenia caused abdominal venous congestion which needed to be relieved. Natural balance, he suggested, could be re-established by rational dress, abdominal exercises, electricity, cold water spray against the stomach, and the re-establishment of regular and natural bowel movements. A few years later Dr. T. C. Ely blamed neurasthenia on such causes as overwork, worry, faulty education methods, and the overstrain of body parts. He suggested that properly directed occupations, free from the hurry and worry of modern life, would maintain the body's natural balances. Most of the treatments for neurasthenics, therefore, centred on establishing the proper equilibrium in the body. Rest, darkened rooms, meagre diets, and peaceful isolation all aided in the establishment of the correct balance.  

Neurasthenia became associated with middle-class women, although there were both male and working-class victims. In many ways the diagnosis was used to control those middle-class women who were bored, restless and dissatisfied with the social restrictions with which they were bound. Feminist Charlotte Perkins Gilman based a short story on her own experience with neurasthenia, and with Weir Mitchell's oppressive treatments. In The Yellow Wallpaper, a neurasthenic wife and her caring but confining husband lease an isolated country home where the wife is supposed to find the rest and peace that the doctor has prescribed. Here she finds
not relaxation, but insanity, as she struggles against a patriarchal society that restricts women's movements and forces them to do nothing and be nothing. It is a story that emerged out of Gilman's own experience with neurasthenia and with Weir Mitchell's prescription: acceptance of her domestic role and limitations on her public and intellectual work. It was a role that stifled Gilman and ultimately led to a nervous breakdown and a divorce.45

The concern over neurasthenia was not simply because of the disease itself, but also because of the symbolism of the unhealthy body in the broader industrial society. The immoral tendencies of the lower classes, the unhealthy figure of the pubescent girl, the unstable and overwrought businessman, the adult woman trying to escape her proper sphere, all were symbolic of the degeneracy that seemed to threaten the very fabric of Victorian life. The perfect body needed to develop mentally, physically, and morally in a symmetrical fashion, Victorian reformers suggested, in order for society to grow in a like manner. The excesses and degenerations of an individual, they believed, were multiplied a thousand-fold in the public realm.

Many of those who worried about individual and social degeneracy saw nature as a force that could restore the natural balance. The belief in the healing powers of nature revealed itself increasingly in regular medicine, but also in the therapeutic approaches of physical educators, herbalists,
homeopaths, phrenologists, and dietary reformers. These regenerative benefits of nature were of particular importance in aiding in the maintenance and restoration of bodily balance. The concept of the balanced body, whether from excessive brainwork, overexertion, sexual excesses, or physical deformity, affected at once the individual and society. Victorians believed that each healthy and balanced individual contributed to an equally healthy and balanced social order. One state could not exist without the other.

Like neurasthenia, the problems of excessive or mis-directed sexuality, linked physical and social problems. Masturbation, for example, was of particular concern for doctors and health reformers, and for patients themselves. A student, William C. Baker, chronicled his problems with masturbation and the resultant disequilibrium caused by his youthful and immoral excesses. At puberty Baker began to practice the "solitary vice." After four years of this sexual excess his "eyes were opened to its evil effects" and he tried to discontinue the habit. But he confided, "Nature was relentless." By the time he was twenty-three he suffered from a variety of symptoms attributable, he believed, to his youthful excesses. He chronicled his ailments; along with seminal losses and nervousness, he listed "high pulse after little exertion; excessive self consciousness, frequent stomach trouble - mainly acidity; lack of endurance in physical exercises . . . excessive perspiration, especially in
the face: lack of self-confidence, and finally mental depression and discouragement." His list of remedies is equally impressive. In addition to consulting a variety of physicians, he tried sitz baths, improved personal hygiene, circumcision, local bathing, and medicines including "bottle after bottle" of the patent medicine Fellow Syrup of Hypophosphites. By the time he consulted anatomist and professor, Burt Green Wilder, he was suffering "with no mental and physical pain." He complained that he was "easily excited sexually in the presence of one of the opposite sex or by lascivious thoughts, in which direction because of my experience, my mind often tends and is hard to control." Yet even more than his concern for himself, he worried about his suitability for "a pure young woman in perfect health who thinks more of me than I feel is best because of my weaknesses." Baker felt, as did many others in similar circumstances, that his excessive sexuality contributed mental and physical pain not only to himself, but ultimately to others around him. Signing himself, "Yours in anxious waiting," he begged the professor for help. "Now, Doctor what can be done?" The response of Wilder, whose lectures in hygiene to the freshman class had inspired Baker's confidence, is equally informative about his own concern for the healthy individual and society. First, Wilder suggested that Baker seek help from a physician in Ithaca; second, he retained the
letter in order to use it to demonstrate "the need for education on this subject." 46

If men like Baker were subject to disease and derangement because of imbalances and excesses in their habits, women were at even more of a disadvantage. After all, they were ‘other’, even in perfect health their bodies could never match the ideal male physique. It mattered not if it was neurasthenia or childbirth, over-work or menstruation, small pox or menopause; women bore the burden of their physical bodies. Along with the danger of common epidemic diseases, the restrictions of unhealthy dress and lifestyles, women faced the ever-present spectre of disability and death due to the peculiarities of their reproductive organs. Yet, most women were not passive victims. Through the health reform movement, many women discovered not only health but the potential benefits of good health for themselves and for society. Health reform offered a number of solutions to women's problems. It offered an improved physical condition, an exalted public role, and even a profession.

Women's lives were difficult. The more fashionable were laced into heavy dresses and tight corsets, expected, with each gasping breath, to exude the correct demeanour. Many suffered from both work and economic hardships. One such woman, a Mrs. Hammond, froze to death in a Newfoundland snowstorm. Pregnant, she had attempted to cross the tickle from Bell Island to Portugal Cove, in order to obtain some
foo d. Her lot, and her demise, was no different from many other women who lived and worked in Newfoundland, the Maritime Provinces and the Northeastern United States. In 1877 a commentator on Newfoundland wrote:

Here and elsewhere I was painfully impressed with the hard lot of the wives and daughters of the fishermen along these shores. Not only does the rough work of cleaning, curing and drying the fish devolve upon them, but the task too of cultivating the land, and worse than that of carrying to their fields, and therefore often up steep heights, the manure with which the soil is enriched. Outdoor exercise of this sort, if it add [sic] to the vigour of those engaged in it, and might even be preferred to that hothouse refinement which unfit a woman to be anything else than a very delicate lady, short lived, and useless at the best, is yet adapted to rob the gentler sex of its charms, to furrow and wither the countenance, to bow the back, and prematurely to entail the comfort of old age."

There were three concerns for women that health reformers expressed. First was the belief that the health of women was deteriorating even faster than men. Second, they believed that women's poor health was a result of their unnatural lifestyle and was, therefore, reversible. Third, health reformers supported equal rights for women, particularly that there should be equal pay for equal work, and that women were capable of fulfilling all types of employment, including - and sometimes especially - medicine.

Of course, health reformers were not the only ones who exposed the poor health of women, but they were the ones who argued that this ill-health and disease was both preventable and restorable by an adherence to nature's laws. Fashionable styles were the cause of many of the ailments peculiar to
women. The wealthier participated in such foolish habits and suffered more, suggested Augustus R. Gardner in the *Water Cure Journal*; fortunately, the poor were "not exposed to fashionable follies." According to Gardner, women were not naturally inferior, but rather they were influenced by social customs. In their early years male and female children both dressed in clumsy attire, but Gardner noted a time came when boys left such debilitating clothing behind; girls kept theirs and the decline began. But as Mary Livermore argued the natural state of woman kind was not an invalid condition. Health and vigor could be attained if women "will acquaint themselves with the laws of their being, and will obey them."46

Many regular physicians would echo Dr. Edward H. Clarke's concern about female weakness. Clarence Webster, an eminent gynaecologist, spoke to the Saint John, New Brunswick Medical Society and noted that while 'women's life' was not synonymous with disease there were linkages. Women's life was a period of physiological unrest, except in youth and old age. . . [with] great disturbances which mark the advent and departure of the reproductive era of her life, the profound changes taking place during ovulation, menstruation, pregnancy, labour and lactation . . . it is not remarkable that neurosis should manifest themselves particularly in relation to her reproductive mechanism.

The years of puberty were especially dangerous as young girls were tempted to over-study or over-exercise. An article in the *Dominion Medical Monthly* noted that "the integrity of a nation depends upon the physical and mental qualities of its
individual constituents . . . . The girl, during the establishment of the menstrual functions should be an object of especial care.\textsuperscript{47}

This view of womankind, although concerned with balance, differed greatly from the health reformer's opinion of women's abilities. To the health reformer, women in a natural and healthy state, were as capable as men at handling both education and employment. And unlike men, they had their special maternal characteristics which particularly aided them in certain professions. What had held women back were the social restrictions placed upon their gender. Legal restraints kept them from being free; their education and employment opportunities kept them from earning a respectable income; and the fashionable dress hindered their physical health. Health reform helped women to gain some freedom from these social bonds. It offered employment for many women. Not only did many women become physicians, but many other women were employed by health reformers at cures and in the publishing industry. The Water-Cure Journal, for example, noted that its offices employed a number of women in its pressroom. Other women would be convinced of the benefits of health and social reform by those health reformers who challenged fashion's dictates and supported dress reform. Harriet Austin at the Dansville Home on the Hill was one such person who flaunted the laws of fashion. Other women would be influenced by people like phrenologist and doctor, Lydia
Folger Fowler and her good friend, dress reformer, Amelia Bloomer. A poem "Success to the Bloomer," published in the *Water-Cure Journal*, read, "Reformers of customs and fashions in use, Have always been subject to vilest abuse; Yet I never again will wear a long skirt, To fetter my feet and wipe up the dirt, while I labor." Others would read the many articles of the health reformers, and themselves begin to challenge the traditional role for women. Rev. Phebe A. Hanaford wrote Fowler and Wells in 1867 and asked why they had offered an article on male ministers only. Offering the names of a number of "lady" ministers that were influential, along with dates and details of their work, she queried, was it not just to give women the same attention?^{50}

While health reformers argued that their regimens would lead to both individual health and social health, they did not hesitate to become involved in other social reforms. Many, indeed most, health reformers were temperate, and worked to alleviate the problems that they saw caused by alcohol. Physical culture advocate Dio Lewis, phrenologist Orson Fowler, and dietary reformer Sylvester Graham, for example, all worked for the temperance cause. Samuel Wells and Orson Fowler both advocated vegetarianism. Wells helped establish the American Vegetarian Society, and Orson Fowler, a vegetarian, published Sylvester Graham's work in the *Phrenological Journal*^{51}.
Health reformers supported the aims of the women's rights movement and their campaign for better health illustrated their concerns. In 1876 Susan B. Anthony, known for her suffragist activities, was working on Mr. Johnson's *Universal Encyclopedia*, compiling information on women workers and reformers. Along with Elizabeth Cady Stanton, Anthony was "working to gather up the broken and scattered threads, of our women's rights work to weave into a history." She urged health reformer and phenologist Charlotte Fowler Wells to send her biographical material. "All I meant is to make sure that you go in the book - not, remember, please for your own personal sake - but for the credit and honor of womanhood." This was surely a tribute to the work of Fowler Wells and the contribution that she and the rest of her family had made to both health reform and social reform.52

The *Phrenological Journal*, for which so many of her family members worked, and which she ran after the death of her husband, was a leader in advocating women's rights. That connection between Fowler and Wells and Anthony would be a long-lasting one. In 1901 the 81 year old Anthony responded to Jessie Fowler, Lorenzo and Lydia Folger Fowler's daughter, who had written to let her know that 87 year-old Charlotte Fowler Wells was in failing health. Women must get equal pay for equal work, claimed an editorial in the *Phrenological Journal* in 1870, so long as they did equal work. And when a contributor agitated against women's rights the editor was
pleased with the flurry of responses, and noted that they could not publish one-twentieth. Both sides had supporters with intelligent and well-supported arguments. "Agitate the subject, ladies, keep up the excitement. Much good will grow out of so free a ventilation." The support was more than rhetorical. Charlotte Fowler Wells was president of the "Southern Woman's Bureau," a society that helped to train, aid and council, southern women as teachers, writers, physicians, reporters, and musicians. The Phrenological Journal laid out the reform view of suffrage: "Governments derived their first powers from the consent of the governed, and taxation without representation has ever been considered Tyranny. Sex is not a crime, and it is, therefore, degrading to deprive women of the right to vote and thus class them practically with robbers, murderers and the worst criminals of the male sex."

Another suffragist who was a good friend of Charlotte Fowler Wells was Abigail Scott Duniway, a writer and publisher. Duniway was a leading figure in bringing the franchise to Oregon. She wrote Fowler Wells in 1887 to advise her that while the New Northwest was no longer owned by her family, it had done well as a woman's suffrage paper. She told Fowler Wells that she would now try to reach both friends and foes through her writing and travels. Brook Farm participant Georgiana Bruce was another good friend. Bruce had been an assistant at the Sing Sing Prison at one time; another friend,
Eliza W. Farnham was the matron. Farnham and Bruce eventually moved to California where they reported on the freedom that they found in regards to dress reform, phrenology, and spiritualism. Writing her friends to send her reading material, Farnham told an anecdote about a marriage proposal she had received. Apparently a Mr. Allen claimed to have no "objection to marriage except to what constituted the principal object of it to most persons." Obviously amused by the man's views, Farnham noted that he had refused to let her milk a cow, objecting that no woman should do so in the presence of a man. She refused the proposal. Suffragist Sarah M. Grimke was less amused by women's restricted position in society. In one letter to Charlotte Fowler Wells, she noted, "My head & my heart bear continually the thought of woman, her condition & her destiny - the one as ignoble as the other is glorious."

The Phrenological Journal, in fact, often took a gleeful pleasure in promoting women's rights. The writer of one article, (most likely Samuel R. Wells), noted he had once urged Wendell Phillips not to speak at a woman's rights meeting. A mob was being organized against Phillips, who was not deterred, and went on to the meeting noting he had not been "entertained" by a mob for some time. It was Phillips' opposition to religion, claimed the article, not his agitation for women and labour that kept him from doing more. Still Phillips did much to encourage equality for women. At one lecture site he found that he was paid $50.00 while a woman
lecturer, the niece of Jefferson Davis, received only $5.00 plus travel expenses. Phillips, in support of equal pay for equal work, offered the woman half of his fee, and later gave her the entire amount.\textsuperscript{55}

This support for woman's rights and a role for women in medicine was hardly new for health reformers. In an 1848 article, "Shall Anatomical Knowledge be Prohibited to Women?," the Phrenological Journal's editor argued, "I hazard nothing in saying that the sick, in [woman's] hands, would be at least as WELL doctored - though probably not as liberally dosed with kill-or-cure POISONS." Women doctors, even those trained in allopathic medicine, had to perform better than male allopathic physicians. Women's maternal nature and sympathies, their patience, and their affinity with nature and natural cures made them much more likely than doctor "Dose-em-and-cut-em" to succeed in curing their patients. In fact, the Water-Cure Journal celebrated that women no longer needed to be drugged and ignorant so that 30,000 male physicians could profit from their disabilities. Education and training in health matters was the solution. Health reformers did not, of course, support the ignorant folk curer of any gender. William H. Orr of Oshawa, Canada West, wrote the Water-Cure Journal, to ask if weaning should take place according to the zodiac positions, as some old women maintained. The response was, "Never mind the old women, Look to Nature: Old women are almost as unreliable as doctors."\textsuperscript{56}
In addition to the various popular social reforms, certain members of the Fowler family, particularly Charlotte Fowler Wells, teenager and later doctor, Edward Fowler, and Almira Fowler, later a homeopathic doctor, were mystified and delighted by the spiritualistic fervour that had started when sisters Kate and Margaret Fox, formerly of the Belleville, Ontario area, claimed to be able to communicate with the dead. Like many of their contemporaries, these members of the Fowler clan believed that spirit communication was another step forward in the natural perfection of mankind and, an extrapolation of concerns about the healthy physical body. The Fowlers were not alone in their beliefs and activities. Clad in Turkish trousers and tunic, Georgiana Bruce, wrote from California in 1850 to exalt the fact that Wells was "living in the midst of light." Another friend wrote in 1857 to congratulate Charlotte on her spiritualistic experiences. He eagerly recounted an appearance of a lower grade spirit, capable of lifting a table and a 220 pound man and ringing a bell, at Corn Planter Hotel in Youngsville, Pennsylvania.

The minute details of some of the Fowler spiritual communication were preserved by Charlotte Fowler Wells. A lengthy manuscript details the events that began on 28 November 1850 with a meeting of a number of people including Samuel, Edward, Almira and Charlotte. While Almira was affected, it would be Edward who, entranced, would pass to the superior condition, under the spirit influence of one departed
J. P. Cornell, who apparently had frozen to death in Siberia. At these meetings, visitors such as Kate Fox, who later would admit to spiritualistic fraud, Horace Greeley, newspaper editor and supporter of many reforms, George Bush, Swedeborgian and Hebrew professor, and Steve Pearl Andrews, former Brook Farm participant, Fourierist and free-lover, attended. To these quests Edward would offer spirit musings, often in different languages, on the human soul (formed by an element not yet discovered), the atheistic character (a vice-ridden gormandizer), Swedeborgian religion (too individualistic), and the beginning of life (upon the birth of an infant). He offered information about planet habitation (Saturn had different, and more perfect inhabitants), moon habitation (it was a "broken, craggy tumultuous mass, not adaptable to human beings with intellect" but it would be populated in the future). On the topic of human creation, the group was told that Adam, a Black man, was the first human, and while mankind had always been above the animal, since Adam's time there had been progress; although present day Blacks were not as refined as the olive skinned, or the even higher developed, Whites, they were above the red skinned. As the black person advanced their bodies would change and the race would disappear. In all spheres (of the Summerland, the spirit's heaven) each person retained their gender identity. "There seems to need a combination of the qualities of both sexes to make a perfect man," claimed the spirit on 22 December 1850. Whether
these are the words of a precocious teenager, who would later become a respected physician and translator of medical works, one of the adults, or a spirit is less important today than the message that the words convey. For in this document are the ideas of the 19th century reformer, held hostage to the belief in the perfectibility of humankind, and all too aware of human fallibility.

The health reform platform, however, did not admit to possible failure. Instead it stressed the potential perfection that Nature offered. Nature, thus, was the focal point of their ideology; if respected Nature could nurture the sick and the sinful back to health and grace. The Water-Cure Journal noted that, "We have gone astray. Nature is not malignant; but we have erred. We have lived in ignorance of the conditions of health." Good health was natural, and with good health came symmetry of form and a harmonious balance of physical, mental and moral forces. With that achieved on an individual level, then social harmony and perfection could be attained. That goal was illusive, however, and health reformers recognized the magnitude and importance of the task. Pondered hydropath James Jackson:

If our people live so badly that the most of them are sick, and when sick are so badly treated that a great many of them die, when by the laws of their being, they should not be sick, or if sick should only be slightly so, and scarcely ever die from sickness, does it not follow that a reform in these directions is needed?
Jackson and many, many other health reformers felt that there was a need for reform and they laboured for that change. They were, in Jackson's words, "a very large minority," these people who chose nature as both a curative agent and as a health preserver. Their commitment to women's rights, to social reform, to hygiene and a healthy balanced physiology and society, made them leaders in their fields. Their allegiance to Nature, as the only path to physical and social regeneration convinced them of the rightness of their position.

Tis Nature cures the sick; Like God, she touches weakly things, and they Revive, and put forth wondrous beauty. Bring forth your sick and suffering ones where gently she Can handle and caress and nurse them. Then their forms, though delicate and frail, shall grow. To strengthen and large endurance. With almost evangelical fervour, health reformers set out to reclaim, regenerate, and re-create those who had trespassed from the path of natural good health.
Notes


7. Leach, True Love and Perfect Union, pp. 19-37; "The Old Year and the New," New York Clipper, 16 January 1864, 6 January 1866. This almost religious concept of "nature," is different from the allopathic conception of "natural" processes. See Warner, The Therapeutic Profession, pp. 85-91. See also the turn-of-the-century article which made the connection between natural processes and the liberalism and progressiveness of the medical profession. James A. Coleman,


22. Public Ledger, Saint John's, Newfoundland, 12 May 1874.


46. William C. Baker to Burt Green Wilder, 15 November 1896. Burt Green Wilder Papers, Department of Manuscripts and University Archives, Cornell University, Box 4/26/95-1. Wilder's response is on the back of one page of the letter and is dated 21 January 1897.

47. Public Ledger 20 March 1880; Rev. C. Steward, "Notes of a Visit to Newfoundland," Ibid., 4 September 1877.


50. "Girls in Printing Rooms," Water-Cure Journal, XX:3 (September 1855); Harriet N. Austin, The American Costume: or, Woman's Right to Good Health, (Dansville: 1868); "Lydia Folger Fowler," American Reformers, Alden Whitman, ed., (New York: 1985), pp. 313-4; "Success to the Bloomer," Water-Cure Journal, XV:2 (February 1853), p. 40; Rev. Phebe A. Hanaford to Messrs. F. & W., [sic], 28 March 1867, Fowler and Wells Family Papers, Department of Manuscripts and University Archives, #97/1/4. Hanaford stressed that she was referring to "lady" ministers and not "female" ministers. See the poem by A.M.B. on the Bloomer dress. The author noted that she began to subscribe to the Water-Cure Journal when she found that it supported dress and other types of reforms. Water-Cure Journal, XV:5 (May 1853), p. 106. The women at the Hygeio-Therapeutic College, New York, supported dress reform. See "Hygeio-Therapeutic College," Ibid., XXXI:15 (May 1861).

51. Eastman, Dio Lewis; Nissenbaum, Sex, Diet and Debility; "Orson Squire Fowler," American Reformers, pp. 314-6. James Simpson to Dear Sir [Samuel Wells] December 1850, Fowler and Wells Family Papers, #97 Microfilm; Sylvester Graham to Friend Wells, March 14, 1851, Ibid., S. Graham to Friend Wells, no date, Ibid. Note, though, that Graham was never satisfied
with the journal's presentation of his work. He complained that articles had not credited his work enough, or that articles were published too late, or that they were edited too much.

52. Susan B. Anthony to Mrs. [C.F.] Wells, 10 August 1876, Fowler and Wells Family Papers, #97/1/7; Susan B. Anthony to My friend, 18 May 1901, Ibid., #97/2/1. Anthony is not sure who wrote her; she asks if this is Miss Jessie's sister and the other daughter of L.N. Fowler, but, in fact, Jessie Fowler was an only child.


55. "Wendell Phillips, The Orator, Agitator, Reformer," Phrenological Journal, 74:4 (April 1881), pp. 171-5; George Lowell Austin, The Life and Times of Wendell Phillips, (Boston: 1888 rep.), p. 244. The strength of women's rights in this period is borne out by the comment made by Carrie Chapman Catt to Florence Woolsey Hazzard who was compiling a book on women's suffrage. "I am not a pioneer. I consider that the pioneer period ended in 1890. A new group of women came into the convention of that year ... We picked up the work where the pioneers dropped it." Florence Woolsey Hazzard Papers, Department of Manuscripts and University Archives, Cornell University, #2516 Box 2.


58. My Dear Mr. Wells from Georgiana Bruce, 1850, in Fowler and Wells Papers, #97 Microfilm; [Vernon Trumbell?] to Friend C.F. Wells, 21 May 1857, in Ibid.


61. Ibid., Frontispiece.
CHAPTER THREE:
"The Phrenological Design for Physical and Social Harmony"

Phrenology unfolds the brain
And does all characters explain...
In short reveals the whole of man,
And does his vice and virtue scan.
His moral feelings it unfolds,
And all his intellect beholds;
His baser appetite surveys,
And ruling passions, too, portrays.
If he be proud or fond of show,
Or prone to lie, it tells you so.
And if his sense be great or small,
Or, if per chance he has none at all,
Or if his brain be dull and lazy,
Or lively, pert, and quick or crazy.
Or if it be both large and strong,
Or if inclined to thought or song,
Or if he cleaves to shining dust,
Or if his honor you can trust,
Or if he has a feeble mind,
Or if his thoughts be well defined.
Or if his words their impulse suit,
Or if his tongue be chained and mute.
Or if his reasoning powers be strong,
To ferret out the right or wrong,
Or if a thief and shy withal,
This potent science tells you all.
On this forever could we dwell,
And different traits with pleasure tell;
But if you doubt what we have said,
Let the phrenologist feel your head.¹

The science of phrenology - for science it was to the
19th century health reformers² - offered a plan for physical and social health. In the often-repeated words of the Fowler family, the leading phrenologists of North America, the key to physical and social well-being was self-knowledge; to "know thyself" was to understand the physical, mental, and social harmony that nature demanded and to follow the laws that would repair, maintain and improve that balance. This chapter will
examine the phrenological design for physical and social improvement and, indeed, perfection. It will concentrate on the history of the Fowler family and their work especially in the period from 1860 to 1900. Orson Fowler and Lorenzo Fowler were the leaders of a family dynasty of practical phrenologists who believed that the various faculties could be improved by the self-culture of the individual. The details of their life have been well documented, but that work has not given phrenology an appropriate connection to the social realm. This chapter will look especially at Orson Fowler and his concentration on the sexual nature of humankind. Despite the tenuous line that Fowler walked in order to improve the physical, mental and moral life of the individual and society, his ideas usually were well received. In the last quarter of the century, however, burdened both by debts and by charges of immorality, he began a lecture tour that would end his career. It was neither his views on phrenology, nor his opinions on sexuality that caused his downfall, but rather his unwitting challenge to the hierarchical order of society.

This detailed look at a man's life, adds to the history of phrenology. Most important, though, is the demonstration of the linkages between individual health and social health, a connection that Fowler spent a lifetime promoting. A society that closed its mind to the issues of personal health, would be - at least in Fowler's opinion - a society that was introspective, stagnant, and unprogressive. For Fowler it
would not be the ordinary Newfoundlander who caused this moribund state; it was the hierarchical society that caused social imbalance and social ill-health. David Alexander, in referring to Newfoundland, argued that "wide differences in educational skills and information between a governing elite and the mass of the population can breed an unwarranted deference on the one hand and a selfish noblesse oblige on the other. It also breeds a sluggish intellectual life and an unimaginative and inefficient debate about the goals of the society and how they might be realized." If Mary Douglas is correct about the importance of the human body to society, and if Orson Fowler’s call to the people to think for themselves, was at the root of his troubles, then, we can only surmise that the gap between the literate clique and the illiterate masses, played a contributing role in the "dis-ease" and disequilibrium of the social, economic and political life of Newfoundland. But Newfoundland is only a smaller and more isolated version of broader society. While it was the site of Orson Fowler’s downfall, the scenario could have played out anywhere in North America.

While Dr. Francois Joseph Gall’s ideas about phrenology had existed for some time it was not until the 1832 visit of his student and colleague, Johann Gaspar Spurzheim, to the United States that the science became known. That visit, which culminated in Spurzheim’s death, brought about the formation of the Boston Phrenological Society. Phrenology
soon took root in various locales. One result was the issuing of a number of invitations to renowned Scottish phrenologist, George Combe, brother of the famous physiologist, Andrew Combe. In 1838 Combe answered the call and arrived in the United States. He would maintain the same rules of lecturing as in Edinburgh: waiting for both an invitation and the guarantee of a class before he would address a group. This, he felt, would keep him from intruding on the beliefs of those who did not support phrenological tenets. One major result of Combe's visit, much ignored by historians, is his three volume Notes on the United States of North America during a Phrenological Visit in 1838-9-40. These volumes not only detail his visit and the acceptance or rejection of phrenology but they offer a rich record of contemporary culture and events as seen through the eyes of an observant and intelligent commentator. In his commentary Combe expressed many of the ideas and beliefs about health and human nature that would later be advanced by health reformers like the Fowler family. He was, for example, concerned with ventilation and the dangers of impure air. He supported the concept of a harmonious balance and the danger of excesses. In North America, he suggested, the air was drier than in Britain and that left the people in a high state of mental excitement. Combe suggested that this over-excitement ultimately was what had killed Spurzheim; he had been so busy and overwrought during his visit that his health had suffered. To cure himself Spurzheim had resorted -
albeit unsuccessfully - to nature. Combe noted that the late phrenologist had acknowledged that "the natural laws have been violated, and I must suffer the penalty; I must live simply, and nature will correct the evil." Combe was careful not to follow the path of his predecessor. While 50 one-hour lectures were a full course in Edinburgh, in Boston he gave 16 lectures of two hours each, three nights per week. He gave the audience a rest after one hour, and, to some people's horror, he insisted on good ventilation and the windows opened for five minutes.8

While Combe's lectures to audiences numbering up to 1500 persons of both sexes - one meeting in Boston drew 6000 - dealt mainly with phrenology he also covered other topics: digestion, anatomy, ventilation and mental health, for example. But that was still only a small fragment of his work. He lectured on subjects such as women's education. He visited and commented on pauper, lunatic and prison institutions, challenging his audience to improve their condition.9 He revealed common beliefs about the abilities of races and sexuality, as well as nutrition when he suggested that the Eastern Penitentiary offered a too rich diet. This led to excessive sexuality and masturbation, he suggested, noting that "secret vice abounds among the men, particularly the coloured convicts, who have few mental resources, but one of the white male prisoners had celebrated its pleasures and pains in an ode written with a pencil on the white-washed wall
of his cell." His suggestion that the African was inferior and animalistic was not an uncommon position in the 1800's.

American women, Combe continued, had a high moral sense but their duties in the ball room "indicate a liability to premature decay." To improve the health of women and men, he suggested, there must first be knowledge of the human body. There was nothing immodest about studying the body, the finest examples of which were statues. Only those with "licentious feelings", or a perverted or neglected education would find the study of the human body immoral and offensive. There were those who opposed his ideas. "Candidus" protested in a letter to the Philadelphia United States Gazette. Unrepentant Combe read the letter to the mixed audience and invited offended members to leave; none did so. These ideas about human physiology, and about sexuality would continue to be important to North American phrenologists like Orson Fowler.

Along with his commentary on North American society, details of trips, and discussions of political events, Combe offered North Americans both an education in, and a defence of phrenology. In these early years the medical and anatomical knowledge of the brain and its function was limited and studies of the human brain rare. In one brain operation involving the removal of an external and internal tumour, many hoped that phrenology would be disproved. The patient of Dr. George M'Clellan, however, maintained his self-possession, firmness and mental faculties although the brain in that area
was gone. Was this proof that phrenology was wrong? No, it only meant that the normal convolutions had been displaced; the brain and phrenology itself, Combe argued, still functioned. M'Clellan, a one-time opponent of phrenology, noted that he now saw how important the knowledge of organ placement was to physicians, and he admitted that he had rashly condemned "the science."  

Phrenology would have many detractors not only from medical science but also from some organized religion. Combe was adamant that phrenological truths dominated even over biblical scripture. Responding to questioners he wrote:

I have repeated to them what I have said to all others, that Nature will not bend, nor will she cease to operate, and that if they discover any discrepancies between her truths and their own interpretation of the Bible, these interpretations must be corrected and brought into harmony with nature.

As Calvinism relaxed, belief in the total corruption of human nature slowly lost ground and phrenological principles became more acceptable.  

In the early nineteenth century phrenology also offered a challenge to the common concept of fatalism whereby God's will dominated over self-determination. Phrenology might offer an alternative. If one's character could be delineated, explored and understood, could humans improve themselves? Or were they condemned to a pre-determined fate? The answer was not simple; it would, in fact, demarcate the difference between North American phrenologists and other practitioners
of the science. It would lead, in fact, to the rise of the Fowler family and their contribution to phrenology and to social reform.

The question of fatalism and mankind's potential for improvement established the leading difference between George Combe and other Edinburgh phrenologists, and Orson Fowler, the Fowler family and North American phrenologists. The latter group believed, and proved to their satisfaction, that faculties could be improved. Once a deficiency or an excess in an organ was discovered, self-knowledge, the laws of phrenological science, and nature could bring about an improvement. 'Self-culture', the conscious improvement of the physical, moral and mental faculties could lead to a better individual and then, to a better society. Phrenological salvation would be the blueprint to a better tomorrow.

Orson Fowler became interested in phrenology while attending Amherst College. Attracted to the study of mental philosophy, Fowler began to examine his classmates in order to test the phrenological ideas. A close friend, Henry Ward Beecher, for instance, demonstrated a deficiency in order, his belongings "strewed about in all directions and in utter confusion." While Beecher went on to gain fame in the field of ministry, Orson Fowler and his brother, Lorenzo began to lecture and demonstrate on phrenology. Many found his analysis of the characteristics of acquaintances to be true. From inmates of asylums to the Siamese twins, Eng and Chan, to
judges and senators, the Fowler brothers delineated their client's phrenological makeup. Even when blindfolded, they claimed success in detailing personality traits, and they often claimed to have changed detractors into supporters.  

The Fowlers and their followers and imitators differed from older phrenologists like Combe, by maintaining that there was an inter-connection between phrenology and self-determination and scripture and fatalism. That union of ideas would be the basis of their life work: teaching their clients to recognize their own organization and potential and educating them toward self-improvement.

... according to phrenology, divine agency and human agency both co-operate in bringing about every transaction and every mental operation of every individual of the human race - divine agency in creating the primary faculties from which these actions originate, and in distributing them in certain degrees, and human agency in modifying these innate faculties, and in directing them to different objects, according as education, external circumstances, and personal volition, may determine.  

In Fowler's words, "itinerant phrenologists" - who like Combe were often invited to an area - were one way to obtain a delineation. The Fowlers would spend much of their lives on the road doing just that. In addition they set up offices in Philadelphia and New York, began to collect skulls and casts of heads, and with medical student, Nathan Allen, began the Phrenological Journal. From their offices phrenology would be dispensed - to educate children, to reform criminals, to improve the world. After all, they would argue, war and
slavery were but the results of poor upbringing; criminals could and should be rehabilitated not executed; and a host of reforms that they and other health reformers promoted such as abolition, vegetarianism, dress reform, and women's rights also helped in restoring both the body and society to health and harmony."

Phrenology, as advocated by the Fowlers, could aid each individual to achieve their maximum potential. Husbands and wives would know each other better; asylum directors could handle the inmates better; teachers could understand their pupils; employers could judge more effectively their employees; and parents could guide their children into appropriate career and life decisions. Many people would use phrenology as a guide for the decision making in their lives. To demonstrate the value of phrenology in an individual's life is not a simple task. While health reformers, and the Fowlers in particular, were prolific writers, ordinary citizens rarely articulated their use of phrenology. Still many employers required a phrenological delineation from their potential employees. No doubt many suitors were rejected because of their phrenological analysis; others were accepted because of their readings. Many people wrote to the Phrenological Journal, to express their thanks and praise for phrenology. Some even would find life partners through that journal's matrimonial column.
Calvin Fletcher was one man who consulted phrenologists, including Orson Fowler, throughout his lifetime. Fletcher, a successful farmer, lawyer and state senator, (1826-1833) was not fanatical about phrenology, but rather he was a practical person who chose to obtain expert advice on family and personal matters. During the years 1817-1866 he and members of his family heard many phrenological lectures and had their characteristics explained. On 9 January 1837, for example, Fletcher wrote:

"The phrenologist came up & examined Miles Stoughton & Ingram's heads. He pronounced all my children with respectable intellects. Elijah & Stoughton calculated the best for scholars & c. Mrs. F ranks much higher than myself in her intellect faculties. This I always knew but she fails in hope which deprives her of much worldly happiness & counteracts her other energies." ¹⁹

The phrenologist who performed the examination, a Mr. Burns, made several visits to examine Fletcher's family. Not all the reports were good: Elijah was cunning and lacked application; Cooley was rated high in approbative nature (the desire for approval) and amativeness (the sexual nature and masculinity or femininity); Calvin was too timid. ²⁰

In another year a correspondent wrote to Fletcher describing a judge in phrenological terms and noting that he seemed to have a "good ordinary head." Fletcher, who was at that time studying Combe's system of phrenology, would have understood the disparagement in the comment. Certainly Fletcher was impressed by phrenology. "I think there may be something in the science & especially as strong inducements by
the advocates are held out to improve the moral condition of our nature we should listen to it." Fletcher was particularly interested in his son's characteristics. In 1845 a Mr. Ainsworth prepared a chart for his son, Calvin, and Fletcher was pleased to hear that the boy would do well in business. Fletcher wrote that he hoped that examinations like this would help his sons learn not only their own characteristics but also those of acquaintances. Phrenology, he hoped, would "restrain their dangerous propensities & [sic] cultivate the amiable & intellectual."

Fletcher did not relax his vigilance over his family's education and future. In January 1857 he and his wife went to hear a lecture by a phrenologist identified as Mr. Fowler. This was most likely Orson Fowler, since he was touring at this time. While Fowler was late and arrived after the Fletchers had left, they did manage to meet him the next day. Fowler gave too good a delineation; according to Fletcher, it was "extravagantly good beyond what it deserved." Mrs. Fletcher later attended a lecture at the Masonic Hall, and that evening, Fletcher and a friend attended a talk given to men only. This talk on sexuality, Fletcher reported, was "very good but exaggerated." In 1859 a phrenologist named Wagner played a role in the Fletcher's lives. Mrs. Fletcher, Miss Hobert, the schoolteacher who had previously discussed phrenology with the Fletchers, and at least one other person went to hear Wagner's ideas. Both the Fletchers also visited
the phrenologist. Calvin Fletcher wanted to examine the casts of skulls that the phrenologist exhibited. Mrs. Fletcher went for a more practical reason; less than one year earlier an orphan girl named Allis had come to live with the family. Abused earlier in her life she was apparently both bright and difficult to manage. A smoking stove and a lack of adequate time put an end to Mrs. Fletcher's plans to get the child's head examined and obtain advice on her upbringing.22

Phrenology did not rule its advocates, but it played a role throughout their lives. For the Fletchers it was a way to develop their children's potential, to curb less than acceptable behaviour, to know the characteristics of themselves and their acquaintances. It was a tool to help them get ahead in a world where increasingly one's neighbour could be a stranger. When their faith in themselves as individuals or as parents or guardians failed, phrenological ideas could counsel their ideas. The way to a healthy and harmonious future lay in touching all the bases; phrenology was one of those supports for the Fletchers and for many other followers in the 19th century. One contributor to the *Phrenological Journal* contemplated this connection between his skull, his past and his future:

Within a dream I looked upon my skull
Fleshless and white - I marvelled why 'twas so -
Leaving quite plain its convex, high or low,
Once with nerve tissue and thought fibre full.
Some day shall I thus look upon my past,
Seeing the why's and wherefores of that time -
Shall I see there the shackles of the mord
Those skull-chains, which the brain has on the soul,
Those birth-gifts, which do keep it in control,
Which limit work and aspirations bind?
Ah, shall I learn that, be we quick or slow,
To knowledge by an effort must we grow?23

Thousands of other people would learn their characteristics through the work of one of the phrenologists attached to the Fowler firm. Clara Barton, later to become the founder of the American Red Cross, was directed in her life course by Lorenzo Fowler. George T. Denison, militarist and imperialist and member of the "Canada First Movement", made several trips to New York for his analysis. The poet Walt Whitman was not only delineated by the Fowlers but intimately connected with the publishing firm Fowler and Wells. They were the first publishers of his Leaves of Grass. Orson Fowler claimed that he had encouraged John A. Macdonald, Canada's first prime minister, in his choice of career. In 1882, in another character assessment done from a photograph sent by an admirer and political rival, Macdonald was described as being "prompt in the gathering of facts, and keen in recalling and in co-ordinating them." He would make "a fine extemporaneous speaker" and has "great practical talent."24

The portrait of Joseph Howe, former premier and Lieutenant Governor of Nova Scotia, was delineated after his death. The Phrenological Journal was complimentary and praised Howe's work towards the establishment of responsible government since "neglect, mismanagement, and corruption were perceptible everywhere, and nowhere had greater dissatisfaction been
created than in the capital of Nova Scotia." The result of Howe's defence of the freedom of the press was "that a municipal system that had existed for nearly a century was smitten down in a day." His energy and good work as a political representative were praised; Howe was commended for being one public man who knew that the "government and people are still behind the times, or, at least, that they have to strain every nerve to keep pace with the growing republic across their borders." Howe's characteristics could be detailed through a phrenological examination.

In that strongly marked countenance we see earnestness, stability, steadfastness, and sincerity. We see courage, fortitude, self-reliance and decision of character... He was frank, outspoken, and direct; was not extra cautious; trusted more to the merits of the case, and the correctness of his motives, and his personal ability to rise above opposition..."  

While the Phrenological Journal published delineations of important personages in almost every issue, and Orson Fowler mentioned others in nearly every book, the delineations of more obscure people were often made. In 1889, for example, an unidentified writer, a former newspaper editor in the Maritime Provinces, wrote to praise the accuracy of a 25 year-old-report prepared by Nelson Sizer, a phrenologist at the Fowler firm. "I am now bound to say," he wrote, "that Mr. Sizer was a remarkably clever delineator of character. Indeed he was prophetic. Everything in the document to the minutest detail has turned out true." Even Sizer's comment that the editor would make a good teacher was realized: "Here I am, after a
chequered life, engaged in what I find a very congenial occupation, that of teaching stenography." Another reader praised Sizer's help in his career choice. He noted that suicide, misery and troubles throughout the land proved that "men do know themselves as they should."²⁶

Nelson Sizer had become interested in phrenology after hearing Spurzheim lecture on the subject. He joined the firm in 1849, and, in the course of his career, delineated some 300,000 heads of famous, to-be-famous and totally obscure people.²⁷ He was one of several people who worked at the Fowler offices. Samuel Wells joined the staff in 1843. One year later he married Charlotte Fowler, a half-sister of Orson, and the phrenologist who had delineated Samuel's character when he was just 16 years of age. Just one month earlier Lorenzo had married Lydia Folger. In 1845 the partnership of Fowlers and Wells was created by Lorenzo Fowler, Orson Fowler and Samuel Wells. Orson would continue his prolific writing, Lorenzo would delineate characteristics and Samuel Wells would manage the publishing and business areas. Charlotte Fowler would assist all three, teach classes, and promote the new science. By the time that Sizer joined the firm it was a major concern, publishing books, delineating characteristics, and sending the Phrenological Journal to 20,000 subscribers. In 1854 Orson Fowler left the firm, returning only briefly in 1880; his mission now was to promote healthy sexuality and phrenological knowledge to the
individual, to the couple, and to society. In 1863 Lorenzo Fowler and his wife, Lydia Folger Fowler moved to London, England. There he established a branch of the publishing firm and he began to lecture on phrenology; Lydia, the second woman in North America to receive a medical degree, practised medicine, studied, engaged in temperance work, and raised a family.28

Orson Fowler, separated from the family firm, spent 10 months of every year lecturing throughout North America and, as well, maintained a practise in Boston.29 His mandate in the last half of the century was to deliver the gospel of proper sexuality. He believed that improving the sexual nature of individuals would help perfect society, since the present generation would be more in tune with phrenology's natural laws, and their offspring would be in better health. "Sexual Science", as Fowler was to name his passion, would be the star that he would follow for the rest of his life. It would be a guide that led him to both fame and infamy.

Recent historiography has challenged the assumption of repressive Victorian notions of sexuality. What has become clear is that there was no single standard of morality, even within the health reform movement. If the repressive sexuality propounded by Fowler's contemporary Sylvester Graham was exceptional, the norm was still far from complete openness in sexual matters. As Ronald Walters has noted, the proliferation of literature about sexuality began in the 1830s and has
continued ever since despite restrictive legislation in the 1870s. Orson Fowler was a major contributor to that genre, garnering both praise and criticism for his frankness. Throughout his career, Fowler's discussions about sexual science demonstrated the intersections between society and human sexuality and suggested the need to follow phrenological laws to obtain harmonious health and happiness. 30

Orson Fowler's beliefs about sexuality emerged early in his career. He focused particularly on courtship, on the selection of an appropriate marriage partner, on healthy sexual relations and on the hygienic reproduction of the best possible child. In order to make a proper marriage a suitor first had to be aware of his or her own characteristics. With that knowledge and a commitment to the laws of natural living, one could achieve not only personal benefits but also social improvement. Self-knowledge was thus of utmost importance according to Fowler.

A thorough knowledge of one's own self - of his good properties, and how to make the most of them; of his predispositions to, and sources of temptation to excess and error, and the means of keeping these desires quiescent; of what he is capable of doing and of becoming and what not; and wherein he is liable to err either in judgement or conduct - is more intimately associated with his virtue, and happiness, and success through life than any other, than all other knowledge united. Before he can correct any defect, he must know precisely in what the defect consists - must know the precise faculty that is too strong, or too weak, or wrongly exercised. 31

Self-knowledge was important especially when it came to the laws of sexual science. Orson Fowler was concerned that
courting couples rushed blindly into marriage, ignoring the laws of phrenology and good health in their passion. People failed to consider what a disharmonious union could do to themselves, to their partner, or to their offspring. Determined to teach people the risks they were taking with their own health, with the health of loved ones, and ultimately with the health of society, Orson Fowler lectured and wrote on physiology and phrenology and their importance to sexual science. The sexual function, warned Fowler, was perhaps "perverted to a depraved use" far more than any other faculty. Phrenology was the solution. It "mounts the breach, It describes the evil. It weeps over its ravages. It points out the remedy . . ." Fowler had hoped that someone else would have spoken about "this monster disease and wretchedness" and spared him the "odium of utterance." That was not to be. Aware that taking up this cause would stir up criticism, Fowler persevered.

Those who object to the presentation of this subject, or think it uncalled for, err in judgement. They may sit supinely if they will, and even bark, but shall neither hinder us from snatching from the fires of lust those half consumed brands within our reach, nor wrest from us the joys of doing good, or the thanks of suffering humanity.  

Armed with phrenological knowledge, Orson Fowler stepped into the breach to offer his version of sexual science.

According to phrenology there were several faculties which could influence how a person managed courtship, marriage and reproduction. Most important in terms of sexuality was
the faculty of Amativeness which caused not just sexual feeling but the very essence of what was masculinity and femininity.

[Amativeness] causes those mutual attractions which exist between the sexes; creates love; induces marriage; eventuates in offspring; renders women winning, persuasive, urbane, affectionate, loving, and lonely; and develops all the feminine charms and graces; and makes man noble in feeling and bearing; elevated in aspiration; tender and bland in manner; affectionate toward woman; pure in feeling; highly susceptible to female charms; and clothes him with that dignity, power, and persuasiveness, which accompanies the masculine.\[35\]

Phrenology ranked the faculties such as Amativeness according to size; the basic classifications were very small, small, moderate, average, full, large and very large. A very large faculty demonstrated "the strongest possible inclination to love." This degree of amativeness meant that the person could "love with complete devotedness, even under unfavourable circumstances." A person with a very small Amativeness, was "passively continent, and almost destitute of love." Those few people with small Amativeness would feel little inclination to marry, and were incapable of appreciating a marital relationship. A person with a perversion of the faculty of Amativeness "occasions a grossness and vulgarity in expression and action; licentiousness in all its forms; a feverish state of mind; and depraves all the other propensities; treats the other sex merely as a minister to passion; now caressing, and now abusing them; and renders the love-feeling every way gross, animal, and depraved." Fowler stressed that only in
the rare case of small or totally depraved amativeness should a person remain unmarried. 34

Faculties did not work in isolation, but in unison with other faculties. A person with an average amativeness was "capable of fair sexual attachments, and conjugal love, provided it is properly placed and fully called out." If that same person also had a large faculty of Cautiousness and Secretiveness, they would express less love than they actually felt, and then only if they were confident the feeling was reciprocated. Mary Starr, a client of Lorenzo Fowler, was told in 1850 that she had just those qualities, a large Amativeness, Cautiousness, and Secretiveness. Her large organs of Order, Approbativeness, and Ideality, would cause her to seek out a polished partner, with "full intellectual and moral faculties." The relationship would probably be based on the "higher qualities of the affections" rather than on "personal attractiveness or strength of passion." 35

Fowler wanted people to become aware of the dangers of improper amativeness expressed through relations outside of marriage, through excessive or deviant sexuality, through unhealthy unions, or through an unnatural state of celibacy. All of these inappropriate uses of the faculty of amativeness could lead to individual and social ill-health. Individual health could be destroyed by indulgence in masturbation; celibates not only harmed their own health but by their failure to bear children helped in social degeneration. Since
the primary function of the faculty of Amativeness was connubial love, Fowler felt that a married couple could find a route to marital happiness without "being in the least gross and indelicate" if they understood each other's propensities. One of his many contributions to marital bliss was his book Matrimony. Within three months of its first appearance, 5,000 copies had been sold; in four months 10,000 copies of the second enlarged edition had been sold. For Fowler, and no doubt for many readers, this ready acceptance proved the book's value as "intellectual repast" and as "a beacon light to guard the unmarried against making matrimonial ship-wreck upon the rocks and shoals of discordant and unsuitable marriages . . . ."

Fowler was certain that marriages would be more compatible and more enduring if young people married those with temperaments similar to their own. When first "smitten," couples found it easy to discover similar views on subjects; only time and intelligent inquiry, warned Fowler, would uncover their differences. If, for example, Amativeness or Friendship were strong in one partner but not the other, the first spouse would be tender and affectionate; the other partner cold-hearted and distant. The exception to this rule was only in the case where a faculty was developed so poorly that it might ruin happiness or hurt future offspring. A person who was cowardly and prone to procrastination, advised Fowler, would do well if their companion for life was bold and
fearless. Those who had strong animal propensities and lacked moral sensibilities would do best if they never married. A mate with high morality would be a constant reproach, claimed Fowler, while a partner with similar low morality would sink both into "a continual boiling over of the animal natures of both." Despite these rare exceptions, however, the normal rule was to marry a congenial partner.

To every unmarried man and woman, then, I say in the name of nature and of nature's GOD, marry CONGENIAL spirits or NONE - congenial, not in one or two material points, but in ALL the leading elements of character. And to obtain this congeniality, marry one whose TEMPERAMENT and PHRENOLOGICAL DEVELOPMENTS are SIMILAR TO YOUR OWN! Do this, and you are safe, you are happy; fail to do this, and you marry sorrow and regret.

If the first step in finding a mate for life was to be aware of your own character and propensities, the second was to study the phrenological makeup of the intended partner. Mere observation was not reliable since one's own personality precluded the possibility of a just and reliable opinion being formed. Since courtship was prearranged and took place with "the mouth put in prim and set off with artificial smiles; the gentleman arrayed in his best broadcloth, and the lady dressed in the tip of fashion, and corsetted too tight to breathe freely or appear naturally . . ." one hardly had the chance to discover faults. Fowler warned that it was better to find out flaws during the courtship, than to discover them after the marriage. "In trying to cheat the other party by concealing your faults, you are only cheating yourselves; for, how can
those love you whom you have deceived?" If one member of the pair still practised "these harmless (?) deceptions," then Fowler asserted the other, armed with phrenological knowledge could easily discern the truth.38

Fowler believed it was necessary to select a marriage partner based upon moral sentiments and a harmoniously-developed personality, rather than marrying for beauty or for wealth. If the faculty of acquisitiveness dominated and a marriage based on riches was contracted, it would never succeed. The wealthy daughter, Fowler explained, would be extravagant, would be unable to make a mate happy, and would be unable to work or save. "Better to hang yourself, or drown yourself, or anything else, rather than marry for money," suggested Fowler. Wealth would just lead to unhappiness. Since second marriages were often made for financial reasons, he advised against them, although he did feel that such marriages might be less of an evil than remaining single after the death of a spouse. "Second marriages are like a dose of medicine, bitter to the taste and painful in its operation, yet a lesser evil than the sickness." He pointed out that this moral dilemma could be avoided if husbands and wives kept care of their health. A lengthy life and a happy marriage with one's first love would cure many of the evils that he saw in the world.39

In a similar fashion women who used corsets deformed their bodies and were equally unfit to marry. Fowler sug-
gested that men needed to adopt the motto, "Natural waists, or no wives." Tight lacing, was "gradual suicide," since a small waist meant poorly developed organs and a sickly constitution. Not only could a woman deformed by the corset never hope to bear healthy children, the resultant congestion of blood around the reproductive organs could excite immoral feelings. Rather than tight-lacing, Fowler recommended that women exercise and get plenty of fresh air in order to promote beauty.\(^{40}\)

Fowler moved beyond mere economic and health matters to address the concept of marriage itself. His major work on sexual matters was contained in two massive tomes entitled *Sexual Science* and *Creative and Sexual Science*. These volumes covered topics from the selection of mates, to the sexual relationship, to the creation of healthy children, all according to the tenets of phrenology.\(^{41}\) Fowler felt that sexual science made contemporary marriage unnecessary. The mutual love between two compatible partners, claimed Fowler, constituted marriage. Legal marriage was merely a man-made device, he argued; the true tie between a couple was "the passion of LOVE." Laws did little beyond requiring that "legalized" husbands and wives love each other, he reminded his readers, and never aided in promoting marital happiness. Without love marriage was merely "licensed licentiousness. Fowler noted that he had been criticized for this position; some people apparently felt he was inviting immorality. He
rebutted such criticism explaining that his point was that a marriage based on nothing more than a legal tie, "oblige[d] those who hate each other to live and propagate together" and to breed unhealthy children as a result. In a future world where sexual science permitted the attainment of sexual perfection, he suggested, marriage laws would exist only to legitimize children and for property inheritance. A couple in love could choose to be together; an incompatible couple could separate without animosity. Of course, the use of sexual science to choose a mate, would ensure more appropriate marital unions and thus fewer divorces.

While Fowler hoped to institute changes in modern marriage, he urged that everyone marry. The alternative to marriage, celibacy, was unthinkable. "Let no old bachelors or old maids be found throughout our borders," he shuddered. Even poorly-sexed persons needed to marry since marital relations would improve their sexual faculties. Fowler castigatd those who argued that if celibacy was difficult the prospects of marriage were worse. Marriage, claimed one argument, would divert the person from their intellectual pursuits. Fowler countered this by arguing that one did not starve the stomach to improve the muscles. In order to develop harmoniously and in a healthy manner, sexual relations within marriage were necessary. Marriage was no more expensive than single life, he maintained, countering other opposition, by claiming that a wife and family were probably less
expensive than club bills. Fowler was adamant that celibacy was "wrong in every conceivable aspect." It was "mean, cold, heartless, selfish, [and] almost despicable." There was, save for the few with moral faculties so depraved, no excuse for single life. Even celibacy for religious reasons was unacceptable. The argument that Catholic priests could do a better job when unhindered by family ties was wrong, he once argued, and he mused if it was true that such clergy really had no Amativeness or had suppressed all sexual feeling.44

Since both celibacy and non-marital relations were unacceptable, marriage was a necessity. Fowler derided the belief that a feminine passivity and woman's social mores necessarily restricted elderly women's chances of marriage. All these women needed was the "right sexuality." Cultivating womanliness and a "warm, cordial, ladylike cast of feeling towards gentlemen," would attract admirers. With propriety, a woman past the age of 22, could take the lead in courtship, since many unmarried men simply needed a strong woman to overcome their hesitancy and bashfulness. To help the unmarried attract suitable mates, the Phrenological Journal ran a matrimonial column where men and women could and did find phrenologically suited mates.45

Fowler also hoped to encourage the working class to marry. He suggested that this class, "the backbone of our nation," should be paid a bounty of several hundred dollars upon marriage. Couples, of course, would have to prove that
they were "of suitable age, of good moral character, of temperate and industrious habits, strong and healthy in physical constitution, and well adapted to each other." This would not only help increase the population, but Fowler felt that such a program would introduce "a stronger and more virile element into the middle classes." A marriage bounty would also give the young couple a chance to start a business or trade, an opportunity that was denied to them through the present system.

