



AGELESS ARTS

**The Journal of the Southern
Association for the History of
Medicine and Science**

Konstantinos Kapparis, Editor

Layout and formatting, Jennifer Rogers

On the cover: Fig. 1 Confederate States Medical and Surgical Journal Vol. I. Richmond, April, 1861 No. 4. Pg 50.

For front matter and officers and board member pages : Fig. II Confederate States Medical and Surgical Journal Vol. I. Richmond, April, 1861 No. 4. Pg 51.

For the table of contents page: Southern Medical and Surgical Journal Vol.XI. New Series. February 1855. No. 2. Editorial and Miscellaneous pg. 133

“In the Monthly Periscope “Pathological Anatomy of Phthisis” Southern Medical and Surgical Journal, (July 1836, 1836) 113.

SAHMS Officers:

President- Steven Weiss, PhD (Georgia Regents University)
sweiss@gru.edu

Vice President- Philip K. Wilson, PhD

Secretary/Treasurer- Robert R. Nesbit, Jr., MD (Georgia Regents University) rnesbit@gru.edu

Local Arrangements- Stacy Tovino, J.D., PhD (UNLV William S. Boyd School of Law) stacy.tovino@unlv.edu

Outreach and Membership Chair-Jonathon Erlan, PhD (University of Pittsburgh) erlan@pitt.edu

Program Chair- Philip K. Wilson, PhD
WILSONPK@mail.etsu.edu

Publication Committee Chair- Kostas Kapparis, PhD (University of Florida) Kapparis@ufl.edu

Student Outreach Liaison- Sara Agnelli (University of Florida)

Social Media Chair and Webmaster- Jennifer Rogers (Iowa State University) jarogers@iastate.edu

Past Presidents-

Lisa Pruitt, PhD (Middle Tennessee State University)
lpruitt@mtsu.edu

Michael A. Flannery, MA, MLS (University of Alabama at Birmingham) flannery@uab.edu

Margaret Barnett(University of Southern Mississippi, retired

Robert R. Nesbit, Jr., MD (Medical College of Georgia)
rnesbit@gru.edu

Wendy J. Turner, PhD (Georgia Regents University)
wturner1@gru.edu

Maarten Ultee, PhD (University of Alabama), retired

Ageless Arts (AGA) is the peer reviewed Journal of the Southern Association for the History of Medicine and Science (SAHMS). We publish articles on the History of Medicine and Science from any period or geographical region. Our primary objective is to publish articles presented at the annual conference of SAHMS, but all papers on the History of Medicine and Science, regardless of origin, will be given equal consideration. We especially welcome articles from young scholars, and articles on the History of Medicine and Science in the American South.

Instructions for Authors:

For article submissions or other inquiries, please contact the Editor, Dr. Konstantinos (Kostas) Kapparis via e-mail (kapparis@ufl.edu).

Once the peer-review process has been completed and an article has been accepted, it is published as soon as the final version and the publishing agreement are submitted by the author.

All submissions must include a short abstract (c. 10-15 lines). Minimal formatting is recommended. If different alphabets (e.g. Greek) are used, Unicode is recommended.

Please address submissions to Dr. Kostas Kapparis, including the words "AGELESS ARTS" in the title.

VOLUME I: 2015

CONTENTS:

Historiography on the Social Status of the Ancient Physician since Ludwig Edelstein

Hoang Pham (1-21)

The Phenomenon of Tremor in Galen

Sara Agnelli (22-32)

Declamatory Doctors

Miller Krause (33-46)

Hippocrates, Aristophanes and Sex-Crazed Women

Konstantinos Kapparis (47-57)

The Maintenance of Aged Property: Healthcare and Medicine of Elderly Slaves in the Antebellum Period

Savannah Williamson (58-76)

The Idle Women in Therapy and Fiction: S. Weir Mitchell's Literary Career and the Gilded Age Fear of Malingering

Brent Ruswick (77-86)

The Woodhouses' Use of an Apothecary: The Ambiguous Mr. Perry

Haley Russell (87-94)

The Medical World of Augusta, Georgia, 1830-1860

Jennifer Rogers (95-120)

*e Hinge joint.
f Spiral spring.
g Two gum elastic tubes.
h Elastic moveable spring.
i Two ivory knobs at aural extremities.*

Not Just the Weather: The Environment Creating Martin Delany's *The Origin of Races and Color*

Eric Robinson (121-127)

Admitted Upon Arrival: The Family's Role in Late Nineteenth Century Missouri Asylum Admissions

Matthew Reeves (128-134)

Happy Deaths: CMS Missionaries, Medicine, and Deathbed Experiences in West Africa, 1860-1890

John Rankin (135-147)

The Introduction of Formal Midwifery Instruction in Eighteenth-Century Milan, Italy