How many thousands of youth there are in every great city who eke out a scanty subsistence from the severest and most protracted labor. In their confined sphere their efforts do not tend to the welfare of society, but the enrichment of a selfish few, to whom the weal of society at large is a slight consideration. Society expects, nay, has a right to demand, that her every member shall to some extent promote her interests, and every measure which will further those interests should be set in efficient operation.

A marriage bounty would free young couples "from a position of dependence" and "in a comparatively short time render some of them far more useful citizens than were ever their former employers."46

Fowler was not only concerned about the evils of celibacy and bachelorhood and spinsterhood; he also worried about the ill-effects of sexual segregation in schools, in clubs, even in the all-male billiard rooms. "I will not associate with men alone, nor insult the female sex by joining a male society, be the object however virtuous," Fowler informed his readers. Men confined to single sex activities were soon led
into "drinking, gambling, and other concomitant and nameless vices" which ruined health, morals, and characters. Schools should be co-educational, Fowler suggested, so that male and female students could develop a healthy sexual nature, and not be corrupted by secret vices or masturbation. Dances and parties were one way to develop the faculty of Amativeness in a proper and supervised manner. Fowler praised such social occasions where couples could give off "sexual magnetism and inspiration" as they mingled. While many opposed such activities on the grounds of irreligiousness, Fowler shrugged off such concerns, claiming that the love of dance was a part of human nature and hardly against Christianity. Fowler praised almost any entertainment or amusement that brought the sexes in contact with each other. He suggested that cheap and educational popular lectures were one of the best ways for the sexes to mingle. This cross-gender mingling in schools and in social activities was natural and healthy and helped develop the sexual potential of men and women according to the dictates of phrenology.47

Throughout his career, then, Orson Fowler openly spoke on what he termed sexual science. Courtship, masturbation, marital relations, abortion, and birth control, there was no subject that he avoided if he thought it would help people learn to live better and healthier lives. In approaching the topic of sexual science, Fowler often noted that many feared to approach the subject. He once approached famed education-
alist Horace Mann and asked him to write a book on the perils of masturbation. Mann declined claiming that the subject ruined the reputation of all who touched it. Fowler was not immune to criticism about his frankness and his topics, but he was often surprised by the favourable reception he received. He noted in the introduction of the third reprint of *Matrimony* that the book had been well received. "Instead of encountering that deadly opposition which the Author expected it would excite," he wrote, "not only has its reception been most cordial, but hundreds have expressed the most heart-felt gratitude for the pleasure and profit of its perusal."

All of Fowler's ideas on sexuality, indeed on any matter dealing with bodily health or social health, were based on the need to maintain a harmonious balance of the faculties. Excessive, inappropriate, or insufficient sexuality could lead to physical, mental or moral degeneration. Since phrenology was part of a divine plan, according to Fowler, the science had to harmonize with nature. It could not counter the natural laws of health. Anything that upset the natural balance had to be corrected if individual, and society were to be perfected. Fowler felt that sexuality was one of the most important and abused facets of a person's being. He was determined to bring the people's attention to the need to maintain a healthy balance throughout the body, whether in the most mundane faculty or the most erotic.
Accustomed to waves of controversy and praise, Fowler continued to write, publish, and lecture on the importance of sexual science to society. While he had had success, his devotion to the cause of phrenology had left him at the mercy of creditors and plagued by debts by the 1870s. He was also at the mercy of critics. Open discussion about sexual matters were less tolerated from the 1870s onward, as anti-vice crusaders such as Anthony Comstock gathered strength. Fowler was not immune to such criticism. A former business manager, Max Bachert, claimed that Fowler's lectures were immoral, his relationship with "female quacks" disreputable and his correspondence "so sickening in its sensuality, [and] so infamously lecherous and vile." Newspaper reports suggested that Fowler's work on sexual science had brought him close to being charged with immorality. Despite this he remained confident in himself and in the phrenological laws of nature. In 1880, perhaps to recoup some of the debts that hung over his head, he announced a world tour. During this tour sexual science, one of the most important of phrenological ideas, played a role in ending Fowler's career. Despite a favourable reception in Saint John, New Brunswick and Halifax, Nova Scotia, and initially in St. John's, Newfoundland, Fowler's firm ideas about celibacy and the need for co-education eventually brought him to grief in a manner that he probably had never envisioned.
The tour started off well. Fowler's free lecture held in the Mechanic's Institute of Saint John, New Brunswick, discussed the basics of phrenology and the need for proper nourishment and physical exercise to maintain a healthy mental condition. He also detailed his success in delineating a person's potential. Fowler's second lecture was to a smaller audience, perhaps due to press reports that his two hour talk was a trifle long. This session dealt with the relations of the sexes, and in particular, the selection of suitable marriage partners. Fowler also gave the audience of both married and single persons general advice about marriage. The audience was apparently appreciative of the "capital points [that] were made by the professor." Fowler's third and final lecture was reserved for men only. It was entitled "Manhood, Its Decline and Restoration: a lecture full of vital truths every person old and young should know and understand." In addition, Fowler was available for private consultations at the Victoria Hotel where he offered to "tell persons all about themselves scientifically, and what each can make out of what he possesses." Orson Fowler's Halifax engagements were even more successful. As in Saint John, he opened with a discussion on phrenology. Here he argued that "the brain of man was made up of separate and distinct functions, each doing its own individual work, so far as its capacity allowed it," yet all operated in a complex and flexible mechanism. Fowler con-
cluded this lecture with an examination of well-known lawyer J. W. Longley. Fowler's judgement of Longley's character was felt to be quite accurate: Longley would do well in politics; he had the ability to demolish his opponents; he would live to an old age as had his maternal grandparents, and he had the potential to be a writer.53

Fowler's second lecture in Halifax was on "Self-Culture," and was attended by a standing room only audience.54 In this presentation he discussed the errors of health that people unwittingly made in their daily lifestyle. Everyone, he argued, had personal control of their own mental, moral, and physical development. In particular Fowler worried about cramming children with education; youngsters should be free to cultivate physical endurance and strength before they were forced to develop their intellectual powers. One commentary on the lecture noted that there was much information in the lecture "replete with sound sense and the world would be a vastly better place were the professor's advice followed." The Acadian Recorder noted that even "those who smiled at many of his quaint and almost radical assertions were satisfied that there is method in this too little known science of Phrenology." Fowler also lectured on matrimony and referred to "the quicksands of courtship and the sandbars upon which so many of the married wreck their happiness and lives. Once again Fowler delivered a private lecture to men on the decline
and restoration of manhood where "the old gentleman's remarks fell with a great deal of weight on his audience." 55

Fowler was no doubt pleased with his reception in the Maritime Provinces. His lectures had been well attended, and no doubt his private consultations and books sales were profitable. Planning to return to Halifax in three weeks and possibly present another series of lectures, Fowler left Nova Scotia to visit Newfoundland. In St. John's Fowler received advice from the American consulate about hall rentals. The Star of the Sea Hall was recommended; the Consul stated that he and his wife often went and met the "best citizens" there. As he had done for much of the past forty years, Fowler engaged the hall, and advertised his lectures and appointment schedule. In addition The Evening Mercury reprinted an article from the Halifax Herald regarding the last lecture in Halifax. Fowler's first lecture was well-received. Once again he spoke about phrenology and the faculties of man. Along with a brief history of Gall and the discovery of Phrenology, he discussed how to use facial features to interpret a person's characteristics. "Everyone," said the Evening Mercury "should make a point of hearing the Professor who is undoubtably the ablest expounder of the science among living phrenologists." Along with selling his monographs, Fowler offered private consultations from 9:00 a.m. to 10:00 p.m. and delivered lectures on "Success and Failure in Life," as well as two private lectures to men on "Manhood and
Womanhood," and "Manhood and its Restoration." He also delivered a free lecture on "God and Immortality."\(^{56}\) At this lecture Fowler's views on sexuality ran counter to the beliefs of the local elite. The result was a violent confrontation, fuelled by the righteous indignation of Fowler and the slumbering sectarian divisions of St. John's.

On the first lecture night Fowler apparently had offended a man by refusing to give him a public examination.\(^ {57}\) In the private men's lecture, this same man questioned Fowler on his views about the vow of celibacy. Fowler quickly responded that it was "an outrage on humanity." The phrenologist later claimed he had not heard the word "vow," and that he had quickly corrected himself saying, "That is a matter of religious conviction to which the remark is not intended to apply." A later question was also troublesome; Fowler condemned female seminaries as ruinous to health. He did this, he claimed, never thinking that the questioner was referring to nunneries. Already in hot water, during the Sunday lecture on God and immortality, Fowler forwarded the view that "all should do their own thinking."\(^{58}\) All three of these statements, while no different from what he had been saying for years, brought great offense to the audience. The Star of the Sea Hall was, after all, a Catholic building, a fact that Fowler had never realized. These comments opened the sectarian divisions of the city as opponents and defendants of Fowler and phrenology emerged.
Fowler detailed the events in an interview with a newspaper reporter. By Tuesday at noon the President of the Hall Society visited the hotel and informed Fowler that he could no longer have the use of the Hall because he was teaching anti-Catholic doctrines. Fowler insisted that he had contracted the building for one week; British law would uphold his claim. "You must," Fowler argued, "you shall let me have your hall my week out." The President apparently ended round one of the argument by claiming that this visit was merely to give informal notice to quit the Hall. Ominously, he notified Fowler "One will soon call on you with its formal refusal."  

Father Michael Morris issued that formal refusal. To Fowler he was merely "a man dressed like a Roman Catholic priest." Morris made the same complaint: Fowler had taught anti-Catholic ideas in what he should have known was a Catholic Hall. Fowler pleaded his case arguing that he needed the Hall, or if not that, at least his money - $13 a night - returned. The priest refused. Fowler threatened to sue and later claimed that the priest had retorted angrily, "THEN WE'LL SUE YOU FOR SELLING OBSCENE BOOKS." This was a different tactic, and one that Fowler no doubt felt he could easily win. After all, science was not obscene. He explained to Morris that while garbled passages in his books might be offensive to a person in "a grossly obscene state," the purpose of his books was to teach control of the passions, not to incite them. The arguments made no impact on the priest,
however, who quickly executed his threat. Scarcely an hour had passed when Police Officer John Sullivan, ("pompous and brainless looking" noted Fowler) arrived at the hotel and purchased a copy of Fowler's *Perfect Men, Women, and Children* (1878). Within the next hour a summons of seizure had been issued to Fowler and his books confiscated.⁶⁰

Fowler was outraged about this treatment. He admitted that he had "unwittingly offended certain Roman Catholic leaders," but went on to state that he had never intended to refer to the clergy in his talks; indeed the question would never have arisen if an "ignoramus" had not been angry that the audience had not selected him for a public examination. "I have far too much experience after a period of half a century continuously in the Lecture field and at my advanced age, to come here and knowingly denounce Catholic doctrines," protested Fowler in the interview.⁶¹ The population was divided on the case. One Catholic newspaper "sneeringly" referred to the phrenologist as "a person who styles himself Professor Fowler."⁶² Certainly there could have been no doubt in St. John's about the prominent position that Fowler maintained in his field. "As a practical Phrenologist," said a letter to an editor, "Prof. Fowler stands at the head of his profession and has a world wide reputation. That he can correctly read the organs of the head can be scarcely doubted by anyone who has given his skill a practical text."⁶³ The Catholic *Patriot* and *Terre Nova* acknowledged that while the
books in question were unfamiliar, Fowler's other work was known. Fowler's reputation, however, did not dissuade them from supporting the decision.

We do not know anything of the contents of these books of the Professor; but if he be the gentleman in copartnery with Mr. WELLS — (FOWLER and WELLS, publishers of the New York Phrenological Journal which we understand he is) we can safely believe he is not a person who would be guilty of circulating obscene works. 64

Orson Fowler's reputation failed to save him. He was charged with selling books "alleged to be immoral and obscene and consequently unfit to be read or sold to the public." A two hour trial was held before Judge J. G. Conroy. Sullivan testified that he had received information about the sale of the books, had examined certain portions of them, and "thought it was his duty to seize on all works of the like nature," and had done so. Two people, both Protestant clergymen, testified for Fowler and his books. Wesleyan minister Rev. Mr. James stated that Fowler's work was "eminently calculated to promote the well being and happiness of the human family, and well worthy of the serious attentions of the human race." James testified that not only had he attended all of Fowler's lectures but he had purchased a copy of Perfect Men, Women, and Children. "There is nothing in Professor Fowler's works more immoral or obscene than that which one meets in various parts of the bible," he stated. Under cross examination by Fowler's lawyer, James stated that the book would be suitable
for his children, that the illustrations aided the book, and that he recommended it.65

The second witness for Fowler was equally reputable. Clergyman Rev. Mr. Percival swore that he had owned a copy of Fowler's Sexual Science for ten years and that it was "in line with the principles of Christianity and morality." He suggested it should be confined strictly to mothers, although he implied that he would give it to young men who practised self-abuse or masturbation, those "young men with bleared eyes and young men with pimples on their face." The concluding testimony was given by Fowler who testified as to his professional standing, his lengthy career, and the philanthropic object of his work. The prosecution called no witnesses. Judge Conroy found the books obscene, and ordered them destroyed. An appeal filed by Fowler's attorney failed. As ordered, the books and pamphlets were destroyed in a huge St. John's bonfire.66

Support for the decision varied and divided along Catholic-Protestant lines. One report noted that "the crowd threw up their caps and shouted "well done" at the bonfire. "We need not explain who constituted the crowd," wrote an indignant "Phreno" to a St. John's newspaper. "Phreno" admitted that there were things in the Professor's books "which might be objected to by persons of depraved tastes and corrupt minds, but such are not likely to be injured by reading his or any other books." Fowler's works, the letter
continued, were published by the best publishers, entered according to congress, and "favourably received by all English reading people. Newfoundlanders excepted." The rule of the land, "Phrenoo" sarcastically noted, now seemed to be "It may do for the United States of America, or Canada, or England, but it is not good enough for us." 67 The Public Ledger, which had once offered Fowler's Phrenological Journal as a premium in a subscription drive, and which published advertisements and notes on the journal's content, 68 was enraged by the decision. "How such a judgement could have been given in the present case . . . it is very hard for one to conceive; and how Judge Prowse, who was not present at the greater part of the trial could "express his fullest concurrence" is a matter alike marvellous to us." This article praised Fowler's work:

Here is a medical work, which has been published by one of the most respectable publishers in the world, and which has run an immense and continuous sale for the past twenty-five years, its contents never having been questioned or suspected by any person competent to judge, brought up before the Bar of Justice in Newfoundland, and proscribed because of its alleged obscenity, and all on the mere ipse dixit of Sergeant Sullivan (save the Mark), an individual whose knowledge of such works is of the meanest possible order. No, gentle reader; there is something more behind all this!

The Catholic Patriot and Terre Nova, however, supported the decision and suggested it was "no doubt for the good of society." 69

Fowler claimed that despite the reaction of the church leaders the Catholic "rank and file approved of [his Lectures]
Others argued that he had merely made the mistake of hiring the wrong hall; in any other his ideas would have been welcomed. Father Morris claimed that since the Hall's name was a Catholic emblem, Fowler should have known who ran it. The Public Ledger argued that engaging the Hall was only a minor first mistake. The major problem was Fowler making statements that could not be tolerated inside the walls of a building owned by such an association, and therefore he has grievously offended - the doors must be shut in his face - and an ignorant policeman, utterly incompetent to form an opinion on such matter is put forward to inspect the [books] contents" and thus the obscenity charges and subsequent bonfire. Certainly both sides admitted the role of Father Morris and religion in the preferring of charges. A newspaper that supported Morris suggested that

> All reasoning minds will concede that he [Father Morris] acted wisely and right. As a guardian of the moral and religious interests of the community he did what every good man will approve, in preventing a Hall always devoted to social recreation and intellectual improvement, to become an arena for needless discussions calculated to unsettle men's minds and arouse the worst and most dangerous sectarian feelings.72

Despite Fowler's professional standing and reputation, then, he had managed to offend the sensibilities - religious ones in this case - of a group of people. First, his views on sexuality, celibacy, and male-female relations left him open to attack on religious grounds; his ideas were not in sync with Catholic doctrine. Second, his stand on sexuality in
general let those he had offended institute obscenity charges.

Were these views merely the views of a select few in a clergy-ridden country that was behind the times and perhaps less sophisticated than its neighbours? Certainly some in Newfoundland thought so. Fowler's wife had protested to Constable Sullivan that, "These books have sold everywhere during the past forty years, and unchallenged until now. You are forty years behind the times." According to Fowler, Sullivan responded, "We pride ourselves on being one hundred and fifty years behind the times, and in shutting out knowledge, for that shuts out crime from us." Sullivan had "struck the proper note" in suggesting that the country was behind the times, correspondent "Phreno" mournfully conceded. "It is to be hoped that such a report will not get beyond our island bounds as it may cause those who read it to think if possible even worse of us than we really deserve, and that we are not only a hundred and fifty but five hundred years behind the time. The intelligent portion of our people look upon the proceedings as a most disgraceful affair, and more than one has expressed himself as being ashamed of his country."

It is difficult to surmise on scanty evidence if this was a peculiarity of Newfoundland. Given, however, the fact that Fowler and other health reformers, were under increasing condemnation in the United States regarding their frank discussions of sexuality, and given that Fowler often had to defend his views, it is perhaps not surprising that he came to
this end. The attacks on Fowler were part of a long series of charges of immorality against prominent reformers. In 1848, for example, a former employee of the Glen Haven Water Cure charged hydropath James Caleb Jackson with impropriety with his assistant, Theodosia Gilbert; Jackson and his wife avoided similar charges in the 1850s with the adult adoption of his next assistant, Harriet Austin. Walt Whitman, whose Leaves of Grass first was published by Fowlers and Wells, endured much criticism for the overt sexuality in his work. Only a few years before Fowler's visit to Newfoundland, his college friend, the Rev. Henry Ward Beecher defended himself in a public trial against a charge of adultery. Obscenity charges against physical culture advocate Bernarr Macfadden would continue this tradition into the 20th century.75

Given the frequency of immorality charges it is apparent that only in the particulars of the case is there a unique Newfoundland flavour. It does not appear that the Newfound­landers involved in or aware of this case were less than well informed about Fowler and his professional life. One further event occurred in this case which demonstrates that participants were aware not only of the fragile state of Fowler's career in the United States, but were willing to bet that Americans were eager to hear of these events. After the court case was over journalist and Catholic E. P. Morris paid a visit to Fowler. He was, he informed the phrenologist, the only person who had acquired a transcript of the trial's
proceedings. While the Mercury had offered him $15.00 for the report, apparently aware of the fragility of the phrenologist's reputation in the United States, the journalist offered to suppress the transcript's publication if Fowler paid him $25.00. Fowler eventually paid $20.00 to Morris and received a receipt which noted that "the money was paid on a proviso that no other report would be published in our local papers, and that no report that I can prevent will go into the American papers."76 Morris later notified Fowler that "at no small inconvenience" he had prevented publication of the court proceedings in American newspapers. "This was," claimed the Public Ledger which certified that its reprint of the letters was true, "the first specimen of blackmailing in Newfoundland that has ever come within our notice."77

For Fowler it was not only blackmail but a wasted $20.00. Soon after the journalist had departed with the money, his brother arrived to inform Fowler that he was a journalist also, and moreover, the correspondent for the New York Herald. He warned Fowler that he and the other reporters who had viewed the trial could not be prevented from publishing a report. After an apparent consultation with his brother, E. P. Morris paid yet another visit to Fowler. The Public Ledger suggested this was the journalist's attempt to exonerate himself from the paper's allegations of blackmail. During this visit Morris acquired and later published a written answer to his question, "Do you consider that I have broken my
contract with you?" Fowler's response was terse and brief. "In answer to your question, I say I do not." But, said the Public Ledger, at that time "neither was aware that a report of these proceedings had appeared in the New York paper." Despite the criticisms of their tactics the brothers had some support. The Patriot and Terre Nova philosophically questioned if the two journalist brothers had done anything wrong in trying to make the most out of the situation. "Don't we all do the same in this particular?" the newspaper asked, "Is the Ledger an exception?"

The sectarian divisions of Newfoundland and St. John's usually have been explored through political history and the hierarchy's support of or challenge to different administrations. It appears that it was this group that Fowler challenged. The conflict was not between working-class Catholics and an outsider but rather between Fowler and the threatened elite members of Newfoundland society. After all, Orson Fowler had lectured successfully in New Brunswick and Nova Scotia, as elsewhere in North America, and indeed, initially in St. John's. But his statements seemingly threatened that dominant position of the Catholic hierarchy. While it is uncertain just who supported Fowler and who opposed him during these events, it is clear that he antagonized the elite strata of society. No doubt many working-class Catholics backed their clergy; other Newfoundlanders may have been angry at the potentially renewed sectarian conflict. What is certain,
however, is that Fowler's vision of "sexual science" emerging out of his rural background, his denigration of wealth, and his long held views on communitarianism,\(^8\) jeopardized the authority of a powerful group; his views on phrenology were not at issue. In some regions Fowler's views challenged the domination of orthodox medicine, in others they tested those who clung to the doctrine of separate spheres; in Newfoundland they defied the control of an elite group who believed that it was their role to interpret religious ideas to members of the working-class. Harmony and equilibrium, the aims of the health reformer, could not transcend class divisions. By the twilight of the 19th century, class differences throughout North America made those ideals not only less important, but impossible.

It was an unfitting end for a man who had spent much of his life challenging the limitations of sexual knowledge. Throughout his career, Fowler stressed that self-knowledge could help improve a person's health and aid in an appropriate development of their personality traits. Over and over Fowler stressed the need to understand sexual science and the functions of the faculty of Amativeness. Repeatedly he emphasized the need for a healthy and harmonious sensuality for both men and women. While he and sexual science had never gained universal acceptance, throughout his career he was well respected, not only by supporters of phrenology, but by those
who appreciated his contributions to human health and happiness.

At this point in Orson Fowler's career, though, it appears that even his family at Fowler and Wells seem to have been wary of his emphasis on sexuality. While Charlotte Fowler Wells did write a defense of his character during the attacks in the early 1880s, the rest of the family seems to have concentrated on praising his early work and ignoring the more recent. One reader wrote to the Phrenological Journal to inquire if Orson Fowler was alive, and if so had he been recently in Texas? The response was non-committal. Even his death in 1887 brought little comment; the Phrenological Journal printed the obligatory obituary, concentrating on his early career. 31

Despite this blow to phrenology, those who accepted the value of the science continued in their work. The Phrenological Journal and its editor, Samuel Wells, for example, were convinced that the acceptance of their ideas was increasing. In 1870, Wells argued that most people believed in phrenology, and he noted it was interwoven into literary works, the court system, and religious sermons. "The present generation, especially the people of thirty years of age and under who have in their early life heard Phrenology lectured upon and talked about, who had no old prejudices against the subject, accept Phrenology as a matter of course; and whomever lives to see fifty years hence, will find opponents of Phrenology
scarcely anywhere, except in the antique halls of learning . . . ." The journal eagerly published any titbit of praise they could find, and used for example, a quotation from the 8th edition of the *Encyclopaedia Britannica*, as their frontis-piece in 1870:

To Phrenology may be justly conceded the grand merit of having forced the inductive method of inquiry into mental philosophy, and thus laid the permanent foundations of a true mental science.

The first editor of the journal, who went on to become a well-known and well-published medical doctor, Nathan Allen, spent much time investigating laws of population, physical culture, degeneracy and public health, as well as spending 25 years as a trustee of Amherst College, and 20 years on the Massachusetts Board of Charities as the Examining Surgeon for Pensions. Despite his allopathic commitment, he argued:

If you take men who have worked in the phrenological field for many years, they will acknowledge that they are more indebted to Phrenology than to almost anything; that they would not exchange any of their knowledge of it for anything else. I do not want to be egotistical in referring to myself, but it is to Phrenology that I owe many of the ideas and thoughts that I have been advancing in articles for magazines, etc., [sic] Phrenology teaches that the great thing to be desired and gained is to have a Well balanced mind; to have the best development of brain, and each of the faculties well set over against the others. On looking back I find that it is to that general idea I am indebted to for a correct understanding of physiological laws.32
For the rest of the family, however, phrenological knowledge marched onward, adapting to the times despite the deaths of the first generation. Samuel Wells passed away in 1875, Lorenzo in 1896 shortly after his return to the United States, Nelson Sizer in 1897 and Charlotte Fowler Wells in 1901. The banner of phrenology and the Fowlers, however, would be carried onward by Jessie Fowler, Lydia Folger Fowler and Lorenzo Fowler's daughter. Unmarried she would promote phrenology until her death in 1932. It would be a different phrenology than that of the 1840's and 1850's. Like her forebears, she worked tirelessly and wrote prodigiously. Like Charlotte Fowler Wells, who had been the mainstay of the firm since Samuel Wells' death, Jessie Fowler would rely heavily on advertisements, popular how-to manuals, and entertainment, along with the lectures and delineations. It was, as Madeleine Stern has noted, the passing of an era and people had turned from phrenology instead to "the couches of Freudian analysts."

If phrenology took a beating in the early twentieth century from Freud, from scientists in shining laboratories, and from phrenologists who denigrated their studies of the mind by reducing the field to entertainment, all was not yet lost. Remnants of phrenology, and indeed the Fowlers would reverberate into the new century. Dr. Edward Fowler, a half-brother of Orson and Lorenzo, who as a youth had been involved in both mesmerism and spiritualism would introduce the works
of J.M. Charcot to a North American audience. Charcot was an important influence on Sigmund Freud and his experiments would be repeated, for a time at least, in medical offices under the new scientific term of hypnotism. Jessie Fowler would become involved in a professional friendship with a leading scientist and opponent of phrenology, Burt Green Wilder. Phrenology itself had lost face; but its ideas would be resurrected and revised in sociology and anthropology, as new professionals sought blueprints on how lives had been lived and how they should be lived. And for many people, while the vocabulary and ideas of phrenology ultimately may have been eclipsed by scientific knowledge, they had also been absorbed into their own experiences and language.84
Notes


2. For more on the debate on whether phrenology was a true science see "Objections to Phrenology Answered," in O. S. Fowler, Fowler's Practical Phrenology: Giving a Concise Elementary View of Phrenology: Presenting some new and Important Remarks on the Temperaments; and describing the Primary Mental Powers in Seven Different Degrees of Development, (New York: 1948), pp. 343-416. Much of this section was originally published as a discussion between O. S. Fowler and "Index" in the Baltimore Chronicle, summer 1835. It was also published in pamphlet form, of which 3000 copies were sold. Ibid., p. 343. One Encyclopedia summed up the negative side of the debate. "That phrenology has arrived or is likely to arrive at the dignity of a science is doubted by the best physiologists." Cassell's Concise Encyclopedia, London, 1883 quoted in "Phrenology Exploded," San Francisco Call, 9 October 1896. This clipping and another, "Exposed: Gifted Authors Denounce Phrenology and Phrenologists." Ibid., 13 November 1896 are included among the notes of Professor Burt Green Wilder, Department of Manuscripts and University Archives, Cornell University Libraries, Ithaca, New York, 14/26/95, Box 4. Note, of course, the late date of this statement.

3. This dissertation, in keeping with 19th century usage will refer to phrenology as a 'science,' rather than the more contemporary and denigrating term, 'pseudo-science.' In addition, since the purpose of this dissertation is not to denounce these reformers but to afford them their proper place in history, in this and the following two chapters, their ideas will be treated as valid within the context of their time. Opposition to and co-optation of the ideas will be discussed later in the thesis.


9. Ibid., Vol. 1, pp. 120, 153, 212-214, 224-227, 246. These are Combe's estimates of his audience size. He complained that newspapers tended to double the number. Ibid., p. 165.

10. Ibid., Vol. II, pp. 5-12. The diet was as follows: breakfast - 1 pint coffee, cocoa or mush, dinner - 3/4 pound boiled beef without bone or 1/2 pound pork, 1 pint soup, potatoes or boiled rice; supper - mush (boiled Indian corn), Extras - 1/2 gallon molasses per month, salt, vinegar, 1 pound wheat or rye bread per day, sometimes turnips and cabbage (as crout), Combe noted that some men requested a diet of bread and milk. Ibid., p. 5.

11. Ibid., Vol. II, p. 112-3. Despite his belief in the inferiority of African-Americans, Combe, like other health reformers, supported the abolition of slavery. Ibid., pp. 83-85. See his comments on homeopathic doctor and abolitionist W. E. Channing's ideas. Ibid., Vol. 1, p. 179. Combe once noted that a free negro who tended his horse had told him of his son's desire to learn phrenology. Combe had no problem with his attendance at the lecture but felt that his audience might object. It was arranged that the young man would stand
at the back of the hall and pretend to be a servant, in order to hear the talk. *Ibid.*, Vol. II, p. 48.


27. Stern, Heads and Headlines, pp. 77-79, 128.

28. Ibid., pp. 53-69; 124-144, 180-198.

29. Ibid., p. 125.


34. Ibid.

35. Ibid. Mary Starr's phrenological chart was inscribed in the pages of the book I examined. The two sets of numbers seem to indicate that she was examined at different times. To make this judgement of her character I have chosen the original analysis written and signed by Lorenzo Fowler. The faculty of Order determines how systematic a person is; Approbateness is the desire to be esteemed and praised, and the regard for character and appearance; Idealitv indicates good taste, refinement and the perception and admiration of the beautiful and perfect. For more on these three faculties see Ibid., pp. 79-81, 98-9, 112-13.


37. Ibid., pp. 35-44.

38. Ibid., pp. 44-46.

39. Ibid., pp. v-vi; 51-3; 93-4. Fowler obviously changed his mind about repeat marriages. He was married three times, twice to widows. American Reformers, pp. 315-6; Cramer, "That was New York," pp. 24, 27; Stern, Heads and Headlines, p. 195.

40. Ibid., pp. 53-4; Stern, Heads and Headlines, pp. 47-8.

42. Fowler, *Matrimony*, pp. v-vi; 89-93.


51. *Daily Sun*, (Saint John), 2, 4 May 1882.

52. Ibid., 5 May 1882.

53. *Acadian Recorder*, (Halifax), 9 May 1882. Longley later became Attorney General of Nova Scotia. His maternal grandmother died at the age of 86; he passed away at 73 years of age. At the time of the examination he admitted that he had been writing for a journal for 7 years. He was the chief editorial writer of the *Acadian Recorder* and later the managing editor of the Halifax *Chronicle*. *The Macmillan Dictionary of Canadian Biography*, (Toronto: 1978), p. 420.

54. *Acadian Recorder*, 10 May 1882. Fowler's lectures were now running from 1 - 1-1/2 hours, less than his first Saint John talk.

55. *Morning Herald*, (Halifax), 10, 11, 12, May 1882; *Acadian Recorder*, 10 May 1882.

56. *Morning Herald*, 13 May 1882; *Public Ledger*, (St. John's) 3 June 1882; *Evening Mercury*, (St. John's), 19, 20, 22 May 1882.
57. Public Ledger, 3 June 1882. Fowler's first lecture concluded with an examination of a carman, Mr. O'Dea; the man who had insisted on an examination was named Kenny. Usually Fowler examined the heads of professional men—such as Longley in Halifax—nominated by the audience. Evening Mercury, 20 May 1882; Public Ledger, 3 June 1882.

58. Ibid.

59. Ibid.


61. Public Ledger, 3 June 1882.

62. Newfoundlander, (St. John's), 30 May 1882; Public Ledger, 31 May 1882.

63. Public Ledger, 20 June 1882.

64. The Patriot and Terre Nova, (St. John's), 12 June 1882.

65. Evening Mercury, 23 May 1882.

66. Ibid.; Newfoundlander, 30 May 1882.

68. Three new subscribers to the Public Ledger would receive subscriptions to the Phrenological Journal; in addition a subscription to both the journal and the newspaper was available for $6.00 in advance. Public Ledger, 6 January 1871. For an example of the newspaper's recommendation of the journal see 27 June 1871. See the article "Fish Culture in America," for an example of reprinted material. Public Ledger, 21 June 1872.

69. Ibid., 31 May 1882; Newfoundlander, 30 May 1882; The Patriot and Terre Nova, 12 June 1882.

70. Public Ledger, 3 June 1882.

71. Ibid., 31 May 1882.

72. The Patriot and Terre Nova, 12 June 1882. Interestingly enough, on 1 June 1882 Judge Conroy, a number of priests, and a prominent citizen, Edward Morris, (no relation to the Morris brothers mentioned later in this paper) dined at the home of the Catholic Bishop. 1 June 1882, Edward Morris Diaries and Journals, Reel 3, Maritime History Group Archives, Memorial University of Newfoundland.

73. Public Ledger, 3 June 1882.

74. Ibid., 20 June 1882.


77. Ibid., 31 May 1882.

78. Ibid., 3 June 1882; Evening Mercury, 31 May 1882. The unnamed brother was most likely Frank J. Morris, who went on to become a lawyer and judge. The Morris brothers were not related to Father Morris. My thanks to Bill Reeves and Melvin Baker for helping me untangle these relationships. Thanks to
James Armour for the discussions on nineteenth-century Newfoundland.


CHAPTER FOUR:
"Water, Diet and the Search for the Healthy Body"

Water is best for the man of health,
'Twill keep his strength secure;
Water is best for the man of wealth,
'Twill keep his riches sure.

Water is best for the feeble man,
'Twill make his health improve;
Water is best for the poor, I ken,
'Twill make his wants remove.

Water for those who are growing old,
'Twill keep them hale and strong;
Water is best for the young and bold,
'Twill make the moments long.

Phrenological ideas mapped out the promise for mankind's mental, moral and physical condition. The various physical culture regimens aimed at sculpting the perfect body and ultimately recreating the natural tri-partite equilibrium. Hydropathic principles were concerned less with the design and structure of mankind's latent perfection, and more with the mundane issue of repairing and curing the body of imbalances. This chapter will examine some of the various water-cure facilities in the northeastern region of North America. It then will examine the various beliefs and strategies of hydropathic experts, including a discussion of nutritional ideas. Water-therapy advocates insisted that what went into the body as food and beverage was just as important as a cure for ill-health as the external application of water. More than any other health reform regimen water-cure emphasized curing actual patients of immediate disease, rather than concentrating on their physical, mental, and moral potential.
Even though water-cure fever was a phenomenon of the 1840s, the concept that water had healing power had roots which extended back in time. Often it had played a religious function for Indians. In the 1700s there were books published which advocated water as a therapeutic agent. Water-cure in the modern sense, however, is linked to the work of Vincent Priessnitz, a Silician peasant who used water to cure, first, a broken wrist, second, a sick cow, and third, his own crushed ribs after he had been pronounced incurable. Word of his success soon spread and in 1826, he opened Grafenbergh, a cold-water cure. By 1840 over 1500 people sought help each year. One of those patients was Elizabeth Blackwell, the first woman to receive a medical degree in North America. At Grafenbergh the patients were not only treated with water, but they were instructed to eat a bland heavy diet, to exercise, to forego spices, and to drink water. The linking of dietary ideas, exercise and water-cure would remain an integral part of water-cure throughout the 19th century. Many patients recovered, in part, due to the enforced rest, the protection from allopathic treatments, and the improved, if uninspired, diet. In North America, water-cure was based on Priessnitz's system. Founders of the movement, Dr. Joel Shew, his wife, Marie Louise Shew, and R. T. Trall opened a water-cure establishment in New York in the 1840s; they added a more refined approach that combined anatomical knowledge and dietetics with hydropathy. The Shews had been influenced by
both Priessnitz and dietary reformers, Sylvester Graham and William Alcott. Trall opened his first water-cure un 1844; he supported both dietary reforms and hydropathy. Both Joel Shew and Trall served as editors for the Water-Cure Journal which operated under various names from 1847 until 1913. It was published by the firm owned by phrenologists, Orson Fowler, Lorenzo Fowler, and S. R. Wells. Over the years the Journal would become more eclectic, offering its readers a wide variety of material on both health and popular subjects.3

Mary Gove Nichols, a follower of Sylvester Graham, became one of the early leaders in the water-cure movement in the early 1840s; she advocated proper diet, temperance, and hydrotherapy. In her 1849 book, Experience in Water-Cure, she laid down many of the ideas that were the basis of water-cure in North America. One thing that she emphasized, and that was integral to health reform in general, was the role of women in water-cure, as both practitioners and patients. She emphasized that good health was a natural state for both men and women.

Health is the result of the natural performance of all the functions of life. It gives development, beauty, vigor and happiness; and is characterized by strength of body, power and serenity of mind, and a keen enjoyment of all the blessings of life. Disease is the result of any disorder of the natural functions. It hinders development, mars beauty, impairs vigor and destroys happiness. It is characterized by indolence, weakness, pain and misery; and brings a wretched life to a premature and painful death.4
For Gove Nichols, the only natural death was that which accompanied old age. Nature maintained health through a constant war against disease. Not only did water cure illnesses, but its application helped to build up strength and "re-creates [the body] in purity and health." She supported the role of women as water-cure physicians, and suggested that woman's strength was in understanding - but not discovering - principles. The natural affection of women made them qualified to doctor, even though they did not have the "more rugged processes of intellect belong[ing] to men." She trained herself received by covertly reading her brother's medical books. When he ridiculed her for her "unwomanly conduct" and hid the books, she turned to the study of Latin and French. Upon her marriage she obtained medical books from a doctor friend and from editors, and began to use cold water bathing. She claimed that this was in 1832, before she had heard of Priessnitz and the water-cure theory. She soon began to practise at water-cure establishments in Vermont, and at Dr. Joel Shew's on Bond Street, New York, and in 1845 at her own premises at 261-10th Street in New York. Gove Nichols stressed that water-cure could be practised at home. She was a vegetarian and condemned the consumption of pork, spices, tea and coffee. Unlike the earliest days of water-cure she did not feel that the crises, a period of fever, diarrhoea, boils or eruption was necessary, and she noted that only one-tenth of her patients had eruptions.\[^5\]
The ideas that Gove Nichols expressed were common, although there were variations among health reformers. R. T. Trall, for instance, did not advocate a strict vegetarian diet. Many hydropaths emphasized that anything but pure water was medicinal, and, thus, dangerous. Others held that there were valuable properties in mineral waters. Debates raged over the use of cold water. The Water-Cure Journal praised both the *Phrenological Journal* and Orson Fowler, but disagreed with his suggestion that animal magnetism (mesmerism), would someday supersede all other cures. There was, however, a consistency of thought throughout the health reform movement. On the cover of R. R. Trall's *Hydropathic Encyclopedia*, for example, were pictures of the goddess of health, Sylvester Graham, British phrenologist George Combe, and Preissnitz; quite appropriately this book, and Gove Nichol's were published by Fowler and Wells.

Water-cure quickly gained support for its ability to cure. M. B. Hopkins, a reader from Mount Auburn, New York, praised both the *Phrenological Journal* and the *Water-Cure Journal*, for saving both his health and his money. He was trying to establish a (subscription) club for the Water-Cure but had not yet succeeded. He wrote, "We have concluded we can not do without it. We hail it as a harbinger of good. Oh, that it might spread to the ends of the earth." From Hamilton, Ontario, WWR wrote to say that he was trying to establish a club; he claimed that there were hundreds in the
city who would like to subscribe. One of the qualities of water-cure that made it acceptable and accessible to many people was its relative cheapness, at least compared to allopathic medicine. While not everyone could afford a live-in visit as a cure, for the cost of a subscription people could treat themselves and their families at home. One reader wrote the Water-Cure Journal to say doctors had cost him $100 annually before he subscribed to the Journal; now he paid less than $5 for good health. In 1858 the Water-Cure Journal cost $1 plus 6 cents postage to Canada. When G.W.B. of Halifax, Nova Scotia, wrote and described his symptoms, the Journal informed him that it sounded as if he had incipient tubercular consumption. He needed water-cure for a few weeks to put him on the road to recovery; that would cost about $8 per week. The relative cheapness and the promise of good health brought people to the water cures. At the height of popularity there were over 200 water-cures in North America, most in New York and New England, but they extended west to California. After the civil War the number of cures declined, but several lasted into the 20th century.

As in other health reforms, there was a vagueness in the definition of hydropathy that encouraged dissension within the ranks of its supporters. Purists like Jackson, insisted on pure water and were critical of spas that offered mineral water and leisure activities that contradicted the austere and temperate lifestyle of orthodox health reformers. The cold
water treatment of Priessnitz gave way over time as hydropaths argued that the shock of a plunging was too harsh for weak systems of patients. Like the Gleasons and Jackson debate raged over the use of mechanical and medicinal treatments that extended beyond the original tenets of hydropathic principles. In all cases though, while the degree of commitment varied, the principles of hydropathy and the reliance on nature persevered.

One of the most interesting histories of a water-cure and its rise and fall concerns the Cascadilla Place Water Cure. The idea of Cascadilla originated with Samantha S. Nivison (1833-1906), a medical doctor, who graduated from the Female Medical College of Pennsylvania in 1855. After graduation Nivison toured and lectured on physiology and hygiene. She was committed to hydropathic therapy and for three years she worked at the Clifton Springs Sanatorium, Ontario County, New York. Ill-health forced her to leave her job but she later re-opened the Dryden Springs Hotel as the Dryden Springs Sanatorium. Here she treated patients using the mineral springs which had been discovered in 1820. Despite initial success, Nivison dreamt of a much larger establishment near the sulphur springs at Ithaca, New York. She intended this to be "something more than a mere 'water cure.'" Its foundation theory is not that water is a universal panacea. Using it freely in all proper cases, its medical direction will, nevertheless, feel free to use and apply all appropriate
medical remedies without a blind and exclusive adherence to any one system." On 10 October 1863 a deed was transferred from Ben Morse to Mary W. Nivison, the doctor's sister. The land cost $2000; it was mortgaged for $1000. Nivison's projections and plans were grandiose. She planned a building of 165 rooms, 150 of which would be filled year round with recuperating patients. She intended to raise the needed $50,000 through stocks ($25,000), loans ($15,000), and donations ($10,000). She estimated that the annual income would be $93,600, and hoped that the debt would be retired in seven years. By the fourteenth year Nivison hoped to have a $101,665 surplus.7

Many shared, at least for a time, Nivison's hopes. When she had completed the plans for what eventually became Cascadilla Place, Ezra Cornell, now known as the founder of Cornell University, hurried them to an architect. Ultimately a spectacular building (still standing on the Cornell campus) was erected. Built along side a ravine that supplied the stone, the five-story building was 100 feet by 180 feet. In its basement, constructed 30 feet below the surface, were 14 regular and vapour bath rooms. Perhaps the plan was too grand. Certainly the post-war economy hurt the scheme as many failed to honour their subscriptions and new pledges failed to materialize. By 1866 Cornell was advised by another participant, the Hon. M. Finch, that no more money could be raised. Some $60,000 would be needed to finish the building, furnish
TABLE ONE
Projected Figures: Cascadilla Place

<table>
<thead>
<tr>
<th>Number of patients</th>
<th>Weekly Fees</th>
<th>Annual income</th>
<th>10% Profit</th>
</tr>
</thead>
<tbody>
<tr>
<td>50</td>
<td>$8.00</td>
<td>$20,800.</td>
<td></td>
</tr>
<tr>
<td>50</td>
<td>12.00</td>
<td>31,200.</td>
<td></td>
</tr>
<tr>
<td>50</td>
<td>16.00</td>
<td>41,600.</td>
<td></td>
</tr>
<tr>
<td>150</td>
<td>---</td>
<td>93,600.</td>
<td>$9,360.</td>
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</table>

<table>
<thead>
<tr>
<th>Funding</th>
<th>Amount</th>
<th>Dividend Rate</th>
<th>Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>Stocks</td>
<td>$25,000.</td>
<td>8%</td>
<td>$2000.</td>
</tr>
<tr>
<td>Stocks</td>
<td>15,000.</td>
<td>6%</td>
<td>900.</td>
</tr>
<tr>
<td>Donations</td>
<td>10,000.</td>
<td>--</td>
<td>--</td>
</tr>
<tr>
<td>Totals</td>
<td>50,000.</td>
<td></td>
<td>2,900.</td>
</tr>
</tbody>
</table>

Annual Payment on Debt
- 6,460.

Surplus
- 1,400.

Source: Adapted from Appendix #1, [H. Clifford Reed], "Cascadilla Chronicles, 1863-1866." Reed noted that there was a transposition error in the original papers and that this was duplicated in his copy.

it, and to complete the grounds. There was, according to Finch, "danger, grave danger, of failure." Finch noted that "Those who have given have given as liberally as they should have done & [sic] perhaps more." He had been told that Nivison would raise $20,000 more if her position at the cure was secure, but Finch noted, "I doubt her ability to fulfil what she has promised."8
Soon a new plan for the uncompleted building emerged. Since stockholders felt that Nivison was not financially involved, she apparently was not apprised of the new plan: to use Cascadilla Place not to treat bodies, but to teach minds. The water-cure-to-be ultimately would become Cornell University. In 1866 Finch suggested that if the water-cure became a university building it would have dining rooms, and water-power for the school of mining, mechanics and engineering. Finch enthused, "Such an arrangement ensures prompt & [sic] immediate success; gives instant vitality to your institution; will enable you this year to organize your corps of instructors & [sic] get to work next year." Furthermore, Finch was certain that using Cascadilla Place as the basis for a university would not only be economically viable but "I think the University can get its completed building, President's house & [sic] grounds on this plan in one year for just about what the building alone will cost at Fall Creek [another alternative], & [sic] be two or three years in the process of completion." If Cornell agreed, Finch was certain that the shareholders would follow his direction.¹⁹

The transfer of Cascadilla Place took time. On 15 September 1867, thirty-one stockholders agreed to sell their interest in Cascadilla Place to Ezra Cornell. Early the next year, on 4 February 1868 Nivison wrote to him asking if the land was to be taken for a university. She suggested that he had always claimed to support her dream for Cascadilla Place.
Cornell reassured her. Just nine days later Cornell reported to the university Trustees that he had the opportunity to "assure the use of Cascadilla Place" for the university. The building could house 300 students (or fewer students and some professors). Cornell suggested leasing Cascadilla Place and obtaining a loan to complete the building. This idea failed and the stock was transferred to Cornell University. Its value was $29,000. With the addition of Ezra Cornell's stock the university would own Cascadilla Place for $32,000. The university's start was assured. It was the end of the dream for Nivison, but not the end of her work. In 1876 she bought a large house and transformed it into a sanatorium, and in 1884 she constructed a building for homeless children. Involved with the Dryden Springs Sanatorium, she conceived the idea of a chain of "Hotel Sanatoria" and in 1890 formed a corporation. As with Cascadilla Place her plans were greater than her ability to generate money and the idea failed. Ill health forced her to give up the Dryden business, and in 1901-2 it was leased to a New York firm but a sale was never completed. Nivison then operated the Dryden Springs Mineral Water Company to bottle and market the spring waters; she operated this until her death in 1906, although it was not a success. The Dryden Sanatorium eventually was taken over by a New York company, and subsequently burned in 1915.

It is difficult to determine if the transformation of Cascadilla Place from a would-be water-cure to a university
was a deliberate attempt to oust Nivison. Ultimately that was what happened, and there is no doubt that negotiations went on for sometime without Nivison's involvement. Perhaps the fact that she had little or no financial interest in the water-cure helped to justify the manoeuvre. A later commentator suggested that Cornell waited as long as possible before agreeing to the takeover. But the evidence suggests that Nivison's opinions and desires counted for little. Just days after Cornell placated her about the future of Cascadilla Place, for instance, he indicated to others that he was able to get control of the building for a university. It is possible that the projected cost of Cascadilla intimidated some the plans were for and elaborate and expensive structure, and the economic climate poor. Questioned in 1855 about the feasibility of a water-cure at Amherst, Nova Scotia to serve the people of Maritime Provinces the editor of the Water Cure Journal replied that the cost of building a water-cure depended upon a number of factors from lumber prices to the facilities needed to bring water to the location. He suggested that from $2,000 to $3,000 would do for a building to hold 20 to 30 clients, and $3,000 to $5,000 for one that would handle 30 to 50 patients. These estimates were a far cry from the proposed costs of Cascadilla Place. Still the cost of establishing a university would have been enormous as well. There is no proof that her gender hindered her in this deal,
still one wonders if there would have been more consultation if Nivison had been a male.

In order to have a well-run and successful water-cure, though, more than a building and access to water was needed. The hydropath needed to be able to cure, or at least help patients, and a personality that would attract the respect of long-term patients. Water-cure specialists needed to be accessible to clients, available for consultation, and committed to reform. The close confines of daily life at a hydropathic institution would not allow arrogance. Hydropaths tried not to disguise their cures in the garb of scientific language and thus limit accessibility, a complaint often levied at regular physicians. Two long-lasting water cure specialists were Dr. Silas Gleason and Rachel Brooks Gleason of Elmira, New York. One former patient noted of Rachel Gleason:

[I] was among the first to graduate from your care, where I was washed and cleansed from many a mental cloud as well as from physical ills, and restored to my friends, clothed with a new inspiration. How I was stimulated and nurtured by your precept and example, dear Mrs. Gleason, through that weary, useless time. You were my physician, counsellor and friend. Whatevsoever I am, whatsoever I have accomplished, I owe to the example of your useful, consistent life, Blessed among women.15

For a brief period Silas Gleason and Rachel Gleason worked at the Forest City Water Cure on Cayuga Lake near Ithaca, New York, operated by Dr. J. F. Burdich and A. S. Bishop. The Forest City Water Cure consisted of a large two-story wooden building (30 by 60 feet), and a wooden gothic-
style building (30 by 84 feet). It was, according to John B. Orton, a patient of Dr. Gleason, "a spacious & [sic] commodious establishment that must have cost $10,000." The patients were cautioned not to take baths without the physician's approval, but they "are at liberty to suggest or advise with the Dr. [sic] at any time with regard to treatment." They were not, however, permitted to ask for food not supplied, although a patient was free to consult with a physician to obtain nutritional advice. Mingling with fellow patients was encouraged. Additional charges were added if baths or meals were taken to patient's rooms. The parlour was available for patient's use from 5:00 a.m. to 9:00 p.m. Card playing, dancing, and amusements were important to many clients to the consternation of Orton who felt that the contemplation of eternity was a more fitting occupation for those who were unwell. Along with the benefits of improved diet and water-cure treatments, patients no doubt benefitted from the ban on smoking and the acceptance of loose and seasonal hygienic apparel for women.14

Despite Orton's disapproval of the frivolous side of water-cure life, he did improve his health. He was not alone. Many found the water-cure institutions beneficial, if only because they saved the patient from the often tortuous heroic treatments of allopathic practitioners. Others claimed to be cured. Joseph Gross wrote his brother in 1861 to say, "I have also had my portion of Rheumatism and as well as yourself have
suffered in every way from the remedies." He treated this "damnable disease" with a mixture of potash and soft water. By 1863 his condition had worsened; he had dropped from 235 pounds to 160 pounds. Feeling that even his brother would not recognize him, he decided to go to Cleveland, Ohio, and try a water cure there. It would be, he realized, a slow cure, but he had no choice but to be patient.

It is very slow business but I have improved since I came here that is certain. I could not expect to get well immediately with the complication of diseases which I had - Rheumatism, dyspepsia and my throat afflicted so that in the deglutination of my food it would nearly strangle me - victuals return through my nostrils. I had no control over the muscles of my throat and in taking liquid to force the food down it would produce coughing from the irritation to the throat. [T]ake it all together I was in what you might call a "damned poor fix." I am not well yet but I can now eat most any kind of food moistened and all kinds of meats but I have to eat slow. I am reduced down to skin & [sic] bones nothing of my former self left not enough to make a shadow. I am now one of the "has been!" I can tell what I once could do what I once was and it is d-d [sic] hard to make anyone believe that who did not know me when I was a man.

True to his expectations, Gross's recovery was slow but steady. His was not the only success story at that establishment, nor was he the patient in the worst condition at the cure.

There are all kinds of invalids here - every kind of disease - most flesh is heir to, but the worst cases that I have seen - the most dejected and suffering are those who are victims to the use of Opium and morphine there is a lady here from Ky [sic] County adjoining Fayette who when she came here took 30 grams morphine enough to kill a half dozen persons unused to taking they have now reduced the quantity one-half - she has been here about two months.
At this establishment, unlike some hydropathic cures, modification was acceptable in certain cases.

Less likely to use medicine, but increasingly eclectic in their ideas, innovation, and approach were the Gleasons. With the experience gained at Forest City and at one of the earliest water-cures in Cuba, New York, the Gleasons established the Gleason Health Resort in Elmira, with aid of merchant, Fox Holden, and Marshall Hale of Phoenix. In 50 years they treated at least 20,000 patients. Of those patients "many were famous and affluent. Many, too, were obscure, poor in purse as in health and entering the institution as a forlorn hope." It was often Rachel Brooks Gleason who would take charge of these cases. Her commitment came out of her religious ideals; she had left her first church and joined the Congregational in order to be ordained as a minister. One of her most famous and devoted supporters was her brother-in-law, Samuel Clemens (Mark Twain), who referred to her as "the almost divine Mrs. Gleason." Rachel Gleason had attended Clemens's wife during her premature confinement and illness. When her patient improved and Gleason tried to leave the house for other engagements, Clemens felt she was still needed. He posted a policeman at the door to keep her there. Other famous patients included Susan B. Anthony, Mormon leader Brigham Young, and the entire Beecher family. Rev. Thomas K. Beecher was so impressed with the facility - "cheap, clean, and honest" - that he lived there three years
as a bachelor, three as a married man, and then across the road for 17 years.\textsuperscript{16}

The water cure, which was known over the years as the Elmira Water Cure, the Gleason Sanatorium, and the Gleason Health Resort, offered a variety of therapies, besides hydrotherapy. Rachel Gleason had studied at the eclectic Central Medical College in Syracuse, New York. While good water was the main therapeutic approach, the treatment meted out by the Gleasons and the physicians at their cure reflected many of the popular ideas over 70 years of health care. A variety of baths were administered: Turkish, Russian, Roman, Sulphur, Cabinet, Electro-Thermal, Electro-Chemical, foment, douches, hot and cold tubs, spray, and plain and carbonated brine baths. In addition, massages were given, and electricity was used in static machines, high frequency machines, and in electric light baths, and as well vibrators, vibrating machines, and oscillators. Much of this was not acceptable to water cure purists but the Gleasons asserted:

\begin{quote}
We do not pursue the extremes of Hydropathy or of Vegetarianism. We intend the condition of the patient shall indicate the diet and regimen necessary to promote health in each case. We seek, first of all, to cure our patients. Water is our chief remedy. But we [do] not hesitate to use Homeopathic remedies, Electricity, or any other means within our knowledge, to facilitate the recovery of the Sick. We are Eclectic in our practice – using all means that in our judgement shall do good to any patient.\textsuperscript{17}
\end{quote}

Still the Gleasons stressed the therapeutic value of Nature, and allowed that their resort permitted one to
"closely commune with nature and feel her health-giving powers." One way that patients could receive the benefits of nature was through the therapy of physical culture exercises from Swedish movements and gymnastics, to billiards, croquet, and horseback riding. In addition the Gleasons supported the concept of rest as "the foundation of all cure." Accepting up to 50 patients at one time, they promised that the ill would never "come in contact with objectionable cases sometimes found in sanatoriums. We do not receive insane, epileptic, or tubercular cases." With their eclectic ideas, the benefits of Nature's cure, and their personal charisma, the Gleason's and their fellow physicians managed an institution that lasted over 75 years.

James Calem Jackson headed a long-lasting water-cure where treatments were true to hydropathic ideology and gadgets and medicine shunned. One of the most highly regarded water-cure specialists, Jackson was the physician at Our Home on the Hillside in Dansville, New York. The object of the institution, said to be the largest water-cure in the world, was to restore the sick to health by means of the agencies provided by God for the preservation of health, such as pure air, pure water, sun-light, sleep, proper clothing, judicious exercise, healthful food, pleasant social influences, &c, [sic] excluding all poisonous drugs, and all other means and agencies, which in their nature tend to injure people in health.

Emphasis was placed not only on regaining health, but on preventative measures, "instructing them [clients] in regard to the Laws of Life, and Health, as that they may not again be
liable to take on the disease which are everywhere so prevalent, and which to a very great degree are the results of false habits of living." This was one of the aims of hydropathic ideology - to cure patients and to teach them how never to be sick again. A successful hydropath should only see a patient once.¹⁹

At the Home on the Hillside James Jackson, F. Wilson Herd, Harriet Austin, and Mrs. Mary H. York, all medical graduates, treated patients - over 20,000 by 1868 - in the large house. Others could stay in a large nearby hotel. Those patients from Canada and the United States who could not come for the cure and to hear lectures and entertainments in the large hall, could send $5.00 and obtain the advice of one of the physicians. Many who came - 350 from 35 states and 5 provinces in 1872 - had already tried allopathic cures and were ready to try water-cure and to embrace a new way of life.²⁰

Even those not in attendance at "Our Home" could learn about its philosophy. Like many health reformers Jackson published a number of tracts, articles, and books which promoted his ideas about health reform. This literature spanned the issues which concerned health reformers and 19th century reformers in general, and offered an alternative way of living. One important aspect of health reform, that applied to most hydropaths, was the promotion of vegetarianism. While not all water-cures offered meatless meals for
their guests, most practitioners suggested that attention to
diet would improve personal and thus social health. In 1866,
for example, Jackson discussed the topic of "Flesh as Food for
Man." Vegetarians, he noted, were regarded as

"odd," "eccentric," "half-crazed" persons, who are
dyspeptic, ill-tempered, ill-bred, sour visaged,
lank, and lean in body, and fit only in mind to
traverse all higher rules of social culture. They
are supposed to be "Skeptics," "Come Outers," "Infidels," "Radicals," and "Revolutionists."

All of this, Jackson claimed, was false; the great proportion
of vegetarians were Christians who felt that abstaining from
the consumption of animal flesh aided them in their spiritual
lives. Eating proper foods and enjoying good personal health
was "to glorify God in his body as well as in his spirit which
is His."21

Jackson felt, as did most health reformers, that the
consumption of pork was the most unhealthy and vile habit.
The pig was a scavenger and like other scavengers it lived
"upon animal or vegetable matter when it is in a putrescent
state, eating it with more relish when in the early stages of
decomposition." Such animals were never intended to be food;
their purpose was to rid the earth of waste from "the
filthiest heap of decaying vegetables, from the excrements of
animals... to the putrid carcasses of such animals." Less
obnoxious, but still unhealthy, was the flesh of herbivores;
if humans had to eat meat, this would be best if of good
quality. But diseased meat was hard to detect. In 1858,
Jackson noted, 2,150 head of cattle were shipped from Clevel-
and, Ohio, to New York City. Standing closely packed, in the hottest season without water, and with many dying by the end of the trip, the cattle were slaughtered quickly and sold as meat. Their inferior condition could not be detected. Cows in New York's Sixteenth Street distillery stables were unhealthy yet their milk was approved despite the fact that "their ears were full of sores, their eyes rheum, their tongues were thickened and the edges raw, their nostrils were glanderous, their udders had externally large corroding ulcers, and inside the glands were stopped by the garget; while on their bodies in various places were large sores of different sizes." Even good quality meat could decompose before it was eaten. Jackson declared that meat-eating also helped to perpetuate drunkenness. Meat, spices, and seasonings, tea and coffee excited the body and stimulated the need for strong drink. All of these, taken together hurt the moral, physical, and mental development of the human body. In all, Jackson felt, that superior beings (humans) should never consume inferior beings. At some point in time, he predicted, Christians would divide on the question of vegetarianism. Those who abstained would be gentle, refined, hospitable, kind and even-tempered. Those who persisted in the consumption of flesh would partake in "adultery, fornication, uncleanness, lasciviousness, and the like."22

This contempt for flesh-eaters was not limited to the practitioners at the Dansville Water-Cure. The promotion of
proper diet played a major role in all health regimens. Orson Fowler, for example, maintained a frugal and meatless diet. Cookbooks based on vegetarianism and water-cure were published. Sylvester Graham, William A. Alcott and Dio Lewis were early advocates of vegetarianism; and Horace Fletcher, the champion of proper chewing technique, was also influential in the promotion of dietary improvements. Health reformers condemned adulterated foods as being unnatural, and therefore unhealthy. Graham bread was conceived, in part, because Graham was suspicious of modern baking techniques and additives. In New Brunswick saleratus or pearlash - a leavening agent of potassium or sodium bicarbonate - was added to flour. Alcott was horrified and noted that mothers were killing their children by its use. "If the use of this strange medicament in human food - this bitter nauseous thing, that should almost remind us of an infernal, rather than a benevolent origin - were confined to New Brunswick, I might say less concerning it. But its use has spread, and is still spreading. New England is but little behind in the 'march,' and the west and south are coming on." Like other health reformers, Alcott hoped that adoption of his ideas would lead to the improvement and perfection of the human race. The child of the future would live a healthy and long life, if parents followed hydropathic regimens and dietary laws such as vegetarianism.
Readers of the *Water Cure Journal* found numerous exhortations to abstain from meat-eating. R. C. of Guildford, Indiana, felt that he had a grasp on good health; he rarely took medicine, engaged in exercise, was "a Woman's Rights man," and had read the journal for many years. He noted it had helped keep the physician's bills small. He suffered from severe dizziness at times, but he felt that he was in good health. Still he was informed that his diet was not the best. After all, he ate pork, mutton, beef and sometimes pies and sweets. He was instructed to go on an "anti-hog diet." The *Water Cure Journal* in 1861 reported on the Twelfth Annual American Vegetarian Association meeting held at the Hygro-Therapeutic College, founded by hydropath, Russell Thatcher Trail. The president of the group was 74 year old Rev. Dr. Metcalfe of Philadelphia, a vegetarian for 42 years. Metcalfe recommended a vegetable diet when he was elected to his post:

> The constant violation of physical laws, in the indulgence of flesh food, weakens and blunts the intellect and finer feels of the human mind, and the animal passions gain mastery over reason and conscience. Hence huge systems of wrong, like slavery, war, and licentiousness, with all the popular and legal frauds, grow and flourish with the fleshly indulgence of mankind.

A deceased member of the vegetarian group, John Chorlton of Philadelphia, died at the age of 90, after having abstained from meat for 54 years. He had been temperate and had had no coffee, tea, or tobacco for 30 years; Chorlton had worked as a journeyman dyer for the last 34 years of his life. Many felt such longevity proved the value of vegetarianism.
Meat was, of course, not the only unhealthy item of food. Spices, coffee, and tea stimulated the body. Sweets, often made with lard, were also poor choices.

Cake
"I am the cake that tastes so nice; Come dearest child, and take a slice. That thing over there, so square and black Is only bread; don't look at that."

Bread
"I do not fear; go eat the cake You'll come again some bread to take."

A long time ran the child about, Till all his money for cake was spent; Then, as he suffered much from want, Home to the bread, he quickly went As how good is bread, indeed; When one feels real hunger-need!"

Jackson was, in many ways, typical of health reformers. Not only devoted to the cause of hydropathy, he supported and promoted a variety of social improvements. Not least of all, were causes that aimed at the elevation of both women's health and women's position in society. Like most health reformers, he supported women in the medical field, and he was concerned about the proliferation of disease amongst women. In The Weak Backs of American Women, Jackson noted that he had received over 1500 letters in one year alone from women asking for help either at the Dansville Cure or in their own homes. A common complaint, Jackson vowed, was pain in the small of the back. At one point in his practice the physicians used internal and external mechanical arrangements, caustic applications of an allopathic nature, and water-cure to treat their patients,
believing as was generally supposed, that the weak back and pain was a result of uterine disease. Taking a different position the Dansville hydropaths decided that most of their patients had, at best, only mild pelvic ailments, and they decided that women's fashions were the major cause of the problem. The weight of the dress caused trouble to only a small degree, but binding around the body, and the cold air trapped by the voluminous skirts caused many infirmities.28

Fashion was not the only cause of women's ill-health; many ailments stemmed from women's work conditions at home. They spent their days in small unventilated kitchens, with cold blasting in from the exterior door, with the "decomposing effluvias" of cellars permeating through the floorboards. Hindered by their dress, and rarely washing, women worked from morning to night. Few men cared. "Of American men," Jackson noted, "it may be said without any hyperbole of statement that they make poor husbands, and worse fathers - to their daughters. In this respect they have not laid off the elements of heathenism. Christianity seems not to have reached, in any great degree, the domestic circle in the United States." On top of all this, women's dietary habits - in type, quantity, and regularity - were poor; the result was a weak back and pain for the majority of women. Jackson suggested that most women were ignorant of the cause of their ailments, since they were taught since childhood that they were governed by their sexual organs and their sex.
Take her then, as early in life as she is able to receive mental impressions, and begin to fasten in her mind the idea of her sex, and however you train her, whatever may be her education, or whatever you do with her, never let up for a single moment, whether in the house or out of it, in the church or in the public street, at home or abroad, in the nursery or in the parlor, down cellar or in the dining room, on foot or on horseback - no matter where she is or what she is doing - never let up the impression that she is made to relate herself to life wholly, solely and entirely with reference to the nature and function of her sex; and you only have to get a muscular inflammation in the small of the back, and she can no more resist the notion that she has sexual diseases... The law of association forbids it. There are pain and soreness low down in the back, and a heavy bearing down sensation in front. Right in that locality are placed her reproductive organs. She never tied her shoe-string without thinking that she had them; she never sat down in a chair, or got up; never moved or sat still; never washed her face or combed her hair; never laughed or spoke; never ate or spat; never coughed or sneezed; never did anything since she was weaned, without remembering that she is female. ... it is well nigh impossible to break up the impression that when there are weakness and soreness in the small of the back, the difficulty must originate in the Reproductive organism proper. 29

While dress reform was one of Our Home on a Hillside's battles, the physicians also fought against the drinking habit and poor nutrition. One way to prevent drunkenness, Jackson suggested, was to pay attention to children's diets. Spices, the "stimulo-narcotic" drinks like tea and coffee, tobacco, and flesh foods had to be avoided. Jackson suggested that by withholding stimulating foods, such as spices and meats, from small children, you would keep the need for stimulation from adults. One of Jackson's patients had taken his advice and raised her daughters on milk, grain, fruit, and vegetables.
The oldest, Jackson proclaimed, was "a perfect model of health, weighs 140 lb. [sic], is symmetrically proportioned, and knows no more about ill-health than an ostrich or an eagle." The younger seemed destined for the same good health. A Canadian woman weighed only 64 pounds upon arrival at Jackson's cure; she ate only two meals a day, each consisting of one tablespoon of raw chopped beef and brandy. Rescued from her inebriated state, she had gained 40 pounds when she returned to Canada. Over 100 habitual drunkards had been saved by his ideas, claimed Jackson, and thousands more had avoided the danger by following his physiological laws of health.  

Many health reformers not only supported dietary regimens and hydrotherapy but they also promoted the benefits of exercise. Jackson, for example, was also a strong supporter of physical fitness. Dance, he suggested could be a beneficial exercise. But, he fretted, those who danced often did so in unhygienic dress, in unventilated rooms, and took part when they were over-tired and over-fed. Under such conditions dancing hurt the mental state and physical condition of the participant. Still, dancing as an amusement was most acceptable. At the Home on the Hillside, where many patients were under 30 years of age, "recreative dancing" was part of the amusements, and was scheduled once a week. It was of great benefit. It encouraged mingling of men and women, and boys and girls, and was "almost the only amusement known to our
people where the sexes are brought together." It promoted
development of the moral and spiritual nature, as well as the
physical. As both a physician and a minister, Jackson
heartily recommended dance for health's sake.31

If Jackson was concerned about the bad backs and health
of women, he was even more worried about their reproductive
health. Americans, he lamented, were sadly behind most
European nations when it came to personal health, and repro-
duction in particular. He voiced his concern about the
subject's propriety but felt that the issue of reproductive
health and child-bearing cried for discussion.

I admit that at the first thought the theme is one
calculated to awaken the falsely modest; but I can
not shut my eyes or make my own consciousness
oblivious to the fact, that for want of proper
instruction in this particular direction, thousands
and tens of thousands of women are made to suffer
from long sickness, children are borne into the
world unhealthy, and live, while they stay in it,
sickly and suffering, and die while as yet their
years are few; and that to ignorance on the part of
their parents how to arrange the condition of the
mothers' health before their birth and after-ward,
a large portion of their sickness, suffering and
heart-aches are mainly to be attributed.32

A child-bearing woman needed to be in good physical
condition, and should not be subjected to hard physical
labour. Men were careful about their breeding stock, he
lamented, but their own wives worked long and difficult hours
and heavy jobs even during pregnancy. Expectant women needed
proper nutrition and they should avoid highly-seasoned and
strongly-flavoured foods. They should be temperate and
vegetarian. They should dress warmly especially in the much-
neglected lower extremities and they should avoid any kind of corset or binding. In the latter months they should not try to hide their condition, but be proud of it. Fresh air and exercise, especially in the early months was essential to the expectant mother. Plenty of sleep and soft water (for bathing or drinking) was necessary, although too frequent bathing was not healthy, and possibly dangerous. Jackson noted that childbirth should not be hazardous. A new mother needed cleanliness, quiet, rest, a simple diet, and pure air in the post-partum period. Too-frequent childbearing, more than once every five years, was unhealthy. Jackson's instructions were decidedly vague. "Married people should be thoughtful on this subject." 

Like most others who attempted to introduce this subject, Jackson was apologetic for his comments on a delicate matter, and took care not to offend, referring to the expectant mother as "one who is in such special conditions as make the subject of this lecture." The fear of offending or being thought immoral was paramount. A year previous, 1884, he had been more forthright. In a paper on the begetting and rearing of healthy children, he noted, as would future eugenicists, that animal breeding was more carefully tended than human conception. He argued that while both parents should be strong in all matters, the mother was most important. Defects such as round shoulders, flat chests, red hair, moles, coarse hair, and poorly-formed bodies may be passed on to children and that
possibility should be considered before they bear children. A married, but unhappy couple should not reproduce, nor should intercourse take place unless both partners agreed. Fatigue, heavy eating, and illness were all reasons for abstaining from marital relations, which should only take place in daylight since proper lighting was important to both the child's health and the parents' pleasure. Children were often raised under unhealthy conditions, especially girls. "From birth till death their destiny is to take clerkships in the world's "circumlocution office," learning "how not to do it," and it is confessed that they make vigorous progress." Girls should be taught to play just like a boy and there was no reason why she should not "learn a trade as well as a boy." Treated thus "she will not lose her womanliness, but will retain it, to be enabled by it to bear beautiful children and be a virtuous woman and true wife." 34

While hydropaths like the Gleasons, Shew, Jackson, and Trall were leaders of the reform, sometimes hydropathic techniques were utilized without guidance. Sometimes there was little awareness of hydropathy's reputed value. A spring in Cape Breton, Nova Scotia, attracted patients, but they credited God, not hydropathic ideas for the subsequent benefits. 35 In mainland Nova Scotia near the tiny village of Wilmot, Annapolis County, from the 1830s to the turn of the century an important hydropathic cure attracted patients. Wilmot Springs had a history that was both similar to and
different from many other North American water-cures and spas. At times it drew patients from afar to test its curative powers. Ultimately it ended, like many other institutions, as a bottled water factory. It is the differences between other more successful water-cures, and the Wilmot Spa Springs that make its history important. Isolated by an inefficient transportation system, and far from centres of population, Wilmot needed both promotion and good facilities to attract clients. More important, unlike other spas, Wilmot Springs was not under the control of a respected and well-known hydropathic physician, capable of monitoring treatments and offering advice, and dispensing literature. It was operated as a hotel which happened to have nearby springs, rather than as a hygienic institution which happened to have rooms for patients. Its success was due to the belief in the curative nature of its waters and provincial tourism, rather than to any owner's commitment to hydriopathic therapy.

The Spring's medicinal qualities were not confirmed until 1817, although the benefits derived from them were known to the region's peoples including the Micmacs. By the 1830s the springs were a centre for treatments and for relaxation. Professor J. W. Webster of Boston analyzed samples of the water, identifying one ingredient as iodine, "a particularly powerful medicine and [which] is found to be extremely beneficial, especially in cases of a scrofulous eruptions."36 Along with other ingredients such as bicarbonate of soda, no
doubt the water eased the symptoms of those clients with skin disorders. In the 1830s proprietor, Farefield Woodbury, owned the five acres surrounding the spring, a "primeval forest" of hemlock, spruce, maple, beech, and birch. Nearby farmhouses would be filled by persons wishing to regain their health. Woodbury built a hotel to meet the demands of these summer visitors. Even without advertising thousands visited the springs, many reportedly paying to sleep on the floors of nearby homes. One newspaper correspondent wrote in 1831:

The congregational lepers of the east and west flocked to the fountain, like anxious pilgrims, and the current of the spring was directed down their throats, into their stomachs, overflowing, like the banks of the Nile replenished the impoverished clay of mortality with health and fecundity.

Newspaperman, Joseph Howe, wrote that it was well known that the water helped infertile women: "We have heard that the waters of this spring are efficacious in filling empty cradles and nurseries, several ladies are ready to swear to the full extent of their virtues."37

As thousands from Nova Scotia and New Brunswick flocked to test the virtues of the springs, they were joined by numerous Central Canadians and Americans (especially from New England and New York), and even the occasional visitor from London or Glasgow. Many of those clients were well-known: shipowner Samuel Cunard, Judge Thomas Haliburton, Hon. Alexander Keith of Brewery fame, Vice-Admiral Sir Edward Geoffrey, Hon. Enos Collins, merchant, Bishop and Mrs. Inglis, the Earl and Countess of Mulgrave. A signed guest book lists
only some of the distinguished visitors through the years. Perhaps one of the most prestigious guests was a young naval captain, the future King George V.38

Eventually Spa Springs came into the hands of a Halifax company, the Spa Springs Company, which constructed a luxurious three-story hotel with a mansard roof and modern hot and cold shower baths. The water was used in a number of ways. As a drink many found it tasteless, while others were nauseated. Still, whatever the taste, many people "still experienced no less advantage from its use and application." Others bathed or showered in the water and mudpacks were a common remedy. Certainly many testimonials were written about the efficacy of the waters. Samuel Chipman Carter of Yarmouth noted in 1831 that his cancer was almost cured after treatment at the spring. He wished he could again be at "the spring to drink my fill and bathe my body well." He had promoted the virtues of the spring waters among the people in his community. Other patients also praised the springs; many requested a shipment of the water. "I need not say that we shall be anxious to get it as soon as possible," wrote H. G. Clopper of Fredericton after his wife returned from her treatments. John Palmer, a trustee of the Parish School, Canning, New Brunswick, suffered from external piles, stomach problems, and lung trouble, yet, after drinking, bathing, and washing found himself recovered after only a week. Many others claimed similar cures.39
By 1846 the first wave of business had declined. A visitor noted that despite attempts to keep up appearances, the decay was apparent, and there appeared to be little active business. A sick friend, however, had drawn water from the principle spring (the others had filled with mud) and had drunk five half-pint tumblers, declaring that the more he drank the more he liked it. The water was cold, hard, and clear with no saline or mineral taste. A nearby spring, though, was sometimes saline, the writer noted, and it had an oily taste. Water was piped to the bathing houses but the correspondent felt that they were not well equipped. "The place itself is in a state of Nature, quiet even to monotony, and in its present condition would, to a patient, irresistibly impress the idea of solitary confinement." Still the writer had no doubt that improved health would result from visits to the spring. Publicity and personal enterprise would help not just the spring, but Nova Scotian prosperity and "the health of thousands, afflicted with the various diseases which human flesh is heir to."40

It took until 1887 for the springs to be improved and the site restored, not just as a water-cure but as a resort. Under the direction of a former sea captain, Jacob H. Hall, the grounds were cleared to a park-like standard. Debris was removed away from the spring to insure that the medicinal qualities of the waters were not "weakened and corrupted." New bathing houses for hot, tepid, and cold baths were
constructed. The hotel underwent renovation and on 10 June 1887 Spa Springs opened. It catered mainly to a wealthy clientele. The lack of good transportation hurt and one source complained that "none but the rich invalid, or the invalid having rich friends, could afford the expense to be occurred in travelling." Still it was hoped that Spa Springs would become a leading resort. 41

Spa Springs of 1887 did not rely on the sympathetic touch of a Rachel Gleason or the wisdom of James C. Jackson. Instead it relied on Captain Hall's personality to attract and keep clients. The refurbished hotel contained carved work which Hall had brought back from the East Indies. Seats placed along paths cut through the woods. Lawn tennis and quoits were popular activities for guests. The emphasis was on entertainment rather than the principles of water-cure; for many amusement, not hygiene, was the drawing card. One visitor wrote, "As I was in robust health myself and was not aspiring to be the inventor of a patent medicine I did not trouble myself with the particulars of its (the water's) curative powers." The stress on enjoyment continued inside the hotel where visitors discovered a ship-like atmosphere. They stayed in "cabins" or went "on deck;" the "crew" of servant-girls lived in the "fo'scle." The Captain hired real sailors if possible: the cook in the basement "galley" was from Malta and previously had sailed with Hall. The clerk was
a "mate," and the hostler the "bosun." They would report to
the captain in his raised office, the "poop."\(^2\)

During this period the waters at Wilmot Springs were
known as "Spadeau." They were promoted as aids to diminish
acidity and to improve health and vigour, particularly in
cases of gout, diabetes, rheumatism and dyspepsia. "Who that
has experienced the sour rancid eruptions [sic] or regurgita-
tions, flatulent distentions and pain, need any description of
its unbearable melancholy horrors." The cure was, of course
Spadeau, and the effervescent "clear steel white, odorless,
sparkling water" could be shipped in barrels to any address.
"It is a Delicious, Healthful Beverage, It quenches Thirst,
Prevents Fermentation, Aids Digestion, and Assists with the
Most Delicate Stomach. It Cures Indigestion, and Sick
Headaches. It is a most Agreeable and Cooling Beverage to
Invalids." Residents of the nearby area were proof of the
claims, noted a promotional pamphlet, not only did they live
long and remain free from disease, but "It is a remarkable
fact that during the various visitations of DIPHTHERIA, and
MALIGNANT FEVERS that have swept through the province at
various times, there has never been known a case of either of
those diseases by those who Habitually Drank SPADEAU."\(^3\)

Mrs. M. J. K. Lawson wrote a poem that was used in a
promotional pamphlet for Spa Springs. It emphasized both the
element of nature, and the healing qualities of the water,
qualities which aimed at attracting both tourist and patient alike.

There, in its sylvan prison  
The cool Spa Waters shine,  
Mixing a draught of healing  
Deep in Nurse Nature's mine.

Down in the crypt-like cistern,  
By plummet never spanned,  
Jets up the tiny whirlpool,  
Troubled by angel's hand.

Strange that from Nature's recess  
Where all is cold and dumb,  
Up to its quiet basin  
The hygean draught should come."

Despite the emphasis on frivolity and tourism, and without the benefit of a hydropath, people still flocked to the springs. Many wrote of the good effects of the water and mud packs. Mrs. P. H. Best of Kingston Station wrote Hall that after having suffered for years from kidney trouble and woman's diseases she had developed a severe cough, night sweats, and had been bedridden. Physicians had failed to restore her health, but had advised her to visit the springs. She obeyed but had had little faith. Assisted to the springs she drank the water and bathed in it. She found that "the relief from pain was immediate and the increase of strength great." Another visitor, J. C. Gates, recommended the waters of the Wilmot Spa Springs. A former attendant at the Insane Asylum in Worcester, Massachusetts, he suffered from fatigue and nervous disability. When he fell ill with pleurisy the physician at the institute could not cure him and sent him on to the Massachusetts General Hospital. Weak and barely able
to walk, he consulted doctors in Nova Scotia, who advised the spa waters. His health and strength were restored. Despite the gradual change of emphasis from health to tourism, Spa Springs still attracted patients who believed that the waters could cure. Despite this resurgence of visitors to the springs to find help for their ailments, the renewed success of the Spa Springs ended when a fire in the late 1880s destroyed the partly-insured hotel and terminated the business.\(^\text{45}\)

In 1888 the water was again tested, this time by Professor Lawson, of Dalhousie University. Water shipments still continued; a Boston firm contracted for 400 barrels ($2.50 each) per week for ten years. A short time later Halifax and Kings County men organized a new company. They planned to build a factory on the site of the burned hotel and to place the water on the market. By February 1891 there were 15 employees engaged in bottling ginger ale, lemonade, club soda and aerated water. The managing director, James Stewart, noted that over 2000 barrels of ginger ale were produced between 15 March and 24 August 1891, bringing in a gross income of $25,000. Some 500 barrels, each containing a gross went to Saint John and 300 to Halifax; some barrels were shipped as far as London, Ontario. While the plant was turning out 50 barrels a day, if demand increased, more could be produced since one spring was capable of 1,000 barrels per day. The future looked hopeful. The capital of the company
would be increased to expand the business; branch offices would be opened in major North American cities and a new large hotel would be opened at the springs. Once again Wilmot would have a sanatorium and a summer resort. The spring's curative powers were still praised albeit in the tone of turn-of-the-century dismissal. It would appear, said one writer:

> that the water of this well was a bone-mender, a gravel-melter, a paper-digester, a face smoother, a cancer cure, a corn cutter, an age-renewer, a panacea. Quoted, taken upon all occasions [sic] and with any or every intention.⁶⁶

Never the owner of the springs, Hall had apparently invested and lost much of his life savings due to the hotel fire and losses from the factory. Around 1897 he returned to his first career, sailing, and was ultimately lost at sea. The proposed health resort never materialized. The factory languished until 1908 when the Wilmot Spa Mineral Company Limited was formed and spa water was barrelled and bottled and used as a basis for ginger ale. This factory burned and the business was transferred to Middleton. During World War 2 the "primeval glade" was cut to provide lumber for the nearby army base at Cornwallis. Newspaper accounts in 1958 noted that the springs, while unkept, still bubbled, the largest one reportedly bottomless. The last bath house had long since fallen down and the property had been sold at a county tax sale. In 1960 Murray Elliott of Melvern Square made plans to restore the springs and the properties. The pools were then under option to European promoters who planned a summer resort
complete with trailer camp, swimming pool, and bath houses. By this time the memories of the springs and their celebrated cures had undergone a transformation. Now, instead of dyspepsia, cancer, and cutaneous disease, the spa was reported to have had "a continent-wide reputation as the most efficacious hangover cure in North America, and hundreds of casks, barrels and puncheons of it were shipped out yearly to ease the morning after agonies of those who had looked too long upon the wine when it was red." No doubt that had been true for some clients at this and other cures, but this attitude of the 1950s denigrated the vitality and fervour of hydropathic ideas.

The trees and the hotel were long gone, but by 1985 the value of the springs was again recognized. The Institute Fresenius of Weisbaden, West Germany had tested and found the water to have a high degree of purity. The springs, claimed to have once been the "Bluenose Fountain of Youth," would be the site of a $5.8 million mineral water bottling plant. In 1979 Orville Pulsifer Senior and Junior sold the Sparkling Springs Company to Alan Shaw who established Sparkling Springs Water Limited, a Halifax based company and producer of Spa Springs mineral water - Eau Canada Sparcal. Estimates of nation-wide bottled water sales were in 1988 about $100 million. Eau Canada Sparcal, was founded by Halifax lawyer Peter Claman and international real estate dealer, Farhad Vladi, along with German brewing investments, and $3 million
in loans from the federal and provincial government. Still under-capitalized and only one of several bottled water plants in the area, the company was forced to cut its 30 employee staff. Management has since embarked on reorganizing the 38,000 square foot plant, attracting new investments, and redesigning marketing strategies all with the hope of attracting North American clients. It was a long way from the heady days of Spa Springs, Captain Hall, and Spadeau water when area mothers would caution their boys about "hiding in the bushes watching those half-naked society hussies play croquet" and clients who after "six weeks of drinking, soaking and mudpacking [would leave] under their own power."48

There were likely a number of reasons that Spa Springs, despite thousands of devoted patients, failed to develop like other North American water-cures. Its geographical location, far from major population centres, and isolated by inefficient rural transportation systems, account in part for the Spa Spring's spotty history. Fires and the high cost of building first-rate facilities, especially in an area which offered only seasonal use, no doubt diminished the chance of success. But the lack of a central figure devoted to and expert on hydropathic techniques played a major role in the development of the Springs as a tourist area which increasingly catered to a select and wealthy clientele. Without that on-the-spot-expertise, guests treated themselves during a vacation, rather than learning the principles of an alternative hygienic life
style. Instead of discovering a tri-partite equilibrium under the guidance of hydropathic physicians, Spa Springs just furnished material for comedians:

a feller standin' with one leg stuck into the mud; another lyin' on a plank, with an arm shoved into the ooze up to the shoulder; a third asittin' down with a mash o'mould like a gypsum cast on his head; others with naked feet spotted all over with the clay to cure corns; and these grouped agin here with an unfortunate fellor, with a stiff arm, who could only thrust in his elbow....

Spa Springs was not the only spring that at the turn of the century catered more to the sophisticated taste of patrons then to hydropathic ideas. Clinton Lithia Natural Springs water was discovered at the Franklin Iron Works near the village of Clinton, New York on 29 October 1894. While there were three other nearby springs, (Franklin, Kadawisda, and Kirkland), this new-found source was considered superior because of its greater concentration of lithium salts and little chloride of sodium. Advertisements for this water had two objectives: to promote the water as a cure for disease and as a beverage. Clinton Lithia Water could treat, advertisements claimed, "uric acid diathesis, with its train of diseases, such as gravel in kidney or bladder, rheumatism, gout and allied conditions." Many gave testimonials on its behalf. Dr. F. H. Peck praised it for renal and urinary problems; Dr. F. M. Barrows promoted it for rheumatoid and renal disease; Dr. Isaiah Dever had "no hesitancy in saying that it is a most excellent water in all difficulties for which mineral waters are used. Patients were also pleased.
Eliza P. Smith credited the water with curing her 15 years of kidney trouble; R. H. Huyc used it for rheumatism. Others used the water simply as a beverage. It was "delicious and refreshing" to J. M. Swan, Baptist pastor Rev. J. E. Lovejoy and many others. A German professor, H. C. Brant, praised it in a manner that would have horrified many hydropaths: he liked it mixed with liquor. George F. Hurlburt, proprietor of the New Grand Hotel was also pleased, noting "for a first-class bar that sells high-balls there is no other water equal to it - to mix with whisky or other liquor." H. B. Harrison used the water regularly with liquor and syrups and he ordered 100 quarts to take with him on a trip to Europe. The Clinton Lithia Company promoted this use, noting, "It is a perfect blender with whiskies and wines of all kinds." Hydropaths, many of whom probably would have condemned the use of any mineral water, would have shuddered to hear of its value as a mixer for alcoholic drinks. Had hydropaths known about the quality of the water (at one time two wells were unsafe, one was fine, and one exceptionally pure,) they might have well considered the cure worse than the ailment. The proprietor of the lithium springs was probably too worried about the colon bacteria in the wells (one advisor suggest that the cows be fenced off) to reflect about his transgressions against hydropathic ideology. The water business was big business; medicinal properties were fine for advertisements, but at the turn of the century profit, not reform, was the goal. The
ironic combination of water-cure, physicians' testimonials, and alcoholic promotion was a far cry from the temperate-vegetarian regime of the true hydropath. Other springs in New York state followed a similar pattern. In 1823 Dr. John Clarke began to bottle the waters at Balston. Three hotels built to service the patients, burned during the Civil War period. They had offered popular entertainments, lectures, and (although many frowned upon it), gambling. By the turn of the century a number of companies were selling bottled water, rather than promoting hydropathic ideals. Fearing that the springs would be ruined by speculators, the state began to take over the springs; by 1915 it owned 1000 acres and 150 wells.\(^5\)

Hydropathic ideals, while not opposed to profits, had a secondary aim of cutting expenses to patients through improved diets, decreased costs and affordable medical care. Improper and intemperate eating habits not only drained the body, but drained the wallet. Many condemned water cures for their expense, but most owners/operators made arrangements to help those who had financial difficulties. Water cure treatments, given at home or at a hydropathic institution generally cost less than the bills and drugs of an allopathic physician. S. A. Chaffee wrote about his experience. He had managed his wife's confinement. "I was opposed by friends and foes; and if anything had happened to her, the place would have been too hot for comfort." His own bad lungs were improving, he noted
and water cure techniques helped both his health and his pocket-book. "Times are hard, harder, hardest, but I've no doctor's bill to pay. Behold! Old things shall be done away, and all things become new!" Many correspondents to the Water Cure Journal claimed they were penniless and had spent their money on drugs and allopathic physicians. "We do not," said an article, like to treat such applicants with silent neglect." They offered to send a prescription for $5.00. Along with the treatment's description the Journal would send 25 copies of "Water-Cure for Millions." Patients could sell these for 20 cents a copy and recoup their money.\(^{52}\)

Joel Shew, a well-known hydropath and original editor of the Water Cure Journal, claimed that prices were not so high compared to expenses at a water-cure and soon they should be no more expensive than normal room and board, which in fact many cures offered to healthy persons. Rev. D. T. Taylor detailed his experiences and tribulations in dealing with allopathic and other drug physicians. Since he was 17 he had seen 20 different doctors - allopathic, eclectic, homeopaths, botanic, and motorpathic. He had endured bleeding, several emetics, 12 blisters and many mustard plasters. Twelve doses of calomel gave him loose teeth and much salivation but little relief. Quinine, opium, sulphur, creme of tartar, strychnine, belladonna, ferrum, potassium, digitalis, assafoetida, tar water, ipecac, lobelia, and many other powerful drugs were given to him by regular physicians. In addition he had taken
more than 90 bottles of patent medicine, 25 bottles of vegetable pills, and 10 containers of liniment. James Jackson was not sympathetic; he noted that if he could not cure this "apothecary shop," then people would denounce water-cure rather than laying the blame where it belonged.53 A writer from "Down East" noted that not only had water cure brought the family improved health, a longer life, and better understanding of each other, but with their new nutritional eating patterns, the grocer was now paid in cents rather than dollars, and the doctor received only "our sympathy." Hard times had hit of late, but to "contribute some practical relief in hard times to others," the writer would, if it was possible, distribute the Water Cure Journal to others.54 Some hydrotherapy clinics accepted people at a lower rate if they helped out with some of the work. In Petersburg, New York, Rev. Mr. Este, whose wife studied at the Hygeio-Therapeutic College, established an institution where patients were permitted - if they could - to undertake tasks in order to reduce the fees. The Petersburg Literary Institute and Hygienic Manual Labor Watercure, under Prof. L. E. Livermore varied its cost from $3.00 to $8.00 per week according to the amount of attention the patient needed. Shaw suggested that his cure's fees were as low as could be expected in a city, but he held out hope that once water-cure was better understood public charities would be built to aid the needy. That
day never arose, but many patients utilized hydropathic
techniques to treat themselves and their families.\textsuperscript{55}

Hydropathy offered many people of limited means a cheaper
and less dangerous method to obtain and retain good health.
Despite their concern with the poor, though, there was only so
much a hydropath could do. A writer from Penobscot, Maine was
told by the Home on the Hillside that their staff "Can help
you but can not give you work." Canadian patrons of the \textit{Water
Cure Journal} were cautioned not to send Canadian or English
shillings and call them equivalent to 25 cents. They were
worth less, and one such letter cost the journal 10 cents in
postage. This was hardly profitable, the editor, R. T. Trail,
complained.\textsuperscript{56}

While offering inexpensive cures, the water-cure business
also challenged the allopathic profession. Hydropathic
physicians' antipathy to allopathic physicians was not at all
uncommon to health reformers. Although some hydropaths held
allopathic licences, in order to legitimize their practice for
critics, the health reformers in general condemned allopathic
medicine as dangerous. Many of their treatments and medicines
seemed to offer only continued ill-health and a cruel death to
their patients.

"How many deaths were there today?"
The hospital physician asked,
As on his gloomy rounds
The grim assistant passed.
"Nine, if you please, sir, only nine
Today," replied the man.
"And how is that? There's some mistake!
I ordered drugs for ten,
And only nine are dead, you say!
Pray, sir, how do you make it?"
"You ordered medicine for ten,
But one refused to take it."

When Dr. J. P. Phillips, the Assistant Surgeon in the 37th Regiment of New York Volunteers, was taken prisoner by rebel forces during the Civil War he could have escaped. But Phillips, a graduate of the Hygic-Therapeutic College and holder of an allopathic degree refused to leave the wounded. The Water Cure Journal hoped he would teach the principles of good health to the southern army, "for, much as we dislike them, we don't want to see them drugged to death." If the heroic medicines utilized by allopathic physicians were not condemnation enough, the fees charged by medical doctors angered many. When scarlet fever raged through the town of Rawley, Maine, one citizen inquired of the Water Cure Journal for help and noted that "Dr. Allopathy is reaping a glorious harvest of fees." A family in New Hampshire claimed that both the Water Cure Journal and the Phrenological Journal were "two of the most valuable publications in the country." The family of 8 had called a doctor only once in 123 years and they believed they had saved 10 times the cost of the journals by not having a physician's bill.57

One charge that hydropaths levied against other practitioners was that they did not respect the rights of women, either as physicians or as patients. As practitioners many women were denied entrance to medical schools. There was a place for them in hydrotherapy. "All along from puberty to
the decline of life, woman needs woman's council, woman's care, and woman's sympathy." Medical doctor, Harriet Austin, of the Home on the Hillside, herself a medical doctor, argued that if there must be physicians there should be female physicians. Unlike many, she felt the female doctors were best for male patients. Many who supported the notion of a female practitioner did so because they felt that women's maternal instincts better qualified them to nurture patients, especially children. In addition, a woman doctor would be protective of the natural modesty of the female patient. Women, whether physicians or not, were considered responsible for the health of themselves and their families. They would not be able to fulfil this responsibility until they learnt about hygiene and human physiology - "there is no salvation for them but in knowledge."58

There was still another reason that women physicians were needed suggested the Water Cure Journal. It was to protect themselves and their sisters from the greed and ineptitude of male physicians. Women, argued the journal, did not need to be drugged and kept in ignorance so that 30,000 male physicians could enjoy a profitable business. Since there were more ill women then sick men, women could handle those cases and male doctors would not make profits at their expense.59 Many concurred with the notion that women should treat their own gender. Mrs. Mary A. Livermore, in an introduction to Perils of American Women or A Doctor's Talk With Maiden, Wife.
And Mother, praised the book’s contents. She noted that women’s natural state was good health. They would attain this "if they will acquaint themselves with the laws of their being, and will obey them." The author was correct, Livermore suggested, to condemn "the unclean army of gynaecologists" who seem desirous to convince women that they possess but one set of organs - and that these are always diseased."60

James Jackson made a similar argument for women physicians when he claimed that women were human first, and female second. Too much attention was focused on their reproductive ability, Jackson reasoned, adding that women were only able to reproduce between the ages of 14 to 45. That gave them some 40 years of inert reproduction. They, therefore, had no obligation to marry or to bear children. Given the same intellectual, moral, and sensual and sensuous powers as men, women needed the same freedom as man. Deprived of this freedom and equality, she could not develop properly and would rapidly decline. With these physical, political and moral restrictions Jackson argued that by the time a woman was 30 years old she would have deteriorated.

Their hair is turning or had turned gray; their eyes are surrounded with wrinkles; their foreheads are seamed with furrows like a sailor’s; their teeth are rotting or are already displaced by others made to order; their fullness of bust has entirely disappeared, and is made good by the dress-maker; their skins are dry, harsh, and colorless, or greasy and jaundiced; their muscles have lost their roundness; their feet have lost the elastic instep spring (which is the surest evidence of a good walker) to that degree that they cannot walk without knocking their ankles together, or
lifting up their feet at the heels of every forward motion so as to flap and bedraggle their dresses.61

Many hydropathic supporters tried to alleviate the suffering and to improve the potential of women. At the Hygio-Therapeutic College in New York about one-half the students were female, and many of the Water Cure Journal subscribers were women. This journal was quick to condemn the Eclectic Medical College of Cincinnati, Ohio for excluding women from its winter sessions; at the same time it condemned institutions exclusively for women." A medical college should educate doctors, not sex!" Jackson summed up the argument for equality for women in a challenge to allopathic physicians:

Change all this, and make women free. Endow her with rights personal and rights social - with rights legal and rights ecclesiastical - give her back her own - the control of her person and the freedom of the mind - bid her to take to herself free speech and free inquiry - open to her the avenues of business, the sanctuary of letters, and the recesses of art - give it to her... and you gentlemen, and others like you, will have better opportunities for judging whether the sexual in woman unmans her, making her constitutionally our inferior.62

If water-cure specialists condemned other systems of medicine for their treatment of women, they also condemned them for their approach to therapeutics. Not only was regular medicine dangerous to the health of patients, according to hydropaths, it was often clad in a garb of scientific words that patients could not understand and that helped to strengthen the allopathic physician's control over therapeutics. Regular physicians also ignored the healing processes
of nature, a concept that was central to the health reformers' ideology. "If you are sick," said Jackson, "get well by proper means. Be content to get well naturally. If you must die, do so rationally. I should prefer to die naturally, than to die scientifically. The drugs of the allopathic system could only harm the patient." Nature was the true cure. "Wonderfully plain are all the teachings of the ever-open volumes of nature's book. Every page tells us of the laws of life, the conditions of health, the essentials of a better individuality, of a higher personality." The Water Cure Journal claimed to lead the way "to eradicate from society the accumulated errors of three thousand years; to convince the people of the utter fallacy of the popular medical system; to explode all of its false philosophy; to clear the ground of the rubbish of ages, and build up a new, a different, an independent medical Science and Healing Art. But it must be done. It will be done."63

The new truths of water-cure were "yet somewhat unsymmetrical" admitted Jackson; it still did not have "polish and proportion." Water-cure had to follow a new direction, both divergent and different from the allopathic method of health care. "New ideas have new paths to tread. The old ways are always crowded. The new TRUTH has to have its own way... New ideas are also necessarily radical. They are so by reason of their newness. Radicalism typifies them as conservatism
typifies old ideas. New ideas have no affinity for old ideas, usually."

Water-cure specialists not only attacked allopathic systems, but warred against those within their own ranks who failed to follow Nature's prescribed cures. "One pretending hygienic physician, who practices drug-medication, does more injury to the cause of health-reform than a hundred regular drug-doctors can." What stood most in the way of health reforms, from phrenology, to water cure to physical culture, to temperance, to dietary reform was the allopathic physician and his kit-bag of lances, leeches, and medications. "The killing process belongs to drugging systems, and not to Hydropathy. Water treatment, properly administered, never kills, though it may fail to cure." Their concern was not only about those who betrayed the profession by prescribing medication, but by those in the profession who made use of the wrong type of water. Mineral springs, for example, were often the basis of water-cure establishments, but many hydropaths considered mineral water a drug and just as dangerous as an allopathic prescription. A patient of R. T. Trall had rallied under his treatment, but succumbed after drinking "Congress" water at Saratoga Springs. There was no sense, said the Phrenological Journal, to living hygienically 10 months of the year, and then wasting time, money, and even the reserves of health on mineral waters.
Still water cure techniques increasingly emerged under the direction of regular physicians and in a modified form. The editor of the Health Department of *Godey's Lady's Book*, Dr. J. Stainback, for example, offered a revised version of hydropathic techniques. He supported the hydropathic tenets of obedience to hygienic laws. "Obedience to physiological law brings its own sweet reward. Disobedience will surely be followed by the pains and penalties annexed to violated law." Like hydropaths, Stainback gave prominence to Nature as a curative agent. But nature was not to be relied upon in an exclusive fashion; in specific cases it might need help from mild remedies. Like many health reformers, he advocated sexual knowledge rather than a false modesty for women. Withholding the physiological knowledge of reproduction and hygiene would be "cruel injustice" to women, and giving way to passion, thereby forcing a woman into excessive childbearing, was abuse. Unlike most health reformers, however, he felt that while female medical colleges were acceptable if they were confined to their legitimate sphere, there were some operations only a man could do. He also stressed many of the health-giving agents promoted by health reformers: fresh air, water, and exercise. But Stainback refused to limit himself to the therapeutic benefits of water and to hydropathic techniques; he advocated its use, but constantly reminded his readers that hydropathic remedies were too exclusive. He claimed that "we do not belong to the hydro-maniacal class who
seem to think that the human skin was made only to be washed. Indeed, we cannot say that bathing would be necessary at all, if all our habits were made to conform to the laws of our organism; if the passions were duly controlled and properly directed; if diet, exercise, clothing, temperature, air, sleep, amusements, &c. [sic], were just as they should be, bathing would still be desirable as a pleasurable indulgence, and as a measure of cleanliness, but it would not be essential to the preservation of health." His position was hydropathic techniques, but never hydropathy.66

Just as hydropaths condemned mineral waters, they debated and argued the value of various treatments such as cold baths. Cold water treatments, based on earlier ideas by Vincent Priessnitz, celebrated as the founder of modern water-cure were considered "heroic" remedies; their success was determined when a point of crisis was reached and the body cleansed of impure substances. The Phrenological Journal noted that most patients could not take the cold baths; it was too big of a shock to the system and could damage - not improve - the health. In the hands of the allopathic physician cold water was most dangerous. In 1882 it was reported that at Sing Sing Prison and other institutions men were forced to take cold baths until they were blue. The Phrenological Journal suggested that the cat-o'-nine-tails might be more easily borne. These cold water treatments were often employed by regular physicians or by untrained persons with no under-
standing of proper hydropathic treatment or ideology. At the Perkins Institute for the Blind, Boston, boys and girls were forced to take a morning bath in water 40 to 50 degrees. The doctor in charge, identified as a female Dr. Howe, claimed that the procedure was supposed to shock the system.

As a shock, the measure is eminently successful; for one boy hung himself and thereby shocked everybody, while a little girl who was sick with the measles was killed by the bath, and a young lady having contracted lung-fever by the same practice, she also died. This is "shocking" enough. To us the practice seems simply barbarous.

The Nova Scotian miller, James Barry, was well aware of the dangers of cold water. Along with a continuous supply of patent medicines, he tried water cure, pouring a teapot of water over his housekeeper's head. It helped her headache but he noted she "looked dull and stupid." Another time, he took a mouthful of cold water to cure a toothache; the pain left, but as the cold water warmed in his mouth it returned. After spending some time sipping cold water, he changed tactics and tried wine and camphor, which cured his dental problems but gave him a headache the next day. Taken internally, cold water posed grave problems. Suffering from pain in his thigh, Barry found that after taking a sip of water his teeth began to chatter, and, after barely making it home, he had to warm himself with tea, and put pain-killer on his legs. "I blame the cold water for the cause of my present trouble. Many a man has lost his life by a drink of cold water when they were warm and I came pretty near to losing mine." He suspected
that his blood had become warmed by a walk, fainting had caused it to congest around his heart, and the water caused an attack. "God be praised. I am here." Young Murdock Stewart, a fiddler, was not so lucky. He died after taking a drink of cold water when he was warm, "of course his inside would be inflamed, and of course he died."69

Athletes needed to learn how to use water carefully suggested an article in Newfoundland's Public Ledger. The article urged rising at a moderate hour, having a light breakfast, and then exercising. Oarsmen tended to neglect their health, said the writer, noting that they tended to their boats before they even thought about their bodies. They needed to cool down after wiping the refuse matter off their bodies. Some had been taught to jump into the water after a race. The shock of the cold water, though, would produce an unhealthy reaction. Several athletes had succumbed to this practise. An athlete, suggested the article, needed to cool down like a race horse. Common sense and temperance were what we required during athletic training.70

Water-cure, like physical culture and phrenology, graduated to being the therapeutic treatment of regular allopathic physicians. In their hands the techniques of water-cure were adopted and transformed, however, and the ideology of water-cure was discarded from its support for physical, mental and moral balance, from its concern for equality, and from its passion for safer and more humane
therapeutics in harmony with Nature. In the hands of its critics, water-cure and the other health reforms, were at once criticized, ridiculed, and degraded, and co-opted and transformed.

By mid-century allopathic doctors began to recognize their lack of therapeutic success and they increasingly turned to nature's cures. Even though scientific knowledge had advanced, the physician's chances of curing serious illness remained remote. Before allopaths could embrace the benefits of nature, though, they had to admit their frequent inability to cure. Heroic medicine did not decline immediately. This was a process that took place throughout the last half of the 19th century. For a time, the theory of heroic medicine was replaced by therapeutic "nihilism." Antiphlogistic practices, or anti-inflammatory treatment, aimed at restoring the body's balance by massive purging or bloodletting. It gave way to what in Germany was called nihilismus, or in France, the "expectant" treatment, or, letting the disease run its course without the usual heroic intervention. But as John Harley Warner has pointed out, nihilismus was more of a myth than a reality. Letting Nature have its way might sound fine as a theoretical approach, but for a physician serious about his professional status, and for a family anxiously waiting for a loved one to recover, nihilismus, meant failure, both a failure to act, and a failure to cure. A doctor who did nothing, appeared far worse than one who actively tried to
check the progress of an illness, even if the eventual outcome was death. Often, as Paul Starr has claimed, physicians promoted the change to less violent medicaments as either scientific advances or due to the declining strength of patients. 71

At mid-century three things happened that caused physicians to re-think their therapeutic approach. First, was the recognition that their cure rate depended as much on luck as good doctoring. Second, physicians had begun to professionalize, forming medical societies, and agitating for legislative restrictions on the practice of medicine. Third, as a reaction to their inefficiency, and as a move towards their own professionalization, allopaths began to look at the competition and the value of the therapies offered by alternative medicine. They slowly acknowledged that there was some benefit in alternative medicine; at worse, unlike their own practices, therapy based on nature rarely harmed the patient. In 1869, for example, Dr. B. DeWitt Fraser, the President of the Nova Scotia Medical Society, saw the inability of physicians to cure. He noted that their remedies were inert at best; they were palliatives and gave comfort but could not cure. Despite this, he felt that there was a moral and physical need for the medical profession, "giving confidence, tranquillity, and hope to the disabling and enfeebled mind and comfort to the wasting body." In Nova Scotia, he regretted that there was a great deal of quackery. There was a cancer
doctor who treated moles and enlarged glands just the same as malignant cancer, who was visited by hundreds, there were bonesetters, "the seventh sons of seventh sons," who took over cases after the regular doctor set the fractures, and there were Indian doctors who even the Indians would not trust, as well as itinerant eye doctors. For some doctors, such quackery was "a vent for people who would have otherwise have to be confined in asylums at a great expense to the public."72

In order to challenge health reformers and interlopers in the medical field, medical doctors began to both denigrate and expropriate their ideas. They began to extol the concept of temperance: in eating and drinking, in organic functions, and in the indulgence of alcoholic beverages. They began to praise the virtues of hygiene and sanitation. Allopaths continued their heroic treatments, and, at the same time, reacting to the challenge from the alternative fashion, they slowly incorporated nature's remedies of fresh air, clean water, proper diet and exercise into their therapeutic kitbag. Over the last half of the 19th century, for example, water became an allopathic remedy. Even Hippocrates used water therapy, said Dr. R. F. MacFarlane in 1892 in an article on the "Theory and Practise of Hydrotherapy." Still despite these scientific origins, he claimed it rarely was used in North America. Hydrotherapy, he noted, was based on the curative effects of nature; while medicines could still be
used, they were often abstained from in order to let nature win. He added that air, water, diet, and exercises also helped to preserve health. People needed to drink water, but they also needed external applications, which would bring on a feeling of strength and exhilaration, as well as increase the number of blood cells, improve circulation, maintain an appropriate body temperature, and help nervous conditions. Dr. James K. King emphasized the use of water in *The Alienist and Neurologist*. The person who was nervous, dyspeptic, constipated, sallow, had a bad taste in the mouth, who suffered from headaches, insomnia, depression, and who was thin, and hungry looking, as well as being occupied "in disposing of relatives," needed to drink more water. "I will prove to you," said Dr. King, "that such a man is a deficient water drinker." Those who slept well, and dreamed only of "angels and banquets," he felt, were good water drinkers.  

In 1874, in his Presidential address to the Nova Scotia Medical Society, Dr. R. S. Black noted that science was making progress in medicine and the physician must take care not to stand still. He noted the decline in bloodletting, but suggested doctors had swung too far in the opposite direction. Still he noted the value of cold baths in lowering the temperature, but he cautioned, that unfortunately, the treatment was used by charlatans. He hoped that "the Profession will not abandon it to the Pretenders." Many heard the call. As one New Brunswick doctor argued in 1896, "water
is the only remedy which has stood the test of time." He used it to cure typhoid, and scarletina; another suggested that the people of St. John were becoming "alive to the advantages of cold water treatment, but there was considerable prejudice to overcome yet." Some of that opposition came from their colleagues. One doctor argued that merely reducing the body temperature did not mean a patient was cured. Another argued that in his 25 years of experience, there had been no advance in pneumonia treatment; he had had favourable results with expectant treatment, in which he combatted symptoms as they developed. Dr. Clara Olding of New Brunswick, felt that rather than treating insomnia with opium and bromides, physicians should use baths, gradually heating the water to a very high temperature. If that failed, hot compasses could be applied to the temple, milkshakes with brandy, beer, and pure air in the bedrooms were considered good sleep inducers.74

By the turn-of-the-century doctors had incorporated sanitation and hygiene into their agenda. This, they felt, demonstrated their humanitarianism; after all, the prevention of disease meant fewer patients; and thus, less money for them. In 1900, Edward Buffet, a New Jersey physician, combined the cures of nature and sanitation in an article in the Maritime Medical News. He noted most medical doctors over-estimated the value of medicines in curing disease. Quacks often took credit, he suggested for nature's cure. It was important for physicians to rely less on medicines and to
turn instead to the rules of hygiene. "Let the doctor of the future give more attention to the rules of sanitation, to the dietetic and hygienic treatment of his patient rather than so exclusively to the medicinal, to the diagnosis and progress of disease." A few years later, A. M. Morton, the president of the Nova Scotia Branch of the British Medical Association made a similar call to use less medicine and to pay more attention to hygienic matters. Noting that "an ounce of prevention was worth a pound of cure," he suggested that in the future disease would be an exception. Medical doctors would spend their efforts on regulating the living conditions of the healthy and vigorous. 75 The creed that enveloped and supported the health reform system gradually was forgotten by the close of the century:

We labor for the Physical Regeneration of the Race, well knowing that only through this can we successfully promote the Intellectual and Moral Elevation of our fellow-men. Health of Body and Health of Mind and Heart are so intimately connected that while the former is wanting, we despair of the latter. 76

The allopathic physician whose training, whose professionalization, whose antipathy to and co-option of health reform ideologies, had hindered the movement to establish a harmonious balance in the physical body and the social body, would in the 20th century emerge victorious.
Notes


2. Two recent books are valuable discussions on hydrotherapy, the water-cure facilities and techniques especially as these were concerned with women. Cayleff, Wash and Be Healed; Jane B. Donegan, "Hydropathic Highway to Health." Women and Water-cure in Antebellum America, Contributions in Medical Studies, No. 17, (Westport, Connecticut:1986).