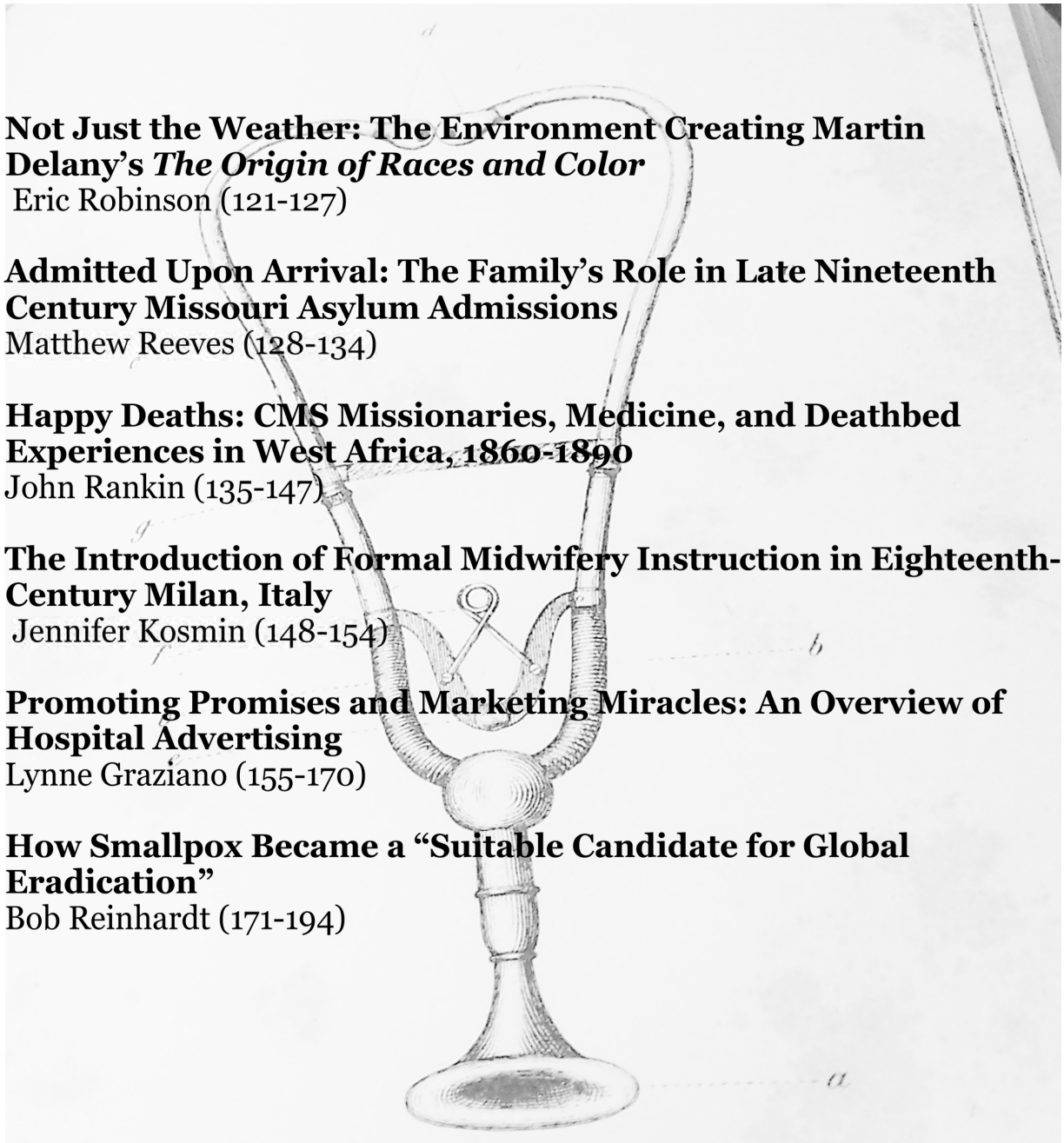
Jennifer Kosmin (148-154)

Promoting Promises and Marketing Miracles: An Overview of Hospital Advertising

Lynne Graziano (155-170)

How Smallpox Became a "Suitable Candidate for Global Eradication"

Bob Reinhardt (171-194)



a Objective end.
b Two gum elastic tubes.
c Two metallic tubes.
d Two ivory Knobs at aural extremities.
e Hinge joint.
f Spiral spring.
g Elastic moveable spring.

HISTORIOGRAPHY ON THE SOCIAL STATUS OF THE ANCIENT PHYSICIAN SINCE LUDWIG EDELSTEIN

By

HOANG PHAM
(University of Ottawa)

ABSTRACT: Ludwig Edelstein (1902-1965) used the Hippocratic corpus as a foundation to explain that it is important to situate the average ancient medical practitioner in his social context—a craftsperson in a competitive environment who had to persuade and win the confidence of clients who might be socially superior. This paper aims to clarify potential revisions to Edelstein’s interpretation of social perceptions of doctors in antiquity. The robustness of Edelstein’s 1931 doctoral thesis, *Peri aeron und die Sammlung der hippokratischen Schriften*, will be assessed through a comprehensive literature review of major scholarship on ancient physicians’ social status in the last 83 years (1931-2014). This comparison of multidisciplinary perspectives by authors of various backgrounds and research methodologies suggests that Edelstein’s thesis has so far stood the test of time. Therefore, the work of later authors largely confirms Edelstein’s observations, adding some minor nuances to the literature. (University of Ottawa) by

KEYWORDS: Ancient history; Historiography; Greek world; Roman world; social class; social desirability; physicians