4. Ibid.


7. [H.C.R.], [H. Clifford Reed], "Cascadilla Chronicle, 1863-1869." Typescript manuscript. Unpaged with appendices [c. 1948] Department of Manuscripts and University Archives, Cornell Universities Libraries, #1317. The body and appendices of this manuscript include copies of several letters held in Cornell's papers which are held also at the Cornell Library. At the time of my visit this collection was closed due to library cataloguing. The Clifton Springs Water Cure was run by a Henry Foster, former house physician at the New
Graefenberg Water Cure and editor of the New Graefenberg Water Cure Reporter. Donegan, Hydropathic Highway, pp. 50, 188, 190. My thanks to the librarians at Cornell University for drawing my attention to this manuscript. Samantha Nivison, Frank R. Nivison, Typescript of Information received, R. Nivison (no date), Department of Manuscripts and University Archives, Cornell University, Samantha Nivison file #2774M; Samantha Nivison, "Cascadilla Place, An Institution for the Treatment of the sick, and the education of females as physicians and nurses." Ibid; "Charter of Cascadilla Place" - Chapter 367 Laws of New York, Ibid.

8. [Reed], "Cascadilla Chronicles."

9. Ibid.

10. Ibid.

11. Ibid., Nivison, F., Typescript; Nivison, S., "Cascadilla Place."


14. John B. Orton, Forest City Water Cure, (photocopies) Department of Manuscripts and University Archives, Cornell University Archives #1760 [Originals held at New York State Historical Association, Cooperstown, New York]. This collection consists of Orton's diary 1 April to 20 April 1857 while he was at the cure, and "Regulations of Forest City Water Cure," 1850. See also Donegan, Hydropathic Highway, pp. 46, 141, 190; Cayleff, "Wash and Be Healed," p. 92.

15. Gross - Snow Papers, Department of Manuscripts and University Archives, Cornell University, #882M. Letters from Joseph J. to Dear Brother, 4 November 1861; Dear Brother J. R. Gross, 11 February 1863; Dear Brother from J. R. G., 6 April 1863; Dear Brother from Joe, 3 May 1863; Dear Brother from Joseph, 20 July 1863.

2. I am grateful to Myra Glen of Elmira College for the discussion about her work on Thomas Beecher.


22. Jackson, *Flesh as Food*, pp. 4-8, 13, 18, Jackson summed up the benefits of vegetarianism:
   1. Vegetarianism excludes poisonous foods.
   2. It is therefore more favorable to health.
   3. It promotes longevity and physical beauty.
   4. It insures physical growth.
   5. It gives superior physical strength.
   6. It aids to clear intellection, and develops genius.
   7. It promotes purity.
   8. It is favorable to high esthetic culture.
   9. It is a grand preparative for the in-flowing of divine wisdom to the soul.
   10. And therefore is a noble auxiliary to Christianity.
   11. And in days to come is to have a marked influence on the question of human redemption.
   12. By it will men and women become strong, single-eyed, of grand aspiration and intrinsic worth.


24. William A. Alcott, Lectures on Life and Health; or, The Laws and Means of Physical Culture, (Boston: 1853). The reference to New Brunswick is on pp. 375-6. Wm. A. Alcott, Vegetable Diet: as Sanctioned by Medical Men and By Experience in all Ages including a System of Vegetable Cookery, (New York: 1849); William A Alcott, Vegetable Diet Defended, (London: 1844); W.A. Alcott, The Home-Book of Life and Health; or, The Laws and Means of Physical Culture adapted to Practical Use, (Boston: 1858); Dio Lewis, Our Digestion; or My Jolly Friend's Secret, (Philadelphia and Boston: 1872); Horace Fletcher, Nature's Food Filter or When and What to Swallow, (New York: 1879); Gustave Schlickeysen, Fruit and Bread. A Scientific Diet, Trans. M.L. Holbrook, (New York: 1877). Benjamin Franklin was an even earlier convert to vegetarianism, although it was not (a part of) his lifestyle for long. See Benjamin Franklin: The Autobiography and Other Writings, L. Jesse Lemisch, ed., (New York: 1961), pp. 29-30, 48-49.

25. "To Correspondents," WCJ, XXV:6 (June 1, 1858), p. 91.


27. "Cake and Bread," Ibid., VII:2 (February 1849), p. 41. This poem was translated from the German.

28. Ibid.


30. James C. Jackson, Drinking and Its Prevention; Drunkenness and Its Cure (London and Manchester: 1883), pp 3-16. This pamphlet consists of a lecture given at the Home on a Hillside and to the Annual Conferences of the Vegetarian Society held at Norwich and Manchester, May 1883.

31. James C. Jackson, Dancing, pp. 3-23.

32. James C. Jackson, "The Curse" Lifted or Maternity Made Easy, (Dansville; 1885), pp. 3-24, esp. pp. 4-5.


35. "At the Glengarry Mineral Springs," Cape Breton Magazine, No. 28, pp. 31-35, inside cover. Thanks to Alan Carr for bringing this article to my attention.

36. Ball, Harold A., "Spa Springs Once Noted Resort," [1960]. Public Archives of Nova Scotia, [hereafter PANS], MG 100 V.246 #18a; Wilmot Springs Register, PANS MG 470 No. 159. Along with the signatures and comments of some of the guests, this register contains an early history of the springs written by Rev. G. Robertson, rector of Wilmot about 1832; he also transcribed some testimonial letters. "Notes on water content," PANS MG 100 V.246 #20c; Morning Herald, (Halifax), 26 May 1887. This source credits a Dr. Sinclair for promoting the springs and occasionally using it in his practise. Webster's analysis: 5.22g of carbonate of soda, 1.6g carbonate of lime, 0.92g carbonate of magnesia, 0.62g carbonate of iron, 2.55g codine, 2.896g sulphite of soda. Ball, "Spa Springs."

37. Wilmot Spa Springs, PANS MG 100 V. 246 #20d; "Wilmot Springs Register;" Ball, "Spa Springs," "Spadeau," pamphlet MG 100 266 #20d; Morning Herald, 24 August 1891; Nova Scotia Royal Gazette, 13 August 1831.


41. Ball, "Spa Springs;" clipping, Halifax Herald, PANS MG 100 V.246 #18c; "Wilmot Springs Register;" "Spadeau;" J.B. King, "How Cap'n Jake Ran Good Ship, 'Spa Springs'," Halifax Herald, RG 28 "5" Vol.2 #22. Morning Herald, 26 May 1887, 24 August 1891; Nova Scotian, 4 June 1887; Morning Chronicle, 7 January 1887;

42. King, "Cap'n Jake."

43. Ball, "Spa Springs;" "Wilmot Springs Register;" "Spadeau," King, "Cap'n Jake") Morning Herald, 26 May 1887; 24 August 1891; Nova Scotian; 4 June 1887; Morning Chronicle, 7 January 1889.

44. "Spadeau."

45. "Wilmot Springs Register."

46. Nova Scotian, 4 June 1887; 20 March 1889, Morning Herald, 26 May 1887, 24 August 1891, 9 March 1901; [King, "Capt'n Jake"; Blakely, "Spa Springs;"] Ball, "Spa Springs"; clipping, PANS MG 100 V246 #18c; "Spadeau," Chronicle Herald, Halifax, 18 August 1958, PANS MG 18"5" Vol. 2 #19. Visitors were still signing the register up to 1905. The results of Dawson's test were: Lime 55.15 gr., Magnesia 1.70 gr., Mixed alkalis (soda and potash) 6.11 gr., Sulphoric acid ((sulphate) 80.72 gr., Silica (soluble) 0.54 gr., Chlorine (as chlorides) 1.49 gr., Iodine very marked, Carbonic acid (trace), Organic matter (trace), Hydro sulpheric (in mud). Source: Morning Herald, 24 August 1891.

47. King, "Cap'n Jake;" King, "Hangover Cure," Chronicle Herald., PANS RG28"5" Vol. 2 #19; Morning Herald, 9 March 1901, 24 August 1897. Officers of the new company were: J. R. Hall, President; L. Dev. Chipman, B. Webster, M. P. P., T. P. Calkin, B. H. Dodge, P. Andrews (one time M.P.P.); James Stewart, Managing Director; J. W. King, Secretary, George Smith, Commercial Traveller; W. W. Hanson, Superintendent of Factory. Stockholders included Judge Chipman, B. H. Calkin, Dr. Webster, W. P. Shaffer, R. L. Borden, (later Prime Minister) G. C. Miller, A. J. Sponagle. Note the combination of medical doctors and politicians. Morning Herald, 24 August 1891.

49. Quoted in Blakely, "Spa Springs."

50. "Several Cases of Satisfaction," pamphlet, Clinton Lithia Springs Company, Department of Manuscripts and University Archives, Cornell University, #1407m; Clinton Lithia Natural Spring Waters, Advertisement. [1896], Ibid., "Water Reports," W.B. Booth, 29 April 1910; Henry N. Jones, 12 December 1914, Booth Apparatus Company, 8 September 1908, Jones, no date, Henry Jones, 1 January 1916, George Trowbridge, no date; letter Dear Charles [possibly C.B. Cory, Proprietor], from Myron 29 September 1915. The latter makes reference to the cows and notes that while the mineral wells were safe, the wash water was not. Ibid.

51. Saratoga County Heritage, Violet B. Dunn (ed.), (Saratoga: 1974), pp. 540-554. Thanks to Ralph Pastore for drawing my attention to this source.


54. M.P.U., "Topics of the Month", Ibid., XVIII:3 (March 1859), p. 43. "Down East" is not identified but since the writer refers to British publications quite likely the letter originated in Maritime Canada. In announcing the 1858 tour of the Maritime Provinces by phrenologist, Lorenzo Fowler, the Journal praised the "attentive readers and liberal patrons of our publications," and congratulate[d] our "down east" friends on this treat. "Library Notices," Ibid., XXVI:2 (August 1858).


the Chemung County Historical Society, he mentioned that his parents had been supporters of watercure. He recalled at the turn of the century being taken to a German hydropath for treatment of a carbuncle. A regular doctor wished to lance the carbuncle; his parents refused and the hydropath treated it with steam. Hilbert's father also built a steam bath to treat the family. This was a wooden cane-bottomed chair surrounded by an iron frame covered with blankets. An oil stove with a flat-bottomed pan of water made the steam. This made the patient very weak and they would be carried to a plunge bath or shower. I am grateful to Mr. Hibbert, and others at the museum for both the conversations and the assistance. See also Dr. William D. Bush, "Water Cure in Home Practice," WCI, XIX:4 (April 1855), pp. 76-7.


60. Mary A. Livermore, "Introduction," G. L. Austin, Perils of American Women or A Doctor's Talk with Maiden, Wife, and Mother, (Boston, 1883), n.p.


64. "A Fraternal Epistle," Ibid., XV:6 (June 1853), pp. 122-125. This was an open letter to Jackson's brother, Giles.


immediately after the menstrual cycle - was wrong. *Ibid.*, p. 64.


68. "Cold Water Baths in Education," Scrapbook, Willard Asylum, Department of Libraries and University Archives, Cornell University, #3475.

69. James Barry, Diary, PANS, Reel #1, 1849-1863, 8 July 1849, 4 October 1850, [May] 1856, 23 May 1857, 30 December 1857.

70. *PL*, 7 December 1877.


CHAPTER FIVE:
Re-Creation Through Recreation:
Physical Activity and the Regeneration of Society

A sound mind in a sound body is a short but full description of a happy state in this world. He that hath these hath little more to wish for and he that wants either of them would be but little the better for anything else.

- John Locke

In 1880, Ohio Congregational clergyman Hiram C. Haydn won a $500 prize for an essay designed "to counteract .... worldly influences." His subject was modern amusements, an important topic in Victorian North America, since "men are actually more alert to the question how to be amused than how to be saved." In the essay Haydn noted the importance of recreation to the "health of body and soul, this harmonious development of all the human powers, and this wise adjustment to the world in which we are to live." Like many others in the late nineteenth century, he believed a careful balance between moral, mental and physical activities needed to be attained in work, rest and leisure. Despite his approval of some amusements, needed to fulfill that mandate of harmonious balance, Haydn argued that "discretion" - not "dissipation" - was needed. As a result some activities were taboo, and others were unsafe or immoral unless in moderation or supervised. To be more precise, they needed to "re-create." The regeneration of the individual and of society depended upon it. Haydn emphasized:

Amusements to be lawful must recreate. If they push the jaded body still further down the decliv-
ity of exhaustion, if they keep up the tension of the mind and sensibility, if they excite and at the same time exhaust what is left of bodily and spiritual vigor, then they do not recreate - they are the occasion of a hurtful dissipation.¹

Haydn's ideas and ideals were hardly unique; in fact, they were shared by many Victorians who believed that society was degenerating. Industrialization had brought ever-increasing prosperity to some, delivered the gospel of consumerism to all, and rang the death-knell of poverty and over-work for others. Smokestacks belched thick columns of smoke into air already poisoned with the miasma arising from rotting garbage and sewage which spilled onto dusty streets and which clung to the skirts of fashionable ladies. Despite increasing numbers of physicians, their lack of therapeutic knowledge permitted their patients to weaken and die from dysentery, smallpox, phthisis (tuberculosis), and venereal diseases. Reformers vainly tried to stem the tide against drunkenness and disorder. Increasingly it became clear that that one-time goal, spiritual salvation, was meaningless in the face of modern capitalism. The millennium, heralded so brightly in the 1830s, no longer beckoned. For most people, the hope for regeneration was no longer spiritual; it was physical. The search for salvation became a search for Health. And the religion of Health became paramount as Victorians recognized their brothers and sisters and mothers and fathers among the unrepentant.

While individual and social deterioration were spiralling, however, Victorians took comfort that there was a
chance for regeneration. It would commence, however, not at the public level or in the spiritual arena, but at the personal and physical level. Society would be regenerated individual by individual. They would be given a second chance to achieve the perfection offered in the Garden of Eden and denied to them because of immoral and intemperate lifestyles. Physical perfection would be encouraged through exercise programmes and through athletic games. First, the individual body would be re-created; then, society. And it all would be achieved through specific forms of recreation: exercise programs and athletic events that would restore the physical and social equilibrium.

This chapter will examine the fears of degeneration in Atlantic Canada and the Northeastern United States. It will consider the types of physical exercise that reformers advocated, and how individuals participated in their own recreation. Most health reformers, from hydropaths, to phrenologists, to physical education specialists, advocated exercise as a way to maintain and restore the natural tri-partite balance of physical, mental and moral powers. Still, despite their support for recreation, there were major disagreements over what type of activities would regenerate the body. At the same time, health reformers argued that regeneration on an individual level would aid in the less tangible re-creation of society and the establishment of social harmony.
This concept of regeneration has been often discussed in the national context or in a more spiritual context. Ramsay Cook, for example, has explored the religious and intellectual connotations of regeneration in Canada. Certainly many believed that there was a role for the church and religion in stemming the degeneration of humankind and the poverty of health among the people. The popular Rev. DeWitt Talmage attacked vice and degeneration in the streets of New York City and the lack of attention to the issue when he roared in 1878:

"Send missionaries to Afghanistan if you will but send them also to Houston street, to Greene Street, and to Mercer Street [sic]. Send quilted coverlets to Central Africa to keep the natives warm in the summer time, if you must; send ice-cream coolers to the heathen of Greenland, but let us have as well some practical charity at home."

Similarly, Robert Nye has discussed the concept of degeneration in France. Despite the national context which Nye has illuminated, however, fear of degeneration was a common theme as people struggled to achieve a tri-partite balance of their mental, moral and physical states. For many Victorians, degeneracy on the individual level and on the social level, and its resultant imbalances, could only be countered by recreation through recreation.

In recent years leisure and sports historians have broadened their exploration of the relationship between recreation and society. At times, this approach has meant an intense study of a specific sport and how it is a reflection of broader social change. Each work makes its own contribut-
ion; earlier monographs for example, have offered regional and chronological explorations in sporting history. More recent works have added analytical sophistication and improved historiographical techniques. For example, Kathy Peiss and Roy Rozenzweig have explored the leisure activities of working-class men and women, while Donald Mrozek, Stephanie Twin, Cindy Hines, and Alan Metcalfe have contributed to our knowledge of middle-class men and women and their participation in sporting activities.

A study of a particular class or a specific recreation, while valuable, fails to consider the inter-class linkages and conflicts more visible in a broader study. Middle-class and working-class men and women often participated in the same activity although not always at the same time, or on the same field, or for the same reasons. What was common to all potential athletes was that they were cajoled by health reformers into participating in re-creating their bodies through recreation. Not all, of course, took part because of health reformers' predictions, but they did have to confront, at some level, the aspirations and fears of a multitude of reformers who hoped and expected that individual and social harmony could be restored by recreation and physical exercises. At the same time, however, as these reformers praised the value of recreation, they offered contradictory warnings about excessive, immoral, or improper exercise. If exercise and sport could build and re-create the body, they also
carried the seeds for potential decline. Just as the regenerating effects of good health through physical culture could rebound onto society as a whole, so could the degeneration. By the turn of the century the concerns about the debilitating effects of exercise became paramount. While the benefits were still stressed, more and more often attempts would be made to regulate the activity, for example, through monitoring by physicians or through new scientific recreation and measurements. The most turn-of-the-century fitness specialists could hope for was to strengthen and protect female reproductive organs, to avoid excessive competition and professionalization, and to uplift working-class and immigrant men and women. As the fear of bodily and social degeneracy grew, the potential positive results of physical activity lessened, and the possibility of social harmony dimmed. The notion of recreating the body and society through recreation would be lost in the twentieth century.

At mid-century, however, health reformers were convinced of the regenerating benefits of recreation and the concurrent need to stem degeneration. It was the degeneration of women that was perhaps most visible. Health reformers found this ironic. Committed to an ideology of gender equality, they believed that Victorian womanhood should be at the pinnacle of good health. According to James C. Jackson, a well-known hydropath at the Home on the Hillside cure in Dansville, New York, the women of America should display "a new or original
type of womanhood." Yet, sadly that ideal was never reached. Jackson claimed there were a number of reasons that kept women from reaching physical, mental and moral perfection. One was that she was not free. Jackson felt that it was wrong that only one-half the population benefitted from liberty and suffrage. He felt that it was unjust to expect women to conform to laws when she was denied a role in making them. In his book, American Womanhood: Its Peculiarities and Necessities, Jackson argued that women had been debased throughout history:

The Greek woman was a brood-mare, the Roman matron a suckling she-wolf, the Jewish matron a human slave. They serve, however, as staple samples of the womanhood by which the American woman is habitually invited to adjust her own, and for not doing which she is severely criticized . . . .

Jackson acknowledged that there were a number of reasons for this deterioration: unhealthy food, dress, constrained locomotion, confinement in houses, too-frequent childbearing, climate and alcohol. He suggested that a major cause of degeneration was that women had neither access to "handicraft labor" or the vote. Domestic work did not allow women to develop in a healthful and symmetrical way, and both public opinion and the state refused her the "right to select and follow mechanical pursuits," forcing her into a lifestyle that hindered her movement and her advancement. As a result "she has gradually developed a form of body motion . . . the like of which neither Science nor History makes mention."
While a lack of political freedom was one reason for the physical deterioration of women, it was hardly the only one. Fashion trends also were responsible for women's inferior and unhealthy bodies. Previously women's poor health had been considered their lot in life. Now health reformers believed otherwise. Nature intended women to be physically fit; it was ignorance of nature's laws that caused disease and poor health. Yet fashion was more than the result of woman's vanity, and it involved more than a lack of adherence to nature's laws. Fashion was both the embodiment and symbol of women's inferiority. Just as society dictated the importance of the reproductive organs to women, the inferiority of her body, and the restricted mobility in woman's public lives, fashion emphasized her sexuality and reproductive abilities, conspired to maintain her ill-health and to limit her movement. This symbolism was not unnoticed; hydropath James Jackson claimed that it was impossible for women to gain equality if they continued to wear symbols of inferiority. He argued:

Forms have wonderful power. They incorporate, under certain circumstances, into themselves intense significance; and if there be a necessity for changing conditions which the forms illustrate, represent, and make common to human consciousness, it is of fundamental importance that in attempting to change such conditions, the forms whereby these are represented should first be changed.

Jackson stressed the importance of symbolism and suggested that new ones could be invented to liberate womankind. If men stopped the "farce" of shaving, he suggested, the beard would
determine the gender, and both adult women and men could dress alike. As it was, though, fashion caused not only debility, but death. In particular, Jackson condemned hair styles that put pressure on the brain, head dress that disturbed the circulation, tight waists that caused stomach and reproductive problems, and upper clothing that compressed and deformed the lungs. Women's wearing apparel had to change. "I know it is said that the difference between men and women is such to justify a difference in style of dress . . . [but] it does not follow that in order to make the difference readily perceptible, woman's dress needs to be unphysiological." 7

If Jackson felt that clothing hindered women by denying them freedom of movement, and that fashion was both unhealthy and unhygienic, his analysis went deeper. Woman's dress kept her from labouring along side of men. Woman had no freedom of movement, and no political freedom, and, because of their dress, no economic freedom, and, they were offered only ill-health. Jackson did not believe that economic freedom would come by a movement by women into the professions or business, but by their entry into skilled trades.

Skilled labor in America is coming to be supreme ruler. It is rising in dignity and, of consequence, in importance, yearly. I can remember when a farmer was despised, and a mechanic was a clod-pate, when manual labor was degrading, and the "upper crust" in society was the class of consumers. That day in this country went to its setting with American Slavery. It was a period, when it culminated, of great degradation, wherein labor suffered untold cruelties and honest industry underwent martyrdom; for he who earned his bread was less respected than he who cheated for it. But
liberty helped labor, and labor rewarded liberty; and now and forevermore in this Republic they travel hand in hand. If women are to be henceforth the representatives of labor, they must take service under liberty. If they are to become skillful in work, they must be free to work, or else to them will be committed the least important and least remunerative employments. If, however, one may justly complain of their half manacled hands, what criticism or reproof is too sharp or too severe on their voluntarily enfettered legs?

This support for the dignity and respectability of the working-class and for women's rights and equality was common to health reformers although Jackson probably took his analysis of fashion further than other reformers. Patients at his health resort often wore the American Costume. This was a short-skirted, loose dress made of seasonable fabric that was worn without heavy undergarments and with pantaloons. Dr. Harriet Austin, Jackson's associate and adopted daughter, promoted this dress. In 1868 she noted that since its introduction in 1849 or 1850 hundreds of women in the United States and Canada had adopted the costume. Articles and commentaries on the unhygienic nature of fashion abounded. But women found that challenging the conventional dress took both commitment and thick skin. They faced rejection, humiliation, and abuse in their quest for less-restrictive clothing and better health. To illustrate the difficulty women faced because of their choice of dress, "Mattie" parodied:

To breathe, or not to breathe; that is the question
Whether 'tis nobler in the mind to suffer
The strings and arrows of outrageous fashion,
Or to bear the scoffs and ridicule of those
Who despise the Bloomer dresses.

To breathe - perchance to gasp; ay, there's the rub,-
For in the Bloomer dress what comforts come
When we have shuffled off the tight-made dress,
Must give us ease . . .

This ridicule does make cowards of them all;
And so the natural hue of countenance
Is sicklied o'er with the pale cast of disease;
To good advice pay no regard. And thus
They lose the bliss of health.11

If wearing apparel was one of the causes of degeneracy, it was hardly the only one. Many considered the lack of temperance and the proliferation of rum-shops and grog shops to be responsible not only for the unhealthy condition of the ever-present drunkard, but for the ruination of homes and families. One response to the seeming endless supply of liquor and saloons was some form of coffee shop, which combined temperance and dieting ideologies. Every town seemed to have one. In 1851 in St. John's, Newfoundland, for instance, Mr. H. Smith established a Temperance Coffee House on Duckworth Street near a local reading room. At the time it was felt that this would be beneficial to the mercantile men who were in Newfoundland only for a short period of time. The original plan had been to establish a lodging house much like those in the United States, but the necessary financial arrangements had not been acceptable so Smith had established a smaller place adjoining his personal residence.12

Smith was not alone in his attempts to open a St. John's coffeehouse. In 1877 a number of temperance women decided to
open an establishment in that city where drinking, poverty, and sailors seemed to share common bonds. At this shop men paid two pence for a cup of coffee and a slice of bread. "It may be the means of doing good to some of those poor people who for the sake of keeping body and soul together with a little stimulant, have no other resource but the rum-shop." It took about a year to establish, but the Ladies Temperance Union collected about £50 and opened a shop on Market House Hill. Despite the inconvenience of its second-floor location, hundreds of seamen and out-harbour men ate a frugal meal at low prices. A second facility soon was planned for the rooms under the YMCA and in just over two years this second eatery, the Newfoundland Temperance Eating Saloon and Coffee House, opened, offering dinner for fifty cents. At its opening the temperance spokesperson, the Hon. J. J. Rogerson spoke on the need for good nutrition and healthy habits for the labourer, to sustain him in his toil and to keep him from patronizing the grog-shops. Rev. Mr. McNeil mentioned the need for nourishment, not liquor, and announced that the success of the first coffee house demonstrated the need for a third eatery, which would open soon and be operated as a joint-stock company. Citing the success of similar ventures in the United States, Scotland, and England - London alone had 14 crowded ventures - McNeil explained the importance of conducting the business on sound business principles rather than "on the spasmodic benevolence of philanthropists." The Newfoundland
Temperance Eating Saloon and Coffee House was soon doing a "rushing business" with large crowds each day. It was "A public house without the drink, where men can sit, talk, read and think, then safely home return." The Public Ledger even suggested that it be opened on Sunday for the benefit of outport people. Fishermen would have more time to eat a hearty meal on that day. This would not be a violation of the Sabbath, the newspaper suggested, but rather would "do good to the class whose wants these Eating Saloons have been established to supply."13

Better quality and more nutritious food would help the poor lessen the craving for liquor. Furthermore, such establishments could counter the influence of saloons which often lured in and held customers with free or cheap food. In Boston, for example, saloons were required to serve a free lunch. Another bar in Chicago would give away $30 to $40 worth of frankfurters, clams, eggs, sandwiches, vegetables, cheeses and bread daily. An article from Christian World noted "Coffee palaces and brown-bread vans in every street would be the greatest foes to drunkenness and the best helps to sobriety that the labouring man could have."14 Sober well-nourished people would have much to contribute in the recreation and regeneration of physical and social harmony.

While regeneration through sobriety was an idea that garnered much support in Victorian North America, there was also fear that some people would fall victim to excessive or
inappropriate leisure time. That would disrupt the delicate balance of mental, physical and moral faculties, a tri-partite balance that was of prime importance to physicians, health reformers and recreational promoters. Newfoundland winters, when the fishery had slackened off, were seen as "always a time of danger." The heavy labour of the summer was followed by a period of idleness, with few activities and entertainments beyond popular lectures or singing classes. There were complaints about boredom even during the summer. Said "Peripatetic," a Public Ledger columnist, "If some one would only be good enough to fall over Signal Hill, or get crushed in some machinery somewhere, or become "converted" to a new religion, or start some new scandal, he or she would confer an immense benefit upon society." Alternating between hard work and boredom "cannot but un hinge the mind and expose the inexperienced at least to the temptations difficult for them to resist, and the consequences of which are doubtless fatal in many instances." Furthermore, boredom often degenerated into lewd, belligerent, or rude behaviour. One public assembly was interrupted by "the beating of sticks, kicking of seats, furious stamping with the feet, hissing and whistling;" it appeared that the ruckus was caused by "young [gentlemen], who make it a practice to attend gatherings of this kind for the purpose of giving annoyance to respectable people. Such conduct would scarcely be tolerated if perpetuated by persons beneath the class of what is known as the respectable."
Boredom was not only the cause of rude disturbances but it could cause physical degeneracy as harmful to one’s health as overwork. As the *Public Ledger* noted:

This is the fast age. Many men live so fast they cannot live long. The grave opens and swallows them when they should be in the bloom of a strong manhood. Luxury in eating and drinking - luxury in play, recreations or amusements - this extravagant luxury or extreme indulgence in everything is what produces much of the excited nervousness and debauchery that weaken and kill our young men.

Appropriate mental and physical regeneration was needed, according to this article, to counter the degeneracy that appeared to threaten all classes of society in all areas of North America.¹⁶

Victorian health reformers promoted various forms of rational recreation to counteract this degeneration caused by fashion, by intemperance and by misused leisure time. Exercise programmes designed to re-create the body were commonplace in both the United States and Eastern Canada.¹⁷ Most were designed to build symmetrical bodies and to maintain or restore the natural tri-partite balance. Aimed at both men and women, they offered gender-based variations in types of exercise, degrees of difficulty, amount of exertion, and, perhaps most important, in the aims: strength and manliness for males, health and grace for females. Most physical culture programmes traced their origins back to Graeco-Roman beliefs about the human body. As commentator Thomas Denison Wood stated in 1910:
The Greek idea as developed by the Athenians represented a balanced conception and practical realization of the relation between the physical and other aspects of education which have not been equalled since that period. The aim of the Athenians was to develop a beautiful mind in a beautiful body.

Supporters of physical culture regimens were influenced so strongly by that model and by that ideology that they began almost every article or book on the subject with a tribute to this Graeco-Roman tradition and with a history of the early supporters of physical culture regimens from the late 18th century, to whom they were indebted also. Wood’s article, for instance, referred to more than 13 major contributors to the development of physical education in Europe. One of the most influential of those early teachers and gymnasts was Peter Ling (1776-1839), best known as the founder of Swedish Gymnastics, "the most precise system of movements and exercises which the world has known." Ling’s system was influential throughout North America, as his followers tried to retrieve the body from "its fallen and dilapidated state." Another important contributor was F. J. Jahn (1778-1852) of Germany who developed his system in order to strengthen German bodies, quite often through the use of apparatus. By the middle of the 19th century these systems were known in North America, and had discovered a new popularity. In addition to the more systematic exercises, an increased emphasis on outdoor sports developed. Most of these games originated in Britain, and while the various teams were often separated by
class, gender and racial differences, the structure of the games varied little. These two systems, German gymnastics, Swedish gymnastics, along with British athletics, were popular in the North American movement for re-creation.¹⁸

One of the most influential leaders in both the United States and Eastern Canada was Dr. Dioclesian (Dio) Lewis (1823-1886). Lewis not only popularized gymnastics, but he was instrumental in introducing them into the educational system and in making exercise programmes appealing and suitable for young women. Where Jahn’s exercises had a potential military application, and Ling concentrated on "military, pedagogical, medical, and aesthetic" benefits, Dio Lewis tried to improve the mind and body of both males and females. His was a unique contribution; while various systems had been initiated and imitated in North America, no one had gained a foothold. Lewis, whose family had farmed near Auburn, New York, left school at the age of 12 and laboured in factories until he began a career teaching school. Illness interrupted his teacher training, and he turned to medicine, studying under the Auburn State Prison physician, and at Harvard University. He began to practise medicine before he completed this course, and soon renounced allopathic methods in favour of homeopathy. By 1848 he had a practice in Buffalo, and was editor of The Homoeopathist. His only medical degree was an honourary one granted in 1851 by the Homeopathic Hospital College of Cleveland. He dedicated his life to two
causes, both dear to health reformers, the promotion of hygiene, a commitment stirred perhaps by his wife’s consumptive nature, and temperance, a long-time interest. Until mid-1860, Lewis spent most of his time lecturing on temperance, exercise, and hygiene in Canada, and in the middle and northern United States. Six of his weekly lectures would be on health; the seventh would be on women’s role in temperance work.19

Along with his lecturing, Lewis worked at designing a system of gymnastics appropriate for people who were in poor health. In June 1860 he settled in Boston, and opened a public gymnasium for men, women and children at 20 Essex Street and offered evening classes for men, women and children. By August of that year he had received recognition; the American Institute of Education invited him to address their 31st annual meeting. After his visit, and an inspection of his gymnasium, the Institute recommended the incorporation of the programme into the Boston common schools. The next year Lewis’s Normal Institute for Physical Education was incorporated with the mandate of instructing teachers in physical education. The first 10 week course began 5 July 1861; thereafter courses were given twice a year. By 1868 some 250 people, most of them women, had studied at the Normal Institute. Lewis would publish a number of works on his gymnastic system, but eventually he returned to the temperance lecture circuit.20
Despite the credit due Lewis, he was not the only person to promote physical culture. Even before his exercises for women appeared, reformer Catharine Beecher had written about the need for hygiene and had begun calisthenic classes in the Hartford Seminary. Hartvig Nissen, for another example, ran a "Swedish Health Institute" in Washington, D.C., where he taught a form of school exercises, designed by Ling and his son Halmar (1820-1886). In 1886 Nissen taught this regimen to students at Johns Hopkins University. At the World's Industrial and Cotton Centennial Exposition held in New Orleans 1884-85, Nissen was in charge of an exhibit of Swedish gymnastic equipment. So while Lewis was the primary, early supporter, he was neither the first nor the only advocate of exercise programmes.

In part due to Lewis's influence, Boston became a leader in integrating physical culture into the educational system. Parents, teachers, and physical educationalists were concerned over the apparent degeneration of young children and their over-taxed mental systems as modern civilization pushed them harder and harder. "Hard thankless task work which tears and frets the grey matter of the cerebrum" was not only dangerous, but had the potential of sapping "the mind of the strong man, and reducing him to the condition of an imbecile." By mid-century the people were beginning to realize that muscles and brains could co-exist; male students at Harvard University apparently had proven this with their good health
and average chest size of 38 inches. Lewis's belief that the health of the weaker members of society, especially women and children, could benefit from physical training spread. In Halifax, for example, James McKay used Lewis's work as a model for his own gymnasium on Sackville Street. At this gymnasium young men exercised to gain a symmetry of form and perfection of body that was denied to them in ordinary life. Even manual labor, cautioned McKay, failed to develop the body properly. One could not assume that hard work automatically would create a symmetrical body and achieve a tri-partite balance.23 Those who laboured in the fresh air might be healthy but they could not achieve the desired re-created body without the appropriate exercise routine.

If regular exercise was the solution to a poorly developed and unhealthy body, then gymnasiums ensured that at least some people had access to systematic gymnastic programmes. Gymnasiums contained a variety of apparatus and offered instruction, usually to boys and young men. While women sometimes were included, their role often was that of a spectator. That was an important job. For success a gymnasium needed to attract an audience that was both large and elite. The Albany Gymnasium in New York, for example, catered to such a "fashionable audience" in 1865, when it held its annual exhibition featuring an acrobatic display and demonstrations on the horizontal bar, peg post, ladders and parallel bars.24
While a gymnasium needed to have a reliable group of spectators, it also needed steady members to offer the numerous performances that ensured its survival. Abner S. Brady established one of the more successful gymnasiums, managing to attract both a regular group of athletes, from baseball players to military men, and the elite of Washington, D. C. as spectators. Col. W. T. C. Grower of the 17th New York Volunteers, a man with "muscles fully developed, and beautifully carved and adapted to gymnastics of all styles..." had tutored Brady in gymnastics. Formerly the proprietor of the Seventh Regiment Gymnasium in New York City, Brady, in 1863 at the government's behest, opened a new institution on Louisiana Street, Washington. At a reception in the early days of the gymnasium some 30 members took part in a gymnastic display involving dumbbell lifting, light exercises for women and children. Participating along side the members Brady showed his prowess holding himself by a ring suspended from the ceiling with one hand and lifting himself until his shoulder was parallel to his hand seven times. This was considered a remarkable display:

We may here remark, for the benefit of those profound philosophers who bewail the sad degeneracy of Americans, that a French gentleman who was present observed that in the "Gymnase Grist" of Paris, three times raising of the body in this way is the greatest number yet attained, and there are two thousand members in that scool [sic]. To persons who wish to understand the muscular effort required to perform this simple looking feat, we say, try it.
Brady closed off the demonstration by climbing the peg pole and lifting himself with one hand on the single ring. The exercise portion of the programme was followed by a "hop" for students and their male and female friends.25

By August 1865, with a membership of 700, Brady held a well-attended official opening for his "great institution." He not only operated the gymnasium, but also managed the billiard rooms, bowling rooms, chess and reading rooms, bathing conveniences, and gardens.26 Despite this auspicious beginning, by the next year Brady's Gymnasium was for sale. The New York Clipper claimed, "This would seem to be a chance to make a fortune." The gym was reported to be doing a good business, and while its cost was $7500, its cash price was $5000. Brady offered to remain in Washington and use his influence and name to help the new owner, and if necessary, he would continue to teach. Brady claimed that the only reason he was selling the gymnasium was that the billiard room and bowling alleys kept him so busy that he could not give his attention to the gymnasium.27 Brady maintained his position, however, through the next two years and continued to be the main attraction for his fashionable audience.28 At an 1866 performance he was credited as the instructor but at this time was unable to participate as he had dropped a revolver and accidentally shot himself in the leg a few days previous.29 Some months later a benefit for Brady was held at the National Theater. The large audience was treated to theatrical
performances and "Sports of the Greek Curriculum" demonstrated by 40 "finely formed and well developed gentlemen." While many of the regular gymnasts participated, and Brady did his famous body-raising exercise, no doubt the elite audience, consisting of members of the House, Senate, diplomatic corps and heads of departments, were interested in the 125 Indians in full war costume who "grunted ugh to show their appreciation." In mid-1867 several army officers stationed in Washington purchased Brady's gymnasium. Brady returned to New York City where he had received an appointment to a "responsible position" in the Custom House. During his proprietorship the gymnasium was supported by an elite audience; along with their attendance, the success of the gymnasium was no doubt due to loyalty of the gymnasts and Brady's connection with military men.¹⁰

Brady's Gymnasium, while more successful than many, had characteristics of other gymnasiums in Eastern North America. At almost the same time as Brady's students were exhibiting to the elite of Washington, the members of John Wood's Gymnasium at East 28th Street, New York, gave their first show of the new year. As in other gymnasiums, when the exhibition closed the floor was cleared and a dance was held. At another exhibition in 1867 Edward Russell, a champion club swinger, demonstrated the exercise's "manifold beauties, and [was] a living example of the beneficial effects resulting from continued practise with these constitution revolutionizers."
Like Brady’s operation this gymnasium remained popular for a number of years. In 1876, for example, William McClellan, the gymnasium’s assistant instructor in sparring, gave a complementary benefit at Masonic Hall. The performance included a fencing match and an Indian Club demonstration.\(^{31}\)

In Saint John, New Brunswick, athlete Fred A. Jones operated a gymnasium under similar circumstances. A large audience watched his third benefit exhibition. One of the highlights was a first for Saint John amateurs: a double trapeze act by Peter M. Sweeney and George Anderson. The next week the exhibition was repeated as a benefit for the students; this show was less successful as stormy weather kept many from attending. In order to make his gymnasium work, Jones had established a joint stock company with $4000 capital. Along with the gymnastic equipment the Saint John gymnasium had hot and cold bathing rooms, reading rooms, parlours, a sawdust running track and generally was considered to be a first class institution. Unfortunately by 1866 Jones had abandoned the institution due to a lack of spectators; his successor, Thomas Clifford had the same problem.\(^{32}\) It appeared that while people were interested in their own individual re-creation paying to watch others exercise was not rewarding, either to the spectators or the proprietors.

This early failure did not keep Jones from maintaining an interest in gymnastics. In 1881 the Saint John YMCA gymnasium held its formal opening. Leading in the gymnasts was coach
and master of ceremonies, Fred Jones. Well-known physician, LeBaron Botsford, who represented the growing alignment of doctors with the physical culture movement, gave the address. Botsford spoke of "the close connexion [sic] between the mind and the body, both of which can be developed only by training." In the bodies of Jones' students "there was not a muscle ... that was not, in some of the exercises, called into play, and it is only by every muscle acting with the other that grace and strength can be obtained." Botsford added that there was much more to this type of exercise; it improved health and digestion, and even "the headquarters of the American system" since "from want of physical exercise comes a want of mental power." Even more could be accrued, though. The gymnasium work would help "stamp on our young men a moral feeling which they would not otherwise have." Botsford advised the students to start with the elementary exercises before they tried the "wonderful." Following his speech which linked the harmonious development of the physical, mental and moral powers and their connection to the broader society, Botsford and the audience watched routines on the gymnastic equipment.33

Obviously to become a profitable business a gymnasium needed to attract both a large membership and a good crowd. Often in order to keep the audience happy, entertainment through spectacular and dangerous feats was needed, and this need could nullify the goals of the health reformers and
gymnasium workers. After all, an appropriate physical symmetry and a tri-partite harmony could hardly be developed if one over-exercised. Proponents of physical culture often were aware of that thin line between balance and under- or over-development. Thus, they were often quick to point to the allegedly unhealthy, immoral, and unhygienic regimens and conduct of others. Two Sunday school teachers who engaged in fisticuffs in a Chicago church, were sarcastically referred to as "exponents of muscular Christianity" even though they were not pugilists by trade and their display was not the example that health reformers would have liked. Mr. Barr, a gymnast who performed at a soiree gymnastique was criticized for his performance on the horizontal bar at the Philadelphia Concert Hall. He demonstrated "a daring bordering on recklessness," according to the New York Clipper. In order to please the spectators the boundary between proper and improper exercise sometimes had to be crossed, and thus, the good effects of recreation were nullified.

While exhibitions might attract both new members and a faithful audience, many gymnasium owners were also involved in physical education in schools and universities. This commitment to education played a number of roles. It integrated women and girls into the physical culture movement; it countered the possible effects of excessive intellectual work and it permitted the physical culturist to promote his or her ideas about the possible re-creation of society. For example,
James McKay taught physical education to classes of girls in the various Halifax schools culling ideas from Dio Lewis and the Boston Normal School of Gymnastics. McKay not only stressed the techniques of an exercise but he encouraged the maintenance of health and a tri-partite balance within the body.  

Many of the athletes involved in these exhibitions would use gymnasiuems as a means to an end: the development of healthy and symmetrical bodies. Sometimes, though, gymnasiuems and the exercises would be used to enhance an athlete’s performance in another field. Cleveland pitcher, Roddy Wallace, for example, set up a gymnasium in his home and invited other ball players to train with him. Willie McGill, a left-hander from Chicago and later Philadelphia, worked out in a gymnasium, apparently to rid himself of the effects of years and beers. Many felt his late commitment to personal regeneration was "not nearly enough to pull the stomach off him." Many health reformers published descriptions of home gymnasiuems that could be constructed easily and cheaply in private homes. Other gymnasts would make their livelihood out of their routines. The famous Hanlon Brothers, described as "refined, social, temperate gentlemen" were a case in point. The Hanlons, six in all, began to arrive in the United States from Britain in 1858 and made their first appearance in a circus under the management of James M. Nixon at Niblo’s Garden in New York City. They travelled to Philadelphia and
then to Boston where they performed at a circus managed by James Wilder. Following a tour of the country in 1860 they staged several performances again at Niblo's Garden. At one show Thomas did "L'ecole Perilleuse [sic]" an act that reportedly defied gravitation and human equilibrium. Several days later he injured his feet after a forty-foot fall. In 1862 two more brothers arrived and the Hanlons went to South America where they performed under the name of Lees Brothers. Upon their return to the United States they formed a company and made a major tour of the west and southwest. Thomas, the eldest and a professor of gymnastics, received praise for both his abilities and physique; he had "probably no living superior in this country, and few, if any equals." Younger brothers Freddy and Eddie, the New York Clipper noted, paid attention both to their mental and physical culture, rather than waste their time and energy in "unprofitable recreation."

There was always, however, difficulty in determining just what "profitable" recreation was. It had to re-create physically, morally, and mentally. Gymnastic exercises would help establish or maintain a balanced physiology; apparatus such as clubs helped gymnasts and athletes in their quest for re-creation. S. D. Kehoe, the inventor of clubs designed to improve the muscles, advertised his product as being especially good for sedentary people. Their use would be "to develop, strengthen and beautify the 'human form divine' and at the
same time add a few years to their [the user’s] thread of life." Kehoe’s biography demonstrates his commitment to his ideas and to his product. His family had emigrated from Ireland when he was three years of age. He worked at various trades, delivering telegraphs, folding papers and carrying mail in a newspaper office, and ringing the bell and later looking after the engine in a railyard. Around 1857 he began to sell dumbbells as a travelling salesman, a job that was enhanced by his friendship with several pugilists. Within a short period of time he had sold over 200 tons of dumbbells. Kehoe then travelled to England and Ireland where he viewed the mammoth clubs of Professor Harrison, regarded as the strongest man in England. Kehoe began to sell clubs of his own design after he returned to North America and within a short time he had racked up both tremendous sales and a good reputation. Kehoe relied heavily on advertising; and as well "if there is to be any great championship match, whether among oarsmen, pugilists, billiardists, turfmen, firemen, or what not, he sees to it that they are all well supplied in the club line, and when any athletic victory is gained, he insists that it was all owing to using his clubs." Kehoe let no possible sale elude him; and his "anti-consumptive, anti-bilious, anti-dyspeptic, and anti all the ills which flesh is heir to, promoters of physical strength and symmetrical form" could be found in most gymnasiums. A number of well-known sports figures gave testimony for Kehoe’s clubs: aquatic champion
James Hamill, billiards champion Dudley Kavanaugh and fighter, Joe Coburn, to name just a few. Kehoe himself, "armed with the insignia of his order" - a 12 pound club - could be found any day but Sunday either in Central Park or the Gold Market taking orders for his merchandise. No wonder the New York Clipper claimed he had a "method of doing business [that was] entirely original." Like all health reform regimens though, there had to be constant attention to maintaining that tri-partite balance throughout life’s activities. Kehoe, himself, the "King of Clubs," found that out when he was forced to take a lengthy stay in the country "for the benefit of his health, which had been impaired seriously by too great assiduity to business." 37

There were various types of clubs used in muscular development and the promotion of health. Selecting the appropriate style and type to reduce individual degeneracy was important. The New York Clipper commented in a special article on club exercise and muscular development, that "although at times certain sages and book worms have treated the matter [of physical exercise] lightly, and esteemed it of no account as compared with intellectual acquirement, its importance still remains manifest to the highest degree, particularly in times like the present...." The newspaper noted that their offices had received many letters enquiring about clubs, exercise and training. Clubs were "in many respects, the best addition to the gymnasium, and which are
now almost universally used by good trainers in developing the muscles of the arms and upper parts of the bodies of their pupils . . . ." Clubs came in many different sizes and weights so the student could begin with the smallest and lightest and progress as needed. Many were made with the bell of the club hollow, so that iron or wooden weights could be inserted. The clubs developed the upper two-thirds of the body; this encouraged symmetrical development since this was the area "requiring constant artificial practice, being naturally most exempted from exertion." The Clipper, which kept clubs in its office for interested readers to examine, offered several exercises for beginners. For example:

A club is held by the handle pendent on each side; that in the right hand is carried over the head and left shoulder, until it hangs perpendicularly on the right side of the spine; that in the left hand is carried over the former in exactly the opposite direction, until it hangs on the opposite side; holding both clubs still pendant, the hands are raised somewhat higher than the head; with the clubs in the same position, both arms are extended outward and backward; they are lastly dropped into the first position. All this is done slowly.

More intricate exercises were established for the advanced student. The use of clubs was not restricted solely to the professional gymnast, but rather it was beneficial to all those interested in re-creating their body. "Let us," said the Clipper, "advise dyspeptics, and those lacking muscle and strength in the arms, chest and shoulders, to provide themselves with clubs, and practice the lessons . . . until they are proficient, when we will guarantee that, the ills to which
they have been heir to in the parts indicated, will have been, to a great extent, if not wholly removed. 38

If gymnastics and exercise routines aided in re-creating male bodies, minds and souls they were also important for girls and women. Their tenuous hold on good health, constantly jeopardized by menstruation, a sedentary lifestyle, and unhygienic dress, could be strengthened by exercise regimens. Furthermore grace and a lady like posture could be achieved. One of the earliest publications on the subject of exercise was Minnie’s Playroom; or How to Practise Calisthenics. Published in 1862, this was an expository novel, aimed at young middle-class girls. Minnie’s father “knew that children require amusements; and, being able to afford it, he had fixed up [a] room for gymnastic exercises.” Incorporated into the story were the mechanics of exercise and descriptions of equipment.

"Pa, what are those funny things for?"
"They are to help you play CALISTHENICS. I will tell you their names and you will learn to use them hereafter. Here are the dumbbells . . . . This part is called the shaft . . . ."

The book stressed that the exercise program was “to strengthen the body, and to give grace to its movements.” While the story tried to emphasize that exercises were “real good fun,” it also tried to counter the belief that routines were boring by offering simple but appealing routines. The teacher “kept them drilling in what they had already learned. This was very proper and the girls made no objection. . . . Minnie thought
calisthenics were as pleasant as they were healthful." While this book was aimed at the middle-class girl whose problem was supposedly boredom and languor, reformers such as Dio Lewis tried to establish hygienic exercise routines in public schools and other institutions to counter the apparent fact that few women of any class had good health. All of these exercise programmes were designed to promote grace and an improved physical condition. In the attempt to re-create good health, care had to be taken to ensure that the young woman did not cause further degeneracy through excessive exercise.

Excessive gymnasium work and exercise for men was also not considered beneficial. Still, many tried to over-extend themselves and many others flocked to watch them do just that. Weight-lifting became a popular spectator sport. Charles O. Breed was an amateur weight lifter. Among other spectacular events, under the supervision of Prof. George A. Walker of the Lynn YMCA gymnasium, where he worked out, Breed lifted clear of the floor a safe weighing 1510 pounds. Charles Breed was 5 feet 10-1/2 inches in height, weighed 184 pounds, and had a natural chest measurement of 40-3/4 inches. Dr. George Windship was one of the most famous weight-lifters. He was constantly being challenged by competitors, such as Ambrose C. Butto, who once claimed to have "taken the sails out of" Windship. Butto credited his success to his balanced lifestyle: he ate plain simple food, with a limited variety at each meal, and he avoided both condiments and pork. He
emphasized vegetable food and milk, but admitted he "found it necessary a portion of the time to introduce solid animal food into my diet." His choice of meat was beefsteak, because of its high muscle content and the fact that it was "more readily distributed as such throughout the system." He claimed that this lifestyle permitted him to lift 2727 pounds and 2 ounces. The perils of such excessive exercise seemed clear when George Windship died at the early age of 42. While at one time he had been able to lift 3,000 pounds, his demonstrations of strength had not been appropriate exercise. Suggesting that the death was perhaps due to a derangement of his heart, the Phrenological Journal, a supporter of most types of exercise, noted that since athletes, fighters and champions often died young, it was clear that moderation in recreation was obviously the key to good health. As for Windship, "the unnaturalness of his system seems to have been shown by his early death. His muscular training was not harmonious in its results, as it gave him enormous shoulders and arms, while the lower part of his body was somewhat diminutive." Clearly Victorians were confronted with a contradiction. They needed to find an exercise that would re-create their body and establish a harmonious balance of mental, moral and physical faculties. Too much or too little could cause degeneration rather than re-creation.

If moderate physical activity aided in the restoration of the natural tri-partite balance, health reformers could never
quite agree on how much or even which exercise was best. It would become a fundamental truth that almost all recreation carried the taint of potential physical, mental, and moral abuse and degeneracy. Sports and athletic events brought even more contention than gymnastics. It appeared that sport was particularly open to abuse through either excesses or through immoral associations. Despite the discussions and discouragement that swirled around their chosen activity, athletes were well aware of the controversy and continued in their quest for both recreation and re-creation. With the rise of competition and professionalism at the end of the century harmonious development appeared even more elusive than before.

In his award-winning essay, the Rev. Haydn was as much concerned about the moral dangers of inappropriate exercise as he was about the physical threat. Sports and exercises were scrutinized for their abilities to re-create morals as well as health. Again, there was never a consensus as to which programs or sports were beneficial. The benefits of billiards, for example, were often debated. Haydn felt they could lead to evil; others disagreed. The argument revolved around the purported healthful blessings or detriments of the recreation. In an article in the New York Clipper, which endorsed billiards as a healthful activity, a Dr. Marcy discussed first the need for re-creation and recreation, and then the use of billiards as a prescription to remedy individual and social degeneration. Marcy first noted that "Nothing
contributes more to the physical, moral, and intellectual
development and healthfulness of a community than suitable
recreation." It seemed to Marcy that the need for health was
not only neglected, but denigrated by the search for wealth.
"In all parts of our country the chief end of life appears to
consist in the acquisition of riches; and all the faculties of
the mind, yea, even health itself, are rendered subservient to
this object." Men from all walks of life were neglecting the
needed "physical and mental vigour," and few could "examine
carefully the mortal tabernacle... without finding some
derangement, some source of pain, depression of spirits, or
other annoyance." Business, lack of sleep, unhealthy meals,
and overwhelming worries, along with a neglect of mental and
physical diversions were at once responsible and dangerous.
The immediate effects might be "next morning's headache,
nausea and mental and bodily lassitude"; later sallow skin,
dyspepsia, torpid liver, and "shaky nerves", would follow.
The final result: apoplexy, paralysis, softening of the brain
or Bright's disease. How could one re-create the obviously
degenerating physical and social body? Marcy both posed the
question and offered a solution.

What then can be suggested as suitable modes of
recreation? How can we present that exercise and
diversion to both mind and body which will result
in recruiting them from the perplexing toils and
cares of business? We answer, by directing the
thoughts and the muscles into new and agreeable
channels; by taking the mind from care, anxiety and
severe application, and diverting it by pleasurable
exercise and excitement; by setting aside disagree-
able and depressing emotions, and substituting in
their place those which are cheerful and exhilarating; by giving to the dormant muscles of the limbs and of the whole body that gentle and healthful exercise which they so much require, but of which they are deprived in the ordinary avocations of city life.

The re-creation of men, women and children could begin with billiards. Even "the most indolent and stupid will, by practice, soon acquire a fondness for the game; and the improvement in the sanitary condition of those who habitually indulge in it, will commend it in the strongest manner to the heads of families." Morals, Marcy concluded, would also improve. The youth, who might potentially descend to the club, "gambling hell" and brothel, if restricted to idleness and boredom, would benefit. Body and mind would be amused as physical, moral and intellectual benefits accrued.42

Marcy was not the only person who believed in the recreational benefits of billiards. In 1863 the physician in charge of the Utica Institute for the Insane ordered a table for the patients. The physician found that "the curative influence of the healthy, invigorating recreation was soon visible." Hearing of those good effects the manager of the Pennsylvania Hospital for the Insane ordered first one, and then, pleased with the results, a second table. Nor were men, and the insane the only beneficiaries of that type of recreation. In Philadelphia, at the elegant billiard hall of Messrs. Palmer and Beatty, women were permitted to play one day a week in a private room. Apparently the program was a complete success. Yet billiards had an unsavoury reputation
to overcome, and sometimes that notoriety was conquered. In 1876, in Toronto, Ontario, for example, after prolonged debate and a previous ban, the officers of the Mechanics Institute agreed to provide a billiard table after they tried the game. Vice-Chancellor Blake noted that he had changed his mind about the recreation and claimed that he "didn't think the Devil should have it all to himself." Several men of the cloth agreed. Rev. D. J. MacDonnell of St. Andrew's Church said he already had suggested such a step to the local YMCA; Presbyterian Rev. Dr. Robb joked that bagatelle was not evil, and "though a bagatelle-table had more holes than a billiard-table, he didn't believe that the latter was more "unholy." Rev. Dr. Smith received much applause when he protested that "he believed in amusements, and thought, moreover, that whatever amusements the people indulged in, the pastors had a right to indulge in also, even in billiards."  