Introduction

A number of reasons may account for why the medical profession is accorded a tremendous amount of honour in contemporary culture. Firstly, medical school admissions committees seek out highly motivated individuals with impressive backgrounds in both academic and extracurricular achievements (e.g. community service, leadership, athletics, etc.). Upon admission, medical students undergo a rigorous curriculum, which is accredited by external evaluators. Medical students also must pass qualifying examinations to become licensed. “The idea of making the practice of medicine dependent on a license, a certificate issued by a competent body testifying that the bearer has undergone a training considered adequate, is an idea that originated in the Middle Ages.”¹ After many years of schooling and experience as a practitioner, doctors garner respect as they care for people’s health. This may result in stressful situations and personal sacrifices due to high patient volumes, rapid life and death clinical decisions, and tiring schedules that may include nights, weekends, and holiday shifts. Through professional regulatory authorities and continuing medical education requirements, physicians are nevertheless expected to maintain the best interest of their patients along with professional competence, patient confidentiality, appropriate relationships, and public trust. Expectations from the public

¹ Henry E. Sigerist, “The History of Medical Licensure,” *Journal of the American Medical Association* 104, no. 13 (1935): 1057.

as well as professional requirements have contributed to the high esteem towards those in the medical profession.

It is tempting to imagine the status of the medical profession as a gradual continuous ascent from its ancient roots to modern times. However, status tends to be a quality conferred upon by external forces and hence, this attribute is constantly in flux and coloured by the sociocultural context of the times. Medicine is no different. There are examples of historical developments that have also diminished medicine's status. For example, the emergence of HIV/AIDS as a new untreatable pandemic disease shook the medical community and caused many to lose faith in modern medicine's abilities. In addition, the arrival of the Internet has given people access to numerous resources with health information and thus the ability to question a physician's authority. Furthermore, patient advocacy groups have given patients an active voice that creates a negotiated power balance in the physician-patient relationship. It is important to keep these considerations in mind along with the understanding that status is a fluid quality that waxes and wanes depending on extrinsic factors. In the sociocultural context of antiquity, the physician may have occupied a low status niche due to lack of key elements of the profession such as requirements of formal training, licensure, and enforceable professional conduct mandates; these requirements currently earn physicians a high rank in society.

Ludwig Edelstein's Life and Academic Work as Historian of Medicine

Ludwig Edelstein, born in 1902, came from a wealthy Jewish family in Berlin.² In terms of formal education, he studied classics under Werner Jaeger (1888-1961), and philosophy and sociology under Eduard Spranger (1882-1963) at the University of Berlin.³ Edelstein's Ph.D. was in Greek, Latin, and philosophy from the University of Heidelberg.⁴ In Heidelberg, his intellectual circle included Marianne Weber (1870-1954), a sociologist and widow of Max Weber (1864-1920); Erich Frank (1883-1949), a philosopher; Heinrich Zimmer (1890-1943), an indologist; and Emma J. Levy (1904-1958), a fellow doctoral candidate in classics and archaeology who eventually became Edelstein's wife.⁵ Edelstein had a remarkable academic career that took him to several institutions. He began at the University of Berlin as appointed assistant at the Institute of History of Medicine (1930) and lecturer in the history of the exact sciences in

² Gary Ferngren, introduction to *Introduction to Asclepius: collection and interpretation of the testimonies*, by Emma J. Edelstein and Ludwig Edelstein (Baltimore: Johns Hopkins Press, 1998), xiii.

³ *Ibid.*

⁴ *Ibid.*

⁵ *Ibid.*

classical antiquity (1932).⁶ The rise of Hitler and the Nazis compelled him to take up an offer by Henry Sigerist (1891-1957) to join faculty at the Institute of History of Medicine at John Hopkins University at Baltimore, Maryland in 1934.⁷ In Baltimore, Edelstein became acquainted with many more scholars including prominent historians, Owsei Temkin (1902-2002) and Arthur O. Lovejoy (1873-1962).⁸ By 1947, Edelstein left John Hopkins in favour of a post in the Classics Department at the University of Washington. He felt this assignment was appropriate since he had always identified himself as a philologist and philosopher.⁹ His stay in Seattle was short, however, because even before his first year was completed, he accepted a position at Berkeley as professor of Greek.¹⁰ Edelstein left Berkeley due to a controversy over loyalty oaths that seemed reminiscent of the Nazification of German universities.¹¹ He decided to return to John Hopkins in 1951 where he became the first chair of Humanistic Studies.¹² In 1960, he accepted a position at Rockefeller University and he held both positions concurrently until his passing in 1965.¹³

The 1931 publication of Edelstein's German revised and extended doctoral thesis, *Peri aeron und die Sammlung der hippokratischen Schriften*,¹⁴ courted much controversy from his colleagues in classics and philosophy, because it rejected the popular image of the Hippocratic physician as a thoughtful scientist and replaced it with a less flattering image: Edelstein's physician was not a scientist who applied rigorous science in forming theories of disease, but instead was considered an itinerant craftsman who trained by apprenticeship and used prognosis to enhance his reputation and attract clients. In addition, Edelstein argued that the lack of professional credentials restricted the average physician from ascending much beyond the low status of a craftsman. Running contrary to the common habit of romanticizing the achievements of the Ancient Greeks, Edelstein arrived at this thesis by emphasizing the particular context of time and intellectual *milieu* that informed the medical practice of the Hippocratic physician. Younger colleagues like Temkin found him provocative, while older colleagues found him inflammatory. In a memorial piece, Fridolf Kudlien (1928-2008) praises Edelstein as

a man with an acute sense of the historical and sociological implications of his subject, a man who appeared unimpaired by the common tendency to elevate the ancient Greeks into some sort of

⁶ Ibid.