If at times the value of billiards was in question, there were many other activities that Victorians felt held a questionable re-creational value. At an 1878 temperance sermon in the Gower Street Methodist Church, St. John's and again in the George Street Church, Rev. Mr. Shenton condemned not only the liquor traffic but also many amusements. Dancing and card playing were taboo, according to the clergyman; theatrical performances were immoral; and boat-racing was "a gathering of the worst character." The Public Ledger took exception to his remarks noting that the very isolation of the
country meant that the people did not have the advantages of other areas, and that as long as such activities contained some moral influence they should not be criticized."

No doubt some of the activities that Shenton criticized did contain an element that might be construed as unsavoury and indeed, immoral. At the 1866 annual scullers regatta in Halifax, a good crowd gathered to watch the races. Oarsman George Brown and the other scullers impressed the crowd as they practised before the race. "The ladies seemed particularly pleased with the appearance of the oars men, as they indulged in a little preliminary 'paddling,' ... and the men themselves felt just as proud as the women were pleased, so that the feeling was mutual between them." Brown quickly took the lead in the three mile course from Anderson's Point to George's Island rowing with "a splendid oar - long, steady and vigorous." He maintained this lead eventually defeating the rest of the competitors in a time of 21:14 winning his third championship. In St. John's, Newfoundland, the annual regatta was condemned for its immoral associations. Said a newspaper reporter:

Rowing, in itself is a most beneficial and harmless amusement; and a trial of skill in oarsmanship is well calculated to develop the best qualities of mind and body; and it is only to be lamented that such occasions ... should invariably take the shape of a big gambling spree.

A few years later hope was expressed that all classes would enjoy the Regatta since mineral water would be drunk on the grounds. Still many competitions would be characterized by
drunkenness, gambling and fighting, nullifying, at least for health reformers, the benefits of the sport. Instead of being an example of the balanced and symmetrical body, for instance, George Brown became a member of the corps that succumbed to the immoral effects of some recreations. Not only had he once bet his life savings, giving two to one odds on himself, but his premature death may have been linked to a bout of syphilis, apparently contacted in Boston.45

Other sports and exercise routines offered the same contradictions. Some pugilists were renowned for their healthy and moral lifestyles and for their commitment to the concept of a harmonious body. Others were less savoury characters. In 1879 on Forest Road in St. John’s, a vicious half-hour battle between two men drew the attention and condemnation of the local press who noted, "It was a desperate hand-to-hand-struggle, and a great quantity of blood was spilt, but not one of the 'ubiquitous' agents to be seen." The conduct of fighters was rarely exemplary, but often reported and sometimes the more disreputable the better, it seemed. Yet not all pugilists were painted the same. Fighter Ned Tuohey declined published challenges, for instance, preferring to go to New Brunswick where he had a job that paid better than fighting and where he would be closer to his family. "Nobody," said the New York Clipper, "can blame him for that." In giving the details of another fight Butler's Journal noted that fighter Jack Burke proved that a man could
be both a sparring master and a gentleman and he demonstrated "that the manly art of self-defence as he has shown it, is both a healthy and honourable exercise." Family values, proper behaviour, and personal re-creation obviously counted for some fighters and recreation supporters.

Dance was another recreational activity which promised much in the way of re-creating the healthy and harmonious body; and yet like pugilism, it could offer immoral and unhealthy results. It was, at times, closely aligned with the exercise regimens of Ling, Lewis and others. Quite often dance as exercise was connected to the rhythmic movements of Francoise Delsarte. Delsartism, in its North American form, had deviated from its original connection with the theatre. Guided by Annie Payson Call and Emily Bishop, Delsartism became the exercise program for both the anxious and neurasthenic housewife and the young lady exhausted by the rigorous processes of puberty and educational training. The goal of Delsartism was to restore the harmonious balance of the body, not by vigorous movements, but by graceful, slow-paced gestures. Ultimately it would emerge as a 'restful' exercise program with a decided class basis, mainly appealing to middle class women. But dance, which contained both regenerative and degenerative elements, had a broad appeal that attracted the support and disapproval of many. This recognition - both pro and con - was based on the grounds of physical, moral and mental harmony. Dance was either responsible for re-creating
healthy bodies and a strong society, or it was accountable for almost all the ills and degeneration that was present in the mid-to-late-nineteenth century. In 1851 in St. John’s, some 30 members of the Sons of Temperance and friends gathered at a cottage for a picnic following the annual regatta. Here some "exercise[d] themselves with sciened steps cheered by lively music; and others of the more rougher sort to more athletic exercises." In this case dance was considered more genteel than gymnastics but given the propensity of many to drink and gamble at the Regatta, there may have been an unsavoury element in this gathering despite their claims to temperance.49

Critics often attacked theatrical dancing. Brother Charles Smith condemned Niblo’s in New York, where so many gymnasts displayed their abilities. Smith objected to a theatrical production, "Black Crook," for its dramatic present and dancing exhibition:

The first thing that strikes the eye is the immodest dress of the girls; the short skirt and undergarments of thin gauze-like material, allowing the form of the figure to be discernible through it in some instances; the flesh colored tights, imitating nature so well that the illusion is complete, with the exceedingly short drawers, almost tight fitting, extending very little below the hip, also of thin material; arms and neck apparently bare, and bodice so cut and fitted as to show off every inch and outline of the body above the waist. The attitudes were exceedingly indelicate - ladies dancing so as to make their undergarments spring up, exposing the figure beneath from the waist to the toe, . . . At other times a danseuse is assisted by a danseur, the attitudes assumed by both in conjunction suggest to the imagination
scenes which one may read of in descriptions of ancient heathen orgies.

It is not clear how many of Smith's "large, mixed and appreciative congregation" decided to evaluate the performance for themselves.⁴⁹

Reformers often attacked the activities of the very wealthy as well as the working class. Rev. DeWitt Talmage noted that few of the working class could afford to visit what he termed "slime pits." He felt that workers needed a quiet leisure after the day's labour, and he argued that such places of dissipation were visited only by those with time and money: "the stockbrokers from Wall street, importers from Broadway, leather merchants, and wholesale grocers." In his usual outspoken manner Talmage noted that he preferred "the heathenism that wallows in filth and thus disgusts the beholder to that kind which covers up its putrefaction with camel's hair, shawls and point lace, turning out in 53,000 equipages, with a liveried driver ahead and a rosetted flunky behind."⁵⁰

If exhibitions of this sort were considered immoral, the ballroom dance was suspect also. While some like Rev. Mr. Gandier of the Fort Massey Church in Halifax felt that Christians should not dance, others were less concerned. In 1891 a parent wrote "Lady Jane," society writer for the Halifax Acadian Recorder, and complained that while lancers, waltzes, and polkas were "lady like," "modest" and "pleasant", the new society dance, the Militaire, was "most disgusting and vile." Lady Jane disagreed; while the dance did involve
kicking, she justified its performance since it was performed in aristocratic circles. The song, which usually accompanied the dance, however, was not aristocratic in origin; it had been popularized years earlier, according to "Lady Jane," by negro comedians performing at the Old Halifax Temperance Hall. The writer, then, may have been objecting to more than just the immorality of the dance; the origins of the music may have played a role in the condemnation.

For some, the immorality of those with wealth was even more degenerating than the unChristian-like behaviour and manners of the poor. It was not always the professional dancer who was condemned. Dancing was an accomplishment that most young women were expected to master in order to be accomplished. The innocent and pubescent girls of wealthy and middle-class families were at risk as much as the professional on the stage. With marriage the all-important goal for proper young ladies, the emphasis on ballroom etiquette and participation was formidable. It was a required experience that made reformers shudder even as they promoted the healthful benefits of recreation. Rev. H. C. Haydn condemned the degenerative effects of dance as children graduated from the nursery to the ballroom.

To behold Lilliputian coquettes projecting dresses, studying colors, assorting ribands, mixing flowers, and choosing feathers; their little hearts beating with hopes about partners and fears about rivals; to see their fresh cheeks pale after the midnight supper, their aching heads and unbraced nerves disqualifying the little languid beings for the next day's task; and to hear the grave apology that
it’s owing to the wine, the crowd, the heated room of the last night’s ball; all this, I say, would be a ludicrous, if the mischief of the thing did not take off from the merriment of it . . . .

If late nights, wine and over-excitement were not enough, female dancers were restricted in their movements by their dress and "corsets that embrace[d] the waist with a tighter and steadier grip than any lover’s arm, and skirts that weight the hips with heavier than maternal burdens." Clearly recreational activities needed to be closely monitored in order to re-create bodies and morals.

Despite the debates about dancing it still had the potential of being a healthful exercise whether one glided across the floor at an elegant ballroom or paid to participate; it cost, for example 50 shillings to dance, but only a shilling to watch, at Professor Danielle’s assemblies at the Victoria Rink in St. John’s, Newfoundland. Some of the support for this recreational activity came from those, like phrenologist Orson Fowler, who believed that the legitimate mingling of both sexes and the sexual energy that resulted from the harmless flirtations in a chaperoned atmosphere was responsible for the improved sexual nature of men and women. Fowler argued that such tensions were necessary in order to fully realize the sexual potential of each individual. This was not an argument for licentiousness and promiscuity, but rather an attempt to promote dance as a way to achieve full human potential, both in sexual development and physical recreation."
While dance could be condemned for its late hours and the stuffy ventilation of the ballroom, no such complaint could be made about bicycling. Still cycling, like other recreational activities, suffered from the same contradictions as other recreations; it could be both beneficial and harmful. It could aid in the regeneration of individuals and society as participants enjoyed both fresh air and exercise and, in the case of women, more hygienic fashions. Rev. Talmage, so vocal against many other pastimes, praised bicycling although he himself did not ride. Those who did take part in exercise were convinced of the benefits of both the activity and their lifestyle. James Sproat of Ithaca, New York, attempted a 100 mile trip (for a $100 wager) at the age of 83; he attributed his good health and his longevity to exercise, his half-century of temperance, and his refusal to use liquor, tea, coffee or tobacco. Even the training for a bicycle race was expected to improve the health. Along with practising starts and stops, a racer was instructed to avoid drinking anything but water, to eat beef and chops moderately rare as well as boiled potatoes and plain vegetables, and to avoid sweets and fatty foods. The timing of the pre-marathon repast was important also; breakfast between 7:00 and 8:00, a hearty lunch at noon, and dinner at 6:00 with bedtime at 10:00. Those not interested in racing also found the bicycle offered healthful benefits. Cycling apparently aided the passage of oxygen to the brain, claimed an article on cycling, which
noted that a financial crisis had prompted a number of bankers to jump on their wheels and "dissipate their anxiety and gather good, healthy mental ammunition." Still some opposed the bicycle for health reasons. A number of Chicago Turners, German gymnasts, debated the issue. After much discussion bicycle races were not permitted at their national Turngemeinde exhibition, since some felt it "enervated the system and that it made the body crooked instead of straight, and made stooping shoulders and spine trouble." Once again, concern about degeneration and excessive exertion overshadowed the benefits of recreation.

As in all recreational activities female participation in bicycling caused much discussion. Women received two different messages about exercise. First, they were in dire need of some form of re-creational activity in order to promote physical, moral and mental equilibrium. Their lifestyle, their natural poor health, their clothing, their reproductive system all threatened their health. Some form of exercise and recreation could change that. Yet, at the same time, reformers emphasized that morals, health and sanity could be threatened by inappropriate or excessive activity. Bicycling was a prime example of this two-sided sword. Fresh air was fine so long as a young lady chose to ride in a sheltered manner and liaisons with gentlemen friends were not the motive. The daughters of some wealthy families sometimes found a valet trailing behind them but reformers knew that
"these petted darlings and favorites of fortune get just as much pleasure and exhilaration and health and excitement out of their bicycle riding as other people." In fact, as bicycling increased in popularity with the invention of the safety bicycle, more and more women were able to enjoy the recreation. "The safety bicycle fills a much-needed want for women in any station of life, and has fairly revolutionized the mode of feminine apparel. It knows no class distinction, is within the reach of all, and rich and poor alike have the opportunity to enjoy this popular and healthy exercise."

Despite these re-creational benefits there were those who worried about the supposed degenerating effects on both men and women. Exercise was good but pressure on the genitals, awkward postures, unladylike grimaces and strenuous movements might cause anything from insanity to disease to immorality. One's health could be injured by over-indulgence in recreational bicycling. Winfred Scott, one of the most prominent riders in Pennsylvania, died of spinal meningitis believed caused by such an over-indulgence, while another "wheelman" had his hands amputated after he rode too far without gloves. One concern was that bicycling might be the cause of immorality. The editor of the Dominion Medical Monthly cautioned that orgasm might result if a woman over-indulged in the exercise. The Medical Record suggested that this was false; either the women to which the other journal referred were vile, or they had been slandered. The Canada Lancet
agreed that this was an injustice to women and suggested that perhaps the Dominion Medical Monthly was piqued at the loss of a bicycle firm's advertisement money? Strain on the heart, the Lancet concluded, was a legitimate problem of bicycling, not sexual immorality."

Insisting on exercise and activity, many women refused to listen to the warnings of health reformers and sport promoters. Some were condemned. "Every lover of clean, wholesome and honest sport will rejoice over the fact that the six-day female race in New York last week was the biggest frost in the history of cycling. This ensures that the disgusting and degrading exhibition will not soon be repeated. Women's place in cycling is not on the public race path," emphatically stated a Sporting Life reporter. Of course the journal still reported the results of the gruelling (four hours per day) six-day race: Frankie Nelson of Brooklyn edged out the nearest contender, identified as Miss Baldwin from Chicago by just a few yards. This ridicule did not stop women's races; for example, another major one was held in Chicago and again Baldwin lost out to Tillie Anderson who had covered 359 miles. The Racing Board of the League of American Wheelmen tried to control such racing events by blacklisting any trotting or bicycling track holding unsanctioned or female racing events. This was a move to compel clubs to abide with the association rules. Madison Square Garden, Buffalo Trotting Park as well
as the Rochester and Syracuse tracks were mentioned as offenders. Those who opposed women's participation in public sporting activities often suggested a more appropriate exercise - housework - as being both physically and morally beneficial. The Sporting Life disagreed, and, noted that sewing, despite articles extolling the physical benefits, just did not match bicycling. In fact, corsetted women sewers, straining their eyesight and working with a jerking motion in an unnatural position, probably would injure their health. As part of the turn-of-the-century bicycle craze, therefore, dauntless women took to their "safeties" defying doomsayers in their quest for recreation and re-creation.

Almost every athletic activity, like bicycling, carried the contradictory potential of both re-creation and degeneration. Health reformers praised the healthful benefits of pedestrianism or long-distance walking. Yet, as in other activities, an excess was harmful. Not only could a pedestrian do physical harm to the body by over-exertion, society could be threatened as strangers came to an area. There was a thin line between a pedestrian and a tramp, it seems. In 1879 people in St. John's were cautioned about two men "of foreign importation" who had been sighted on the streets. The local press noted that while they might be harmless, they should be watched as they roamed around "with that freedom of gait which betokens the habitual pedestrian." As in most other recreations women found pedestrianism healthful but they
were both stereotyped and criticized for their participation. "There is one advantage in this walking mania among the female maniacs; if they exercise their heels more it will give them a chance to rest their jaws, and thus give joy to the world," commented one newspaper in an attempt to be humorous.62

To be a pedestrian meant much more than mere walking for exercise. Pedestrians who were serious about the sport followed guidelines concerning their apparel, their conduct and their exercise programme. Potential candidates were cautioned to wear a thick felt hat and to carry an umbrella. One pedestrian noted he carried needles threaded with black and grey thread, a thimble, extra buttons, a metal box with supplies such as candle, twine, shoe strings, a brush to use on one's clothing before entering a village, Epson's salts, and sulphate of quinine. A newspaper for botanical specimens and sandwiches, visiting cards, and passports were all valuable in the pedestrian's kit. More important was the bottle of oil of lavender: "if you have to occupy a bed suspected to be haunted, drop five drops of the oil between the sheets . . . and it will drive away intruders for a couple of nights." Prudence was important; a walker should strive for a pace of 60 to 70 steps per minute on slopes, and 90 to 100 paces on the level or downward slopes would protect the pedestrian from exhaustion.63 Not only was it a sport that was beneficial to one's health, pedestrianism could also improve the condition of one's pocket-book. Bertha Von
Hillern proved her expertise in Boston area, when she walked 100 miles in 28 hours in early March 1877. Von Hillern found Boston a very lucrative city in which to demonstrate her talents and it was noted that she had "already walked away with considerable wealth there, even in these hard times." Pedestrianism demonstrated the contradictions of recreation: the need to carry a brush in order to look respectable when entering a strange village, the concern with immorality or impropriety which touched all such activities, and the potential lucrative results which sometimes dominated over any possible re-creation.

The Rev. Haydn was scathing in his attack on "pedestrianamania." Walking was wholesome, he noted, but even the most innocent and healthful activity could be perverted; thousands of spectators, gambling, and sensational newspapers made the simple recreation of pedestrianism unhealthy in both physical and moral terms.

"Sixty thousand dollars gate money in a single week to see three men in tights walk around a sawdust track; a bar, four hundred feet long, with forty bartenders, dispensing 'fuddling beer and maddening whiskey' for one hundred and forty-four hours without a stop. Hundreds of ginmills posting hourly bulletins of the match, and an amount of drinking and all-night street-roaming which is simply frightful. The whole police force and a regiment of troops, held in readiness to suppress a possible riot: "this is the picture true to life, in the city of New York, in the year of our Lord, 1878 . . . ."65

Skating, like pedestrianism, could aid in the re-generation of participants or lead them into degeneration. It
offered fresh air and exercise. A letter to a Saint John newspaper, *The Morning News*, noted the benefits and popularity of skating in 1863.

The new beginners afford some amusement, but they must skate - it is the fashion. A healthy fashion. Strange anomaly! . . . it is fine recreation. The pale faces become flushed with a healthy hue, and everyone seems happy. No cross-natured people are admitted. And I will give you a friendly hint: Don't go without skates or you will be as I was - A Nonentity. 66

The popularity of the recreation was visible: not only by the crowds of skaters but by "the erection of palatial edifices over half a continent." In these "skating houses" protected from the elements, free from the dangers of thin ice, men and women could mingle through healthy recreation. Still, women's presence on the ice was challenged. In 1871 in response to such criticism, one newspaper correspondent wrote:

And why pray should not ladies skate in public, and in a match too? Is there anything improper or indelicate in so doing? If so we have a serious charge against all the ladies of both rinks . . . The time is gone by when ugly names were heaped upon ladies who had the pluck and "Manishness," as it was termed, to break through absurd conventionalities and to skate.

By 1884 in Fredericton, New Brunswick, for example, everyone from university professors to policemen to members of parliament could be found on the ice. In one week alone retailer J. S. Neill sold 500 pairs of skates to eager participants. At the La Tour Skating rink at the rear of St. Luke's church in Portland, New Brunswick, some 3000 people gathered in what was
described as the "finest open air rink in the Maritimes." At the same time a ball on the flagpole in nearby Market Square signalled that the ice in Victoria Rink, serviced with three electric lights in 1884, was ready for some 300 of its elite members. This rink had opened in 1865 after a subscription drive had raised $15,000. It was a spectacular building with a domed roof topped with a cupola 80 feet off the ground. Even a reporter from the Scientific American had come to gaze and report on the structure which was reserved for its wealthy members.67

In other cities the scene was much the same. On the 18 January 1865, reportedly 10,000 people were on Union Pond in Brooklyn for a grand Masquerade, and both the Central Park and Fifth Avenue Skating Ponds were crowded mainly with female skaters. Thousands attended other skating carnivals which were often celebrated with music and fireworks. The wealthy of New York City attended a fancy dress carnival at Capitoline Pond in Brooklyn in 1864; the New York Clipper questioned the behavior and composition of this elite crowd since police had to intervene in a fight that broke out.68 Obviously, as in other recreations, there were dangers to that tri-partite balance of the body. Degeneration was possible: rooms were smoky from kerosene lights; women skated in their sometimes-corsetted but always fashionable attire; and young men lurked around the ice rinks for dubious purposes, or so it seemed to many. As rinks were often used for roller-skating or for
dances in the summer the dangers to personal and social health were present year round. St. John's, Newfoundland, was not immune to the skating fever. In 1878 there were two rinks in the town. Both were consumed by a single fire: "[They] took it to their heads this morning that they would give an illumination; and now they are both missing." It was not so great a loss, perhaps, suggested city newspapers. Had the wind been blowing in another direction thousands of people would be homeless. Many felt that the rink dancing parties of Professor Danielle were to blame both for the fire and St. John's immorality. One newspaper claimed the rinks "were never anything but a public nuisance; and in addition they have been a source of life-long illness and premature death to many of our young people." Despite such disparaging remarks there were many who supported the building of a new rink, the construction of which was delayed due to urban-rural discussion on the costs and payments. Some felt, though, that the benefits of a new rink outweighed the financial costs: "The burning down of the old rinks had been a public loss to the community, and they should offer every encouragement in their power to the erection of other such buildings in the [Bannerman] park." Once again the threat of degeneration contested any re-creation that might devolve out of physical exercise; once again athletes of all classes, ages, and skill levels would challenge the experts and denigrators and continue in their quest for recreation and re-creation.
Recreational activities offered other paradoxical values too. While many middle class reformers argued the benefits of exercise and sports, they were at the same time opposed to the Sunday sporting events. The working class, possessing limited leisure time, protested attempts to limit their recreational opportunities often to no avail. In Indianapolis an attempt to stop Sunday ball playing was instituted even though all the labour bodies had endorsed the games. William F. Kirk later would capture the class battle in a poem, "Sunday Baseball."

The East Side Terrors were playing the Slashers,
Piling up hits, assists and errors.
Far from their stuffy tenement homes
That cluster thicker than honeycombs
They ran the bases 'neath shady trees
And were cooled by the Hudson's gentle breeze.

Mrs. Hamilton - Marshall - Gray,
Coming from church, chanced to drive that way.
She saw the frolicking urchins there,
Their shrill cries splitting the Sabbath air.
"Mercy!" she muttered, "this must stop!"
And promptly proceeded to call a cop,
And the cop swooped down on the luckless boys,
Stopping their frivolous Sunday joys.

Mrs. Hamilton - Marshall - Gray
Spoke to her coachman and drove away
Through beautiful parks and shady roads
Past splashing fountains and rich abodes.
Reaching home, she was heard to say
"How awful to break the Sabbath day!"

The Terrors and Slashers, side by side,
Started their stifling Subway ride
Down through the city, ever down
To the warping walls of Tenement Town.
Reaching their homes, the troublesome tots
Crept away to their shabby cots,
And thought of the far off West Side trees
And the cool green grass, and the gentle breeze,
And how they had played their baseball game
Till the beautiful Christian lady came.
Not all of the working-class supported Sunday baseball. In industrial Cape Breton workers and players resisted Sunday ball which had been proposed by the company in an attempt to make them remain at work on Saturdays. Still others argued that baseball was an antidote for the class consciousness that permeated turn-of-the-century society. Professor Charles Zueblin of Chicago argued that baseball players offered a religious experience as they demonstrated good will, fair play and most importantly, no class conflict. "Individual experience is submerged by a common impulse; we are all equal; the pressure of the crowd makes us one. The office boy who has stolen away, the business man from the counting-room, the clergyman from his study, the clerk from his desk, the girl from the factory, the wife from the home, are all on equal footing; barriers are forgotten, and how good it seems for us to be just human beings." Baseball, however, as the Indianapolis and Cape Breton experience indicates, was not always the class-leveller that some reformers hoped. Just as recreations often brought about an unseemly mixture of the races and genders, they easily could be used to maintain class identity, distinction and even conflict if need be.

The issue of Sabbatarianism involved much more than issues of race, gender and class. In Newfoundland, for example, the sectarian divisions of the country played a role in sport. When the Protestant Public Ledger criticized Catholics for breaking the Sabbath, the Newfoundlander printed
a letter from the Catholic side, condemning Protestants for their Sunday recreation. "Are we to understand that cricket, football, sliding, skating, street-singing, (as performed here), pitch-and-toss, fishing and shooting, card-playing, gambling, and drinking, or any other of these and such like pastimes are among the legitimate 'amusements' of the Sabbath?" questioned the writer.

Sport on Sunday was an issue in Halifax as well. In an article on "The Preservation of Sunday", the Acadian Recorder, asked if moral suasion really would promote the observation of Sunday as a day of rest, and hypocritically argued that:

The seeming boldness [with] which hockey players and skaters carry their skates and sticks over their shoulders to a near-by pond or lake for a Sunday afternoon's game or skate shows a lack of the right kind of moral thought. Time was when skaters would wrap their skates carefully to avoid detection, but there is apparently a change of tone in this respect and a don't carelessness' is manifested that is not to be commended."

For this writer, at least, it was better to break the Sabbath by sneaking quietly to the ice, than by not caring about the day at all, and openly participating in the recreation.

Sabbatarianism was not the only contentious issue in baseball. Women found that their entrance into the sport was at once encouraged and denigrated. In a widely publicized tour of the Maritimes a woman's team was criticized by some for being "frauds of the first order." As the sport expanded in the early twentieth century the Baseball Magazine, offered a proliferation of contradictions for prospective
female players. On one hand, it held up baseball as a sport that offered physical, mental and moral regeneration, even for women, yet on the other hand, women were condemned both for their lack of expertise - whether true or not - in understanding and in playing the game. In baseball, as in other sports, women's role was quite often expected to be that of spectator. There would be a big turn-out at games, argued W. C. C. Minot, if "pretty girls" sat in the stands and waved their handkerchiefs at good plays. Better still, foul language and complaints about double-headers would disappear if male and female spectators were seated side-by-side. From the stands through good example and moral suasion, the female spectator could save the male athlete from degeneration even if she only rarely took to the field to re-create herself. Women were valuable as spectators: they attracted male spectators. Some sporting event managers established Ladies' Days to attract women to the grandstands. One field went even further, ultimately abolishing Ladies' Day, and permanently offering women a reduced fare of 15 cents. "This is a wise move on the part of the management, as the fair sex are the best drawing card on earth, and many a fellow will go to get a "flash" at them in their pretty makeup lots of times when they would not attend otherwise." Sometimes, however, this approach backfired. A Pittsburgh team abolished Ladies' Day complaining that "the softer sex abused the privilege;" and Club President
Kerr grumbled, "the deadheading of petticoats didn't help the finances of the club a dime's worth."  

The sporadic participation of women in baseball was not always due to a lack of desire or a fear of excessive or unladylike exercises. Actress Mrs. Leslie Carter felt that sports like baseball offered women longevity, physical independence, confidence, moral courage, mental alertness and a release from stress as well as better figures. Good exercise, she mourned, was "a very difficult matter in these days of Delsarte and girl-poses." In fact, it offered social as well as personal regeneration. "My conclusion is that if a woman intends to live long and to achieve something in the world she must make every personal sacrifice for her personal health," concluded Carter.  

Baseball, like other athletic games and exercise programmes, carried its own internal contradictions. True regeneration was possible, but the participants alone held the key as to whether that mandate was carried out. Poet Walt Whitman eulogized the game when he wrote, "I see great things in baseball; it's our game - the American game. It will take our people out of doors, fill them with oxygen, give them a larger physical stoicism. Tend to relieve us from being a nervous, dyspeptic set, repair these losses, and be a blessing to us." Others were not as convinced of the merits of the sport. Some considered it far too violent. One writer
detailed his concerns of this "Perversion of a Pleasant Game," claiming:

A story is told of a fellow who was found one day tickling the heels of a vicious mule, which, in return, kept continually kicking him against the side of the barn. When told he was a "confounded fool" for indulging in such recklessness, he replied, "No, I ain't. I am going to play a game of baseball tomorrow, and it is necessary to get a little practice for it." On another occasion, when a baseball player was addressed concerning the hazards of the game, he defended it by saying that three members only had been killed this year. "But how about the umpires?" asked his friend. "Oh, we don't take umpires into account."

The re-creational benefits of recreation could not be disputed - even if the type and quantity was in dispute - but health reformers and athletic advocates began to spend as much time proving their claims as promoting their cause. By the turn of the century, recreational activities had a much different character than that of the 1860s. Health and regeneration had, in part, been superceded by the thrill - and evil - of competition. This was not a sudden occurrence but rather a continuation of the long-feared degenerating tendencies of some activities. As the popularity of sports and recreation grew, the profit-making potential and the value of professional athletes became more apparent. Competition involved a number of problems; gambling, excessive exertion, the threat of female participation, and probably most damning of all, the taint of professionalism, and class conflict. Male athletes would continue to play, as they always had, for
their own reasons, but those reasons had less and less to do with personal and social health.

The joy of sport had always attracted participants and with the increase in leisure time it continued to do so. At Physical Culture City, a community started by publisher and health and fitness advocate Bernarr Macfadden, there was an interest in both re-creation and recreation. Pressmen, working in the community printing plant, were "all ardent admirers of physical culture, and a more healthful or happy-go-lucky lot of boys cannot be found among the printing fraternity." Their newly won eight hour day gave them time to row, fish, swim, and play games. Macfadden's influence spread widely in the early 20th century and he came to typify the modern version of the health reformer, attracting converts through his publishing empire and self-promotion. Scottish socialist Thomas Bell noted that both he and Lizzie Aitken "were ardent physical culturalists and vegetarians, students of Bernarr Macfadden. Our son was to be the personification of all our ideas on a good physique and clean living. Besides, he was to be brought up in the socialist faith." While good fun and pleasant leisure was important to amateur sport by the turn of the century, professional sports had become a business enterprise controlled by men like baseball's A. C. Spalding.79

Women's recreation also had changed much by the turn of the century. Some activities still were promoted as being
beneficial to health, but over time reproductive health had become paramount. Delsartism and ladylike gestures were acceptable, but cautions and concerns about the effects of exercises and sports on potential childbearing, and the suspected decline of the femininity of the female athlete dominated the concerns of sporting enthusiasts and practitioners. Even those who supported women’s role in athletics and gymnastics based the argument on reproductive health and matrimonial prospects. One article by Christine Terhune Herrick, subtitled “The Athletic Girl Not Unfeminine,” for example, defended the introduction of women’s athletics into boarding schools.

The girl is wanting a sense of proportion. Being born a woman, she cannot avoid her heritage. She lackself control, unless she has been exceptionally well trained at home. She considers tears her natural weapon of defence and has no hesitation in showing temper when she feels like it. She is an exception if she has the mere rudiments of a sense of honor. She is a girl and she does, without the least compunction, all the mean dishonorable things, that make a girl the contempt of the boy, and a woman the despair of the man.

Athletics, Herrick suggested, would help this contemptible being, and eliminate female tendencies towards cheating, vanity, and snobbery. Patience, mental strength, and moral benefits would ensue as a result of such activity. But there is a difference here. The girl of the twentieth century is such a degenerate creature that regeneration takes on a new meaning. Where previous health reformers often argued that re-creation would aid in establishing - at the very least -
physical equality for women, hopes of this seem to have vanished by the early 20th century. Summing up the revised opinion of women and the value of recreation is a caption under a picture of girls preparing for a race. "On the Mark, at the Start of the Sprint, is Where She Gets Training in the Combination and Instant Action of Mind and Muscle, Which, Later, When Crossing an Approaching Trolley Car, Will Enable Her to Decide Which Way She Really Wishes to Go." It seems that rather than supporting equality, physical fitness at best could only improve the perceived deficiencies of women, including both weakness and an inability to make decisions.

If recreations were of value helping women gain strength of character, they were also used to enhance the importance of women's figures. Again this was not a new idea; exercises had been cited often as a way to improve one's form. The perfect body in form and in health was always possible through exercise and good hygiene. In the 20th century the portrayal of that body became an end in itself. The Moliere sisters were often cited as superior examples of womanhood. Still in their teens, the sisters were experts on the horizontal bars and performed in vaudeville houses. Despite being in training since the age of three, they were praised as having "not a sign of those cord-like muscles. Nothing but symmetry and beauty of form that any society woman, would give half of her life to possess." Kate, aged 16, weighed 115 pounds; Elsa 17-1/2 was 135 pounds. Their photographs in their form fitting
suits displayed their builds to readers of Bernarr Macfadden’s *Physical Culture*. This was not limited to women. Bernarr Macfadden, the eccentric physical culture specialist, posed to demonstrate his physical perfection for his readers. At the Barnum circus for instance, where male posing was displayed, the owner was “careful to have everything chaste, free from vulgarity and unoffensive to the most fastidious taste.”

Certainly, some did enjoy the displays. In Halifax, “Lady Jane,” praised the “living pictures.” Some people, she noted, were shocked apparently by women displaying evening gowns and tights, but “Lady Jane” argued that the well-made female form was about the “most perfect of God’s works.” She did have a problem with the women who displayed themselves, but conceded that there was little difference between the attire at this event and that at a fashionable ball.⁹¹

Physical exercise for women became a way not so much to re-create health first, and then society but a way to mould women into a wife and a mother. Girls and women who exercised were praised; they would be the ones, it was supposed, who would attract husbands with their figures, their vigour, and their reproductive potential. “The woman who can tramp roads or the golf links, climb fences, scale cliffs, and endure hardships side by side with a man is far more likely to be sought for him as a companion than the girl who takes care of her complexion in a hammock on a veranda,” claimed Herrick.⁹²
A future wife and mother were of prime concern in this new direction for re-creation.

In an article published in the *Journal of Education*, Rebecca Stoneroad, Director of Physical Training in Washington Public Schools, discussed the physical education needs of girls. She claimed that there were three requirements for an "adequate and scientific system of physical education": consideration of the stage of physiological development, the mental and physical condition of the individual and consideration of gender. Girls, she declared, needed to be treated differently since "it is girls with all the potentialities of future women, whose lives we are influencing." Girls needed health and vigour; this could be supplied by physical activities such as walking, skipping, throwing and running. They also needed education "in the formation of right habits of action by proper training of nerve centres." This would be beneficial in both the present and future since girls had an "emotional nature [which] makes them more liable to yield to weakness along this line, interfering with and preventing a well balanced nature."  

Stoneroad claimed that the final two benefits of gymnastics and physical exercise were to counter the mental strain of school work and to improve "postural defects." Stoneroad argued that "natural" exercise was best - a cross country walk under favourable conditions and with opportunity for social intercourse was ideal as an outdoor exercise. Exercises which
developed great strength should be avoided, as should exercise during menstruation. Long distance runs and broad jumps might injure internal organs but for the most part, Stoneroad felt that the difference between exercises for girls and those for boys "is one of degree rather than kind," with girls enjoying "lighter forms of practically the same game." Stoneroad laid down several conditions that should be followed "to safeguard our girls from the physical evils resulting from over-work in the matter of athletics." Medical doctors first should certify the condition of heart, lungs, nerves and general health, and should repeat their examination after several months of training. Female instructors should supervise a female athlete and "prevent her from participating in competition at times of temporary disability." The individual should be observed after rest periods following "unusual exertion." Excessive fatigue should be avoided, by educating the competitive girl about the danger, by having longer rest periods between exercise, by shortening the length of time for exertion, by increasing age and weight limits of contestants, by using relays and group events, by making it easier to score and by holding private, not public competitions. All of these would eliminate the danger of excessive exertion and reduce the strain caused by competition in a public forum. The result of these modified activities would be the cultivation of "social qualities necessary for the civic good" along with the improvement of health, ease and grace. Proper training
would teach the girl a lady-like method of walking, of climbing up or down stairs, of rising and sitting, as well as improved posture. "These constitute beauty in body expression as well as good health, an aesthetic side to body training, giving delight and pleasure to those round the girl as well as satisfaction to herself." By the end of the century the quest for personal and social health and balance had diminished into a promotion of grace, beauty and reproductive strength.

New York physician, Angenette Perry, echoed these views when she suggested to doctors of obstetrics and gynaecology that the matter of athletics was both complex and significant. The reproductive life of athletic women needed to be studied, she argued, with "the medical profession doing its full duty in advising and in training our splendid army of American girls into the highest type of physical perfection possible for womanhood and motherhood." Held back from competition, playing only modified sports, and keeping one eye on her reproductive organs and the other on the now easily attained goal, many female athletes found that their recreations, their abilities and their bodies were degraded and devalued.

Perry, herself, represented another change in the progress of physical culture and recreations. Physicians were now becoming more involved in athletics and gymnastics, both in schools and institutions. Doctors suggested that only the professionally-trained medical practitioner could fully
understand the human body and its potential re-creation. Most supporters of physical education now felt that medical doctors had a place in the gymnasium, if not as an instructor, at least to give medical examinations. In addition, scientific methods were being stressed to demonstrate the benefits of systematic exercise upon the body. Dio Lewis, criticized Edward Hartwell, was more a revivalist of older ideas and not a scientist "in any proper sense of the word." While some educationalists stood by the old system of Swedish exercises, others criticized the "unscientific character of some of the most important of its doctrines." 46

Dr. D. A. Sargent tried to establish scientific methods by using strict standards and careful measurements to discover the improvement to the body. Sargent gave each athlete a number, and took note of the time, the date, the time since eating, the occupation and the height and the weight. He measured and examined the body calculating such things as the length of shoulder to elbow, stretch of arm, the horizontal length, girth of waist, nipples, and the breadth of the head. He observed the amount of hair on the limbs and body - though not the head, face or pubic hair - and he classified it as light (4 categories), dark (3 categories), or red (3 categories). He also categorized eye colour into light (3 types), dark (4 types), or mixed (2 types). Only with such precise measurements could the benefits or detriments of exercises and sports be known; and only then could the directors of pro-
grammes claim success. In other attempts to justify both the scientific nature of physical education and its progress in the school system, studies were done to demonstrate when physical education had infiltrated schools and how successful its introduction had been. Dr. Luther Halsey Gulick prepared one such report encompassing 90 public schools and 2392 public high schools in the United States.  

Clearly recreation was becoming a scientific endeavour, moderated by physicians, and applied according to their expertise. All of these changes, subtle and gradual as they were, resulted in modifications to the early health reformers' plans and hopes. They had hoped that exercise and recreational programmes would gain more and more adherents. The programmes instituted in schools and in gymnasiums, however, often only reached the middle-class student and middle-class man and woman. Other programmes had been spoiled by the taint of professionalism. Health reformers also had hoped that recreations would lead to more healthy individuals. Certainly men and women used exercise to improve their stamina and restore their mental, and physical (although perhaps not always their moral) balance. But, by the turn of the century, the notion of health, for women, often meant only reproductive health. Furthermore, even the definition of good health for women had changed; once it had been an attainable, desirable and a natural state; by the new century, good health meant something less. The concern over women's reproductive tracts,
over their nervous tendencies, over the possible damage that would ensue from inappropriate and excessive exercise, aided in communicating the impression that women's physical condition could never be perfected, merely improved. Despite their enthusiastic participation in recreations - sometimes for fun, sometimes for health, sometimes for pay - women could never be re-created. They simply did not have the bodies for it. Female and male recreations, never identical, grew further apart. While the desire for improved male health through recreation never disappeared, it became less important when compared to the new aims of physicians, physical education professionals and supporters. Exercise programmes and athletics could build strong armies, could uplift unruly workers, could improve the manners of youngsters, and could integrate and benefit immigrants. It could also garner huge amounts of money for promoters, players and advertisers. In addition, it could occupy the leisure activities of the working class, without threatening the status quo or jeopardizing their contribution to production levels. With such lofty, ambitious, and rewarding aims and prospects, no wonder the ideology of individual and social re-creation, as promoted by health reformers, became less significant.

Champions of sport and recreation still extolled the virtue of health and a harmonious body. Degeneracy still remained a problem, which could only be tempered by recreation and sports. The game plan, however, was altered by the turn-
of-the century. By that time physicians were suggesting that their knowledge of the body made them most able to supervise and prescribe fitness exercises for healthy boys and potential mothers. The health reformers and their emphasis on the tripartite balance and on the moral, physical and social benefits of recreation had all but disappeared. This cooptation of the health reform platform, discussed in the next chapter, however, would not include an adoption of their broader ideology. The dream of recreating both the human body and all of society through sport and recreation would be lost in the 20th century.
Notes


6. Ibid., p. 16.


8. Jackson, American Womanhood, p. 45. Jackson felt that nine-tenths of all pursuits and professions could be managed by women. Ibid., p. 47.
9. James C. Jackson, Our Home on the Hillside. What We Are Trying To Do and How We Are Trying To Do It. (Dansville: n.d.). "Our Platform of Principles" and How We Apply Our Principles," found in the back of this booklet, note that proper dress is considered a "remedy" for disease, Jackson stated:

Persons who are sick are free in "Our Home" from the enthrallments of fashion. They can dress very simply and plainly. Women are at liberty to wear the American costume, but we do not require them to do so. There is no need of this, for by far the greater portion of invalid women who at home dress fashionably, and many of them expensively, on becoming our patients put it on from choice."


10. Some people defended the corset. "Lady Jane," a columnist for a Halifax newspaper, reported in an interesting comment on marriage and wife abuse, that she knew of three cases where corsets protected women from the bullets of their enraged husbands. "Stick to them, girls; they do you no harm and they may act as a life preserver some day," she advised; Acadian Recorder, Halifax, Nova Scotia, (hereafter Ac Rec), 8 September 1894.

11. Mattie, "A Parody," Water Cure Journal, XV:6 (June 1853), p. 132. While women had to choose between ill-health and humiliation, there were other dangers of their fashionable follies. Miss Annie, reported the New York Times, was a dressmaker whose skills were renown in Boston especially for increasing "Bostonian beauty, both in breadth and thickness without much increase in weight." Miss Annie, later discovered to be a man, collected more than $1000.00 from "the terrified fair ones" when he threatened to reveal the amount of cotton and whalebone in their dresses. PL, 11 December 1879. While Amelia Bloomer's name was attached to the bloomers, she was not its inventor. The first woman to own, publish and edit a newspaper, The Lily, Bloomer promoted the dress in its columns. She wore the costume for eight years, stopping when she felt its use attracted too much attention. The Lily began as a temperance paper, but it soon added women's rights and dress reform to its agenda. See Amelia Jenks Bloomer, American Reformers, Alden Whitman, ed., (New York: 1985), pp. 89-91. See, for example, The Lily, 4:8 (August 1852). This issue has been reproduced and is available at the Seneca Falls Historical Society, New York.

13. PL, 6 February 1877, 14, 16, 18, 21 October 1879. The Newfoundland Temperance Eating Saloon, a Coffee House offered the following menu:

<table>
<thead>
<tr>
<th>Item</th>
<th>Price</th>
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<tbody>
<tr>
<td>Coffee w/Bread</td>
<td>$0.00</td>
</tr>
<tr>
<td>Tea w/Bread</td>
<td>$0.00</td>
</tr>
<tr>
<td>Soup</td>
<td>$0.00</td>
</tr>
<tr>
<td>Mutton Pie</td>
<td>$0.00</td>
</tr>
<tr>
<td>Beef Steak Plain</td>
<td>$0.00</td>
</tr>
<tr>
<td>Beef Steak w/Onions</td>
<td>$0.00</td>
</tr>
<tr>
<td>Mutton Chops Plain</td>
<td>$0.00</td>
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<tr>
<td>Mutton Chops Fried in Crumbs</td>
<td>$0.00</td>
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<td>Baked Beans w/Coffee</td>
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<tr>
<td>Fresh Rolls w/Coffee</td>
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<tr>
<td>Cold Boiled Ham w/Coffee</td>
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<tr>
<td>Cold Corn Beef w/Coffee</td>
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<td>Ham and Eggs</td>
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<td>Fried Ham</td>
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<td>Ham Omelet</td>
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<td>Omelet w/Jelly</td>
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<tr>
<td>Plain Omelet</td>
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<td>Scrambled Eggs</td>
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<td>Boiled Tongue w/Coffee</td>
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<td>Oysters Stewed</td>
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<td>Oysters Raw</td>
<td>$0.00</td>
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<tr>
<td>Boston Fancy Roast</td>
<td>$1.60</td>
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PL, 21 October 1879.


17. There are a number of valuable overviews available on the history of physical education. For a dated but comprehensive look at both events and participants see Robert Tait McKenzie, Exercise in Education and Medicine, 3rd edition, (Philadelphia, 1923); Fred C. Leonard, Pioneers of Modern Physical Training (New York: 1919). See also Betty Spears and Richard A. Swanson, A History of Sport and Physical Activity in the United States (Dubuque, Iowa: 1978).


20. Leonard, "Dio Lewis."


24. NYC, 22 April 1865.

25. Ibid., 12 December 1863, 1 October 1864, 24 December 1864, 3 June 1865, 21 April 1866.

26. Ibid., 19 April 1865.

27. The gymnasium was advertised as containing 600 lockers, baths (7 wash and foot baths with hot and cold water), plumbing, gas fixtures, chandeliers, office and reading room fixtures. Ibid., 21 April 1866.

28. Ibid., 12 May 1866.

29. Ibid., 12 January 1867, 20 October 1866.

30. Ibid., 9 March 1867, 27 April 1867, 15 June 1867.

31. Ibid., 5 January 1867, 16 March 1867, 15 April 1876. Ibid., 16 March 1867. By 1876 the gymnasium had moved to 28 Street and 5th Avenue where it was touted as "the largest and most complete of any in the city, being fitted up with all the necessary appliances for developing "muckle" [sic] and rendering lithe and graceful the human form divine." Ibid., 15 April, 1876.

32. The Globe, Saint John, 13 December 1908; NYC 16 January 1864; Smith, ”Graceful Athleticism."
33. The Globe, 10 December 1881.
34. NYC, 29 December 1866, 17 March 1866.
35. Smith, "Graceful Athleticism."
37. NYC, 4 November 1865, 3 September 1864, 2 December 1865.
38. Ibid., 16 May 1863, 17 December 1864. Interest in fighting was high at this time given the recent prize fight between McCool and Coburn for the Championship of America and a $2000 purse. Club swinging was not an easy thing to master. See the story by R. Pyke in which a would-be-club swinger damaged the house, the landlord and himself in trying to learn the exercise. R. Pyke, "His First Lesson in Club Swinging," Ibid., 27 January 1877. For an earlier article on club exercises see Ibid., 12 July 1856.
39. Francis Forrester, Minnie's Playroom, (Boston: 1862), see esp. 11-13, 35, 41.
40. NYC, 5 January 1867, 2 February 1884.
41. Phrenological Journal, 63:5 (November 1876), Windship, whose name often appears as Winship, officially died of apoplexy although paralysis, protraction and heart disease were also cited as the cause of death. See Joan Paul, "The Health Reformers: George Barker Windship and Boston's Strength Seekers," Journal of Sport History, 10:3 (Winter, 1983), pp. 41-57.
43. Ibid., June 1866, 26 August 1865, 4 June 1864, 30 December 1876.
44. PL, 24 December 1878. (The editorial page of this issue is dated 23 December 1878).
46. PL, 26 August 1875; NYC, 10 October 1863; Butler's Journal, Fredericton (June 1895). English fighter Joe Goss found that he was condemned by more than the judge in a case
involving "a gross and brutal outrage" upon a Harriet Shale, the keeper of a house of prostitution. The English and American press were equally aghast at Goss's conduct and ultimately he was expelled from the Pugilistic Benevolent Society. Goss apparently forced Shale to perform oral intercourse in the presence of a number of men called in from the street. He then struck her several times and threw her against the fire-grate breaking the top bar. Shale did not appear in court since "Goss had given her money to compromise the matter." The magistrate insisted on hearing the case despite the woman's reluctance. Goss received six months imprisonment with hard labour. NYC Dec. 14, 1864. The New York Clipper, itself a more rough than respectable sporting and theatrical newspaper, loved to report on such crimes. See for example, "Scouring the Naked Body of a Young Girl," Ibid., 8 August 1863.

47. See Annie Payson Call, "The Greatest Need of College Girls," Atlantic Monthly, 69 (1892), 102-9; McKenzie, Exercise in Education and Medicine, 137-9; Alice Tweedy, "Homely Gymnastics," Popular Science Monthly, 40 (February 1892), 524-27.

48. B.T., 16 August 1851. The Regatta continued to hold an unsavoury reputation as "one of the vices." See PL 15 February 1879.

49. Smith was equally scathing of the dialogue in the theatrical portion, in which a young woman apparently was willingly seduced by her suitor, and which contained "a dialogue about snoring, bedclothes, self-defence, nightmare, separate apartments, [and] sleeping alone in future" all presented in a manner "with a familiarity and coarseness that would be unbecoming to a married couple." "Naughty Things That a Preacher Saw," NYC, 1 December 1866.

50. PL, 5, 19 November 1878.

51. Ac Rec 19 November 1886, 3 March 1891. A similar sermon was held in Saint John, New Brunswick. Ibid., 7 December 1886.


63. *NYC*, 3 December 1864.

64. *Ibid.*, 10 February 1877.


69. PL, 2 May 1882, 16 July 1878; Temperance Journal, 30 July 1878.


73. PL, 21 July 1871; Ac Rec., 12 February 1902.


76. Leslie Carter, "Exercise - The Fountain of Youth," Baseball Magazine, 8:1 (May 1909), pp. 21-23. For sentiments similar to Carter's see the article by comic opera prima Donna, Lulu Glaser, The Lady Fan, Ibid., 3:5 (September 1909), pp. 18-22. For denigration of women as players and spectators see Mabel Hite, "On Just Being a Fan," Ibid., 2:1 (Nov. 1908), pp. 23-24. (Hite was the wife of player Mike Donlin); Ina Eloise Young, Ibid.; Petticoats and the Press Box," Ibid., 7:1 (May 1908), 53-54; and Roy Somerville, "Feminine Baseball Deluxe," Ibid., pp. 18-22. It is interesting to note that only one of these articles was written by a man. His strongest condemnation was not for female players but for wealthy women players "secure in their social position, [who] could afford to show the natural American love for the game of baseball." None of the players would know the score, Somerville suggested, but tea would be served and baseball would be "Voted the nearest thing." See Michael Smith, "Sport and Society, Towards a Synthetic History," Acadiensis XVIII:2 (Spring 1989), pp. 150-8, for comments regarding women's critiques of female participation in sports.


82. Herrick, "Women in Athletics."


84. Ibid.


His aunt was concerned. She began to try all manner of remedies on him. She was one of those people who are infatuated with patent medicines and all newfangled methods of producing health or mending it. She was an inveterate experimenter in these things. When something fresh in this line came out, she was in a fever right away to try it—not on herself, for she was never ailing, but on anybody else that came handy. She was a subscriber for all the health periodicals and phrenological frauds, and the solemn ignorance they were inflated with was breath to her nostrils. All the "rot" they contained—about ventilation, and how to go to bed, and how to get up, and what to eat, and what to drink, and how much exercise to take, and what frame of mind to keep one's self in, and what sort of clothing to wear—was all gospel to her, and she never observed that her health journals of the current month customarily upset everything they had recommended the month before... She gathered her quack periodicals and her quack medicines and, thus armed with death, went about on her pale horse, metaphorically speaking, with "hell following after." But she never suspected that she was not an angel of healing and the balm of Gilead in disguise to the suffering neighbors.

Do I contradict myself?
Very well then... I contradict myself;
I am large...I contain multitudes.

In 1876 Samuel Clemens, or Mark Twain, as he is better known, wrote of the hustle and bustle of early water-cure fever. As a devoted supporter of Rachel Gleason he felt that he owed his wife's life to Gleason's treatment. He was more sceptical of other ideas of health reform: Madeleine Stern already has detailed Clemens' attitude to phrenology after he had visited Lorenzo Fowler for a reading. Fowler claimed that his client had little sense of humour. On a second visit, now aware of the writer's identity, Fowler indicated that Clemens'
faculty for humour had grown from a cavity to "a Mount Everest." Stern pointed out that whatever his public hilarity over phrenology, the detailed delineation perhaps was not far from Clemen's true personality. It was accurate enough for him to return a third time later in life to discover the secrets within his head.¹

If Clemen had an ambiguous attitude towards health reforms, there was no doubt he had plenty of company in that indecision. If one were to accept water as a healing agent, for example, did one have to accept a vegetarian life-style? If one felt that phrenology held clues to human nature, did that mean that one's life was to be conducted on the austere plan devised by phrenologists? If some of the ideas made sense,² why not incorporate them into allopathic therapeutics and forget the world vision of health reformers? For many people in the late 19th century these questions posed a profound dilemma.

Clemen's humour may have set the standard of ridicule for health reformers, and in present times this denigration of phrenology may be the main recognition the 19th-century science receives,³ but to health reformers the public's disdain for their ideas and their work was more than a cross that they had to bear.⁶ It was an indication of the depth of ignorance and folly that they felt they had to overcome in order to bring about their vision.
One of the major obstacles that hindered health reformers, and indeed affected all people, was the prevalence of ill-health throughout all levels of society. In 1864 school-girl Sarah H. Ellas wrote to her father who was recuperating from small-pox, and noted that not only had she had measles (which made her feel like when she had had diphtheria), but she had a side-ache and a sore neck; Uncle Addison had a swollen face; Grandmother had a severe cough; Mary - whose children had received a smallpox vaccination - had a lame ankle; and Emma had just recovered from the measles. James Barry, the Nova Scotian miller, may be an extreme example of poor health; his diary is a litany of illness. "I would almost suit the lamentable description of the Church by Isaiah Chap. 7: 5, 6 verses: - "The whole of the head is sick and the whole heart (that is the only thing sound and strong about me, except the doodle) is faint. From the sole of the feet to the crown of the head there is no soundness in it, but wounds and bruises, and petrifying sores!" Barry’s approach to a system of therapeutics, however, like many other persons', was haphazard and eclectic. He relied on patent medicines, for example, despite the fact that they were seldom beneficial and often harmful. Lydia Pinkham’s patent medicine, for example, was touted as a cure for many diseases, not because of its efficacy but because of the ailment’s potential to attract customers. Wrote her son, Dan, "I think there is one thing we are missing it on; and that is; not
having something on the pamphlets in regard to Kidney Complaints as about half of the people are either troubled with Kidney complaints or else they think they are." When one woman wrote to say that she had received no benefit after 11 bottles of medicine, Lydia Pinkham informed her that she had improved, even though she "did not realize it just now." 9

Alcohol also played a role in Barry's stock pile of cures, as did doctors, druggists, and "quack doctors." His ill health and poor condition dominated his thoughts and his diary, and he often felt at death's door. On 31 December 1857, he believed his days were numbered; in January 1860 he knew he would not survive; and in March of that year, he believed his cold, "would finish me sometime, no human being can stand it long at this rate." 10 He penned a poem addressed to the "Winter of 1856," celebrating his victory over the colds and sicknesses of the season:

Many winters I have seen
And many more may I see;
And many bad ones has there been
But none of them like unto this.

Thou kept my nose stuffed full of cold
My eyes afloat in water.
And racked my guts with pain untold.
That made me as mad [as] a hatter.

Pains in my back and around my belly
And in place I will not tell ye
And a Diarrhoea in my guts
That almost put me out of my wits
But thou art gone, and here am I;
And while youre [sic] handy, take thou good bye
And may you never come back again.
To rack me fore and aft with pain.
Pray, stop a moment - turn about
Kiss my arse, and then clear out.11
With health, or the lack thereof, foremost in many people's minds, it was no wonder that they would turn to heroic medicine, alternative regimens, patent medicines, miracle cures,¹² and a host of other remedies. If nothing else worked, then there was magic; a mad stone would, for example, cure hydrophobia.¹³ And, every household had its collection of "Receipts" for ailments. For pneumonia one placed ten to twelve raw chopped onions and a large spider over a fire; and then added rye meal and vinegar to make a thick paste. Simmered for 5 to 10 minutes, this would make a hot poultice to be placed on the sick person's chest. This reportedly had cured at least four persons, and had been passed on by a physician.¹⁴

Sometimes illogical cures attracted the desperate. In 1867 in Torbay, Newfoundland, fisher-folk ducked underneath the belly of an ass in the hopes of finding a remedy for their ailments.

Credulous people have supposed that the limit to simplicity in medical treatment had been reached by the discovery of Holloway's Pills and Dr. Barry's Arabica Revalenta Food. Any such supposition, however, is altogether erroneous. There is a far simpler treatment and that is, passing under the belly of a Torbay Jack-ass. I ought, perhaps, to have written the Torbay Jack-ass, as the animal in question is said to be the only genuine representative of his species in the country. "No more mineral poisons," nor vegetable ones either! There is "hope for the afflicted" now, in earnest. On Saturday last, the doctor made a visiting tour about and around the town, when scores of squalling B[abies], afflicted with hooping[sic]-cough, were compelled by intelligent elderly females to take the asinine road to health. There can be no doubt whatever, that the remedy is as efficacious in the
cure of all other diseases as in that of whooping-cough.

The correspondent who reported this incident noted that the first inference of this was, "it doesn't follow that because the ass is a doctor that the doctor should be an ass . . . . And if it did, it doesn't follow that because the doctor is an ass, his patients should have sufficient intelligence to discover that fact." Charging a one shilling fee - for the health of an entire family - the enterprising "ass purveyor" made at least enough to purchase a pair of boots.\(^\text{15}\) The popularity of a variety of home cures demonstrates the desperation of patients and their families.

Many persons would have felt that health reforms were just as silly as these remedies appear in hindsight, but, it must be remembered that allopathic treatments were often as useless, and as harmful as quack cures. Indeed, allopathic acceptance of new ideas, such as the germ theory of disease, was not always swift nor was it all encompassing.\(^\text{16}\) There were vast problems in operating a hygienic surgery, noted New York doctor, T. H. Squires, adding that while he supported Lister's principles, he had difficulty implementing them in his practise. While the world might be full of hazardous bacteria, he felt "the dangerous ones do not swarm around every patient." He noted one case where a married patient died of peritonitis, and his next two obstetrical patients (and apparently some surgical patients) then contracted the disease. He had taken precautions after that and declined to
attend obstetrical cases for a time. Still, despite the use of disinfectants and germicides, an obstetrical case died when he again began to attend cases a month later. It was truly difficult to operate a hygienic practice. 17

Doctors often were aware that liquor had no therapeutic value, but they continued to advocate its use in some cases. Questioned by the Woman’s Christian Temperance Union, Dr. Thomas W. Musgrove, the Secretary of the New Brunswick Medical Society, noted that alcoholic beverages were neither necessary nor helpful to healthy persons, but argued that doctors felt that they were "beneficial in many diseases, and that in the present state of our knowledge we know of no substitute for them of equal efficacy; but when prescribed, judgement, care and discrimination should be exercised." Asked in what types of cases alcohol should be supplied, he condescendingly replied that the answer would fill a volume, "which, we presume, would not be understood by our questioners. All questions of prescriptions must be left to the learning and judgement of the attending physician." Yet Musgrave noted to the society that he felt that "Physicians in this province have been using alcohol far too recklessly." At the same meeting another doctor suggested that alcohol was seldom a medicine, and that he had found that he was able to complete more work now that he abstained from alcoholic stimulants. There were doctors, however, who felt that alcohol was an excellent stimulant, and still others who disregarded the
therapeutic question, and suggested that any resolution to discontinue the use of alcohol as a curative, might look as if the society was condemning some of its own members.\textsuperscript{18}

Just as regular physicians dispensed poisonous drugs, there were often dangers in the use and abuse of the patent medicines advertised in every newspaper. Hop Bitters would save a patient over $1000 a year in physician’s bills, claimed one advertisement. Dr. Halsy’s Forest Wine and Forest Pills, containing no drugs or minerals and only pure extract of plants, could cure not only bilious and stomach disorders and bowel problems, but, as well, asthma, dyspepsia, indigestion, rheumatism, ague, fever, chills, boils, ulcers, blotches, scabbed head, ring-worm, sore eyes, and female obstructions including "the most distressing forms of these complaints."

No wonder that when a patent medicine man posted handbills around a village, the local press quipped that overnight 15 goats had eaten enough medical information to run an eclectic college.\textsuperscript{19} The possible consequences of patent medicine were summed up in the Water-Cure Journal:

\begin{align*}
\text{I was well;} \\
\text{Wished to be better.} \\
\text{Took physic,} \\
\text{And here I lie.} \textsuperscript{20}
\end{align*}

The whole situation was perplexing and paradoxical for health reformers. After all, in their world vision the goal of individual and social harmony was within reach. It was the 19th century, the height of civilisation, and men and women stood on the edge of perfection. At the same time, however,
the amount of physical, moral, and mental degeneration was appalling to many late Victorians. How could perfection be attained if drunkards roamed the streets, if sanitary measures were ignored, if women were only agile enough to bow down to fashion, if children were cramped into over-crowded, poorly ventilated, and dirty school houses, and were expected to comprehend matters far too complex and taxing for their physical and mental reserves? In addition, health reformers found that allopathic doctors chose not only to hinder and belittle their work, but continued in their practice of heroic medicine. For health reformers, there seemed to be a race between degeneration and regeneration, a classical fight between evil and good. The solution to the crises, lay in accepting the veracity of their ideas, and allowing nature full rein to help in the re-creation of individuals and society. Given the therapeutic ineffectiveness of most remedies, it is not surprising that the various health reforms, stressing those benefits of nature, made headway. Many persons felt that orthodox medicine was dangerous. Writing to the Water Cure Journal from Picton, Canada West, H. E. B. wrote, "If there is one spot on God’s green earth where the truths you teach are especially needed more than another, it is our pleasant and naturally salubrious country, but where, from ignorance, our people are suffering intolerably from almost all forms of disease. Allopathy promotes this ill health . . .[since] our people are not a reading people."
Many medical doctors saw the issue in a different perspective, as Robert Nye has argued. They believed that biological determinism lay at the root of the problem. Hence there was an ever-increasing birth rate, a danger of race suicide, a fear of immorality, and a rapid degeneration of inferior types. While health reformers often supported similar ideas, doctors felt that with their scientific knowledge, they should be the arbitrators in the battle for health. Not only would they try to expand their area of expertise, but, physicians suggested that their hegemonic position and the support of the people gave them at once the right to expand their area of expertise beyond the boundaries of regular medicine. The race between Health Reform and Nature, and Allopathic Medicine and Science probably was never balanced, but throughout the century it endured. The basis of the alternative system was Nature, and reformers would attack and berate their competition for its failure to heed natural laws. Allopathic physicians claimed that their remedies were scientific, and with Science on their side they could belittle and degrade the remedies of the irregulars with impunity, even while they seldom could offer cures. Attacks by allopaths on phrenology, watercure, nutrition, and other reform ideas were common and often brought a vigorous response from the reformers.

By the end of the 19th century, allopathy and science had ousted health reformers from whatever credibility they still
maintained. They achieved this distinction in part through the development and acceptance of scientific truths, in particular the discovery of the germ theory. But the successful cooptation of alternative techniques, and the denigration of irregular treatments and ideas also aided in the development of an allopathic hegemony. In addition, the increasingly eclectic treatments of health reformers, as they struggled to maintain their legitimacy and their ideology, and the always present "quacks" who undermined the health reform platform by the wanton and uneducated misuse of its ideas and ideals in the search for profits, also aided in establishing regular medicine's dominance. The techniques of professionalization adapted by allopaths also helped to secure their dominant position, as physicians appealed increasingly to middle-class patients convinced of the legitimacy of proper education and scientific endeavours.24

If health reformers had a great deal of opposition and competition to contend with, the situation was no different for the allopathic professionals at mid-century. Not only did they have the issue of their own therapeutic ineffectiveness to face, they often had to undertake the disciplining of physicians who stepped outside the boundaries of acceptable medicine and utilized alternative measures on their patients. This was a grave problem, since the admission of their own inability, and the success or possibility of success of other methods, was threatening to allopathic medicine.
Orthodox physicians were careful, therefore, to attempt to restrict the practice of medicine to those who followed the allopathic tenets. As a result they attempted to control access to medical schools and to hospitals. Various legislative procedures, medical organizations, and an opposition to any competition, were all part of this process. This exclusiveness had long been a part of orthodox practice. In 1848 the founding constitution of the American Medical Association restricted membership to regular physicians, and attempted to exclude, "all Homeopathic, hydropathic, chronothermal and botanic physicians, and also all mesmeric and clairvoyant pretenders to the healing art, and all others who at any time or on any pretext claim particular merits for their practices not founded on the best system of physiology and pathology, as taught in the best schools in Europe and America." In Canada, especially in Quebec and Ontario, due to the strength of the alternative groups the allopathic progress towards a monopoly was less swift; still regular physicians challenged all forms of competition.25

Homeopathic practitioners were trying to gain a foothold on the allopathic platform; doctors needed, one New York physician claimed, "to shove them off and let them swim or sink alone. According to the [medical] code they are not fit associates in consultation." Homeopathic medicine, for example, he added "never an off-spring of science, but was the child of cunning."26 Ultimately, unlike other irregular
therapies, homeopathy has limped along until the present day. As Phillip A. Nicholls has argued the enforced "isolation" and "sectarianism" of the homeopathic profession did not mean that the allopathic profession "refrained from epistemological intercourse with the outcasts. In short the orthodox profession had consorted with the knave, and the union had resulted in the birth and growth of bastard homeopathy." 27

For health reformers, adverse to all medications in any dosage, the confrontation would be fatal. Allopathic physicians gradually recognized the danger or futility of their therapeutic practices, and at the same time, they undermined the alternative. In the case of health reformers, this often was most difficult. After all, health reform techniques had a certain favourable reputation, promoted both by the leaders of the movement, and by those grateful patients who believed that they had benefitted from a regimen. In hindsight, there can be no doubt that a sensible diet, based on grains, fruits and vegetables and which avoided the pernicious and trichinosis-bearing pork, if not all other meats, was healthful. A regimen which advocated pure water, rest, fresh air, exercise, better dress habits, temperance and sanitation, to say nothing of the relaxation provided by a stay in a sanatorium, helped improve many patients' health, even if an actual cure for their condition never emerged. The most sensible way to defeat this threat to the hegemony of allopathic medicine, was both to denigrate the health reformers
and to incorporate some of their least offensive methods into allopathic medicine. Allopathic physicians also took measures against those irregulars who practised in their neighbourhood. In 1909, for example, in Elmira, New York, a committee of physicians was established to see what action could be taken against "certain irregular practitioners of the city." The action in this case was to spend $10.00 to hire detectives to try and obtain legal evidence against a particular irregular. The final result was the departure of the person from the city. 28

As well as challenge usurpers, allopaths also had to defeat the popularity of patent medicines, a task difficult to complete with the flood of advertisements, and with groups such as the Kickapoo Medicine company, which toured areas dispensing their Indian Tonic and Rattlesnake Oil, and with individuals such as Anthony McDonald, who travelled through the eastern part of Prince Edward Island with a medicine wagon stocked with his veterinarian brother’s household remedies. 29

One physician argued that patients needed mystery about their cures; as a result they resisted "scientific rational measures in medical treatment and insist[ed] so strongly upon some illegitimate and inadequate course, as to put the honest physician's patience to its last resorts." 10

This was not, of course, an across-the-board plan to destroy all opposition. It must be remembered that the ideology of the health reformer's cures often went against the
education, training, and beliefs of allopathic doctors, and, their enmity to these treatments was quite logical. The credibility of reform therapeutics simply did not always connect to the reality of the allopathic tradition; it would have been quite easy to condemn their procedures. The reform ideology, which often endorsed such radical views as woman's rights, including suffrage, marriage reform, and economic equality, spiritualism, and communitarianism, was no doubt alien to many late 19th century practitioners. Furthermore, there is no doubt that health reformers became victims due to their own unrestrained attacks on the allopathic system.  

Between the new emphasis on sanitation and public health, and the developments in the understanding of disease etiology, there was a growing awareness that, however misinformed and untrained (in the orthodox sense), health reformers might be, limited acceptance of their therapeutics offered allopaths and patients certain benefits. Also, although health reformers claimed to be the originators of their therapeutic remedies, ideas about the "nonnaturals" were often a part of the allopathic tradition.

In addition, there was never a clear demarcation between allopathic medicine and health reforms. Part of this was due to the blurring of the boundaries between each group: health reformers sometimes held allopathic licences, and allopaths often utilized reform techniques, either because they believed in them, or because they were willing to try alternative reme-
dies. Almira L. Fowler, for example, one of the half-sisters of phrenologists Orson and Lorenzo Fowler, graduated as a medical doctor from the Women's Medical College in Philadelphia, and had been a demonstrator of anatomy at the Boston Medical College. After her graduation she became involved in homeopathic medicine and had "one of the largest practices in the Oranges." Lydia Folger Fowler held an allopathic licence and yet supported phrenology. Silas Gleason, of the Elmira Water-Cure held a regular licence, but his wife gained her experience by studying under his tutelage. The Hygio-Therapeutic College held a charter to confer upon its graduates the degree of medical doctor. With this vague delineation between one group of practitioners and the other, if need be, and if conscience permitted, one could easily slide from one therapeutic approach to another.  

For those committed to allopathic medicine, the solution to this problem of competition lay in the successful cooptation of health reform therapeutics and in the incorporation of their techniques into the allopathic arsenal, without giving credence to the irregular supporters, and without subscribing to the world vision propagated by health reformers. Doctors were not unaware of the fact that nature often cured where they could not. The president of the Medical Association of Southern Central New York, H. N. Eastman, mourned, "[S]o large a portion of our maladies disappear, after a time, without the aid of judicious treatment, nay, that often resist the worst
medication and are cured by the efforts of nature." Other cases proved fatal no matter what was done. Doctors were left in a dilemma.

[Whoever engages in the practice of medicine must inevitably turn quack, abandon his calling or distinguish himself by more than common skill and devotion to his profession, or be content to drag out a miserable existence on the confines of poverty and wretchedness, without even the enjoyment or the deference which the ill-acquired wealth of the base pretender often commands from the masses, or the real respect which true merit always deserves from those capable of appreciating solid worth.

Those who left allopathic medicine to practise in another system, argued this doctor, did so because they had failed to gain the fame or wealth that they had desired. He dismissed the rest of the alternative practitioners as a "multitude of dyspeptic clergymen, broken[-]down lawyers, bankrupt merchants, conceited mechanics and nervous females." 36

If medical doctors did not subscribe to the ideology of health reform, it does not mean that they were insensitive to or ignorant of the degeneration that they saw around them. It would have been impossible to miss the prostitution, poverty, insanity, filth, crime, and public drunkenness, that menaced the public. The need for sanitation and public health measures increasingly was obvious in this, the gilded age, and physicians countered with both their legislative influence and their humanitarianism. Where the allopaths and the irregulars differed was in their interpretation of the causes of the problems and their solutions. Doctors blamed problems on a
failure of the population to heed science and their interpretation of its laws. As the allopathic tradition gained dominance, biological determinism became paramount as the causation of the degeneration and deviance that surrounded late 19th century society. The very language of degeneracy would become integrated into the consciousness of those in the late Victorian era and beyond."

Medical doctors increasingly argued that they and their knowledge of science could solve the problem of degeneration. Dr. Daniel Holmes of New York, argued that the first man had no need of physiological knowledge; before the fall he had been perfect. Now there was a need for that knowledge and doctors had gained it after "patient long continued and persevering study & [sic] observation." Now that "darkness has been removed: mind has arisen in its might and asserted its dominion, civilization has been regenerated and the cloisters of the convent unlocked, and Science and Art come forth in their native parity and vigour, to resuscitate and illumine a gloomy and benighted world."

Physicians believed that they alone possessed the scientific knowledge that could lead to better health. With that key and the cooptation of reform ideas, nature and science could unite to produce a population of robust and balanced men, women, and children.

Health reformers had long been concerned about the delicate nature of the tri-partite equilibrium. This was true of schoolchildren as they struggled to understand difficult
concepts under unhygienic conditions, of women who were either
over- or under-worked, and of men who struggled in the
business world. Poor sanitation, unhygienic conditions,
unhealthy physiology, excessive mental strain, all became
common concerns. Dr. W. H. Hattie, the Assistant Physician at
the Nova Scotia Hospital for the Insane, was just one doctor
who, in the process of offering an interpretation of insanity
and mental illness, incorporated the techniques and arguments
of health reform, and nature into his work. Near the end of
the century, Hattie, along with a host of others, would
combine Darwinism, hereditary ideas, and health reform
arguments to make a plea for physical education that sounded
much like the competition.

The ceaseless activity of mind which to-day char-
acterizes the fittest to survive reacts not alone
upon his unfortunate offspring. The abnormal life
which is led by the present generation of business
men— the worry, the toil, the excitement, the
suspense attendant upon the manipulation of "deals"
—amounts simply to abusive exercise of the higher
function without any opportunity being afforded for
a correlative development of the system of as a
whole.

This increased tendency towards insanity threatened the whole
of civilization, Hattie argued, backing up his assertions by
citing an article from the American Journal of Insanity.
Invoking the health reform call for a balanced mental, moral
and physical state, he argued that "Physical training should
become a primary and all important consideration in our public
school system. It should have the undivided attention of an
instructor educated in physiology, hygiene, and physical
culture, should be compulsory in every grade of promotion from the most primary to the most advanced classes, and should be allotted sufficient time to permit of its efficient application." In 1884 Dr. George Leland lectured to the Boston Ladies' Physiological Institute on the value of physical culture. He noted that while Boston prided itself on aesthetic and spiritual culture, it failed to consider physical culture. Ignoring the important contribution of Dio Lewis to that city in particular, Leland noted, "[B]y regular and judicious exercise the muscles become larger and firmer and more healthy, that Physical culture should be the most essential thing for children, that a boy or girl should have more attention paid to that than mental culture." Dr. Dudley Sargent, at that time the assistant professor of Physical Training at Harvard University and of the Normal School of Physical Training. He spoke about physical training, proper food, and exercise for all parts of the body. Other medical doctors who lectured that year also incorporated health reform ideas into their therapies."

By the latter part of the century the specially trained instructor of physical education, for example, would be a medical doctor, who was the expert in the science of physiology. A textbook on Mechano-therapy, a "remedial agent," which aided nature in the battle against disease, appeared in 1899. The author, once a lieutenant in the Swedish army, and now the house physician at the City Hospital, New York,
praised the work, not of the many health reformers who had long advocated physical exercises as an important part of nature's cure, but the well-known doctor of neurasthenia, Weir Mitchell. It was Mitchell, claimed the writer, who "introduced this science in America, to grasp it, as it were, from the hands of quackery and bring it under the control of the medical profession." The writer did acknowledge the Swedish roots of the system and that there had been a slight contribution from others, such as Baron Nils Posse of the Boston Normal School of Gymnastics, but what remained important was the fact that the system now was under the control of the medical profession with their scientific training in physiology.49

One must question just how different these allopathic ideas were from earlier ones which had been long proffered by health reformers. In *Hereditary Descent: Its Laws and Facts Applied to Human Development*, (1847), Orson Fowler argued that children inherited their characteristics from their parents. He mourned that humans carefully bred their stock yet paid little attention to the question of begetting healthy children. Healthy partners had to be chosen. A predisposition for insanity could be passed from one generation to another, he argued. This tendency could be modified if persons tried to follow hygienic lifestyles. Fowler, like eugenists in the future, would explore racial differences. Phrenology showed, he claimed, that Africans, with their love
of children and music, would make good nurses. Native Africans had better developed heads than those in the United States, he commented. "The heads of heathen Africa superior to those of Christian and republican America!" White America owed a great moral duty to this race, he suggested, dragged down more by slavery, than by their inferior culture. Jews had a love of acquisitiveness and were deceitful, although not so much so as the American native. Children in alms-houses showed large Amativeness and had generally had licentious parents. Wealth might have benefits, he noted, but it made its owners unhealthy. Life partners should be chosen based in their characteristics and life style, not their wealth. By the early part of the 20th century, many of these ideas would exist in the minds of eugenists. Just as Fowler had used his science, phrenology, to explain his own racial concepts, so too would the new eugenists justify their racist positions with science and hereditarian ideas."

In a similar fashion, physicians at the turn of the century used science to advocate both physical labour and exercises as prescriptions to combat mental and physical illness. Dr. George Lincoln Walton, a consulting neurologist at the Massachusetts General Hospital, credited physical culture advocate, Amy Morris Homans, the Director of the Boston School of Gymnastics, for asking him to make an address upon which he based a book about worry. He suggested that "Communion with Nature has a peculiarly soothing effect on
tired and jangled nerves," and praised exercise as an antidote. Work was an excellent cure for "incurables" in lunatic asylums; not only would it provide good results, it was cheaper. "We know of no good reason why labor, both agricultural and mechanica] should not be prescribed and enforced, if necessary as part of the hygienic and curative treatment, just as medicine is prescribed and given. Of the two, employment is much more useful and efficacious," said one report. In view of the worrisome cost of incarcerating the insane, ideas such as these served a two-fold purpose. They offered a financially responsible way to deal with the residuum and outsiders of society, and they suggested a humane way of resolving a growing problem.

Enforced labour was a solution which seemed manifestly better than the common poorhouse or insane asylum. Problems in these institutions were revealed every day in the press. At one institution in Pennsylvania the women were kept partially or totally naked; there was no furniture, little heat, and the occupants were covered with vermin. At another twelve insane inmates were confined; some were held in chains with one person being chained from the ceiling; six had only straw litters, and none of the patients received fresh air. These conditions made "the day and night hideous with the distressing shrieks and yells of the wretched and maltreated madmen." In a searing expose, a reporter feigned mental illness and quickly was committed to the Bloomingdale Asylum.
His aversion to brandy and peppermint seemed to confirm his case; although that was helped by his "harmless vagaries and a series of demented observations." Not only was the cost of the room far too high, $20.00 per week, and worth only $2.00, but the treatment was dubious.

The medical treatment was one dose of quinine and four interrogations from a doctor that received a sane man as crazy, which interrogatories were always, "Well, how do you feel?" The moral treatment comprised the removal of all his clothes, the theft of a collar button, the refusal of printed matter and writing materials, the supplying him with damp sheets, the saturation of his room with chloride of lime and soap suds, and the quartering him amid howling lunatics. We must not forget to say the deputy-keeper once offered to play him a game of seven-up.44

The concern with idleness went beyond the walls of the institution; boredom due to lack of work could beget many problems: vagrancy, insanity, depression, crime, poverty, as well as burden governments with relief payments. It all depended on just who was not working and why.45 There was much criticism of those who were able to work, but did not; their impoverishment was considered their own misfortune and due to intemperance, ignorance, laziness, promiscuity or all of these. If some men were blamed for not providing for their families, women, too, were criticized for their maternal failings and their lack of housekeeping skills. In 1862 a Newfoundland newspaper condemned one unemployed person, repeatedly on relief, for his lack of initiative, and for having a "careless, dirty duck of a wife, ... what he brings in by the door ducky takes very little care to prevent it
flying out the window." Work, voluntary or enforced, would give such people both physical fitness and mental robustness, and as well, lower the relief statistics eliminating a growing problem of the age. This was an analysis which took little account of its racial, gender, and class prejudices. A poem, published in Newfoundland, condemned the idler who was content to live off "Government pay."

'Tis sorry I'd be to go tilling the land,
To find that hard work is not asy;
Be me soul but I fancy I'd much rather stand
At the street corners, drink and be lazy.
Do yez want me to fish when October comes in,
Wid de fog and de frost on de ocean;
O, faix its meself that would think it a sin
Thus to perish alive, I've a notion.
Is it work on a wharf for four shillings a day
And try to provide for the winter;
I would rather by far take Government pay,
"Tis aiser had, and pleasanter.
True for yez, I'm lusty, young, well-fed and strong.
Well-housed, warmly clad -how, no matter,
And apt to insult folks as they pass along
At night, when I'm out on the batter.
Increase the police! Is it send me to gaol!
'Tis little that same would annoy me;
There's nothing I dread but the cat-o'-nine tail,
Or the chain-gang on roads to employ me."  

Mandatory labour, according to its supporters, would alleviate much poverty, lower the expenses of poor houses and other institutions and improve the health and morals of the insane and criminal-minded. Ultimately, whatever the accepted reason for unemployment, the physiological problem that resulted was a disturbance in the natural equilibrium of the mental, moral, and physical state.

For the ill person, work or exercise was often touted as a beneficial remedy. "Out of door exposure with some work
will be a better restorer than all the medicines I have taken or may take," suggested one person in ill-health in 1865. A doctor suggested suffragist, temperance leader, and socialist Francis Willard suffered from nervous exhaustion until she was persuaded to take up bicycle riding. In 1910 Boston doctor Paul W. Golds burg praised physical culture for its paradoxical quality; it could give the body needed stimulation, yet it provided rest after sedentary work. Physicians and lay persons generally accepted the need for a balance between work or exercise and rest; they also accepted the notion of a healthy and harmonious mental and physical state. In 1909 Dr. G. L. Walton, quoted physical culture and Delsarte exercise promoter, Annie Payson Call: "Rest must be complete when taken and must balance the effort in work - rest meaning often some form of recreation as well as the passive rest of sleep." Recuperating patients were advised not to get depressed or discouraged since "a stout courage is no mean curative." In 1894 Dr. William Bayard argued in the Dominion Medical Monthly that education could defeat degeneracy through the "[U]niform development of all powers," and that that should be its aim.47

The concern with a tri-partite equilibrium and the fear that North Americans were degenerating permeated both the medical profession and the lay population. Typically women were the ones who needed the most help in their re-creation. At the University of Wisconsin female students were given a
course in how to rest. It was believed that many arrived at university on the brink of nervous breakdown simply because they could not control or conserve their nervous energy. Out of 175 students, scores of young women allegedly were saved from nervous collapse in only one year.48

Ever since Dr. Edward Clarke had cautioned about the dangers of educating young girls at a time when they needed their energy for reproductive growth, women had worried about the problem of ill-health and college-life. In 1885 a study done by the Association of Collegiate Alumni expressed relief and reported that almost all of their respondents felt capable of handling the demands of higher education. Of 705 female college graduates 138 or 19.58% had suffered a deterioration of health in college. Of 1032 working girls, 166 or 16.09% had experienced a decline in health. Only four of the 166 had good health, 128 were in fair health, and 34 were in poor condition. Of college girls 42 had declined from excellent to good health. Still, almost as many had reported that their health had improved with college education. The report concluded that an individual predisposition to ill-health, and not higher education, caused the problem. If studies showed that women were holding their own through the rigours of higher education, their gender’s natural stamina was never credited, but rather outside elements such as physical culture which helped them to improve their inferior physiology. The Massachusetts Bureau of Labor Statistics sent questionnaires
to 700 women's schools and colleges to discover the relationship of education and women's health. The result, said Dr. Lewis W. Pendleton to the graduating class of the Albany Medical College, showed that a course of education was more beneficial than harmful. It offered young women a chance to develop "steady control," something they were unable to attain without help. Mental and physical discipline could be learned through a program of brainwork and physical education. "The real object . . . is to have a well-poised and symmetrical frame, a heart that never weakens in its regular pulsation, a nervous system that will hold its vigor under the surprises and depressions of real life."49

The question of mental imbalance, from whatever cause, was of utmost importance to women. They, after all, were viewed as the most common victims of the problem, and furthermore, were often easily incarcerated in asylums for trivial or minor reasons. Said one horrified correspondent to a newspaper, "I fear to enumerate the trivial grounds on which fathers commit their daughters to this living tomb, and I am amazed at the levity with which women generally are deprived of their liberty by daughters, husbands, and fathers." Attempts to cure their supposed insanity were brutal and abuse proliferated at asylums. At the Illinois State Asylum women were tied hand and foot, or placed in a strait-jacket and plunged into cold water, their heads held under water. A Miss Jane Barackman reportedly lost the ability to speak after
mistreatment in an asylum, while another woman died following a beating, and a third remained bruised several weeks after an attack by two attendants. This asylum was investigated after a clergymen’s wife, a Mrs. Packard, escaped and subsequently was found sane. She publicized her experience; she had been confined by her husband when she changed her religious beliefs. This event was the catalyst for the Personal Liberty or Packard Law of Illinois. It provided for a trial in order to prove lunacy. Some remained unconvinced of its value; John B. Chapin, Director of the Willard Asylum, argued that this was both expensive and unnecessary.\(^5\)

While the prevention of insanity and imbalance and insanity in women was important there was also a need to maintain and protect their reproductive potential. One way to do this was through physical culture. In 1904 Dr. James H. McBride noted that the goal of education should be to make a sound and healthy body, and to help form character through mental and moral discipline. One of the drawbacks to female students acquiring this personal knowledge, he suggested, was their unhygienic dress which especially hindered exercise routines. Ignoring health reformer’s long time demand for rational dress, McBride argued that only physicians understood the misery caused by this problem.\(^6\)

Special care needed to be taken during puberty, warned a 1905 editorial in the *Dominion Medical Monthly*, since “the integrity of a nation depends upon the physical and mental
qualities of its individual constituents . . . ." The good effects of military drill, for example, could be lost because of the mental strain from those same exercises. "All such exercises should be undoubtably under the supervision of a careful physician." 52

Women and girls were not the only victims of an inharmonious state, however. Dr. Edouard Brown-Sequard gave a lecture at the Lowell Institute in Boston on the effects of irritating or injuring the nerves demonstrating his argument with a number of cases. He was a respected expert on insanity and his work on the concept of brain duality, "that each hemisphere [was] a complete brain for the activities of intellectual life," had challenged those who supported cerebral localization. He suggested that the educational system failed to develop both sides of the brain; the result was children with mental and physical problems. For his audience, no case was more demonstrable of the effects of disequilibrium than Dr. Brown-Sequard, himself. During his lecture he became so afflicted that he was unable to continue. "This very event perhaps illustrates as well as any which the lecturer related, the effect of a shock of the nervous system. Here was a disciplined man," claimed a reporter, "whose calm experience embraced the most difficult operations of surgery. But his nervous system was suddenly overcome by sympathy with the sufferings of a patient and friend, so that he was unable
to continue the simple mental effort of repeating audibly the rest of a manuscript which was lying before him."53

Brown-Sequard was a survivor of imbalances; numerous reports recounted tales of less fortunate victims. Dr. J.H.W. Young, a recent graduate of medicine, and the winner of the highest staff position at Bellevue Hospital, New York died of septicaemia, after wounding himself. According to the report, after a hard winter's work, his energy levels were so depleted that he could not fight the infection. "If it is to be inferred that overwork contributed in any degree to the fatal result of the wound, this sad case should be a warning to ambitious students not to [over exert] themselves, even for an apparently desirable object!" Even those who participated in athletic activity could be at risk because of worry and excitement. For example, a number of baseball personages committed suicide over the pressures from professional sport. James Whitfield, president of the Western League and sporting editor of the Kansas Star, committed suicide by gunshot; he was over-worked due to the pressures of the two jobs. Charles Stahl, captain and manager of the Boston American League team, committed suicide by carbolic acid after his club failed to get a good position in the race for a pennant. Harry C. Pulliam, president of the National League, shot himself after a vacation failed to cure him of "a deplorable nervous condition brought on by many baseball controversies. Michael P. Hines, a former member of the Boston team, died in an
insane asylum. The list of those who succumbed to the effects of disequilibrium, emphasized the need for appropriate physical, mental, and moral health.54

John K. Mitchell, a Fellow of The College of Physicians, Philadelphia, and the attending physician of the Philadelphia Orthopaedic Hospital tackled this issue of the "hygiene of nervousness." In 1901 he published a number of articles in *Harper's Bazaar*, which in 1909 were published as a monograph, *Self Help for Nervous Women: Familiar Talks on Economy in Nervous Exhaustion*. Mitchell combined the popularization of a medical subject with the health reform ideology. He noted that although nervousness could apply to men, it usually struck women. Yielding to extravagant emotions was "weak-minded," he noted; still, too much self-control was repressive and harmful. "For this habit of unnatural repression Nature must take her revenge sooner or later and a time comes when these strong self-controlled women find their emotions will no longer be controlled. There must be an outlet." Thinking, he suggested, brought an excess of blood to the head; this could be controlled by hot foot baths, warm drinks, or a hot water bag to the feet. All of these remedies would reduce the amount of blood and help the person sleep. He noted the "widespread superstitions" about foods, usually spread by the promoter of certain foods or "the honest noisy ignorance of half-educated fanatics." He suggested that an all-meat diet could have benefits; a vegetarian diet, with dairy products,
would be good; but added that a raw food diet was merely a craze and should not be considered. Breakfast foods were fine if one did not take seriously the extravagant claims, nor use them exclusively. He praised physical exercise, especially games for children; gymnastic routines, he felt, might be too regimented for the nervous child. Moral treatment from a religious mentor could also help, he suggested, adding that the Roman Catholic priest’s power often helped in the control of nervous disorders. Hypnotism was suspect, he noted, adding that the medical profession felt that it was dangerous and that it could lead to the deterioration of character. All in all, he felt that a sound mind, a sound body and a sound life were necessary for good health. Standing behind his professional title, Mitchell at once denigrated health reformers, and offered their ideas in a new guise of scientific medicine.55

The physical, mental, and moral problems caused by masturbation and sexual excess concerned physicians as well. It was important that self control be taught, one doctor claimed, to prevent children from acquiring immoral ideas and habits. He added that medical doctors gradually had come to believe that the dangers of self-abuse had been exaggerated; still, he felt that perverse sexuality in children, such as homosexuality, needed to be watched, although it was not necessarily a life-long problem. Neurologist Edward Spitzka noted that while mental labour itself would not cause insani-
ty, it could have that effect if combined with a physical imbalance. He cautioned that while masturbation caused no special form of insanity, "melancholia, stuporous insanity, katatonia, [sic] and insanity of pubescence [were] the forms most frequently found in masturbators." Corporal punishment was a just solution to the problem, he suggested, although he cautioned that neither the child nor punisher should receive a perverse thrill from flagellation. Dr. E. B. Lowry published articles and a monograph on False Modesty. He berated the immorality of the day, and added that both boys and girls needed to be taught the facts of life, and the dangers of self-abuse. Light, "nerve-quieting" exercise, rest during the menstrual period, loose clothing and plain nourishing food were needed by young girls. Dr. Alfred Schofield, a well-published British physician, wrote a book on Nerves in Disorder. He argued, "We must remember that health itself is but a condition of unstable equilibrium, and a very little push upsets the balance, and produces dis-ease - health being, of course, ease." Properly directed physical education programmes would help to overcome the problems caused by sexual and amoral imbalance.

If physicians came more and more to cite support for physical culture and a physician's role in that area, they also slowly incorporated ideas of phrenology into medical practice. True, they never admitted that leap; phrenological ideas would emerge as psychology, or anthropology, or cerebral
localization, never as the evolution of the subject of phrenology. Still, the study of skull and brain size and function kept eminent scientists and phrenologists busy. This study of skulls was sometimes referred to as craniology, and it would play an important role in the work of hereditarian and eugenist, Francis Galton. Gall and subsequent phrenologists had rejected the term "craniology," feeling that it was too learned and elitist for the general public; they preferred the term, phrenology. Orson Fowler had denounced the professional world for "calling things by names which few understand . . . . Away with the technicalities of science." Children could be taught about the body, he continued, "when cutting up (I mean dissecting; how unaccountably unclassical I am though), a chicken for dinner, or a hog (I mean swine; for, it is very vulgar to say hog) for salting." Despite what their detractors claimed, phrenologists did not study 'bumps,' but looked for [the] distance from the spinal axis, located at the top of the spinal cord, to the surface of the head where the organs are located. This was another reason for their dismissal of the term, "craniology." As Gall argued, "The object of my researches is the brain. The cranium is only a faithful cast of the external surface of the brain; and is consequently but a minor part of the principal object. This title, then, is as applicable as would be that of [a] maker of rhymes to a poet."
The forensic study of the brains of both rich and poor, brilliant and dull occupied much time. The Fowlers and Samuel Wells were well known for their collection of skulls, kept on display in New York, and they later would collect brains. In Stephen Gould’s words, "the dissection of dead colleagues" in order to measure their brains became "somewhat of a cottage industry." The results of the science, Gould has suggested, would have depressed the owners of the brains since one of the criteria for superiority was thought to be a heavy brain. Walt Whitman "managed to hear America singing" with a brain of 1,282 grams; Franz Josef Gall made his contribution to phrenology with only 1,198 grams of brain power, while J. Spurzheim managed 1,559 grams. The average weight of a man’s brain, without the outer membrane, claimed phrenologist Jessie Fowler, is 48 ounces (1493 grams); the average weight of a woman’s brain, 44 ounces (1369 grams). Arguments about the brain ultimately supported misogynist and racist ideas in the early 20th century.

The brain of George Francis Train, who played no small role in the history of the early American suffrage movement, provides an interesting example of early 20th century studies and the work of doctors and phrenologists. Train had been well-known to Lorenzo Fowler in both England and America. Fowler had examined him in Liverpool in 1860. Jessie Fowler had examined him in 1891 and 1899. The *Phrenological Journal* noted in 1904 that a person had to ignore Train’s eccentrici-
ties; he has been described as a "Champion Crank" who advertised himself as a "lunatic, ass, mountebank, and demagogue." Dr. Carleton Simon presented a death mask of Train to the Institute of Phrenology; it had been Train's special request that this be done. Apparently it had been difficult to remove the brain since *Dura Mater* had attached it to the frontal and parietal bones of the skull. The famed neurologist and president of the New York Neurological Society, Dr. Edward Anthony Spitzka, who had done the autopsy, suggested that this was due to Train's habit of going bareheaded. Dr. Simon attributed the problem to an inflammation which also caused Train's aberrant behaviour. In accepting the gift of the brain, Jessie Fowler noted that she would have liked to have been at the autopsy as she had been when the brain of her aunt, Charlotte Fowler Wells, had been removed. She urged the audience at this presentation to leave their brains to the Phrenological Institution for examination.60

Much of this science of craniology was based on falsified data and the racism of the data compiler. Stephen Gould's book, *The Mismeasure of Man*, points out some of the problems with this scientific examination of the human skull. Samuel George Morton, a Philadelphia physician and anatomist, the owner of a large skull collection, a friend of George Combe, and a man of good reputation, was interested in the relationship of brain size to race. He used his measurements to offer support for the theories of polygeny. Argues Gould, "In
short, and to put it bluntly, Morton's summaries are a patchwork of fudging and finagling in the clear interest of controlling a priori convictions. Yet—and this is the most intriguing aspect of the case—I find no evidence of conscious fraud; indeed, had Morton been a conscious fudger, he would not have published his data so openly." Morton's work showed a marked deficiency of mental powers among Indians; he based his work on "a large sub-sample of small-brained people (Inca-Peruvians) to pull down the Indian average, but excluded just as many small Caucasian skulls to raise the mean of his own group." These ideas, designed to advance science, were not just the work of uneducated and ignorant phrenologists, but the scholarly work of some of the best scientists of the day.

These ideas, long part of a phrenological delineation, became the basis of criminal anthropology; Cesare Lombroso, for example, used them to describe the Chicago Haymarket bombers. Many people easily accepted the notion that physiognomy indicated character and intelligence. The new science was used to depict the evil character of Dracula. Police detectives used the science to identify criminals by the shape of their nose or ears.

Brain research was the basis of much "scientific" proof of the inferiority of women and non-whites, whether that evidence was presented by health reformers or physicians. The lighter weight of the female brain was used to justify and
legitimate women’s inequality. Dr. William A. Hammond, a New York neurologist, was one person who popularized this view. This was disputed by Helen Hamilton Gardener (1853-1925), an author, feminist, freethinker, and suffragist. Aided by neurologist Spitzka, Gardener wrote on "Sex in Brain," later translated into eight languages, and delivered before the International Council of Women, Washington, D.C., in 1888. She admitted that the slight weight difference in male and female brains was due to the fact that the brains of eminent men had been examined, it was usually the brains of women paupers and criminals which were used to represent the female statistics. Furthermore, the links between brain size and intelligence had yet to be determined. Despite this defence of women, brain examinations offered a justification of many of the racist and misogynist ideas of the 19th century and early 20th century, beliefs held by phrenologists, scientists, doctors, eugenists and the public. Until the rise of intelligence quotient testing, which contained its own biases, craniology would remain an important science, a science which had drawn its ideas from phrenological ones.

The examination of brain size aided in the maintenance of the notion of separate spheres. Jessie Fowler was the daughter of Lorenzo Fowler and Lydia Folger Fowler. Born in England, after her parents made it their home in the early 1860s, Jessie studied law, graduating from the Women's Law class of the New York University, and medicine at the London
Medical School for Women, although she never became a qualified doctor. She took over the family firm after the death of Charlotte Fowler Wells, and she led the firm into the 20th century, offering career counselling as well as phrenological delineations. In addition she authored a variety of books combining ideas of health reform and modern science and medicine. Fowler argued that the difference in male and female brain size had to be examined in ratio to body weight. This would mean, according to her calculations, that for men the average ratio was 1:36.50, while in women it was 1:36.46, or a difference of .04 in woman's favour. The important thing, she argued, though, was that the dissimilarity between the male and female brain gave women "refinement, elevation of mind, [and] gentleness of manner." Men excelled at the rougher, heavier trades, and at protecting and defending family, home and property. She used the words of her father, Lorenzo Fowler, to explain this difference:

Men and women are alike as far as original powers are concerned, and differ mainly in quality and quantity. Man is strong, woman is elastic; man is thoughtful, woman is emotional; man is inventive, woman is intuitive; man is positive, woman is negative; man is firm, woman is tenacious; man is liberal, woman is kind; man loves power, woman loves admiration; man wishes to be looked up to, woman wishes to look up to; man is methodical, woman is tasteful; man knows or thinks he does, woman believes and is sure; man thinks, woman considers; man respects, woman adores; man has pluck, woman has fortitude; man wholesales, woman retails; man has push, woman has patience; man rules by commands, woman rules by love; man is philanthropic, woman is sympathetic; man has judgement, woman had sagacity; man has talent, woman has tact; man makes the money, woman should take care
of it; man fathers the race, woman bears and takes care of it; man takes the lead, woman guides; man conquers by blows, woman conquers by smiles; man is dignified, woman is affable; man has passionate love, woman has conjugal love; man has a strong temper, woman have a quick temper; man speculates, woman calculates; man was made in the image of God, woman was made in the image of both man and God; man was created first and was made capstone of creation, woman was made last and is capstone of man; man feels his superiority, woman feels her equality; woman can do man's work and adapt herself to his sphere in life, as well as he can do her work and adapt himself to her sphere."

Despite the fact that she was an unmarried, well-educated woman, who ran a business, and had been raised in a family where her physician and phrenologist mother had cut a path in medical history, Jessie Fowler was unable to cross the divide of separate spheres. Men and women were equal but different; while they could perform each other's work, their attitude and approach to the job confirmed the gender differentiation. While her conclusion seems limited in hindsight, many others were unable to see even that far. In 1906, announcing that the mean weight of the adult male brain had been found to be 3 pounds 1 ounce, while the female brain was only 2 pounds 10 ounces, the Maritime Medical News ran an editorial on the subject. If this disparity in mass was true, the article noted, it was significant. "The present rage for bringing up the intellectual brain of woman to a parity with that of man may be successful, but it can only be a transfer of the true woman brain from its divine seat to a different place and function. Neither men nor women were able to become "mentally bi-sexed." The ultimate result, the medical journal noted,
citing recent German investigation, was that "if women are admitted into competition with men the inevitable result will be a tremendous increase of insanity." Two years later, in 1908 the president of the Canadian Medical Association, phrased it more succinctly. He argued that women should not compete with men; such a thing opposed nature's laws. "Take as one evidence of this the distribution of hair upon the face. The man is supplied with a moustache to act as a dust filter and protection of the nostrils, . . . and a beard to protect the throat . . . ." and he, therefore, was the one to brave the elements of the public sphere. The absence of this protection for women, "must surely be nature's indication that she is intended for the shelter and protection of the home." 67

The study of skulls and brains also would lead to an unusual and unlikely friendship: that between the neurologist and professor of physiology and vertebrate zoology at Cornell University, Burt Green Wilder, and Jessie Allen Fowler, the last of the "Phrenological Fowlers." Burt Green Wilder had been a student of and long-time supporter and friend of the famed Swiss scientist and Harvard University professor, Louis Agassiz. Stephen Gould has argued that Agassiz had serious sexual fears about miscegenation, and a "pronounced visceral revulsion" against blacks, and a belief in polygyny, despite his original religious beliefs about human unity and the
single Adam. Upon meeting his first black in 1846, he became convinced that blacks were a separate species. He wrote:

"...it is impossible for me to repress the feeling that they are not of the same blood as us. In seeing their black faces with their thick lips and grimacing teeth, the wool on their head, their bent knees, their elongated hands, their large curved nails, and especially the livid color of the palm of their hands, I could not take my eyes off their face in order to tell them to stay far away. And when they advanced that hideous hand towards my plate in order to serve me, I wished I were able to depart in order to eat a piece of bread elsewhere, rather than dine with such service. What unhappiness for the white race - to have tied their existence so closely with that of negroes in certain countries! God preserve us from such a contact!

Such was the origins of Agassiz's polygynist and racist ideas, which undoubtedly many accepted. He influenced his student and friend, Burt Green Wilder, for example, and advised him to make the study of the brain his life's work."

Interested in cerebral localization, and suspicious of the work of phrenologists, the story of Burt Green Wilder's connections with the Fowler Institute, and more specially with Jessie Fowler is most interesting. Over many years Wilder spent much time in a public attempt to discredit phrenology, while at the same time enjoying a cordial professional relationship with Jessie Fowler. His interest occurred not during the first flush of appeal for phrenology, in the 1830s and 1840s, but rather during the early 1870s to 1913. Why would a respected professor and scientist spend time and energy in collecting information on what he publicly condemned? The answer is simple: privately he was not convinced
by calling phrenology a "humbug," Wilder gave it a "sweeping condemnation." He suggested to Wilder that while a rational man could report on defects in phrenology, if truth be known, "There are Pettifoggers in law, Hypocrites in theology, Quacks in medicine and shallow pedants in every branch of learning." Many persons in scientific fields condemned phrenology, he claimed, in order to make a name for themselves. A study of phrenology was not wasted, Capen argued; if those half-educated persons that Wilder condemned, would study phrenology and observe characters they would "come to have charity for the faults of many men and to distrust mere pretenders however high their position and they [would] acquire the ability to make correct discriminations in character when the hereditary condition is strongly marked so that it may control, to a degree the influence of the environment." The principles of phrenology were sound, although the field still needed study. Wilder's reaction to this counter-attack was to try and find out just how much of a medical man Capen was; he wrote a colleague inquiring about Capen's status, and, noting that he leaned towards phrenology, asked if he was in science or medicine. His colleague replied that he had never heard of Capen, and he was not in a 1897 medical directory.  

Still Wilder continued to be curious about the public acceptance of phrenology. The New York Tribune noted that science might denounce phrenology, millions of people still believed in the subject. The Phrenological Journal had a
that phrenology was completely wrong in all of its aspects. Some of this attitude may be attributed to his background. Wilder had been born in 1841; his parents had practiced a Swedenborgian version of Unitarianism, and "like so many of the progressive Boston bourgeoisie who had broken with established religion, had adopted the rejuvenating tenets of homeopathic medicine, Grahamism, and Garrisonian abolitionism." Just as that family interest in health helped to determine Wilder's career, it also gave him an enduring interest in the alternative side of his science, and the possibilities of health reform.69

Publicly, however, Wilder was interested in denigrating phrenologists; not only did he claim that their ideas were wrong, but they offered a challenge to his profession. He also may have felt that the subject also was an issue in his personal life; in the late 1880s Cornell University established a department of Psychology to accumulate evidence on behalf of phrenology.70 In 1891, Wilder wrote an article arguing that children should learn about the brain by an actual study of the organ. In part he felt that this would prevent them from wasting time studying phrenological ideas. He queried, "Does not that humbug phrenology, waste the time of thousands of inquiring but half-educated persons, who might be saved such folly by a little real knowledge of the anatomy of the brain?" This point drew a hasty letter from phrenological supporter and doctor, John L. Capen. Capen felt that
circulation of 20,000 per month earning about $100,000 per year, and there were still about 50 phrenological examiners in the country. Phrenology might not be the wondrous thing that educator Horace Mann had once claimed, continued the article, "yet neither does it look so utterly insignificant as we are apt to believe." 72

Phrenologists were aware that their science was imperfect, yet they suggested that that merely made it comparable to other disciplines. Its acceptance was evident, at least to them. They argued that their discipline had had a profound influence on education (although they felt that at Cornell University professors pressured the students to reject phrenology), and attention was being given to the effects of education on growing minds. Psychology and physiology retained phrenological ideas; the concept of mental, moral and physical training was apparent to the late 19th century world, and studies were ongoing in brain localization. There was, as well, a growing attention to psychic function, a long time companion of phrenology. And everyday conversation, whether from the pulpit, in literature, or on the public platform, was sprinkled with phrenological ideas. "There remain anatomical links, we must acknowledge, to render it perfect, but in the respect of imperfection does Phrenology differ from other departments of science?" Stanley Grimes, a well-known phrenologist, who had spent much of his life-time studying the subject, made a similar argument.
What science is not imperfect? Is medical science perfect? The ablest physicians frankly confess that it is so imperfect as scarcely to deserve the name of a science. The homeopaths, allopaths and eclectics treat each other with quite as little respect as they do the phrenologists. But they all continue to practice their profession in spite of its imperfections and their mutual contempt for each other. With what consistency, then, can they complain of the phrenologists who imitates their example, by practicing his profession honestly, according to the best of his knowledge and ability?

Both medicine and psychology were as yet tentative, the Phrenological Journal suggested, noting that the editor of the Medical Record had queried if medicine was a failure since outside of surgery and hygiene there had been little success. Dr. Henry Hun presented a paper to the Albany County Medical Society. "During the past fifteen years great progress has been made in the study of cerebral localization, and it seems probable that in the immediate future the whole cerebral cortex will be mapped out into small areas; each being associated with a definite and distinct mode of mental action, depending on the peripheral connections of the nerve fibers which terminate in that particular area." The Phrenological Journal clung to his words.

The brain is divided into different organs, and each organ devoted to a different use. One portion of the brain enables us to see things; another to hear things; another to feel things. Destroy the integrity of these organs and you destroy sight, hearing and feeling. This is just what Spurzheim taught sixty years ago and got jeers for his reward. It is just what Prof. Fowler, the celebrated phrenologist has been teaching for over forty years, receiving for his reward the applause of the people and the ridicule of the old-line doctors in the State."
For Burt Green Wilder, it was a perplexing situation, and one that he would spend years investigating. Despite the attacks on phrenology from both scientists and medical practitioners, his collection of phrenological material must have alerted him to the fact that many people remained unconvinced that phrenology was wrong in all of its parts, and that science was not infallible. At the turn of the century, one writer noted that "however absurd to us a science based on cranial protuberances or even "temperaments" may seem," the system was quite abreast of contemporary knowledge.

The phrenology of Gall and Spurzheim, indeed however hopeless to us its details may appear, was, after all, the only serious and exhaustive attempt that has been made to form a science of character, and it was of some undoubtable value, inasmuch as it was based on the connection, now known to be so close, of mind and brain....Far from being discredited, the advance of cerebral physiology has demonstrated this in so many instances that it is now doubted by few. Character is thus stamped upon the body, though not in the charmingly simple manner shown by printed labels in phrenological heads.

The problem with phrenology was that it was "one of the many melancholy instances of the evil of generalizing from insufficient data, or imperfectly understood phenomena."75

Many of Wilder's other ideas on physiology corresponded to the health reformers' views. He had been a lecturer on hygiene for the students at Cornell, and was very concerned about the declining student health and the immorality of some of their activities. He complained, for example, about a student dance which was to be "continued until the last
tripper is exhausted, . . . . if necessary until eight o'clock in the morning." This was dangerous to the students' health, Wilder complained, due to over-heating, exposure to draughts, loss of sleep, and especially from over-exertion by "the unduly prolonged muscular effort and nervous strain involved in what is professedly a competitive performance." He noted that both medical journals and the public press had recognized the dangers of such competitions, condemning them as "useless, injurious, barbarous, and degrading." While cycling competitions might hurt "relatively valueless members of the community," this dance, the Junior Promenade, was threatening to "selected youths and maidens who have already completed more than one-half of a college course." Many of these students had been engaged in "rigorous examinations" and should not face the extra mental or physical labour involved in a dance. There was also the question of morality; at a function such as this the chaperons would not be able to exert the proper influence. On top of this, if reports were true, stimulants were consumed at these events; this could easily lead to an addiction. Wilder felt that the students held little regard for those in charge of such functions; an attempt to shut down a dance some years previously by shutting off lights had been defeated when new lights had been imported to the room. If such an event occurred again, he suggested, "I would advocate turning the fire-hose upon the recalcitrants and then expelling them from the University." In all he felt
it was a question of excess, and that curtailing the hours of
the dance would not only teach the students "bounds which they
may not pass," but allow others to read about the events
"without dismay and mortification." Wilder had written a
booklet entitled Health Notes for Students, where he suggested
slow and complete mastication, exercise for agility, and
bathing techniques: wash feet at night, a cold sponge bath to
exhilarate, and brief (10-15 minutes) sea bathing. Stomach
troubles, sexual excesses, and irregularity, he suggested,
would lead to stomach trouble. He also held an intense
dislike of tobacco smoking. Once he wrote to the author of a
story to complain about the illustration: a man with a cigar.
He felt that this was a "needless demoralization." In both
his scientific research on the brain, and his interest in
physiology, Wilder was an example of the new 20th-century
health reformer: a professional advocating ideas modified
from an earlier movement and given a new veneer of scientific
and medical respectability.

Along with his interest in hygiene and his collection of
information on phrenology, another step that Wilder took was
to have several phrenological delineations made. Not only did
he have studies done of himself, he also had other people
obtain them. One student, H. T. E. Wendell, reported in 1879
that he had made two visits in disguise - once claiming to be
a theological student - to a phrenologist, Thomas Turner.
Apparently he considered one delineation to be quite good; the
second, however, apparently was based on the fact that the phrenologist assumed him to be interested in the study of theology. Practical phrenologist John Logan made a chart for Wilder in September 1874. Logan noted that although it was 21 months since he had seen Wilder at the Cooper Institute, "when he [Wilder] lectured on the brain and against phrenology," he felt that it was as accurate a description as any long-time friend would give. Wilder also had been examined in 1873 apparently by Samuel Wells. Incognito as B. Green, the examiner told him that his medical training would make him useful in a drug store. Said Wilder, "this was a bitter pill indeed, but I swallowed it." He felt that the delineation was correct in about 3/4 of 53 qualities, while his wife's delineation done the same year had much wrong with it. In 1873 Nelson Sizer, of the Phrenological Institute had examined Wilder. In 1905 he again was examined under the name of Henry Cowell, by Jessie Fowler, with whom he had only exchanged letters. Later he would discuss the merits of his 63 page delineation with a minister friend, Rev. Moncman, and judging by his written comments, most of the character sketch was correct.