⁷ Ibid.

⁸ Ibid., xiv.

⁹ Ibid.

¹⁰ Ibid.

¹¹ Ibid.

¹² Ibid.

¹³ Ibid.

¹⁴ This work uses later English translations in *Ancient Medicine*, ed. Owsei Temkin and Clarice Lilian Temkin (Baltimore: John Hopkins Press, 1967), 65-85, 87-110.

heroes and to trace what was to be ‘timeless’ in their mental achievements.¹⁵

Kudlien attests Edelstein sought a reassessment of the facts in light of historical settings. Kudlien speaks highly of Edelstein’s keen sense of sociology, which may have explained Sigerist’s interest in him,¹⁶ seeing as how Sigerist was a major authority on social medicine. Kudlien suggests that Edelstein’s background in humanities oriented him toward making conclusions about the social side of medical practice, because in the interpretation of ancient sources, he did not primarily concern himself with strictly medical matters.¹⁷ Kudlien implies that the situation may have been different if Edelstein had approached these ancient texts with different formal training.

The Doctoral Thesis of Ludwig Edelstein

In Edelstein’s thesis, his first layer of argumentation focuses on how the constantly varying work setting of the Hippocratic physician was comparable to that of a craftsman. The ‘office’ could exist in various settings. A physician could have worked as a local doctor for a certain town or as an itinerant, wandering from place to place for work. If he was localized to a particular town, the workplace was either the patient’s home or a shop that could be occupied by a different physician on a different day. This practice variation did not allow the establishment of a stable medical practice establishment. Edelstein specifies that for the craftsman-physician, the shop was not a hospital or office consultation room.¹⁸

Edelstein next explains that the liberty to take up your own enterprise without needing to pass any tests or acquire certification by any authority made the physician of antiquity socially equivalent to that of an entrepreneur (a segment of society that was low on the ancient social strata), rendering medicine as a business rather than as a profession.¹⁹ In other words, training centres may have existed but there was no mandatory requirement to attend them and it is uncertain whether these training centres resembled contemporary notions of medical schools in terms of curricular content. Nevertheless, there is no record of official degrees being conferred. Edelstein qualified his arguments about the status of the physician as pertaining mainly to the *average* physician: a famous physician would have maintained a higher social position.

¹⁵ Fridolf Kudlien, “In Memoriam Ludwig Edelstein, 1902-1965: Edelstein as Medical Historian,” *Journal of the History of Medicine and Allied Sciences* 21, no. 2 (1966): 173.

¹⁶ *Ibid.*, 175.

¹⁷ *Ibid.*, 177.

¹⁸ Ludwig Edelstein, “The Hippocratic Physician,” in *Ancient Medicine*, ed. Owsei Temkin and Clarice Lilian Temkin (Baltimore: John Hopkins Press, 1967), 87

¹⁹ *Ibid.*

However, a famous physician would have been just as vulnerable to suffer a diminishing social status due to external factors.²⁰

Since simply asserting oneself as a physician was no guarantee to the patient of proper training or trustworthiness, the patient had to take a calculated risk and perform a critical evaluation of the physician's abilities. Edelstein contends that this in turn led to a fierce competitive culture of shameless self-promotion on the part of physicians, which deleteriously restricted the esteem people could ascribe to the medical field.²¹ Therefore, it was of central importance to the physician to make good impressions and develop a solid reputation in order to save time marketing himself.²²

According to Edelstein, one of the most common and effective mechanisms to overcome rivals was to use *prognosis*.²³ Prognostication in the ancient medical sense meant arbitrarily taking into account some of the patient's health information such as age and sex, interpreting it in light of a particular philosophical framework and generating a prediction of the patient's future clinical outcome as well as an understanding of a patient's prior medical history that has progressed to the current condition.²⁴ Contrastingly, prognostication in the contemporary medical sense meant predicting disease outcome using specific findings in a patient's medical history, physical examination, and lab investigations (e.g. biopsy, imaging results, and other tests). The knowledge of a patient's medical history without having to obtain collateral information inspired trust toward the physician. Once the patient's trust had been won over by deducing the patient's past and present condition, the prognosis could take on two formats. Sometimes the doctor would forecast a fatal outcome that would release the doctor from any liability going forward. In other instances, patients were given reassuring treatments and a forecast for a successful outcome, which would further increase the patient's confidence in the physician.²⁵ Edelstein reached this understanding of prognosis after detailed interpretation of the Hippocratic writings mainly such as *Prognostikon* and *Prorrhethikon II*. Prognosis was not uniformly accepted by all practitioners and hence, it became necessary for the physician to adopt a particular doctrine of humankind and disease as one's unique "weapon in the struggle for public recognition" in the competitive climate of antiquity.²⁶

Keeping the marketing potential of prognoses in mind and with an eye to the Hippocratic writings, Edelstein advocated that many passages, especially from the surgical Hippocratic works, support the notion that medicine was treated as a business more than as a profession. These

²⁰ Ibid., 87 n. 2.

²¹ Ibid., 87.

²² Ibid., 88.

²³ Ludwig Edelstein, "Hippocratic Prognosis," in *Ancient Medicine*, ed. Owsei Temkin and Clarice Lilian Temkin (Baltimore: John Hopkins Press, 1967), 65-86.

²⁴ Ibid., 75.

²⁵ Ibid., 69-70.

²⁶ Ibid., 77.

passages, although primarily oriented toward practice, offer considerable insight into the social context of ancient medical practice. Much ‘practical’ advice is actually directed at showmanship skills and not necessarily best practices for optimal patient outcomes. Interestingly, Edelstein observed that a Hippocratic work called *On the Physician* rejected the idea of performing procedures just to please and make good impressions—“senseless ostentation, not becoming to the true physician.”²⁷ For Edelstein, this proscription reinforced his belief that attracting patients with flashy medical methods may have been a widespread practice for the craftsman-physician.

Based on these statements, Edelstein concluded that the Hippocratic physician of antiquity considered business success as the primary objective instead of the patients’ best interest. Therefore, his position in society was lowly since he worked as a self-employed craftsman eager to render services for a payment.

Review of Literature

Temkin (1953)

Owsei Temkin (1902-2002) was a close colleague and contemporary of Edelstein (1902-1965). Temkin was a medical historian who also held an M.D. medical degree. In 1953, he used literary sources²⁸ to support his debate about attributing Greek medicine as a science or a craft. Temkin’s interpretation of the historical record reinforced Edelstein’s notion that claimed medicine was a craft; this assumption likely remained unchanged throughout antiquity. However, Temkin elaborated on the physician-craftsman construct; he divided the social status of clinical medical practitioners into two subtypes: the leech and the physician.²⁹ Temkin derives these subtypes from Aristotle’s *Politics*³⁰ and Plato’s *Laws*³¹. Temkin inferred that the major difference between the two types of medical practitioners was educational background. The leech trained through observation and apprenticeship similar to “learning by rote”.³² Because of this manner of training, the leech would treat his patients mainly based on experience without collecting a thorough history and without offering patients a medical rationale. Whereas the freeborn practitioner would have trained by studying the course of diseases based on a theory of nature and therefore would treat his patients by carefully

²⁷ Edelstein, *Hippocratic Physician*, 96.

²⁸ Owsei Temkin, “Greek medicine as science and craft,” *Isis* 44, no. 3 (1953), 213-225.

²⁹ *Ibid.*, 215.

³⁰ Aristotle, *Politics*, trans. Harris Rackham (Cambridge, MA: Harvard University Press, Loeb Classical Library, 1932), 3.11.1282a6, quoted in Temkin, 214.

³¹ Plato, *Laws*, trans. Robert Gregg Bury, (Cambridge, MA: Harvard University Press, Loeb Classical Library, 1961), 4.720, quoted in Temkin, 214.

³² Temkin, 215.

investigating the patient and proceeding with 'specific' treatment. Temkin emphasized that distinctions could be made based on the use of science for the physician and craft for the leech.

Temkin embraced Edelstein's thesis of Hippocratic physician as craftsman to reunify his two subcategories together. The leech, who was limited to treating only the familiar, may have become a physician by expanding his scope of practice merely by drawing on the words of philosophers and impressing patients.³³ It is likely that the competitive character of Greek medicine combined with considerable social ambition compelled the leech to subscribe to a particular sect of medicine, which would provide him all the necessary philosophical theory and persuasive oratorical tools needed to fashion impressive prognoses.³⁴ Therefore, Temkin arrived at the conclusion that Greek medicine practiced as a craft remained unchanged throughout antiquity, but the Hippocratic physician had the potential for some slight upward social mobility by joining a sect and gaining a philosophical theoretical foundation for persuasive oratory.

Cohn-Haft (1956)

Louis Cohn-Haft (1919-2011), an ancient historian, in 1956 cited and agreed with Edelstein and Temkin, but expanded the discussion on professional recognition and socioeconomic status of Ancient Greek public physicians mainly using Plato, the Hippocratic Corpus, and some inscriptions and papyri. With regard to professional recognition, he explained that discerning between professional medical practitioners was a challenge for the ancients because there were no legal safeguards in place to determine who was fit for practice.³⁵ However, there may have been social circumstances in the ancient world that hindered the standardization medical licensing. Firstly, a prospective patient could determine the competence of a physician by learning the name of the master who trained him.³⁶ Secondly, geopolitical arrangement of the ancient Greek world as a collection of independent city-states would have made the task of instituting universally accepted medical certification extremely difficult.³⁷ Furthermore, the Hippocratic Oath theoretically could have provided evidence of training,³⁸ but because it was not enforced by ancient authority, it played an insignificant role in professional recognition. As reinforced by Cohn-Hafts, medical practitioners relied more reputation of where they trained and less on the evidence of their practice.

³³ Ibid., 224.

³⁴ Ibid., 225.

³⁵ Louis Cohn-Haft, *The Public Physicians of Ancient Greece*, (Northampton, MA: Smith College, 1956), 17-8.

³⁶ Ibid., 18.

³⁷ Ibid.

³⁸ Ibid.