Wilder also corresponded with the editors of the Phrenological Journal. This correspondence draws an interesting picture of a scientific man, troubled by something he cannot understand, and, it offers a study of a developing friendship. In 1874 Wilder received a letter from the Fowler and Wells
establishment. Wilder had sent the firm some articles from the *Journal of Anatomy and Physiology*, in order to obtain the phrenological viewpoint on a case involving an idiot, Jonathan Gorman. The phrenologists felt that the report of the post mortem and the chemical analysis of the brain was in line with their views: Gorman’s brain was small and reflected the fact that his body was feeble, his habits filthy, and his passions violent. The excessive phosphorus in the brain was due to the lack of mental action. The brain was defective in many respects, and according to phrenology, its best development was in the area of fear and violence. The letter continued that the fact that the parents had been healthy should not be surprising although it had been so to the doctor performing the autopsy; many defects developed for no apparent reason; intemperance, for example, often caused the problem. Idiots themselves differed; some had severe physical and mental disabilities, while others were fit in all ways save the mental. Phrenologists knew that it is not just size that counted in brain development, but also quality. Thanking Wilder for the chance to see the article and diagram, the author continued, "We certainly have no desire in this, or in any other discussion, but to develop the truth, and to follow it regardless where it may lead us. We regret that a man of your ability, culture and position would be unable to see Phrenology as we see it, and that you seem to choose the line of opposition to its doctrines." Phrenology was, the writer
Another early letter from Wilder condemned the journal for crediting him with remarks he claimed not to have made. He would correct their interpretation, suggesting that, "While admitting the possibility, at some time in the remote future, of a true or scientific phrenology based upon the slow accumulation of facts bearing upon the localization of different functions in different portions of the cerebral cortex, I have never conceded, and to, the best of my knowledge and belief, I have never declared, that Phrenology as practised at your establishment or any other had any value commensurate with the claims made for it." The response from the journal was less than friendly, and condemned the nature of Wilder’s professional work. He was referred to several works on phrenology including Gall’s and Spurzheim’s writings. "If, however, the study of mind is to be based solely on the advances made by you in your wonderful laboratory, we can thoroughly appreciate your modern researches as we know your talents are unbounded and your knowledge limitless." Wilder felt that the attitude of professional scientists had been misunderstood. He would again write in 1903 asking for the phrenological view of alcoholism. The response suggested that there was no way of determining who was susceptible since there were many factors involved: a lack of self-control, an
over-developed gustatory centre, and a sanguine temperament."

In time, however, the correspondence became more cordial. In 1905 Wilder wrote to Fowler and Wells referring to his earlier examination by Sizer and asking about the firm's organization. Who was the chief examiner? Was Nelson Sizer still alive? Was he a medical doctor? Was there a branch in Philadelphia? Who was the chief there? Did they have brains? Have they read and commented on the work of neurologist Dr. Edward A. Spitzka?

This correspondence would begin a professional friendship between Wilder and Jessie Fowler, a relationship in which they exchanged journal articles, gifts, and at times met. In 1909, for example, Jessie Fowler thanked Wilder for sending her a reference to a review of Spurzheim; she also asked him for a copy of his paper on the Negro race as her journal was planning a piece on their skulls. Wilder informed her that the brain of the average white American weighed about 2 ounces more than that of the American Negro. Studies on the superior Negro brain needed to be done, he added and noted that their brain was "distinctly human as compared with those of apes and other animals." There were no constant characteristics distinguishing between white and black brains. Along with sending Fowler several other articles and reviews, that same year Wilder had Fowler do another delineation in which she suggested that his brain would mature late in life, and he
would be able to work long after the age of 60. He was versatile, intuitive and scientific, and just to rich and poor. She noted that he had a gift for musicality, but added, "you would starve before you would be able to make a living by music alone." This comprehension of his latent musical talent, seems to have impressed Wilder. In January 1910, Jessie Fowler thanked him for sending her a "very beautiful duet" and praised the piece noting that it "accords with the workings of your mind." At the same time she returned a number of articles he had lent her, and commented briefly on them. She noted, for example, that she felt that neurologist Spitzka was unfair in his criticism of phrenology. She wished Wilder well in his research, adding that she knew he would be "more fair." In his comparison of brains, she wrote, he surely must have found the differences in contours "and have arrived at some reason for their difference." Later that year she wrote to say that she was pleased to have met his wife, that the music, apparently a score he had written, was very fine, and that she and Miss Drew - apparently an institute worker - would share in the gift of the photograph of Wilder. He also had given her a picture of Louis Agassiz and a sheet of information on brains.

The friendly correspondence continued. In 1913 Jessie Allen Fowler agreed to examine a friend of Wilder, while she was blindfolded and without the client speaking. She sent her kind regards to his wife. This correspondence over a number
of years indicates a cordial friendship between two colleagues who supported two different ideas, but who respected each other's right to differ, and their status in their profession. Wilder, for example, once asked Fowler's opinion of the efforts of the Simplified Spelling Board, a simplified form of scientific spelling, a project in which he was interested."

Wilder was probably responsible for the American Institute of Phrenology establishing its collection of brains. He once wrote to see if they had any to examine. The response was that they did not have many, and that they did not think "that the time has come for any public exhibition of them." Eventually, however, they maintained a large collection of brains, in fact, the third largest of its kind in the United States, smaller only than Wilder's own and that of the American Anthropometric Society. Wilder managed to acquire his collection, despite his feelings that it would be in bad taste to ask openly for donations of brains. Bequest forms would ask for a photograph, and measurements of height, weight, hip, chest, head circumference, colour of eyes, hair, as well as various head measurements, including the height above the eye, the length from centre of ear to centre of ear, and the front and back diameter. This type of careful anthropometric measurement was the scientific method of detailing the physical differences between humans. In addition a biography was requested for details about such things as
racial origins, family details, life achievements, mental traits, family traits, and negative qualities.\textsuperscript{35}

A variety of people volunteered their brains. Goldwin Smith, Cornell and Oxford historian, best known for his promotion of the annexation of Canada to the United States, was one person who offered his brain to Wilder; originally this was done as a joke, but Smith apparently felt he should keep his promise. He did not want this bequest publicized, however, since he feared it would shock his wife. He was also concerned about disfigurement; and noted that the doctor who performed the operation should follow Wilder's directions. His brain did not make it to the Cornell collection. Upon his death, his secretary was not willing to act upon the question, and Smith himself verbally may have cancelled the request before his death. Another person who had donated her brain to the Wilder collection was Ellen Hayes of Massachusetts, a Socialist Party Candidate for Secretary of State. Rosika Schwimmer, a European feminist and pacifist, denied United States citizenship for her pacifism, also gave her brain to Wilder. Upon his own death, Wilder's brain was donated to Cornell University. This was specified in his will. In that document Wilder offered only two bits of information about his characteristics. The first was that for many years his weight had been 135 pounds. The second, interestingly enough, was that his phrenological examinations were held with his papers. After all the years of denouncing phrenology, it is most
interesting that this expert on the human brain, would in the end, offer phrenological delineations of his own nature and personality to those scientists who would obtain his brain, and further his studies. As he had confessed to Jessie Fowler many years before, phrenology was perplexing. He was a sceptic but he had to concede "some really startling 'hits' in my own case" and some "equally impressive misses."

Just as other health reforms became part of scientific medicine, phrenology merged in a sideways fashion into new ideas about psychology, anthropology, and cerebral location. So too did another area of health reform after a long period of rejection by scientific experts, namely mesmerism. It had changed very much since Mesmer’s first belief in an invisible liquid surrounding each body. In the United States it had become part and parcel of some phrenologists’ platform. The Fowlers, for example, would use mesmerism, also referred to as animal magnetism, in an attempt to cure the ill and to improve their knowledge of the individual. Lorenzo Fowler magnetized people but acknowledged that he was not a professional. He felt that both the body and mind were interrelated, and they could be improved by magnetism. Madeleine Stern noted that phrenology and mesmerism were both based on body-mind linkages, "that via the mind changes could be effected in the functions of the body and that between metaphysics and physics there was no gap."
A strong connection between Mesmer and modern hypnotism, the allopathic term, was made through the work of a less-well-known Fowler, Edward, a half-brother of Lorenzo and Orson. As a teenager, Edward Fowler had played a leading role in spiritualist meetings, where mesmerized into trances, he had spoken to spirits, to the delight of his sister Charlotte, a life-long believer in spiritualism. As an adult, however, he put the practices of his youth behind him, and ultimately became a well-known physician. He is best known for being the first to translate the works of J. M. Charcot into English. Charcot's ideas about hypnotism, although later discredited, would influence one student in particular, a pupil whose work ultimately would affect much of the 20th century world: Sigmund Freud, whose contributions to psychoanalysis at once would strike the final blow to phrenology and yet also derive some ideas from the subject.88

During the latter part of the century, Charcot and his followers believed that hypnotism was a neurosis or functional nervous disorder that occurred in hysterical persons, usually in girls. This viewpoint became known as the Paris School of thought. The opposing school of thought was the Nancy School which argued that rather than a form of neurosis or a disease, hypnosis was a physiological condition that occurred even in healthy men, and that it was a result of the mind's action on the body. Of the two schools of thought it was generally agreed that the Nancy School was more scientific, and by the
end of the century much of Charcot's work would be discredited. This would happen due to the "experimental contamination," caused when Charcot, a man with medical training and "impeccable scientific credentials" was led into the "grossest of observer error" due to his over-eager students and his erroneous belief that patients were unaware of what was happening while they were hypnotised. As a science, mesmerism could easily be rejected by allogaths: "Neither the medical nor the physical sciences were prepared to embrace subjective phenomena as empirical data. The so-called facts of mesmerism weren’t really facts at all." Hypnotism, however, while inciting controversy, eventually would become part of allopathic practice.

As hypnotism gained popularity, medical doctors clamoured for its inclusion in medical jurisprudence, claiming that it was used as an excuse for infanticide and seduction. Even within a medical practice, hypnotism could be dangerous, they suggested, adding that it threatened the moral and emotional control of patients already in ill-health. Medical doctors recognized and sometimes worried about the impact of hypnotism on their practise and on their patients. The hypnotist was a person who held great power in his hands, noted one article, suggesting that Charcot’s "commanding appearance and air of superiority" could produce such changes in patients that they would feel no pain during an operation, if so commanded. If
the patient was truly hypnotized, doctors were warned, "he obeys the mind of the hypnotizer, and not his own."³³

Physicians were not immune to the close links of hypnotism and the various spiritual ideas that both lingered on to some degree, and, re-emerged near at the turn of the century, and which ultimately became incorporated into 20th century religious thought.³⁴ With mesmerism's revival in its new guise, came new threats to allopathic medicine, especially various forms of faith cures. Sects like Christian Science have a history that parallels that of health reform. Christian Science supporters were, for example, predominantly women who often turned to the religion after having unsuccessful experiences with other types of cures. The religion, in fact, incorporated a number of 19th century ideas about health.

Mental therapeutics grew on native soil and incorporated many of the notions that were already familiar to health-seeking Americans of the day—Homeopathy, mesmerism, and phrenology were all understood as science with a spiritual aspect. All were thought to unite matter with spirit in some way. Health reform not only presented itself as a holy cause but relied on God's own remedies to restore the body to health. Indeed, it was but a short step from allowing the body to regain its natural healthy state by using God's own remedies—water, air, sunshine, and diet—to using one's own mind along with God's mind to promote health.

In the face of this challenge, doctors, like Weir Mitchell, argued for rational medicine and a recognition of mind-body linkages, and that "a knowledge of the mind is indispensable to the successful prosecution of physical science." These were, of course, ideas that the health reformers had been
advancing throughout the 19th century." But medical doctors felt that even psychic healing should be under their scientific expertise. At the end of the century a doctor from Collingwood, Ontario referred to the various forms of psychic healing and concluded, "That the general practitioner of medicine should study this subject and should use it in his practise, and should agitate until it is taken from the hands of unprofessional people in Canada, as it is in Germany and France, where it is illegal for anyone but physicians or scientists to practise it." 

While phrenology and mesmerism underwent cooptation in a less than open fashion, the adoption of hydropathic notions was more easily accomplished and better recognized. It fit, for the most part, into the ideas of those who supported modern sanitation and public health officials. With the technological advances in bath tubs and sewers, bathing the body would become a pleasurable as well as healthful, experience. Water would still be used as a therapeutic remedy, in part due to the public acceptance of germ therapy, but now it would be handled by the scientific physician. Cold compresses, and ice-packs on the head could treat the delirious, and with experience a physician could discover the value of various techniques, such as cold tubs, showers, and wet-packs." The austere nature of water therapy gave way to leisure palaces, where idleness, rather than ideals, was stressed. The water therapists' aim of improving the world
through the individual disappeared, just as the drive for personal gratification and consumerism emerged. The long-time connection between water and temperance would evaporate as mineral water became a favourite mixer with alcoholic beverages.

As long as there have been alternative options in medical care, there has been some kind of opposition to it. Phrenology, water-cure, and physical culture faced that opposition from the very first. In many ways they invited the attack. Alternative medicine promoters openly attacked the system that they hoped to replace, and they did it with both frequency and noise. They undermined their own health reform position by rigorous and impossible ideals that they often ignored. Health reformers, for example, opposed the idea of medical school education, and they taunted the allopathics for their so-called scientific expertise, their elitism, and their refusal to work in tune with nature’s laws. Yet in order to offer the public their own professional credentials, health reformers had to establish some form of teaching facility, to eliminate pretenders and to prove their own system. Many health reformers were graduates of an allopathic school who had determined that that system was inappropriate for them; others studied regular medicine, merely to give themselves the legitimacy of a degree; still others studied at various health reform institutions such as the Hygeio-Therapeutic College or Fowler's Institute of Phrenology. It was a paradoxical
situation: with professional institutions and schools, health reformers were denying the individualism that their ideal required; without them, they had no credentials to offer the public whose patronage they hoped to gain. As medical doctors amalgamated into closed-rank societies and gained legislative support for their own practices, the problems of the health reformer multiplied.

Many health reformers found that to be successful, and to attract new clients, they had to extend their direction and become less exclusive in their practices. Some, like the Gleasons at Elmira, would adopt evolving mechanical treatments, and declare themselves to be eclectic rather than limit themselves to hydrotherapy. Phrenologists would incorporate ideas such as career planning and hand-writing analysis into their work. Phrenologist Nelson Sizer, for example, spent less time speaking of the possibilities for the future, and instead, offered practical advice, such as nutritional ideas. In 1891 he would do a phrenological delineation, for example, that concentrated more on diet than cerebral development and personal characteristics. Sizer advised client Deidrich Willers, a former Democratic Secretary of State for New York and an Assemblyman, that he had a large head (23 1/2 inches in circumference) and a body to support it. Sizer calculated that his client should weigh about 190 pounds. He needed lots of sleep. Willers had a strong critical faculty and was perceptive. He was high in self-esteem and firmness, but was
neither bossy nor aggressive. But rather than dwell on a goal of self-improvement, Sizer concentrated on offering dietary suggestions. Intelligent people, Sizer shuddered, thought nothing of eating bread made of super-fine flour with honey on it, but a dog would die under the same daily fare. Another dog would die if fed only the bran and starch. A third would be "happy and handsome" if given the entire wheat, ground without sifting. He told Willers, "Entire wheat is perfect food, if you eat it all. Milk is perfect food, if you eat it all." Butter and starch were not. Sizer suggested that it was not unhealthy to eat lean beef, mutton, fish, eggs, and common vegetables. Refuse sugar and take exercise, Sizer cautioned Willers. Jessie Fowler would eventually take this phrenological eclecticism even further, as she offered handwriting analysis, character analysis, career guidance, and continued to publish on phrenology and physiology. An advisor of the National Vocational Board, her business card offered to find the right career for clients, but never mentioned phrenology. Phrenologist Professor Palma, (J. H. Brown) who claimed to have been a graduate of Fowler's Institute, also offered an eclectic mix of phrenology, physical culture, hypnotism, and palmistry, when he toured the Maritime provinces after the turn of the century.

Just as health reformers adopted eclecticism, so too did allopaths. Eli Peter Miller, the physician at the New Hygienic Institute and Turkish Bath on West 26th Street, New
York, was one such person. He held a regular medical degree from the Bellevue Medical College and had also studied at Dio Lewis's Boston Normal School and at the New York Ophthalmic College. Diet played a central role in his ideas. "Soup, fish, fowl, and flesh, pepper, vinegar, mustard, catsup, pickles, gravies, jellies, oil, vegetables of various kinds, puddings, pie, cheese, fruits, nuts, ice-cream, confections, and numberless other articles of conflicting chemical qualities, are thrown together to ferment in degenerate gases which necessarily produce disease, - and this mass is washed down with tea, coffee, cocoa, chocolate, cider, beer, wine, brandy, whisky, . . . No other animal could subsist on such a diet." Most people over-ate, he argued, the few who ate too little were those who because of poverty were unable to obtain a decent diet, and those "radical health-reformers who carry their theories to extremes and voluntarily deprive themselves of the amount of nourishment they require." Americans, he decided, incorporating biological determinism and heredity into his ideas, were "a race of dyspeptics. Generation after generation have gone astray, and each generation having less of digestive power to transmit. The succeeding ones are born with inherited weakness of those organs on which depend the current of life. We have baby-dyspeptics all over the land . . ." Improper exercise, lack of light and fresh air, poor mastication, masturbation, and overtaxing education also would contribute to dyspepsia and ill-health. Miller was not,
however, a vegetarian; it may be a good theory, he declared, but "sudden abandonment of all animal food and condiments, would be attended with fatal results in a large number of cases." Offering descriptions of a number of bathing techniques, he cautioned that some, like the wet-sheet pack, had to be administered by a person knowledgeable in hydropathic techniques. In addition, exercise was important: "The more a person digests, the more he may exercise; the more he eats, the more he must exercise." Swedish movements, light gymnastics, and moderate weight-lifting were appropriate. Electricity was valuable in stimulating dormant organs, while animal magnetism was valuable in quieting nerves and aiding rest. Most important of all, however, was never to break the rules of health. Combining religion, notions of hereditary descent, and health reform, Miller cautioned:

God never made the man or woman who was well enough to admit of a violation of his laws in their bodies, any more than he makes them good enough to tamper with his spiritual laws; and even if he who violates a physical law does not feel the penalty himself, his children and his children's children will; for truly "the sins of the parents," bodily as well as spiritual, "are visited upon the children unto the third and fourth generation."

In addition to this eclectic mixture of hydrotherapy, nutritional advice, medicinal treatments, electricity, and hypnotism, Miller would also write for the Phrenological Journal, which itself had become a hodge-podge of psychology, phrenology, career guidance, health tips, biographical descriptions,
along with Miller's contributions on the "Science of Health."^{100}

At Hornellsville, New York, the Steuben Sanitarium stood: "A place for the weary to rest and the sick to get well." There, a blend of health reform and allopathic treatments, was practised. In 1905 this institution provided all the amenities of modern early 20th-century therapeutics. Situated within ten acres of park land, the brick and stone structure was well-heated and ventilated with fans; using natural gas power and a private electrical plant it offered an elevator, parlours, reception rooms, offices, verandas, balconies, and long-distance telephone communication. The cuisine was hygienic; a gymnasium was included; and a bath room provided every kind of bath. But this was not strictly a water-cure for the electrical appliances included galvanic, faradic, and static machines, and an x-ray machine. There was also an operating room, with an experienced house staff, sixteen consultants, and trained nurses and attendants.^{101}

Not far away at 201-203 State Street in Elmira, New York, was the Pratt Private Hospital, Sanatorium, and Dispensary. This hospital specialized in chronic diseases and confinement. It used both medical and surgical procedures, employing electricity, water, air and medicine under strict antiseptic procedures. Cancer was treated by "a new paste," X-ray light, injections and surgery. A form of electrolyses was offered and "the liquor disease, morphine, cocaine and tobacco habits have been treated." Prostatic enlargement and stricture of the
urethra were treated by electrical methods, and diseases of kidneys, lungs, heart, stomach, intestines and liver had been treated, as well as cases which required relaxation from business. Confinements "were rendered painless by a harmless method." A gymnasium and play-room were available for patient use. Even the concept of vegetarianism had become separated from the health reform ideology. It became more fashionable to watch one's consumption of meat; but it was physicians, not health reformers, who were recommending the change. The incorporation of health reform, with its stress on exercise, fresh air, water, diet, and a balanced state had been merged successfully with the allopathic remedies of medicine, surgery, and electricity.

As the 20th century began, it increasingly became apparent that if health reformers were to be successful, they needed to become eclectic practitioners. A few - like the Dansville Home on the Hill water-cure - managed this transition. Other health reforms - like phrenology - survived only as long as their chief people, and collapsed upon their demise. For the most part, many of the therapeutic remedies offered by irregular practitioners, had emerged as mainstream allopathic care: phrenology as psychology and anthropology, hydrolpathy as hygiene and regular medicine, mesmerism as hypnotism, diet as nutrition, and physical culture as physical education and athletics. All of these varieties of therapeutics would no longer be controlled by the health reformer,
nor would they be wrapped up in the ideology and language of the reformer. Instead they would be defined as part of the expertise, owned and controlled by scientific experts. This perversion of their ideas in the new century, would not only discredit these reformers, but, ultimately aid in the transformation of North American society. The concept of harmony and equilibrium, at both the personal level and the social level, would no longer be the illusive dream of a few. Instead, in the face of class conflict, gender inequality, global warfare, massive immigration, consumerism, and monopoly capitalism, not only would the hope for harmony disappear, but even the memories of that dream.
Notes


5. This denigration slowly has been lifting in the last quarter century. See, however, the patronizing treatment of Fowler in John I. Rempel, Building With Wood and Other Aspects of Nineteenth-Century Building in Central Canada, (Toronto: (1967) 1980), pp. 289-340.

6. For an example of the ridicule that was directed at phrenologists see the chapter on phrenology in John S. Hart, In the School-Room. Chapters in the Philosophy of Education, 3rd ed., (Philadelphia: 1870), pp. 121-9.

7. Dear Father from Sarah H. Ellas, 14 March 1864, McCall/Ellas Family papers, Department of Manuscripts and University Archives, Cornell University, #222D Box IX Folder 102.

8. Barry’s diary is replete with comments on three topics: his health, his domestic servants’ incompetence, and his neighbours’ sins. James Barry Diary, 24 August 1856, Public Archives of Nova Scotia, MGI V. 1216, [May] 1856. For other comments on patent medicines, see, for example, Ibid., 4 March 1856, 28 August 1857.

10. Barry does not define his understanding of the term "quack," but he referred to a number of people by that term. See, for example, James Barry Diary, 28 April 1851, 12 July 1854, 9 May 1956. See also "The Language of Quackery," Roy Porter, Society for the History of Medicine Bulletin, 33 (December 1983), p.68. For Barry's comments about his approaching death see Ibid., 31 December 1857, 31 March 1860, 20 January 1860. This view of imminent death may have been common to patent-medicine users. The second verse of one poem reads:

Oh, patent-medicine almanac!  
I read thy fearful pages  
With tears and fears and groans and moans,  
And shakes and aches of ages!  
And now I have the vertigo  
And tumbling in the dirt I go;  
Have general blood corruption,  
Loss of vigor, lack of gumption  
And I feel I am travelling down the last  
stage of consumption.


11. Ibid., 24 August 1856.

12. See the Public Ledger, St. John's, Newfoundland, (hereafter PL), 20 August 1880 for references to "Miraculous Cures" that some Catholics claimed to have experienced. Cures attributed to a spring in Cape Breton were also deemed to have been divine work. Don MacGillivray, "At the Glengarry Mineral Springs," Cape Breton Magazine, #28, pp. inside cover, 31-35.

13. This remedy was suggested to the Water Cure Journal by W.F.C. of Kentucky. The journal’s editor was not impressed, suggested a mad stone should be sold to a madman, and challenged the writer to be bitten by a rabid animal and prove the value of the stone. Water-cure Journal and Herald of Reforms, (hereafter WCJ), XXXI:4 (1861). Some claimed that hydrophobia also could be cured by plunging into cold water for 20 days. Account Book of Jacob Shook Thompson, Department of Manuscripts and University Archives, Cornell University, #229, n.p. James Barry resorted to using an eye stone to remove a speck. See James Barry Diary, 1,2 May 1855, 18,19 January 1857. He turned to black magic at another time when the eyestone failed. Ibid., 1 February 1868.

15. "Important to Invalids." PL, St. John's, 12 February 1867.


17. Handwritten notes, [1885] Dr. T.H. Squire[s], Medical Papers, Box 9, Chemung County Historical Society. This apparently is a review of an article on "Antiseptic Surgery," by a Dr. Merchand, dated June 1885.

18. Mrs. W. W. Turnbull from Thomas W. Musgrove, Minutes of the 6th Annual Convention of the Woman's Christian Temperance Union of the Maritime Provinces, 7 August 1888, pp. 33-4. Public Archives of Nova Scotia, MG 20 Vol.506, # 20. The organization queried the benefits of alcoholic liquor, if the indiscriminate use of alcohol by the unhealthy patient was beneficial, if and when alcohol was necessary in medical prescriptions, and the attitude of the medical profession towards the sale of intoxicants. Ibid. Acadian Recorder, Halifax, 18 July 1884.


20. WCJ, 1:3 (January 1846), p.37. This was similar to the English verse:

Pain was my portion
And physic was my food;
Groans was my devotion,
And drugs done me no good.

Ibid.

22. Robert A. Nye, Crime, Madness, and Politics in Modern France: The Medical Concept of National Decline, (Princeton: 1984), pp. xi-xii, 62. Just as Nye's degeneration can be taken beyond the boundaries of France, so can the professional aspirations of physicians.

23. These attacks and rebuttals continued throughout the 19th century. See, for example, the response to attacks on water cure, James Wilson, and James Manby Gully, The Practice of the Water Cure with Authenticated Evidence of its Efficacy and Safety, (New York: [1846]). A note by the New York editor of this English volume suggested that the free enquiry and "rapid circulation of thought" of the United States should offer a "compound multiplied effect" for future generations. Ibid. p.13.


29. Maritime Medical News, III:12 (December 1891). In his biography of Thomas Patrick Kelley, who ran a medicine show through 37 states, Ontario, and Atlantic Canada, Thomas Kelley Jr. claimed that at least 2 of the Kickapoos were from Dublin, Ireland, and were named Leary and Connor, and that they had had a fondness for Guinness stout. Thomas P. Kelley Jr., The Fabulous Kelley, (Don Mills: 1974); Morning Guardian, Charlottetown, 25 July 1902.


31. See also the chapter, "The Delights and Promise of Water-cure Life," Donegan, Hydropathic Highway, pp. 185-97.


34. Chester R. Burns, "The Nonnaturals: A Paradox in the Western Concept of Health," Journal of Medicine and Philosophy, 1:3 (1976), pp. 202-11. Burns noted that for physicians the naturals were "structural and functional elements innate in each human body," citing as examples, the temperaments or humours, while the non-naturals, paradoxically, were air, rest, motion, sleep, wakefulness, food and drink, excretion, retention, and emotions. For the Greeks, health was "The consequence of a proper ordering of the naturals and a proper regimen of the nonnaturals." Burns added that as the non-naturals disappeared from the western concept of health as defined by physicians, so too did the concept of free choice in health matters and even, perhaps, the "traditional obligation of physicians to act as hygienists. Ibid., p.203, 207. This tradition would be one thing ultimately regained with the cooptation of the health reform tradition, and the parallel movement to gain exclusive control over all issues connected, however remotely, with public and private health matters.

35. New York Daily Tribune, 2 January 1900, in Fowler and Wells Papers, Department of Manuscripts and University Archives, #97-3-4. Despite allopathic opposition the New York Hygeio-Therapeutic College received this charter in 1857. Donegan, Hydropathic Highway, p. 172; Cayleff, Wash and Be Healed, p. 92.

36. H. N. Eastman, "Presidential Address," Meeting of the Tenth Annual Meeting of the Medical Association of Southern Central New York, June 1856, Medical Societies, Regional, Papers and Minutes, Box 38, Medical Papers, Chemung County Historical Society.


38. Dr. Daniel Holmes, "An Address," Department of Manuscripts and University Archives, Cornell University, Folder 10, #20. Holmes argued that the profession of medicine was both a science and an art.


40. Colin Howell and Michael Smith, "Health Reform"; Michael J. Smith, "Dampness, Darkness, Dirt, Disease: Physicians and the Promotion of Sanitary Science in Public Schools," Paul A. Bogaard, ed., Profiles of Science and Society in the Maritimes Prior to 1914, (Fredericton/Sackville: 1990), pp. 195-218. Axel V. Grafstrom, A Textbook of Mechano-Therapy (Massage and Medicinal Gymnastics) Especially Prepared for the use of Medical Students and Trained Nurses, (Philadelphia: 1899), esp. pp. 15, 78, 90-3. Health reformers were pleased to see any recognition of their ideas; but cautioned that practitioners - not allopathic experts - must be trained properly. When Amherst College established a chair for a gymnastic instruction, and when Harvard University founded one for a Professor of Hygiene, the Water Cure Journal, praised their efforts but argued that the steps did not go far enough; what was needed was a "practical physiologist." The journal argued "It is for the anatomist to reveal the order and arrangement of the living machinery, so fearfully and wonderfully made; and for the physiologist to explain its actions and uses. It is the business of the hygienist so to exercise each of the vital tissues and organs as to secure the equal and harmonious development of all." By prescribing drugs, regular physicians undermined any benefits that their knowledge of the body might have given them. "Topics of the Month," WCJ, XXXII:4 (October 1861), p. 81.

Divine, (New York: 1866), pp. 378-91, 392-481. See similar works: Lorenzo Niles Fowler, "John Bull" & [sic] "Brother Johnathan:" Their National Peculiarities. A Lecture, (London: 1866); Jessie Fowler, Practical Physiognomy: A Psychological Study of the Face, (New York: [1912]). Eclectic physicians also were making points about sexuality similar to Orson Fowler’s early ideas. Dr. John M. Scudder, a professor of pathology and medicine at the Eclectic Medical Institute, Ohio, advocated sexual education, recognized female masturbation, warned of the dangers of sexual excesses, and advocated the wife’s right to refuse her partner’s sexual demands. Scudder noted the linkage between the brain and sexuality. While he referred to the organ of Amativeness from "the old scheme of phrenology," he did not credit phrenologists’ ideas, admitting only that there was evidence that "these functions of the mind do exist, and must be represented in the structure of the brain." John M. Scudder, On the Reproductive Organs and the Venereal, (Cincinnati: 1874), esp. pp. 25. See also the article on stirpiculture by Nova Scotian medical doctor, eugenist, public health officer, and cattle breeder, Alexander J. P. Reid, "Stirpiculture or The Ascent of Man," Read before the Nova Scotia Institute of Natural Science, 13 January 1890, Public Archives of Nova Scotia, V/P Vol. 9 #5.


43. Willard Asylum, untitled clipping, [1867?], Willard Asylum Papers, Department of Manuscripts and University Archives, Cornell University, #3475. The Willard Asylum was the first asylum in New York state to offer long-term care to the insane.


46. [*+*], "Street Corner Song," PL, St. John's, 28 October 1862; Ibid., 2 May 1862; Struthers, No Fault of Their Own.


50. "Private Insane Asylum," Evening Post, clipping, Willard Asylum Scrapbook, Willard Asylum Papers, #3475; "Cruelty to the Insane," Ibid., John B. Chapin, "Address: Delivered at the Forty Third Annual Meeting of the Association of Medical Superintendents for the Insane," American Journal of Insanity, (July 1889), pp. 1-21, held in Willard Asylum Papers. For a fine book which discusses women spiritualists in Britain and the ease with which many were committed to asylums see Alex Owen, The Darkened Room: Women, Power and Spiritualism in Late Victorian England, (Philadelphia: 1990), or her equally interesting dissertation on the subject, Alexandra Owen, "Subversive Spirit: Women and Nineteenth Century Spiritualism," Ph.D. Thesis, University of Sussex, 1983. A Canadian politician and doctor argued that he knew of only one case where a woman had been falsely committed, but he knew of several cases where an attempt had been made to put a sane woman in an asylum. One such case was "that of a pretty
little woman whose husband apparently had tired of her and had decided that he would get rid of her by putting her in an asylum." The doctor cautioned the man against this, and the couple separated. R. J. Manion, Life is an Adventure, (Toronto: 1936), p. 104.


54. Dear Doctor [Burt Green Wilder] from Chas. G. Wagner, 4 May 1882, Department of Manuscripts and University Archives, Cornell University. According to a note on this letter Young had been Wilder's student in a Natural History course in 1879; he was the first person to make use of a provision which allowed a student, with Wilder's certificate, to be admitted to the second year of a medical course at the University of Pennsylvania. Wilder was so struck by this letter that he sent a copy to a newspaper editor and asked for a comment. I have maintained the corrections made in the letter. Ibid. Elwood A. Roff, Baseball and Baseball Players, (Chicago: 1912), pp. 139, 160, 191, 208.


The average male brain weighs:

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* Size refers to the hat size.


person's characteristics. Ibid. There is no pagination in this book. This belief that physical characteristics indicated one's personality had long played a role in phrenological ideas. The Phrenological Journal offered information on the subject of noses and characteristics. See "Rhinology, or the Science of the Nose," Phrenological Journal, LXIV:5 (May 1877), pp. 337-341. See also Samuel R. Wells, New Physiognomy, or, Signs of Character as Manifested Through Temperament and External Forms and Especially the Human Face Divine, (New York: 1866); Lorenzo Niles Fowler, Revelations of the Face: A Study of Physiognomy, (New York: 1850). A few people felt this classification of criminal characteristics was not valid. Richard Cabot, a Boston doctor and the Assistant Professor of clinical medicine at Harvard, felt that Americans were in too much of a hurry in accepting ideas; prison officials could testify to the falseness of the notion of criminal features, he suggested. Richard C. Cabot, "The Consecration of the Affections (often misnamed Sex Hygiene)" APER, XVI:4 (April 1911), pp. 247-253.

64. Kasprzak, "Wilder Brain Collection." Born Alice Chenoweth, she also willed her brain to Cornell. Ibid. See also James W. Papez, "The Brain of Helen H. Gardener (Alice Chenoweth Day)," American Journal of Physical Anthropology, XI:1 (October-December 1927), pp. 29-79.


black race could be raised higher, (although not as high as
the more civilized white race), if the shackles of slavery
were cast off; women too could become closer to white men in
brain size. Argued Jessie Fowler, "Thus, we find that in
savage nations, the native Australians, the bushmen, the
negroes of Africa, and other low races, the skulls of men and
women are much more alike in size than they are in Europeans."
This suggested to her that women had not availed themselves of
the benefits of civilization. Fowler, *Men and Women Compared*,
p. 7. There is a small difference in the brain weight given by
the *Maritime Medical News*, and the one Jessie Fowler used for
her calculations. Fowler, *Men and Women Compared*.

68. Kaspr. .k, "Wilder Brain Collection," Gould, *The
Mismeasure of Man*, pp. 42-45. See the letter from L. Agassiz
to Dr. Wilder 27 March 1871, where he discusses his friendship
with Charles Darwin, his opposition to Darwin's theory of
evolution, and his advice to Wilder, telling him to produce a
monograph on an anatomical subject rather "than in wasting
your time in discussions upon the origins of species,
whatever side you take and in what ever manner you treat the
subject." I have kept Agassiz's corrections in this letter.
Burt Green Wilder Papers, 14/26/95-I, folder 3. See the entry
1235. See also the introduction by David W. Nobel in John
Fiske, *Outlines of Cosmic Philosophy*, Introduction by David
Nobel, Vol. 1, 2, (New York: 1969 (1875,1874)). Fiske was an
opponent of phrenology and suggested that the subject appealed
to the "unlearned public." *Ibid.* pp. 133-4. For Agassiz, see
Alice Bache Gould, *Louis Agassiz*, The Beacon Biographies,
Phrenologist Stanley Grimes claimed that he had advocated the
same doctrine as Darwin, only he had "assumed that Divine
Providence superintended the natural evolution of organized
beings." He noted that Agassiz denounced the theory of
evolution. J. Stanley Grimes, *The Mysteries of the Head and
the Heart Explained: Including an Improved System of Phrenology;
a New Theory of the Emotions, and an explanation of the
Mysteries of Mesmerism, Trance, Mind-Reading and the Spirit
Delusion*, 4th ed., (Chicago: 1885), p. 189. For a phrenol-
ogical delineation of Agassiz, see Madeleine B. Stern, *A
Phrenological Dictionary of Nineteenth-Century Americans*,


70. David Baken, "The Influence of Phrenology on American
Psychology," *Journal of the History of the Behavioural
Sciences*, 2 (1956), pp. 200-20; Karl M. Dallenbach, "Phren-
ology versus Psychoanalysis," *The American Journal of the

71. John L. Capen, M.D. to Prof B. G. Wilder, 12 April 1897. Bert Green Wilder papers, #14/26/95 Box 4. Capen referred to an article in The Arena, March 1897. At one time Capen ran the Phrenological Museum, Bookstores, and Office, Philadelphia. In 1874 he wrote phrenologist S. R. Wells, with a list of his stock, and the hope that another phrenologist would take over. He felt that the business needed an active lecturer, and he had been giving these talks since in the last three years he had been busy with dissections. This last would indicate that he had some medical training. Madeleine Stern refers to him as Dr. J. L. Capen. Capen had trained in phrenology in the Fowler and Wells office, New York; in 1856 he took over the Philadelphia branch from Nelson Sizer. This office, located at 231 Arch Street, was next door to the Female Medical College of Pennsylvania. Dear Sir from J.L. Capen 1 December 1874, Fowler and Wells Papers, #97/3/1; Stern, Heads & Headlines, pp. 125,198, index, p.333. H. Allen from Burt G. Wilder, Burt Green Wilder Papers, no date, #14/26/95 Box II-I.

72. Undated clipping, [1870s], New York Tribune in Ibid. The Phrenological Journal sold 20,000 copies per month in the 1840s. Lorenzo Fowler, Phrenological Almanac, 1848, p. 46.

73. "The Outlook," Phrenological Journal, 87:1 (January 1889), pp. 43-45; "Reaction," Ibid., 63:3 (September 1876), pp. 237-8; Grimes, The Mysteries of The Head and The Heart Explained. Writer George Eliot (Marian Evans) was just one person who "repeatedly describes the human mind in physical, chemical, biological and geological metaphors" and it was Phrenology which "provides a rationale for her metaphor making." Diana Postlethwaite, Making it Whole: A Victorian Circle and the Shape of Their World, (Columbus: 1984), p.83. See also the comment in Should Women Obey? A Protest Against improper matrimonial and prenatal conditions, showing cause, prevention and remedy of needless inharmonies, unhappiness, etc. Together with a special chapter by Prof. L.N. Fowler, entitled Love Courtship and Marriage, (Chicago: 1900), p. 28. Madeleine Stern has devoted several pages to 20th century praise of phrenology. Stern, Heads & Headlines, pp. 260-266. Since the appearance of that book phrenological contributions have received more credit. See, for example, Harrington, Double Brain, pp. 7-11, 174.

74. Dr. Henry Hun was the Professor of Diseases of the Chest and Nervous System at the Albany Medical College. See Henry Hun, "Outlines of Insanity," Albany Medical Annals, (hereafter AMA), XII:7 (July 1891), pp. 169-182; XII:8 (August 1891), pp. 193-206; XII:9 (September 1891), pp. 217-33; XII:10 (October

75. A. T. Schofield, The Springs of Character, (New York:
1901) pp. 36, 38. The author also noted that character could
be determined through both palmistry and physiognomy (the
study of the face). Both of these were relevant to phrenology
and criminal anthropology. Ibid., p. 41.

76. Dear Sir from Burt G. Wilder, 29 January 1903, Burt Green
Wilder Papers, #14/26/95 Box 2. Wilder noted on this letter
that he had sent out a number of copies including one to the
President and a Dean at the university. Burt G. Wilder,
Health Notes for Students, (Ithaca:1879). See also Burt Green
Wilder, What Young People Should Know: the reproductive
function in man and the lower animals, (Boston: [1875]).

77. W. D. Howell from Burt Green Wilder, 22 August 1889,
[copy], Burt Green Wilder Papers, #14/26/95.-I. "Prof
Wilder's Brain Yields Secret of his Hatred of Smoking as a
Vice," 7 May 1925, clipping, in Ibid., Box 4. See also James
Papez, "The Brain of Burt Green Wilder," Ibid. Papez claimed
that Wilder’s dislike for tobacco was due to atrophy of the
olfactory centre. Ibid.

78. Henry Wendell to Prof. Wilder, 12 March 1879, Burt Green
Wilder Papers, #14/26/95/4-2. Phrenological Notes on Charles
Allen Brown by Thomas Turner, Ibid., #14/26/95/2-I. Turner
Suggested that "Brown" was touched with religious mania and
had a tendency towards melancholia. See Thomas Turner,
Phrenology: Its History and Most Important Principles,
(Brooklyn: 1878), in Burt Green Wilder Papers, #14/26/95 Box
4-1. Prof. John Logan, "Aids to the Study of Character," 25
September 1874, Ibid.

79. Phrenological Character of Mr. Henry Cowell by Jessie A.
Fowler, 15 April 1905. Burt Green Wilder Papers, #14/26/95/-
III. This delineation contains notations made by Wilder, and
according to the notes, Wilder felt the analysis to be fairly
accurate. This discussion with Rev. Monkman was apparently on
28 August 1905. A picture of Jessie Fowler contains a note
that she had examined "me" as Cowell in Spring 1905. While
they had corresponded by letter, they had yet to meet. Ibid.;
See the reference to the 1873 delineation in his papers.
Ibid., #14/26/95 folder 1. Mrs. Sarah C. Wilder, Delineation,
17 September 1873, Ibid., 14/26/95/4. To Fowler and Wells
from Burt Green Wilder, 27 February 1905, Ibid. Wilder may
have been examined much earlier in his lifetime; in Wilder’s
papers there is a copy of Synopsis of Phrenology, written by
O. S. Fowler which includes a delineation done in 1845. Its
comments were re-examined around December 1898, apparently by
Wilder. Burt Green Wilder Papers, 14/26/95- Box 4-1.
80. S. R. Wells to Dr. B. G. Wilder, 30 May [1874], Burt Green Wilder papers, #14/26/95 Box 1.

81. Bert Green Wilder, to Editor of the Phrenological Journal, [November 1898], Burt Green Wilder papers, #14/26/95 Box 4-2. Bert G. Wilder to Fowler and Wells Co., 8 December 1898, Ibid., Box 2; Burt O. [sic] Wilder from Fowler and Wells Co., 1 December 1898, Ibid. M. H. Percy [manager of the firm and Secretary at the American Institute of Phrenology] to Burt Green Wilder, 21 December 1903. Ibid.

82. To Fowler and Wells from Burt G. Wilder, 27 February 1905. Burt Green Wilder Papers, #14/26/95/III.

83. J. A. Fowler, Phrenological Character of Burt Green Wilder, 1 June 1909, Burt Green Wilder Papers, #14/26/95 folder 1; Dr. Wilder from J. A. Fowler, 28 October 1909, 10 January 1910, 7 June 1910, Ibid., #14/26/95/4-4; Dear Miss Fowler from BWG, 30 October 1909, Ibid.

84. Dear Miss Fowler from Burt Green Wilder, 22 March 1913, Ibid., #14/26/95 Box 2. Given events at the end of Wilder’s life, this communication and friendship between scientist and phrenologist is very important.


86. Goldwin Smith to My dear Wilder, January 1 1892, Burt Green Wilder Papers, #14/26/95 Box 2; Dear Miss Fowler from Burt Green Wilder, 30 October 1909, Ibid., Box 2-2; Kasprzak, “Wilder Brain Collection,” Hedwig Kasprzak Papers, #14/26/130. In 1972 there were 350 brains still held at Cornell University, where Wilder had worked; only 122 were retained after that. Ibid. The Kasprzak papers contain both a copy of Wilder’s will and instructions on “How to Make A Brain Bequest.” Ibid. Burt Green Wilder from Manager of Fowler and Wells, Burt Green Wilder papers, #14/26/95-III. The Bequest form for suffragist and women’s rights advocate, Elizabeth Cady Stanton, also is held in Burt Green Wilder Papers, #14/26/95 Box 2.


91. Some medical doctors were sceptical of the existence of a hypnotic state. See the notes from the 15th meeting of the Elmira Clinical Society, Minutes, 18 October 1909, Chemung County Historical Society, Box 31, Doctors Miscellaneous, p.19.


98. Nelson Sizer, "Delineation of D. Willers," Diedrich Willers Papers, Department of Manuscripts and University Archives, Cornell University, 4 April 1891, # 652, Box 4.


101. Advertisement, Elmira City, Elmira Heights and Horseheads Directory, (n.p.:1905), insert between pp. 256-7. At this time patients from the Elmira area could visit The Palace Turkish Baths operated by proprietor Peter Flynn, cancer specialist and masseuse, Mrs. Mary J. Veazie (or several other masseuses), or the Gleason sanatorium, as well as regular physicians. Ibid., pp. 396, 534, 552, 562.

102. Elmira City Directory, 1903. This building later became the Hotel Gotham and then the State Street office of the New York State Electrical and Gas Company. Acrec, 28 November 1896.
CHAPTER SEVEN:
From Health Reformer To Reform Professional:
Health Reform and the 20th Century

The sailor and traveller...the anatomist chemist
astronomer geologist phrenologist spiritualist
mathematician historian and lexicographer are not
poets, but they are the lawgivers of poets and
their construction underlies the structure of every
perfect poem. No matter what rises or is uttered
they sent the seed of conception of it... of them
and by them stand the visible proofs of souls...
always of their fatherstuff must be begotten the
sinewy races of bards. If there shall be love and
content between the father and the son and if the
greatness of the son is the exuding of the great-
ness of the father there shall be love between the
poet and the man of demonstrable science. In the
beauty of poems are the tuft and final applause of
science.\(^1\)

We have boiled the hydrant water,
We have sterilized the milk;
We have strained the prowling microbe
Through the finest kind of silk;
We have bought and we have borrowed
Every patent health device,
And at last the doctor tells us
That we've got to boil the ice.\(^2\)

The health reform movement of the 19th century has
impacted on our world of the 20th century; it has not done so
in the manner that the reformers would have expected and would
have preferred. True, there were some dramatic challenges
made to the orthodox medical profession. Under the influence
of the reform movement, allopathic practitioners came to
recognize some of their therapeutic inabilities. There was a
recognition of the role of nature as a curative measure. The
allopathic profession ultimately abandoned heroic medicine,
and moved towards a therapeutic programme that emphasized
prevention and public health. Health reformers would have been pleased at this. They also would have, and did, celebrate the opening up of the medical profession to women, no matter how slow, how reluctant, and how based on financial expediency that development was.

With the cooptation of health reform ideals, however, much was lost. The notion of cooptation itself is shrouded in ambiguity. It does not automatically mean that one group has succeeded in having its ideas adopted by a formerly antagonistic section. It does not mean that a reform agenda has been successful. Through cooptation the regular medical profession was able to be selective about what it took from health reformers. Gone was the entire notion of human perfectibility, a concept that played a large role in the ideology of health reformers. Lost was the health reform battle against the sterility, authoritarianism, and elitism of higher education. The belief in the strength and goodness of the general mass of humanity also had disappeared. The concept of self-help had vanished and had been replaced by a dependence on skilled professionals. The notion of a tripartite balance in society disappeared; and the concept of the harmonious and symmetrical body faded, albeit more slowly, in the face of new scientific research. Along with many of their ideas and ideals, the health reformer of the 19th century also vanished. Alternative treatments, however, still play a role
in medicine, and modern research has helped to elevate its position and validity.

The importance and universality of ideal good health had remained a constant, though. Dr. John H. Kellogg, who traversed the gap between 19th century health reform and 20th century scientific medicine, offered one Victorian metaphor for health: "What we need is a general recognition of the claims of the new religion - the religion of the body, which makes for physical righteousness and had for its goal the physical redemption and salvation of the human race."

Others, such as British writer Samuel Smiles, had long equated health with wealth. He noted, "Health is said to be Wealth. Indeed all wealth is valueless without health." By the opening of the 20th century, there came a narrowing in the concept of harmony and equilibrium, and a loss of the health reformers' perfectionist vision of health. Metaphors of salvation and wealth no longer made sense. Health reformers long had promoted that belief in the possibility of the perfected harmonious body. Without physical, mental and social harmony, people could not fulfill their function in life, whether that role was defined as earning a living, gaining an education, or nurturing a family. To them, pain and ill health meant "Return to nature, observe her laws, and be restored to happiness." This struggle for good health, and a balanced physical, mental and moral nature, a constant
in the health reform movement, had to be maintained at all times.

Man violates the laws of nature in his own person, and he suffers accordingly. He is idle, and overfeeds himself; he is punished by gout, indigestion, or apoplexy. He drinks too much; he becomes bloated, trembling, and weak; his appetite falls off, his strength declines, his constitution decays; and he falls a victim to the numerous diseases which haunt the steps of the drunkard.\(^6\)

The problem was never merely an individual one; it was also social. To perfect the world all should be in balance; unfortunately, between the seemingly growing degeneration, the class conflict, and the impact of industrialism, that objective seemed more and more unlikely. Like humanity, society was troubled by imbalances.

Society suffers in the same way. It leaves districts undrained and streets uncleaned. Masses of the population are allowed to live crowded together in unwholesome dens, half poisoned by the mephetic [sic] air of the neighbourhood. Then a fever breaks out— or a cholera or a plague. Disease spreads from the miserable abodes of the poor into the comfortable homes of the rich, carrying death and devastation before it. The misery and suffering in such cases, are nothing less than [wilful], inasmuch as the knowledge necessary to avert them is within reach of all.\(^7\)

Health reformers were prepared to live their lives in a manner which they believed would aid in their personal perfection, and add to social health. For ten years while he was a vestryman of St. Timothy's Church in New York, for example, Samuel Wells worked to abolish distinctions in the place of worship, believing that the rich and poor, and the fortunate and unfortunate were equal, a practice which
"harmonized with his benevolent nature." A friend once wrote him from New Orleans in 1862 and claimed, "You know so much of human nature, of human character, that it is no small privilege to either receive a letter from or enjoy an hour's conversation with you. General information comes from the masses; accurate information from the few, - men who think." The correspondent noted that there was an ongoing fight for freedom from the evils of slavery, but he noted that "on moral grounds, the battle of ideas is to come." Like other health reformers, Wells would live out his life in that struggle for ideals. In a similar fashion, Harriet Austin, of the Dansville Home on the Hill, promoted dress reform throughout her lifetime. In her role as a physician, hydropath, and councilor to female patients, she, too, lived the reforms she advocated.

The practice of health reform ideas was not limited to the health reformers themselves, but were to the lifestyles and life-decisions of their patients and acquaintances. William Blaikie of Cambridge, for example, wrote Samuel Wells for advice on both his profession and the proper development of his mental, physical, and moral health. Blaikie noted that he had followed Wells' earlier suggestion and had turned down a position as an assistant buyer and seller for an oil shipping firm. At that time Wells had suggested that while he had the intellect for the position he would not like a sedentary job. Blaikie decided to stay in law. He later
questioned Wells if his lifestyle was healthy, or should he try for a more rigorous system of exercise. "I would like to develop my moral, mental & [sic] physical nature harmoniously; and if the thing is possible, each to a scale on your list."

He wanted to be more than "a mere hewer of wood & [sic] drawer of water," yet he acknowledged that even with total abstinence from sexual indulgence, he found it hard to achieve the appropriate tri-partite equilibrium. In another example of this dependence on health reformer's ideas, a woman from New Hampshire wrote Charlotte Fowler Wells, asking for help in raising two children, who were not her own. She also had written to Lorenzo Fowler and his wife, Lydia Folger Fowler, for help, noting that they were known for having raised good children. One child, under her care, the daughter of a domestic who had been apparently good at her job but not overly bright, and of a man who was intelligent enough but over-fond of sensual pleasures and possessing little self-discipline, was being taught self-control. The other child was almost perfect, she wrote, being very bright at her studies. The mother intended "to have every faculty thoroughly trained that she may make a perfect woman whatever business she may undertake."

Health reformers and their readers not only practised their beliefs, they promoted alternative lifestyles, as well. The Phrenological Journal, for example, praised the establishment of the Universal Improvement Society, formed in 1904 with
its head office in Seattle, Washington. Its mandate was to encourage the study of human nature including phrenology, physiology, heredity, as well as doing educational and humanitarian work, "Solely for the purpose of improving mankind and increasing human happiness in its truest and broadest sense." The health reform movement had had far-reaching effects, not only for its promoters, but for a multitude of committed followers, and a good number of sceptics. If human and social perfection failed to materialize, it would not be due to them.

The change that people like Wells and Austin sought was not just to bring a specific reform to the world, but to bring about a new world view. In her study of hydropathy and women, Susan Cayleff has claimed that of all health reformers, hydropaths were the only ones to offer this new vision. While this is a logical deduction to emerge from a study strictly concerned with hydrotherapy, it is erroneous in that it ignores the ideology of other health reformers. It would be impossible to argue that ideas which emerged out of phrenology, or out of the physical culture movement, were any less encompassing in their scope than those of hydrotherapy. The wide range of social topics that Orson Fowler tackled, would alone prove this claim. This mandate of health reform at once permeated and benefitted from a broad reformist platform in the latter half of the 19th century. Much of that platform depended upon a utopian vision of a balanced and symmetrical
world, one that would develop from the efforts of each balanced and symmetrical individual. The health reform ideal was tinted with the colour of Jacksonian individualism and the self-made man. This was, of course, a motif that reached back into the earliest years of the century. It would be tinged with the hue of utopianism which emerged out of the millenarianism of the religious fervour that swept across New England and beyond. It would be developed first with the environmentalism that ran deep into the abolitionist stream, and later with hereditaryism, and a Christian mutation of evolutionary ideas. Health reformers believed that in the near future individual effort would lead both to the perfected human and social state. The health reform vision combined an optimistic view of the individual's social responsibility with the prevalent possessive individualism of the age. It was a view of an emergent middle class that had neither obliterated the ties to its recent past nor expropriated the bourgeois reformist attitudes of its future.

That vision would be transformed beyond recognition in the 20th century. The modern health reformer would have an altered view of humankind and its potential. Hopes of finding perfection would give way to pessimism; attempts at recreation would be abandoned in favour of merely stemming perceived degeneration. Individualism and its personal responsibilities vanished in the face of mass consumerism and the leisure-oriented society. The health reformers would not
only be replaced by the professional medical doctor, but they would be supplanted by the professionalised "expert" in specific fields. Nutritionists, physical education teachers and trainers, social workers, psychologists, along with medical doctors, would direct the general population in the 20th century. They would form part of a new professional middle-class phalanx that would offer and enforce solutions to the degeneracy of the modern world. The professional middle-class, feeling itself threatened, would maintain a stance of bourgeois reformism, and would promote both the responsibilities of the state, and the guidance of the rational scientifically-trained expert, a duo of supposedly "impartial umpires."  

The advent of modern forms of communication would spell an end to the lecture field where so many reformers had made their reputations and their money, and as well, where they had dispersed reform ideas to the general public. Public lectures had been both a form of entertainment and a source of instruction. Their popularity would fluctuate. In New York city alone, for example, from 1840 to 1860 there were more than 3000 advertised lectures. Those persons who hoped to make a name for themselves, or who had already done so, found it necessary to enter the lecturing field. They would speak to diverse audiences of men and women; although these would contain few factory workers, many clerks, apprentices, artisans, and mechanics would be represented, as well as the
emerging middle class professional. In the years after the Civil War there was an increasing number of comic lectures and entertainments, as well as talks by women lecturers "who no more feared to speak in crowded halls than they did to appear on public thoroughfares in bloomer trousers." The disdain that some women faced for speaking in public was wide-spread.