With regard to the socioeconomic status, doctors may have been regarded differently and more honourably than the standard craftsman may. For one, whereas the other crafts tended to deal with inanimate materials, the physician-craftsman had to deal with human life itself.³⁹ Secondly, Cohn-Haft gently asserts, “the physician was not classed with other craftsmen, and we do hear of many doctors [e.g. Nichomachus, Democedes of Croton, and Eryximachus] who belonged to the highest intellectual and social circles and were held in great esteem.”⁴⁰ In the absence of statistics on ancient annual incomes, Cohn-Haft uses two indirect measures of physician wealth. For one, it did not seem that physicians were above seeking payment for services rendered.⁴¹ It is tempting to generalize that medicine was a lucrative profession because of evidence celebrating wealthy physicians and their benefactions, but caution is warranted for it is not clear whether wealth in those cases came from their practice of medicine or inherited family resources.⁴² Secondly, there is no evidence of physicians described as being poor or living in uncomfortable circumstances.⁴³ Cohn-Haft concludes that in terms of financial success, ancient Greek medicine was a desirable career. Thus, the general impression from Cohn-Haft runs close to Edelstein.

Amundsen (1977)

Darrel W. Amundsen (1969-2003) was a classicist by training with extensive writings on medicine and medical ethics in the ancient and medieval eras. His exploration of ancient popular culture sources such as folktales, joke books, and romantic novels suggests that doctors were viewed in both awe and agitation.⁴⁴ Instances where physicians were highly regarded include substituting soporific drugs in place of poisonous ones to prevent suicide of the innocent,⁴⁵ averting murder plots,⁴⁶ reanimating the comatose person,⁴⁷ and diagnosing lovesickness.⁴⁸ However, with respect to vicious slander, doctors due to their privileged relationship with a vulnerable segment of society, their *potential* to bring about death, and inability to objectively demonstrate professional competence made them easy targets of sensationalistic speculation in the

³⁹ Ibid., 19.

⁴⁰ Ibid.

⁴¹ Ibid., 20.

⁴² Ibid., 20-1.

⁴³ Ibid., 21.

⁴⁴ Amundsen, Darrel. W. “Images of physicians in classical times,” *The Journal of Popular Culture* 11, no. 3 (1977), 643.

⁴⁵ Xenophon of Ephesus, *Ephesian Tale*, 3.5ff, quoted in Amundsen, 644-5.

⁴⁶ Apuleius, *The Golden Ass*, 10.11, quoted in Amundsen, 645.

⁴⁷ Apollonius, *Prince of Tyre*, 25ff, quoted in Amundsen, 649.

⁴⁸ Apuleius, *The Golden Ass*, 10.2; Apollonius, *Prince of Tyre*, 18; Heliodorus, *Ethiopian romance*, 4.7; quoted in Amundsen, 650.

public consciousness, as evidenced by these ancient works.⁴⁹ Instances where physicians were seen with contempt include exploiting patients' wills,⁵⁰ poisoning patients intentionally,⁵¹ stealing from patients,⁵² seducing and bedding patients,⁵³ earning profit off patients' deaths,⁵⁴ and caring for patients negligently or incompetently.⁵⁵

At this point in his analysis, Amundsen's views start to dovetail with Edelstein. Amundsen asserts that, in an ancient world in which professional medical licensure did not exist, reputation was the only credential that the ancient physician could offer and upholding a positive reputation was essential for commercial success. Although this view is quite similar to Edelstein's, Edelstein is not directly cited for this statement; however, there is evidence that suggests Amundsen was familiar with Edelstein's doctoral thesis, because Edelstein does appear in a later footnote.⁵⁶ No reference is made to Temkin or Cohn-Haft. One line of evidence that Amundsen uses for the importance of physician reputation is the literature on the importance of physician health, especially physical appearance, to facilitate patients' trust in one's abilities as a healer as evidenced by Hippocrates,⁵⁷ Cicero,⁵⁸ Babrius,⁵⁹ and Avianus.⁶⁰ Next Amundsen suggests that the quest to attain the greatest reputation became such a prevalent nuisance to the public that a whole literature emerged around denouncing physicians for being too ostentatious about their services as evidenced by Aesop,⁶¹ Plutarch,⁶² and Dio Chrysostom.⁶³ These points regarding lack of official credentials and reputation are highly in agreement with Edelstein. Therefore, Amundsen arrives at a similar understanding regarding the social image of the ancient physician even though he approached this conclusion from a wider

⁴⁹ Amundsen, 642.

⁵⁰ Pliny the Elder, *Natural History*, 29.8.20; Publilius Syrus, *Sententiae*, 373; Hierocles and Philagrius, *Facetiae*, 139; quoted in Amundsen, 644.

⁵¹ Apuleius, *The Golden Ass*, 10.23, quoted in Amundsen, 644.

⁵² Aesop, *Fables of Aesop*, trans. S.A. Handford (Baltimore, MD: Penguin Books, 1954), 161; Hierocles and Philagrius, *Facetiae*, 142; quoted in Amundsen, 645-6.

⁵³ Pliny the Elder, *Natural History*, 29.8.20f; Martial, *Epigrams*, 11: 71, 74; Hierocles and Philagrius, *Facetiae*, 260; quoted in Amundsen, 646.

⁵⁴ *Greek Anthology*, 125, quoted in Amundsen, 646.

⁵⁵ Dio Chrysostom, *Discourses*, 32.19; Seneca, *On Mercy*, 1.24.1; Hedylus, *Greek Anthology*, 123; Lucilius, *Greek Anthology*, 257; Callicter, *Greek Anthology*, 118, 120, 122; Nicarchus, *Greek Anthology*, 112, 113, Ausonius, *Epigrams*, 4: 80, 81; Lucian, *Greek Anthology*, 401; Palladas, *Greek Anthology*, 280. Martial, *Epigrams*, 1.30, 7.74; Aesop, *Fables*, 169; Phaedrus, *Fables*, 1.14; Hierocles and Philagrius, *Facetiae*, 177; quoted in Amundsen, 646-8.

⁵⁶ Amundsen, 652 n. 79.

⁵⁷ Hippocrates, *The Physician*, 1, quoted in Amundsen, 648.

⁵⁸ Cicero, *Epistulae ad familiares*, 4.5.5, quoted in Amundsen, 648.

⁵⁹ Babrius, *Fables*, 120, quoted in Amundsen, 648.

⁶⁰ Avianus, *Fables*, 6, quoted in Amundsen, 648.

⁶¹ Aesop, *Aesop without Morals*, trans. L.W. Daly (New York: Thomas Yoseloff, 1961), 114, quoted in Amundsen, 648.

⁶² Plutarch, *Moralia*, 71 A, quoted in Amundsen, 648.

⁶³ Dio Chrysostom, *Discourses*, 33.6f, quoted in Amundsen, 648.

appreciation of medically hostile literature of broad chronology and genres whereas Edelstein understood from the perspective of Hippocratic prognosis. Amundsen's work lends considerably credibility to Edelstein's thesis.

Nutton (1985 & 1992)

Vivian Nutton has a background in classics focusing on the history of ancient medicine. He has commented considerably on the social profile of ancient physicians in a number of works. In a 1985 work, he accepts Edelstein's work along with Temkin, Cohn-Haft, and Amundsen; however, compared to previous authors, Nutton employs an even broader chronology in his exploration, particularly into Roman times. Nutton, using the "plurality of the non-medical evidence drawn from inscriptions, art, philosophy, theology and other literature,"⁶⁴ investigates two major issues: (1) the social context behind those called doctors in antiquity (*iatroi* in Greek and *medici* in Latin) and (2) the negative societal attitudes toward them, which put limits on their social status.

With respect to the first point, Nutton argues that in antiquity to become a doctor, all that was generally needed was self-proclamation or acceptance by laypeople. Nutton identifies three reasons may explain why it was so easy to self-proclaim oneself as a doctor: (1) medical discussion was not limited to a peculiar group in society, (2) medical theories (of the humours and, later atoms) were easy to comprehend, and (3) there was no special brand of medical vocabulary.⁶⁵ Surprisingly, even judicial authorities in ancient case law accepted and provided legislated tax breaks to whoever self-proclaimed themselves as doctors.⁶⁶

As for acceptance by laypeople, their definition of doctor was simply someone who provided medical services for a fee.⁶⁷ Nutton connects medicine's association with monetary gain to that of a craftsman whose "social status was not of the highest, except in the rarest of circumstances."⁶⁸ Cicero and Aristotle both mentioned that medicine for monetary gain was worthy of a tradesman and not a gentleman.⁶⁹ Galen tried to downplay the role of money in medicine by declaring his financial independence from medicine—thanks to his enormous inherited wealth.⁷⁰ In the *Digest*, which is a massive compilation of Roman law, Ulpian writes that anyone can be considered a doctor who pledges to treat one part of

⁶⁴ Vivian Nutton, "Murders and miracles: Lay attitudes to medicine in classical antiquity," in *Patients and Practitioners: Lay perceptions of medicine in pre-industrial society*, ed. Roy Porter (Cambridge: Cambridge University Press, 1985), 25.

⁶⁵ *Ibid.*, 30-1.

⁶⁶ *Oxyrrhynchus*, 40, quoted in Nutton, *Murders*, 30.

⁶⁷ Nutton, *Murders*, 27.

⁶⁸ *Ibid.*, 28.

⁶⁹ Cicero, *De Officiis*, 1.72; Aristotle, *Nicomachean Ethics*, 1.13.7; quoted in Nutton, *Murders*, 28.

⁷⁰ Galen, XIV.660K.; X.561 K, quoted in Nutton, *Murders*, 28.

the body or only one ailment without relying on religious techniques like incantations and exorcisms.⁷¹ Doctors recognizing doctors did not happen until 368 CE under Emperor Valentinian with the establishment of the Roman College of physicians in the selection and approbation of public doctors, but even then, this college did not set licensing standards for practice and had no oversight over physicians' activities.⁷² According to Nutton, the only point in which the concept of doctors significantly differed between laymen and other doctors was that the laymen placed much more value in rhetoric as a measure of competence.⁷³ Cleary, Edelstein and Nutton both see eye to eye on the reliance of rhetoric as one of the hallmark tools of the ancient medical trade. In this sense, Nutton and Edelstein's views align with the physician being a craftsman who charged a fee for medical services and promoted himself using rhetoric.