Those reverend Misses, doctors in mobcaps, 
And petticoated lecturers, are things 
Which make us loathe, like strange unnatural births 
Nature's disordered works. Yon chirping thing 
That with cracked voice and mincing manners prates 
Of rights and duties, lecturing to the crowd, 
And in strange nondescript of dress arrays 
Unfettered limbs that modesty should hide.... 
Sweet sisters, call not that unsexed thing 
By the pure name of woman."

Many who ventured into the health reform field helped to dispel that notion that women had no place on the public platform.

Women and men both could earn a respectable income on the public stage. Henry Ward Beecher was the highest paid lecturer, and even "second-rate" people could manage $100,000 per decade. Beecher's house was mortgaged, noted the Public Ledger in Newfoundland in 1875, even though he earned an estimated $2000 per month, plus $12,000 for a lecture tour, despite being embroiled in a sexual scandal. Health reformers Orson Fowler, William Alcott, and Sylvester Graham were other highly paid speakers. After 1875 there was a decline in the field, but lectures on public health and women's health increased in popularity. Over time as the lecture format became professionalised, the audience became more discriminat-
ing and demanding, and the platform where once so many women had advanced, would open only to a limited number of professionals.¹⁷

The ultimate outcome of the era of the lecture tour, however, was, first, and foremost, that many women were able to earn their living at their profession, a move that helped to legitimize the idea of women in medical schools and hospitals; second, that talks on health reform dominated in the lecture field; and third, that the reforms themselves had reached a vast audience. For women the dawning acceptance of the fact that the proper female condition was health, was at once beneficial and harmful. The notion of good health helped to show many women that they did not need to live in pain, desperation and fear, but it also accelerated the development of health professionals, who suggested that they alone held the key to good health and hygiene. That permitted the rise of a dependence on experts, a decline of personal self-reliance, and the growth of technological and professional interference in health matters, both private and public.

In addition to the importance of lectures throughout the 19th century, as the general public became more literate, there was increased interest in popular articles and writings on health. Health reformers had played a major role in disseminating information on physiology, disease, and general health. They did this through their writings, as well as lectures, and in the case of Fowler and Wells, for example,
through the publishing industry. In 1884 Dr. H. B. O’Leary, the president of the Boston Ladies’ Physiological Institute, suggested improvements to the organization’s library. Feeling that most medical tomes were dull, she wished to subscribe to popular journals since most carried articles on health. Using medical metaphors, she argued, “It seems to me that we might with an advantage have a few periodicals, and thus introduce the subject at first in homeopathic doses, and after the taste has been acquired and cultivated, we will give the heroic treatment; by having in future the best medical journals which the country affords.” If her suggestion was accepted, she offered to provide *The Century*, *The Atlantic*, *The Woman’s Journal*, and two health journals to the library.18

Through work such as this both popular and scientific notions of health were brought to the general public. There was and is, however, a problem with the popularization of issues as complex as science and medicine, and that is the tendency for information to be misread, misinterpreted, and misused. Matters of health, as promoted by the popular press at the instigation of health reformers and doctors alike, offered only modified and sometimes contradictory information. As Stephen Gould has argued, academic and lay ideas often flooded the popular press. “Once entrenched, they often embarked on a life of their own, endlessly copied from secondary source to secondary source, refractory to disproof because no one examined the fragility of primary documenta-
As medical physicians and health professionals entered the literary or lecture battle field either to denounce or proclaim ideas about health, the result was identical: the concomitant denigration and cooptation of the health reform agenda, and the promotion of the expert on scientific and health matters.

If health reformers helped to popularize ideas about health and hygiene, they also promoted the notion of nature in health care. John Burnham has argued that naturalism was "the triumphant motif in popularization." For allopathic medicine that was true only so far as Nature herself could be defined in scientific terms, and thus, become part of allopathic therapeutics. Doctors and scientists had to convince the population that they were not only the ones who best understood sickness and health, but that they and their science possessed the understanding of the abstract concept of nature. In part the rising acceptance of education served to justify their claims to the general population. Burnham has complained that science ultimately lost importance and credibility when scientists abandoned the field of popularization, but, in their attempts to counter health reformers' impact and influence, allopathic practitioners, defenders of science, did not abandon the field, but rather tried to sell a palatable version of science to the public. The impact of this popularization in health matters was the promotion of a secular mutation of orthodox and irregular medicine, with nature and
science both diluted to a consistency acceptable and comprehensible to the general public. Such a mixture successfully co-opted the therapeutic regimen of health reformers while ignoring the ideology of the movement. While the concept of balance and symmetry, the lynch pin of health reform, would continue its significance for some time, it increasingly would be defined more narrowly and be limited to the physical body, rather than the social body. Even the long-held concept of the perfection of physical symmetry and harmony would decline. This was, in part, due to advances in brain research, which increasingly suggested that asymmetrical brain development in the human, rather than symmetrical brain formation, might signify superiority and advanced development. This shift in the understanding of the concept of harmonious balance also was due to the widening chasms in society. A more overt class consciousness, based on the accumulation of wealth rather than inherited status, would replace the goal of social harmony, as both the working class and the middle class recognized, and even celebrated, the impenetrable barriers that separated them.

A typical example of how medical doctors incorporated the ideas of health reformers into their therapeutic arsenal, can been seen in the work of Dr. Hamilton Wey. From 1864 to 1865 Wey’s father had been the physician in charge of the Confederate prison camp at Elmira, New York. Steeped in the allopathic tradition, Hamilton Wey graduated from the Albany
Medical College in 1849, and eventually became the supervisor and physician at a youth reformatory at Elmira. While in charge of the reformatory, he published articles on the application of anthropological ideas to his criminal charges. He believed that his ideas about "the diseased and blunted mind" and his experiments at the prison would be benefit educators and physicians who wished to understand the human mind. Society's main goal towards the criminal as in the case of the insane, he argued, was first, self-protection, and second, the well-being of "the convicted felon, and his subjection to influences that will modify and correct his abnormal tendencies, that, ultimately, when given his freedom, he will not be a menace to the community in which his lot is cast." Wey claimed that "wrong-headedness" or "blunted or non-developed nervous areas" was the origin of criminal tendencies. Whatever the motives attributed to the perpetrator of a crime, "the fact remains that the head of the criminal is wrong. Education was the best way to treat this person who suffered from both moral failure and blunted intellect." That education included letters, manual training and physical education. Through this training "the slumbering germs of manhood are fructified, maturing under a firm and unrelaxing discipline." The criminal was an abnormal production, physically, mentally and morally. Generally under weight, with repulsive features in some one or more lines, and asymmetrical head; he is coarse in fibre and heavy in his movements. His mind, while not diseased, is undeveloped, or it may be abnormally developed in cer-
tain directions; the smartness resulting therefore partaking of low cunning and centering about self. He is deficient in stability and will-power, and incapable of prolonged mental effort an application. His intellect travels in a rut and fails him in an emergency. His moral nature shares in the imperfections of his physical and mental state. . . . His is a perverted moral nature; a blunted mind, and a crude body.

Wey depicted the criminal class as encompassing the person from the tenement house, homeless wanderers, the "overgrown and stupid dunce found in every rural district, a neglected yokel barely able to read and write, without resources within himself, and corroded by the tales of lewdness and crime" and the boy "rich in conceit and poor in experience." 21

Physical education for these felons, suggested Wey, would not make the criminal a gymnast, but rather it would improve physical and mental health. In 16 months Wey had taken 43 "dullards" and put them into classes for physical training. He noted that they spent their lives as loafers, tramps or hostlers, and that their physiognomy that indicated their criminal tendencies. Wey gave them a special diet, physical training, passive exercise (massage) with a professional trainer, manual drill and calisthenics. They worked at the lowest level of school training, Wey noted, since they were very dull and knew only the foods they liked, but not the names of cities. He took a guess as to how many baths they could take without physical deterioration. He judged that one bath per day was too enervating; and finally decided that one tub and two vapour baths in one week, and two tub and one
vapour baths the alternate week was best. Baths not only aided cleanliness, but helped the skin functions, the skin-organ relations, and stimulated the peripheral nerves and the secondary action on the cerebral centres. The tub bath did not do enough, Wey admonished, as he praised the turkish bath with a seating room, the cold plunge, the douche, and the needle, vertical, and lateral shower and massage treatments. Under his direction, he reported, the criminals, lost their "dull and stupid look." The next two classes were not as successful; his trainer was lost when he was released on parole, (an ironic choice given Wey's opinions of the criminal class), and these new groups did not have the "ox-like traits" of the previous class, being mostly "country clods" and some city criminals, and therefore, they were not in need of so much regeneration. 24

Wey praised the objectives of criminal anthropology. He noted that the mental and moral organization of criminals had led to the search for "an anatomical basis of crime - a criminal brain." A cerebral anatomist was needed to demonstrate this "asymmetrical and atypically asymmetrical" brain. The criminal head was "markedly asymmetrical with the facial lines coarse and hard, characteristic of a degenerate physiognomy." Wey's physical training aimed at cultivating perfection in the human body through "the correct[ion] of disparities in accordance with the law of adaptation and harmonious adjustment of parts." Wey noted that Dr. Dudley Sargent, the
director of the gymnasium at Harvard, believed that symmetry of form held both a physiological and moral significance and that the body shape and structure had "a direct dynamic relation to all the vital organs, and appreciably influence[d] the functions of the brain and nervous system." Physical training in its most literal sense, Wey argued, was the cultivation of the perfection of the human body, according to the physical proportions of the average (male) human body."

Here we have a medical doctor using water therapy, nutrition, physical culture, and ideas about symmetrical brain development, to classify and treat his patients. All of these are attributed and attributable to the newly emergent science of criminal anthropology; but they are also therapies and ideals that have descended from the work of health reformers. Of course, their contribution was never cited by Wey or by most other allopathic physicians. Furthermore, many of those who turned to criminal anthropology remained unaware of the developing contradiction in Lombrosian criminal theory. As brain research progressed there was a direct turn about in the concept of brain symmetry. Scientists and physicians began to stress the long-time phrenological concept that since humans had the potential of self-improvement, they also had the potential to increase the structure of the brain. Rather than a superior structure, a symmetrical brain, therefore, actually may show that there had been no conscious cultural development of the organ. By the early 20th century a symmetrical brain,
rather than a symbol of excellence, had become a sign of lesser development. Those who celebrated Lombroso's rule that asymmetrical development denoted criminal characteristics, were placed in the paradoxical position - although it appears not to have altered their conceptions - that both an asymmetrical brain or a symmetrical brain could identify criminal tendencies.\textsuperscript{26} It was a predicament for those who exhibited anti-social tendencies, for their physicians and, no doubt, for their lawyers.

As class divisions widened, and hereditarian and evolutionary thought began to formalize, and as fears of race degeneration and possible race suicide materialized, the new health experts, among others, expressed their concerns and assisted in the development of eugenic thought. Twentieth-century physical culture advocates, for example, accepted these eugenic principles. Arguing that even Ling's system of gentle exercises was too strenuous, one author used eugenic thought and the concept of balance in a series of articles, later published as a monograph, and argued that:

\begin{quote}
In order that a race may progress, it is important that there be a natural equilibrium between the individual's temperament and his character, and that a sane education of the nervous system promote a fluid and harmonious functioning of all the powers. If the mind is to expand as a whole, it should never be thwarted by the conflicting manifestations of an ill-regulated temperament.\textsuperscript{27}
\end{quote}

Since eugenic thought was based on the superiority and more advanced development of specific races over others, social harmony would depend on the improving the offspring of some
persons, total assimilation of some people and races, and on the elimination of the truly inferior.20

If eugenic works are examined the similarities and discrepancies between the earlier health reform movement and the early 20th century drive to prevent and end degeneracy can been seen. Well-known physicians and leaders helped to establish the Life Extension Institute, which worked in the "Human Salvage" field. Formed in 1913 the Institute's mandate was to make available to the general public periodic health examinations. Its hope was that life insurance companies would pay the costs associated with this venture and thus, save money by this preventative measure. The Life Extension Institute members included ex-President Hon. William H. Taft, chairman, Dr. William J. Mayo, surgeon, Eugene Fisk, its director of Sanitation, Gen. W.C. Gorgas, the Consultant on Sanitation, inventor Dr. Alexander Graham Bell, Dr. John H. Kellogg, Superintendent of the Battle Creek Sanitorium, William G. Anderson, Director Yale Gymnasium, Dr. R. Tait McKenzie, Professor of Physical Education and Department Director at Pennsylvania University, Dr. Dudley Sargent, Dr. Luther Gulick, President of American Camp Fire Girls, Mabel T. Boardman, Chairman, American Red Cross National Relief Board, Arthur P. Kellogg, managing editor, The Survey, Norman Hapgood, editor of Harper's Weekly, and Horace Fletcher of health reform and nutrition fame, along with some 100 scientific men. Their aim: to bring educational, constructive, and
preventative ideas to "the very fabric of business life." 29

The residual linkages with health reform ideas and the emergence of professional expertise is easily visible. Anderson, Gulick, Sargent and McKenzie were all physicians involved in physical training; Kellogg formulated the Seventh Day Adventist diet, and was a physician who popularized health matters through the Battle Creek Sanatorium and his journal, Good Health; and Boardman was a director of an institute which might not have existed, according to its founder, Clara Barton, had it not been for the perception of phrenologist Lorenzo Fowler.10 Fletcher's notions about food mastication once had rallied many behind him; now his ideas would be sponsored particularly by Kellogg and Fisher, as they tried to place his dietary schemes on a scientific footing.11

Institute co-founder, eugenist, and Yale political economy professor, Irving Fisher argued before the American Public Health Association that while sanitary principles had helped make humans safe from germs, social degeneracy and physical ill-health still plagued all social levels. The chief culprit in these conditions was ignorance, lack of hygiene, indifference, and industrial conditions. For Fisher, eugenic thought was a simple matter. "I HAVE SOMETIMES SAID THAT EUGENICS IS HYGIENE RAISED TO THE HIGHEST POWER." Since eugenists believed that feeble-mindedness was a recessive factor, care had to be taken that those with such characteristics marry only the most normal partner. Isolation of the
worst cases, and even sterilization of some, would help stop the advance of feeble-mindedness into future generations and "we can save the bloodstream of our race from a tremendous amount of needless contamination." One defective girl, Fisher noted, had had surgery to correct her problem and was "made over into quite a respectable human being." He found it deplorable that now she was to be married; despite corrective surgery, she would always be a defective, and carry the taint of degeneracy. Even worse, she would pass that trait to her descendants.

Eugene Lyman Fisk, a co-author with Fisher of How to Live, and a medical doctor involved with the Life Extension Institute, was an advocate of one of the group's primary aims: periodic examinations of those who were considered healthy. This would help both the employer and the employee, he argued, and, as well, increase the scope of the physician's work. The only opposition to this preventative medicine, he claimed, came from "nervous neurologists, and well-meaning, but utterly misinformed representatives of organized labor." Neurologists argued that the discovery of a here-to-fore unsuspected malady might harm people's minds. The labour issue was more complex:

As for the labor sentiment against periodic examinations, it is not widespread but simply reflects a fear that the "weak brother" will be discriminated against, and also evidences a total misapprehension of the spirit and motive underlying these activities. It is not the weeding out of the sick or the unfit that is contemplated in this movement, but the raising to a general level of fitness and well-being. The frankly sick have for years been weeding themselves out, while under this new system
sickness is not only prevented, but the unfit are given an opportunity to improve their condition in many cases, given the kind of employment to which they are adapted, if they cannot be physically adapted to the work they are doing.

Future regeneration, not present degeneration, was what should be stressed in preventative hygiene. If care was taken to present the notion of periodic examinations to workers, there should be no complaints. At one company, International Harvester, over 20,000 men had been examined, and only 20 had protested, he claimed; most of them had permitted examinations when they understood the need for such tests. Sears, Roebuck, and Company had similar success, and had noted a reduction in tubercular deaths (from 4.6 per cent to .8 per cent) in five years. Ignoring the possibility of gender, class or ethnic bias, and the resultant discrimination made possible by the findings of such tests, it was stressed that potential financial gain to the company was not the issue, nor was the aim of this eugenic programme (eugenics with immediate results), the weeding out the "physically underaverage or the physically unfortunate." There could be no place for individualism in this scheme. It was the health of the entire work force that was important. One estimate, for example, suggested that 90 per cent of those with tuberculosis were from the working class. Of course, the trained worker with a correctable physical flaw should not be dismissed if at all possible, Fisk suggested, but those with a serious disease caused more problems. "This I must confess - the care of
those absolutely disqualified for wage earning - is a question which must ultimately concern the State, quite as urgently as disability from accident."

Even with this concession, there remained a problem of the vast numbers that subsequently were diagnosed as unfit. The Life Extension Institute conducted medical examinations of employees of commercial houses and banks. Only 3.14 per cent were found normal, 96.86 per cent were in need of advice, 96.69 per cent were unaware of their impairment and 59 per cent were referred to a physician. There were, however, financial compensations for companies. If all American manufacturing associations had their employees examined, an estimated 90,000 people, the Institute suggested that a $10,000,000 advantage in working capacity would be gained. For every $1.00 expended, there would be a return of $4.00.

Under the scientific direction of the reform professional and the supposed disinterestedness of the benign state, those workers unfit to produce and their families would somehow survive; the problem was that both the professional and the state were oblivious to the biases inherent in eugenic thought. And neither was willing to assume a paternalistic responsibility for the dislocated worker. Finally, the ultimate benefactor/victim of eugenic thought, whether that status be identified by a physical difference, by a class attitude, by gender, or by race and ethnicity, was never
consulted nor considered in the drive for efficient production and improved public health.\textsuperscript{32}

Many doctors, along with other professionals, advocated similar eugenic principles. Dr. Calem William Saleby argued that in eugenics all that mattered was the principle. It overrode notions of political positions, he argued. "The question is not whether a given proposal is socialistic, individualistic or anything else, but whether it is eugenic. If it is eugenic, that is final." Even socialism, he admitted, if it put an end to women marrying for money, rather than upon sound eugenic principles, was worth while. Claiming himself to be the coiner of the term "eugenic," he argued against the rapidly multiplying "yellow peril," and presented a Malthusian ideal of a finite population on earth. He worried about the sterility of women in higher education and the apparent backlash against eugenics among the rapidly multiplying lower orders.\textsuperscript{33}

The ideas of the Life Extension Institute and of other eugenics promoters would not have appealed to the 19th century reformer. One major objection would be the denigration of the working class. While health reformers were rarely socialist, or, even workers for a political cause, they did feel that the native American worker or farm labourer was in better condition than the fashionable and often idle member of society. Health reformers believed that those of the aspiring and emergent middle-class could benefit from the workers' better
qualities: their exposure to fresh air and exercise, their lack of affectation in fashion and society, and their strong moral tone. Even those present at the onset of the factory system and witness to the degeneracy caused by emerging industrial capitalism blamed not the workers, but the conditions under which they struggled. Dr. Andrew Combe, a well-known physician, and the brother of phrenologist George Combe, for example, argued that, "The remarkable increase of insanity among the lower orders in Great Britain, particularly in the manufacturing districts, has been pretty accurately traced, partly to the miseries, want, and anxiety, inseparable to the fluctuations to which they are exposed, and partly to the prevalence of dram drinking, as is the only means of relief within their reach."

With this early recognition of the detrimental side of industrialization, came a coherent recognition of class consciousness, the development of class conflict, and the recognition of the position of the reformer who stood outside of the shop floor. "By a strange inconsistency, while we assert universal equality, we are all struggling to seem elevated above the common level. Idealizing the dignity of labor, we aspire to be regarded as any thing else than laborers." The role of the health reformer is thus difficult to discern in 19th century radicalism. Their primary agenda was their particular health regimen; few actively became involved in the political world. They were often friends and
acquaintances of radicals from William Garrison to Wendell Phillips, yet they resisted a commitment that might surpass their primary reform. Indeed, for many, since their particular health regimen was expected to achieve individual and social perfection, political work would have been a needless distraction. They did experiment with communitarian living, and as well, reported on these attempts at alternative living. In 1860, for example, Harriet Austin, physician at the Dansville cure, wrote of an "extraordinary," harmonious community that was neither "rich nor poor." There was a community kitchen and dining hall, a large parlour, a reading room, and a play room. Steam ran all the ploughing, planting, mowing, sowing, reaping and threshing machines. As well, the town contained a woollen factory, a sawmill, gristmill, printing office, sewing and knitting room, shoe shop, washing and ironing room. There was, she reported, very little labour involved in this experimental development, and participants practised a vegetarian diet, took much exercise and sport, slept from dark to dawn, and spent their days as students. At other times readers would ask reformers for assistance in locating communities or groups that supported their causes. When B. N. wrote to the Phrenological Journal, for example, and asked if there was a company for temperance and moral reform that had its own settlement, there was a quick response. At that time, 1882, they knew of no settlement that fit that description. There were, however, temperance
colonies such as those in Maine, Massachusetts, New York, New
Jersey, and Illinois. Some of these were well-known, but, "If
you wish something quite new and in a primitive region, how
would British Columbia suit? A new colony is in prospect up
there for temperance and moral ends, besides industrial
independence. The aim, according to the secretary of the
movement, is to found a model society, and it has the counten-
ance of the Government."

In 1848 Orson Fowler set down his views on social
organization. Tinted with phrenological and health reform
overtones, it was the simple belief in the rights of man, the
praise of individualism, the faith in the commoner, and the
condemnation of the person committed to the pursuit of wealth
and fashion for their own sake. Fowler argued that all
persons must develop harmoniously. Neither God nor Nature
supported the nineteenth-century chase for wealth. The hunt
for property began the descent to ill-health, he argued; the
expenditure of money completed the fall. For the farmer and
labourer the search for the balanced body still caused
problems: they upset their equilibrium by too much physical
labour, and not enough mental toil. The solution was apparent
to Fowler: all men should labour for only five to eight
hours per day in order to earn the necessities and comforts of
life. More riches were not needed; they would bring only
trouble and children who squandered wealth. The labouring
classes should not be forced to spend their waking hours in a
desperate bid for existence. They merely needed to be better paid for their services; that would give them time to cultivate the intellectual and moral faculties. "The present arrangements of society tend to make the rich man richer, and the poor man poorer. This is certainly not the order of nature." It was the "capitalist" whom he blamed for the low pay and the inferior health of the common man.

And who is this rich nabob, this "great Caesar" that he should monopolize, or rather sacrifice upon the altar of his selfishness, all the lives of all these human beings? Why he is a rich man! that is all. Let the wages of the labouring classes be doubled, and trebled, and quadrupled; build the comfortable house for $5,000, but pay out the $25,000 for it, and let the 10,000 extra days be spent in reading and mental culture.

Excessive consumption, especially of the drugs of tea, coffee, and tobacco, were both harmful and unnecessary, Fowler continued. In addition, urbanization threatened both public health and public morals, he cautioned, "besides sending out a pestiferous influence throughout the entire length and breadth of our land, besides being the sinks of sin and pollution, and literally rotten with depravity, and being 'the sores of the body politic,' [cities] have originated and still perpetuate these fashions and bad habits, and wrong arrangements to which we have alluded, as so destructive of the lives, and health, and virtue of mankind." This attitude that abhorred the results of urbanization and capitalism, he proclaimed, was not a manmade construct, but rather, it was the formula of nature.
If this is called radicalism, agrarianism, loco-focoism, the real levelling principle, putting the rich and poor on an equality, be it so; it is the order of nature. Mankind have tried "the good(?) [sic] old way" quite long enough, and suffered quite enough thereby. That every thing as it now is, is all wrong, is fully evinced by the hard times, the bad health, the misery and vexation, and the premature deaths of all classes.37

Yet despite comments like this, and Orson Fowler's design and construction of an affordable home for all,38 and several attempts at communal living, only one of the Fowlers would make a commitment to socialist thought. Samuel Fowler was a much-younger, half-brother of Orson and Lorenzo Fowler, who had participated in a failed community, the Ancora Productive Union of the Industrial Public. His work distributing phrenological pamphlets in the slums of New York city had brought him face-to-face with poverty and the need for social change. His theories of social reform were pronounced in a monograph, entitled Genetics, A New System of Learning based on the Analogies comprised in a complete abstract of the requirements of Genetic Law as they apply to the origin and production, or the source and genesis of the star, plant, zo-onic and societary worlds. The book is, as Madeleine Stern noted, a mystifying document. A 1921 book by Samuel's son Horace, included a reprint of Genetics, but also offered a plan for social reconstruction which included female economic independence, an end to private ownership of property, and the establishment of the workers' collective ownership over the facilities of production.39
Charlotte Fowler Wells and members of her family and friends, held a number of spiritualist meetings. At one gathering a spirit cautioned Samuel Fowler and the Fourierist and reformer, Steven Pearl Andrews, about their commitment to Association and the future reformation of the world.

Society may, and will yet arrive, at some future period, at that point where your conceptions shall be more than fully realized, although not in a manner which you now anticipate. The principles which you now sustain are not those which are destined to revolutionize the world of society. You are vainly striving to ascend the summit of the edifice at one stride. The little sprout that springs from the acorn, is not at once a tree although it may ultimately become one, and however well it may be nourished, it cannot be forced to become a gigantic oak, but must go through the natural process of adding layer to layer, till it is fully and naturally developed. So with society - it must undergo one form & [sic] then another & [sic] & [sic] another, until it at length becomes naturally developed. And nature cannot be forced although it may be abused.

Rather than trying to perfect society at once, the spirit advised that Samuel begin to prepare the ground for the seed, to examine the past changes in society, and to formulate his views. He must be sure that the spiritual element was in line with his wishes, otherwise success would be denied. Whatever its origin, this message held true to health reform ideology; a natural harmony, rationality, and balance was needed in all areas of reform, even in political and economical change.10

The programme for social reform that health reformers articulated centred on the improvement of the individual; they expected that social reform would evolve naturally once the people had been converted to personal well-being. While
health reformers certainly had made progress in convincing people of the need for the physical, mental, and moral tripartite balance, their unwillingness or inability to translate this into a social program that included economic and political elements perhaps aided in their own demise, and in their susceptibility to cooptation. Many health reformers promoted a radical stance in areas from abolition, to communitarianism, to women’s rights. Their radicalism was fragile, however, and always hidden beneath the rhetoric and importance of health reform. Thus health reformers’ regimes easily could be coopted, their ideology ignored, and the political and economic status quo maintained.

The health reformers’ predicament was not unlike the position of those who primary objective was the betterment of labour conditions, and who relied on similar symbolism to explain their ideology. David Montgomery, for example, noted the concept of symmetry in early labour reformers’ demands for an eight-hour day split between work, recreation and rest, and sleep. Like health reformers, those who promoted labour’s collective power, also promoted the notion of harmony and potential perfection. They had, Montgomery claimed, "full faith that economic and political progress must occur in simple harmony." Like health reformers, who were overcome by the professionalization of the opposition, the cooptation of their regimes, the advance of science, and the maturation of industrial capitalism, just as they reached their zenith, the
labour reformers were overwhelmed by new forces and a different breed of radicalism that stressed the needs of a new industrial elite. Just as the health reformers tried to bring about a tri-partite individual and social equilibrium, at the same time as ill-health threatened increasing numbers, so did the labour reformers aim for the harmony found in full employment, increased economic activity and industrial peace, despite their ongoing engagement in shop-floor battles. Montgomery recognized that the perfectionism of labour reformers, "testifies to the resiliency of the social equilibrium that was emerging from the Reconstruction era." At the same time that concept of harmony and equilibrium, the linchpin of the arguments of both labour and health reformers, "served to disguise class consciousness and to divert popular anger from such social foundations as private property and constitutional government." It would be that view of harmony and balance that kept labour reformers and health reformers devoted to their own personal causes, even as they were bypassed as their world evolved into a new and unpredictable creature. As Montgomery has noted:

Passionately, vainly, the labor reformers were attempting to impart to the new industrial order some values other than purely commercial ones, to impose moral order on the market economy. True, they were pursuing a fantasy, but their will-o’-the-wisp was social harmony within the new world of the factory, not an imaginary arcadia of days gone by.41

The same can be argued for the 19th century health reformer, whose dreams spanned the residual nature of the recent
agrarian past and the emergent industrial future, and whose ideas reached the heights of human perfection, but floundered in the depths of reality.

In the early 20th century, for the most part, those concerned with personal health and social improvement argued with the voice of the progressive reformer. The maintenance of the status quo was paramount, and solutions to social problems and to industrial capitalism placed state or economic concerns above the individual. The notion of individual and social equilibrium was lost. For those involved with health, sanitation, and social welfare, the issue of the abnormal and degenerate person became paramount, not the possible perfection of humanity. Soon the eugenic cloud would sweep across the continent, as those who deviated from the middle-class norm were singled out with pity, fear, suspicion, and loathing. While commitment to the most drastic eugenic solution, sterilization of the mentally, morally, or physically deviant, was never widely accepted, nevertheless on occasion legislation did succeed, and there was widespread absorption of eugenic ideas. It was a middle-class solution to a middle class perception of a problem. As such, it illustrated some of the problems of a supposedly neutral point of view that is backed up with supposedly unbiased science.42

The typical eugenic attitude also can be seen in the ideas of a middle class professional, whose humanitarian zeal is evident, but whose argument revolves around an economic
axis, and retains the biases of the progressive era. Ernest H. Blois, a Halifax juvenile judge and the Director of Child Welfare, presented a paper, entitled "The Mentally Deficient as a Social Problem," to the annual meeting of the Children's Aid Society in 1926. Blois recognized that there were wide variables in "feeblemindedness," and he cited the three modern classifications: idiots, imbeciles, and morons. Since the first two had physical deformities, and the idiot lacked sex impulses, while the imbecile lack sex appeal, they were not a serious social problem. It was those who were classified as morons who were the greatest problem in terms of detection and treatment. Even with expert observation, some who suffered from feeblemindedness were not detected, and in fact, they often had "pleasing personal appearances." Sometimes the problem would be discovered in school, when the child failed, was led into mischief, had poor control over the appetite, played with much younger children, or, was "often very easily susceptible to sex temptations."43

Blois noted that in recent years academics, industry, and the military had begun to study the moron. While at one time social workers and those who worked with criminals had been the major impetus behind the studies of the feebleminded, it was now industry that pressed for more knowledge of the subject, and for more intelligence testing. "The results of experiments and investigations so far seem to indicate that feeblemindedness plays a large part in our economic affairs as
well as in our social adjustments, and it is largely because of this economic importance that present-day studies and investigations are being made." Hence, the problem of the moron meant that, "we are facing one of the most difficult social problems known." In the past it was believed that feebleminded persons, especially females, were responsible for sexual immorality and other evils; Blois pointed out that that was untrue, but without a pause he went on to argue the opposite. "This we now know to be untrue but nevertheless, in dealing with these particular forms of vice and crime, feeblemindedness is one, and in some cases a very large factor in a very complex problem." He quoted from a manual issued by the Department of Public Health in Washington to illustrate his point.

Brutality and cruelty seem to be universal symptoms of imbecility. The cruelty of the feebleminded which enables them to torture animals, to cripple birds, to tear wings and legs off insects, to laugh at the pain of others, forms the basis when they are physically able for assaults, homicidal attempts and murder.... The feebleminded, lacking in reason and judgement and devoid of all moral critique, commit all manner of sexual crimes without any feeling of restraint or shame....

In addition, Blois quoted, the feebleminded were "cunning thieves" and arsonists, and comprised 60 percent of adult and child, "professional prostitutes." The upshot of these facts, Blois noted, was "curiously enough this was the last to be considered by the early investigators, namely that the feebleminded are inefficient in industry (using the word
"industry" in its broadest sense) and hence in our modern society they are becoming a great economic burden." The modern pleas for care and training of these people did not revolve around humanitarian ideas and fear of the problem of their moral and criminal tendencies on the social order, "but on the purely financial grounds that if they are not trained they will be unable to do their work properly, and by clogging the wheels of industry by their inefficiency will thus become an economic burden."

Throughout the homes of Nova Scotia he found parents neglecting their children, either by a failure to provide for the family, an inability to make use of the father's earnings, a lack of moral standards, or a lack of ambition and a lack of appreciation for education. All of these conditions, unless the entire community suffered from economic problems, he claimed, pointed to feeble-minded parents. There were several methods of dealing with these degenerates, including intelligence tests, segregation and temperament analysis. Sterilization of all beneath a certain intelligence level, had found favour with a few, but Blois argued that it was impossible to determine a satisfactory cut-off point, and non-hereditary feeble-mindedness would persist. Blois argued that many people who could be a "carrier" of feeble-mindedness, furthermore, were not in themselves abnormal. Many feeble-minded were capable of earning their living; isolation would deprive the
state of their labour. And finally, the cost of such a plan was exorbitant.\textsuperscript{45}

The third and best plan, endorsed by most authorities, according to Blois, was the training and supervision of the young, and institutionalization of certain cases; although many approved this plan, little research on its practicality and financial cost had been done. Rather than humiliate them in a regular school, such children could be taught manual labour, and "what is perhaps most important of all, to obey constituted authority and to observe our laws." Blois noted that Dr. George N. Wallace, Superintendent of the State School for Massachusetts, argued that each must be evaluated on an individual level. Young children, lower grade deficients, many of the male morons, "the girl who is not the possessor of physical beauty," and those who have a good home could remain in the community. Blois concluded that there was a need for early evaluation, special classes, some boarding schools, and a maritime institution for the incapable, as well as supervision and care for the graduates of training schools. This, he knew would cost money. But, he added it must be done. "When municipal and local authorities generally recognize the importance of the adequate care and training of the feebleminded and its bearing not only upon the moral and social life of the community but upon the economic and industrial life as well, a means of carrying out such a program will be readily forth coming."\textsuperscript{46}
As this drive towards the dependence on the expert and towards the not-so benign-dependence on the state increased, to some extent the concept of symmetry and tri-partite balance remained as a symbolic metaphor, despite the turn-of-the-century decline in the belief of the potential perfected and harmonious society. Dr. Alfred T. Schofield, a physician and pathologist at the London Hospital in 1908, and a vice-president of the British College of Physical Education, for example, argued for a harmony of body and mind. He suggested that neither doctors nor their medical textbooks should overlook the role of the mind in bodily illness. Schofield also tried to bring a "harmony" to the medical texts that he felt were too concerned with rigid and functional illnesses. This lack of balance in allopathic thought gave quackery a chance to flourish, he argued, adding that regular doctors had to take control of these mental therapeutics. "It is indeed only within the last century that the practice of medicine has been severed from its connection with the black arts, witchcraft, astrology, phrenology, quackery, and knavery of all kinds; most of these [cures] being more or less psychological in their nature." The time had come to make them scientific.

Quoting Dr. Weir Mitchell, of neurasthenic fame, he advocated that the physician gain control of mental therapeutics.

Our best have owned the rare dramatic power
Which gives to sympathy its lifting hour; Go learn of them, the masters of our Art,
To trust that wise consultant called the heart.
There are among us those who haply please
To think our business is to treat disease,
and all unknowingly lack the lesson still.
'Tis not the body, but the man is ill.'

Schofield believed that some of what was termed, "quackery," could cure, and he argued that procedures such as hydrotherapy and homeopathy had a "semi-or pseudo-scientific basis" and are "elevate[d] . . . above the mere rank quackery," although he knew that some of the medical profession might be surprised by this admission. This "power of the unconscious mind over the body," that was the true curative agent of quack systems, needed to be controlled by doctors. After all, body-mind linkages had been ignored too long by allopathic doctors. Health, Schofield argued, was the harmony between body and mind; ill-health and disease were the disharmony. While faith and faith cures, whether evangelical, or Christian Science, or mesmeric, or spiritualist, could cure, physicians must not advocate faith cures themselves, but instead Schofield argued for the "legitimate practise of medicine as medicine." By this time, though, this metaphor was indeed a hollow replica of the social model of equilibrium that health reformers and others had proclaimed and pursued throughout the last half of the 1800s.

Those few health reformers who would find success after the turn of the century, did not share the vision of their predecessors. Bernarr MacFadden, the self-proclaimed "Father of Physical Culture," for example, viewed sexuality and the human body in an exhibitionist and amoral manner that would have shocked Orson Fowler, despite the latter's defence of
both male and female sexuality. Like Fowler, MacFadden suggested that there was little difference between male and female strength and that slavery to fashion caused feminine weakness. Both reformers had the dubious pleasure of being condemned by vice opponent Anthony Comstock. Both promoted their ideas through their own journals and publishing firms. The Phrenological Journal even published a delineation of MacFadden’s character. It would have been the blatant sexuality of MacFadden that would have offended Fowler. MacFadden promoted the naked form as beautiful, and his journal, Physical Culture, would often publish the nude and near-nude, not just to educate, but to titillate. Praising the teenage Mouliere sisters, shown in their union suits, a sashed outfit resembling long underwear, MacFadden noted that they had, "Nothing but symmetry and beauty of form that any society woman would give half her life to possess." All girls can be like this, he argued, parents must only try. There was no world vision attached to MacFadden’s message, only the sensuality of the human body. It was a loud and vibrant message that would be connected to the earlier health reform movement, and yet be all that the movement had opposed.

The Fowler and Wells’ publishing empire produced and reproduced monographs on health, social, and spiritual reform. MacFadden chose to release titles which reflected the consumerist, blase and narcissistic attitude of the twentieth century. MacFadden’s publishing empire, which included
Physical Culture, True Story, True Romances, Dream World, True Experiences, Your Home, True Ghost Stories, Midnight, Dance, Dance Lovers, Automotive Daily News, Model Airplane News, True Detective Mysteries, The Master Detective, and Brain Power, as well as a host of other magazines, with various levels of success, had a circulation of 7,355,000 by 1935. MacFadden’s personal worth, despite some financial failures, was $30,000,-000 in 1931. MacFadden was a master of sensationalism, expose, and provocation. In 1924 he branched out to the daily press, offering the New York Evening Graphic, the first of several daily papers. The Graphic was so lurid that the New York Public Library refused to hold it. From its unsavoury reputation came a popular newsroom joke, wherein the speaker begged someone to help keep his mother from discovering that he was employed at the Graphic, since, “She thinks I’m a piano player in a whorehouse.” Although the paper had a first week circulation of 400,000 and a steady circulation of 100,000 during its first year, the Graphic still garnered heavy losses and expired in 1932, no doubt accompanied by sighs of relief from those concerned with social morality.59

Notwithstanding his penchant for sensationalism, his well-(self)-publicized sexual drive, his reputation as a crank and a faddist, MacFadden had some extraordinary achievements. He drove home the importance of physical culture to many. Many people, like 94 year old D. Silliman, wrote to Physical Culture to praise the exercise programs and dietary notions.
The MacFadden publishing enterprises promoted the film stars and sports figures of the day, along with assisting people like Ed Sullivan, a *Graphic* sports column writer, later known for his radio and television work, to get a boost in their careers. Upton Sinclair, socialist writer and reformer, would credit MacFadden's health cures with lifelong benefits, as would fellow-socialist Thomas Bell. Angelo Siciliano, better known as Charles Atlas, would start his career first by reading *Physical Culture*, and then by winning MacFadden's "World's Most Beautiful Man" contest two years running; the contest then ended as MacFadden felt that Atlas would win each year. Overall, however, despite the promotion of exercise, proper nutrition, proper dress, and an end to prudery, MacFadden offered a self-indulgent lifestyle that was the very antithesis of the aims of the 19th century health reformer, and, rather, reflected the self-indulgent and narcissistic society that marked the twentieth century.

While the 20th century health reformer revelled in flamboyant displays - for example, MacFadden took up parachuting at the age of 81 to promote his fitness and spent more than $500,000 to finance his unsuccessful political ambitions - other messages that their predecessors had preached were expropriated. The need for physical education was one example; few argued after the turn of the century that physical education was not valuable. Medical doctors, however, had succeeded in coopting the physical culture
movement to a large degree. In Boston, where so many early health reforms had blossomed, a demonstration of both the rise of the expert and the decline of the non-professional can be seen. The Boston society withdrew from the American Physical Education Association because its constituents wanted a medical man at the front to lead a program with a concentration in reform work, hygiene, child labour, and gymnastics. Retaining the same societal name, the President was Dr. Richard C. Cabot, and 1st Vice-President, Dr. Dudley A. Sargent, and there would be a number of doctors on the board. The professional trainer, the physician, and the professional athlete would soon dominate the sporting scene, and transform it in new ways.

Health reformers may have been vanquished, but medical doctors still sensed the challenge to their profession, offered by people like Bernarr MacFadden. The American Medical Association would spend time fighting the popularity and ideas of physical cultural specialist, MacFadden, who in return used his journals to condemn vaccination and orthodox medicine, and to support his interpretation of many of the regimens that doctors long had attacked. Eugene Fisk of the Life Extension Institute would refer to MacFadden as "one of the greatest obstacles to sound health education", and a "potential murderer" who "is jeopardising life and unquestionably causing many deaths by influencing people to employ the wretched fakirs and quacks who advertise in his journal."
This dissertation has been concerned about affording the health reformers a proper place in history. They were never a marginal fringe element, nor did they deserve the denigration that was hurled at them by both their contemporaries and by some historians. Health reformers were at the centre of social reform, and the friends and acquaintances of most of the popular reformers of the day. That they and their reforms remain virtually unknown today has been an oversight by historians, too eager to accept the veracity of the insults thrown at them by their opponents. Many of those in opposition were members of the allopathic medical fraternity, themselves eager to have their medical expertise accepted as the legitimate and scientific health care system. But allopaths, their patients, and the health reformers were all aware of the limitations of regular therapeutics, which involved heroic doses of often dangerous and usually ineffective medications. Health reformers felt that they could offer a better system, one which relied on Nature’s ability to cure. The alternative health reformers advocated a regimen based upon exercise, fresh air, diet, phrenology, hydrotherapy, and mesmerism to improve and strengthen health. In addition, they offered the argument that the body was a closed system; too much or too little of anything could destroy the natural tri-partite balance of the body.

Many Victorians accepted the notion that there was a healthy balance between the mental, moral, and physical
faculties, but health reformers believed that there also should be a healthy balance in society. They suggested that the ideal was possible if each individual worked towards personal health, and then, social health. Believing that society would find its natural equilibrium and harmony, health reformers failed to develop a political and economic critique that would counter the cause of the social disequilibrium of their time. They did use that notion of balance and harmony, however, to advocate many social reforms. They argued that health was a natural state for women; that women were equal to, although different from men; and that women could handle the same tasks, political responsibilities, and education as men. They were involved in the temperance movement, in abolition, in spiritualism, in dress reform, as well as in experiments in communal living. All of these reforms fit quite naturally into that vision of a healthy and harmonious body and a healthy and harmonious society.

This dissertation has examined health reformers' therapeutic regimens from the phrenological design for perfect health, to the hydropathic search for the healthy body, to the re-creation of the body through physical culture. Throughout eastern North America the ideas of health reform put many people on the road to good health. This dissertation has examined the history and historiography of the health reform movement. From a discussion of its origin to an in-depth discussion of phrenology, hydropathy, and physical culture, it
has demonstrated the concepts that were important to health reform ideology. Nature played a key role in the therapies of alternative medicine. Those who understood and whose work was compatible with nature—and women had an advantage here—were best able to establish the goal of improved social and physical health. The natural equilibrium of both the physical body and the social body had been disturbed by the transformations of industrial capitalism. Health reformers, linked to the past and reaching to the future, sought to re-establish that balance. They were ultimately unsuccessful, in part due to the denigration and co-optation of regular practitioners, and in part due to their inability to change the social structure.

Health reform ideas also ironically aided in the development of the allopathic medical profession and in the ultimate cooptation of alternative therapies. As regular physicians came to recognize their own therapeutic inefficiency, they examined the natural regimens of their opponents. Recognizing that such treatments rarely harmed and sometimes cured patients, the allopathic profession began to use health reform ideas in their own practices, without giving up their acceptance of regular medicine. Yet, at the same time, they never stopped the harassment of the reformers, and they chided them as much for their lack of medical qualifications as for the unscientific nature of their treatments. By the new century, the cooptation of the health reform regimen by the allopathic
opposition virtually was completed. Physicians used the alternative procedures in psychiatry and public health, to name few areas where nature offered improved care. Still, they did this without acknowledging the contributions of health reformers. The health reformers, however, were no longer in possession of their regimens; the few who survived would practice an eclectic brand of medicine. The others would hold only a caricature of the original health reform ideas, and promote them as entertainments, as much as cures. The health reformers' ideas about social reform would also vanish. In a modern world where possessions and consumerism dominated, there was no place for health reformers. In a modern world rent by the divisions of class conflict, gender conflict and racial conflict, the notion of a perfected harmonious and stable society was both forgettable and forgotten.

And so health reform expired; it had drifted far from its roots, but irregular practitioners still irritated the 20th century medical physician. Even though various regimens still gathered adherents, the social vision, the concept of harmony and equilibrium, the reliance on nature, and the optimism about the future perfection of humankind had vanished along with the old order of reformers. In 1883 Mary Beaufort Dewey had written an affectionate letter to the ever-hopeful Charlotte Fowler Wells, noting that man was not made hopeless and there was still a chance that "the grand piece of workman-
ship will not be left incomplete - and methinks you will at a glance appreciate the perfection of the wondrous piece of mechanism that you have so long studied and tried to harmonize - for yourself and all the rest of the world." For Charlotte Fowler Wells that day would never arrive; instead, while lost in the dream of individual and social harmony, the modern world overtook and bypassed Fowler Wells and other health reformers. Health reformers of all types had tackled the leading questions in the 19th century. They offered answers that often had a profound effect on the world then and now. These reformers of health had tried to change their world; they had started with themselves and their families, friends and patients, and moved outward to challenge the obstacles that threatened. In an 1870 article relating the impact that phrenology had had on anthropology and physiology, J. West Nevins argued that when the "true science of Man shall have become an established study, and each man shall be taught his analogical relation to, and true place in the body corporate, the highest type of the present will not be equal in roundness and perfect unfolding to the 'least in that kingdom of heaven.'" So far man had been cultivated only on an individual level, but phrenological knowledge would teach about the inward person and outward society. The sooner that man learned the analogies between the personal body and the corporate body, Nevins suggested, "the sooner will they fit themselves to be partakers in the harmonies of the long-hoped-
for future." Phrenology was heading towards sociological anthroplogy, he suggested, and could be used with the masses and industrial armies, so that "the world of man might be made to work as harmoniously as the world of nature, and pain and evil cease to predominate." 57

In an 1882 article entitled "Self-Culture," C. L. Hill noted the importance of the individual in a social context. "We must look about us and examine every relation connecting us with the rest of mankind, and see whether we are fulfilling the various duties that devolve upon us in the sphere in which we move, to the best of our ability." 58 Only through that perfection of the individual and familial sphere could social improvement and perfection commence. But this would be a utopian vision. Not only could man not perfect the individual, but rare was the person who wanted to try. Lost in their competition for wealth, leisure, and consumption, those of the 20th century forgot the gifts, the hopes, the admonishments, of a small but vigorous group who had struggled on their behalf. While health reformers had once brought an edge of radicalism to their vision of harmony, their cooptation brought a silence to their voices, and an accommodation to the cultural hegemony of the twentieth century. When remembered at all, health reformers would have their dreams denigrated, and their accomplishments forgotten. The 20th century would belong to the expert who would offer the empirical truths and technologies of science to a world no longer concerned with
the perfection of the human race, to a world that looked at 19th century health reformers at best as quaint, and more often, as quacks, to a world where self-interest and corporate bureaucracy obliterated the multi-faceted concept of Self-Culture.
Notes


5. Samuel Smiles, "Thrift" Temperance Journal, St. John’s, Newfoundland, 2 July 1878. Samuel Smiles (Physical Education, (Edinburgh: 1838)), based his philosophy of self-help on phrenological ideas after he was exposed to the work of phrenologists George Combe and Charles Caldwell, as well as to Ralph W. Emerson and W.E. Channing, who were attracted to phrenology. His lectures were delivered to British artisans who had an awareness of phrenological ideas. See Angus McLaren, "Phrenology: Medium and Message, Journal of Modern History, XLVII (March 1974), pp. 86-97.

6. Ibid.

7. Ibid.

8. Meeting of Rector, Wardens and Vestrymen, on the death of S. R. Wells, Fowler and Wells Papers, Department of Manuscripts and University Archives, Cornell University, #97, 1-9; My Dear Mr. Wells from J. F. Newman, 9 November 1862, Ibid., #97/11-2; Harriet N. Austin, The American Costume: or, Woman’s Right to Good Health, (Dansville, New York: 1868); James C. Jackson, The Weak Backs of American Women, (Dansville, 1876), pp. 5-9.

9. My dear Sir [S.R. Wells] from Wm. Blaikie, 24 January 1867, Fowler and Wells Papers, #97/1/4; Dear Mrs. Wells from M. F. Allen, no date, Ibid. #97/1/5.


17. Greef maintained a denigrating attitude towards the subject of phrenology. While he claimed that audiences for most lectures were "upper middle class", he felt that phrenological lectures were delivered "in less sophisticated parts of the country, and that O. S. Fowler made extensive and lucrative trips "charming ignorant audiences equally by his assumption of scientiﬁc knowledge [and]... extreme sentimentality." He noted though that Professor Burt G. Wilder gave a scientiﬁc survey of the subject in 1873. Ibid., pp. 40-41, 65. He also mistakenly noted that Lydia Folger Fowler held no

18. H. B. O’Leary, "President’s Inaugural Address, May 1884," Ladies Physiological Institute, Schlesinger Library, Radcliffe University, # MC 236 SV.


24. Class Number 1 commenced 5 June 1886 and consisted of 10 white and 2 black men (10 American, 1 Canadian, 1 Irish) with an average age of 22.9 years. Wey, "Youthful and Dullard Criminals;" Wey, "Physical Training;" Wey, "Physical Training of Criminals;" Wey, "Pedagogic Phase."

25. Wey, "Youthful and Dullard Criminals;" Wey, "Physical Training;"


28. This would become, ultimately, the notion behind the eugenist platform of Nazism. For more on eugenic thought see Angus McLaren, Our Own Master Race, Eugenics in Canada, 1885-1945, (Toronto: 1990); Carl Jay Bajema, ed., Eugenics: Then and Now, (Stroudsberg, Penn.: 1976); Blanche Eames, Principles of Eugenics: A Practical Treatise, (New York: 1914); Robert Reid Rentoul, Race Culture: or, Race Suicide? (A Plea for the Unborn), (New York: 1906); J. David Smith, Minds Made Feeble: The Myth and Legacy of the Kallikaks, (Rockville, Md.: 1985); Henry Herbert Goddard, The Kallikak Family, A Study in the Heredity of Feeble-Mindedness, (New York: (1912) 1931); Mark B. Adams, ed., The Wellborn Science, Eugenics in Germany,


32. See M. G. Overlock, The Working People: Their Health and How to Protect It, (Boston: 1911) p. 16.

34. Andrew Combe quoted in "Drunkenness--Insanity," Water-

35. Quote from the Courier and Enquirer, in Untitled, Water-
Cure Journal and Herald of Health, XXXI:4 (April 1861), p. 64;
"An Extraordinary Community," Ibid., XXIX:3 (March 1860); "To
Our Correspondents," Phrenological Journal, 88:4 (October
1889), pp. 192-3. See also Delores Hayden, The Grand Domestic
Revolution: A History of Feminist Designs for American Homes,

36. Orson Squire Fowler, Fowler’s Practical Phrenology:
Giving a Concise Elementary View of Phrenology, (New York:
1848), pp. 21-8.

37. Ibid.

38. Fowler’s ideas were published as A Home for All: Or a
New, Cheap, Convenient, and Superior Mode of Building, (1848).
For more on this activity see Stern, Heads and Headlines, pp.
86-98. There was a number of homes built according to
Fowler’s plans throughout the northeastern United States and
parts of Eastern Canada. In Dartmouth, Nova Scotia, an
octagonal home based on Fowler’s plans, stood (in 1971) on
Dahlia Street. This "Ink Bottle House" or "Octagonal House"
had been built in 1871 by Gavin Holldiday, the production
manager of the Starr Manufacturing Company, best known for its
manufacture of skates. This three-storey house with its
octagonal terrace, had been designed by Henry Elliott, and was
built to resemble the New England homes that Holldiday remem-
bered from his childhood. In Halifax, the Rockhead Prison,
built in 1864, also had an octagonal centre portion; this
design, though, has been attributed to Quaker influence. In
Sackville, New Brunswick, what is known as the Round House, or
Captain Anderson’s house built in 1855, probably was based
upon Fowler’s design. This house, moved from its original
location, has undergone restoration and renovation and now
serves as a tourist bureau and craft shop in Sackville. In
Bracebridge, Ontario, a house known as "Woodbridge" stands; it
was built in 1882 and followed Fowler’s instructions. A
historic plaque commemorating the design is at the site. For
sketches and information see John I. Remple, Building With
Wood and Other Aspects of Nineteenth-century Building in
[Halifax Historical Society], Founded Upon a Rock: Historic
108.; J. T. H. Conner and Jennifer J. Conner, "Medical and
Related Museums, Historic Sites, and Exhibits in Ontario: An
Annotated Guide and Review," Canadian Bulletin of Medical

40. "Spiritualism," recorded by Charlotte Fowler Wells, 28 November 1850 to March 1851, Fowler and Wells Papers, #97-2-1. See also Stern, Heads and Headlines, pp. 145-54.

41. David Montgomery, Beyond Equality, pp. 80-89, 239, 445-447. Angus McLaren's suggestion that phrenology had no goal and was merely a fad, is wrong, at least in the North American context. His argument that phrenology led artisans from religious thought to rationalism without addressing political questions is only partially correct; it fails to consider the political issue implicit in the ideology of social equilibrium that attracted, held, and restricted health reformers and workers alike. Furthermore, in both the English context and the American context, phrenology was much more than a 25 year fad; in Britain the Phrenological Society lasted until the late 1960s and there is still a phrenological company in London. See McLaren, "Phrenology: Medium and Message," pp. 86-97.


43. Ernest H. Blois, "The Mentally Deficient as a Social Problem," Paper read at the Annual Conference of Children's Aid Societies, October 26-27, 1926, pamphlet, my possession. For an example of the medical attitude towards feeblemindedness see the address by British doctor W. Birch Caley to the medical association in Halifax. Acadian Recorder, Halifax, 24 March 1910. It is rather ironic that this talk was given at the School for the Blind, since at the turn of the century great care was taken to segregate the male and female students to avoid the intermarriage of students with congenital eye conditions. Lynn Davies, "The Halifax School for the Blind: Past and Present," The Atlantic Advocate, 74:7 (March 1984), p. 41.

44. Blois, "The Mentally Deficient."

45. Ibid.

46. Ibid.

47. Alfred T. Schofield, The Force of Mind; or, The Mental Factor in Medicine, (New York: 1908), esp. pp. x, xi, 2-21, 151-272. See also Alfred T. Schofield, Nerves in Order or the Maintenance of Health, (London: 1905) for Schofield's ideas on hygiene and healthful living. Note the similarity between his
ideas and those of the early health reformers. The frontispiece of his book reads:

Joy, Contentment, and Repose
Slam the door on the doctor's nose.

Ibid., n.p.


52. Christopher Lasch, The Minimal Self; Christopher Lasch, The Culture of Narcissism.


55. Dr. Eugene Fisk to Frank Munsey, 8 February 1924, quoted in Ernst, Weakness is a Crime, p. 108. For more on the battle which raged between the American Medical Association and MacFadden see Ibid., pp. 108-113, 119.

56. Mary Beaufort Dewey to My Beloved Mrs Wells, 26 February 1883, Fowler and Wells Papers, #97 microfilm.


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