With respect to Nutton's second point regarding negative societal views toward physicians, even though the physician could theoretically earn a substantial fortune from the practice of medicine, there were limits on how high up the physician could ascend the social pyramid, especially in Roman society, due to two major cultural biases. The Romans had a narrow view of who was a true blue blood. The Romans respected individuals who inherited landed wealth from a long line of agrarian ancestors and could afford to indulge in leisurely activities (i.e. *otium*). Seneca believed that any dealings with medicine were disgraceful, even if it only involved supervising another person's exercise rehabilitation.⁷⁴ Cicero offered "subtly and damningly qualified" praise in that medicine was a nobler art only when considered against other lines of work like tax-collectors, small traders, carpenters, cooks, and dancers; medicine was definitely not on par with oratory, politics, and large-scale farming—this was meant for ordinary people.⁷⁵ If Cicero and Seneca, who are admired for their open-minded thinking, held such low views of physicians, it is unlikely that others in antiquity thought any better. As such, Dio Cassius scathingly commented how the situation in the Roman Empire had arrived at a dire point when in 219 CE Gellius Maximus, the son of an imperial court physician, could vie for control of the Empire.⁷⁶ Cato the Elder was certain that the self-help brand of medical knowledge from the Roman head of household (*pater familias*) was superior to any Greek invention. Pliny the Elder followed Cato's lead and together they leveled the fiercest attack on medicine's credibility.⁷⁷ However, Nutton considers this prejudiced rhetoric from the upper classes—represented by individuals such as Dio Cassius, Cato, and Pliny—as nothing more than playing on

⁷¹ *Digest*, 50.13.3.

⁷² *Ibid.*, 26-7.

⁷³ *Ibid.*, 35-6.

⁷⁴ Seneca, *Epistles*, 15.2, quote in Nutton, *Murders*, 39.

⁷⁵ Cicero, *De Officiis*, 1.150-1, quoted in Nutton, *Murders*, 39.

⁷⁶ Dio Cassius, *Roman History*, 80.7.1 quoted in Nutton, *Murders*, 40.

⁷⁷ Pliny the Elder, *Natural History*, 29.7.14, quoted in Nutton, *Murders*, 42.

stereotypical themes of moral decay and anti-Greek sentiments.⁷⁸ Thus, these are the typical views that restricted the prestige of the medical profession by the Roman elite.

In 1992, Nutton conducts a broad survey of the social history of Greco-Roman medicine from the early Homeric period to the end of the Roman Empire, comprehensively accounting for some heterogeneity in medical practitioners throughout antiquity; it is a welcomed variation on Edelstein's theme of the average medical practitioner as a craftsperson.

For the early period of Homeric Greece, accounts from the *Iliad* and *Odyssey* suggest that no one specialized purely as a physician, because the primary duty during the Trojan War was military.⁷⁹ Nutton qualifies that a few men may have had an enhanced reputation for healing skills (e.g. Podalirius, Machaon, Patroclus, and Achilles), which may have made them sought after by wealthy hosts from afar, albeit treated similarly as a travelling bard.⁸⁰ Therefore for this period, Nutton concludes that physicians were "high-grade craftsmen, but craftsmen none the less."⁸¹

Before the late fifth century BCE, in the isolated countryside, there may have always been a traditional self-help form of medicine as suggested by some passages in the Hippocratic Corpus directed at the layman.⁸² Nutton also says there is also a certain degree of evidence to suggest the existence of medical clans, families that kept medical knowledge within bloodlines and enjoyed community recognition as the local medicine men; much discussion about medical clans revolves around the Asclepiadae from Cos, which practiced a renowned religious brand of medicine.⁸³ Regarding the issue of a medical school in Cos, Nutton concedes that Cos was well-known for its doctors and Hippocrates provided teaching for a fee, but the doctors of Cos were apparently all natives or long-term residents, perhaps taught by family members or the occasional visiting traveller.⁸⁴ For Nutton, this is different from the traditional idea of a permanent teaching institution for the training of doctors.⁸⁵ He castigates 19th century scholars for reconstructing misleading images of ancient medical schools akin to the modern sense, without setting it in the proper context of time and place:

Evidence for medical schools at this period depends entirely upon late reconstructions and on a touching belief in the validity of 'school traditions', for there is, as yet, no evidence, literary, epigraphic or archaeological, for the existence of places or buildings

⁷⁸ Nutton, *Murders*, 44.

⁷⁹ Vivian Nutton, "Healers in the medical market place: towards a social history of Graeco-Roman medicine," in *Medicine in society: Historical Essays*, ed. Andrew Wear (New York: Cambridge University Press, 1992), 16.

⁸⁰ *Ibid.*

⁸¹ *Ibid.*

⁸² *Ibid.*, 17.

⁸³ *Ibid.*

⁸⁴ *Ibid.*, 24.

⁸⁵ *Ibid.*

where medical instruction was carried on, or for students flocking to particular areas to be taught by distinguished masters of medicine.⁸⁶

Keeping in mind major Greek expansions during the eighth century BCE Archaic Period, itinerant doctors appointed to serve as civic and public physicians become more commonplace in this mobile society than medical family clans, as such as Democedes of Croton.⁸⁷

By the high fifth century BCE in Golden Age of Classical Periclean Athens, Nutton suggests that there may have been remote possibility that civic doctors provided free treatment to citizens or to the poor citizens alone.⁸⁸ Nutton cites a passage from Plato's *Gorgias* that reveals that public doctors tended to be selected more often on rhetorical ability than technical skill.⁸⁹ According to Nutton, the substrate of fifth century medical rhetoric was derived from a century before from the philosophical frameworks generated by debates of the sixth century Pre-Socratic philosophers (e.g. Heraclitus, Empedocles, Anaxagoras, and Democritus).⁹⁰ Nutton embraces Edelstein's thesis that prognosis was meant for propaganda either to proclaim a physician's excellence or to save face in the case of failure and poor outcomes.⁹¹ The extreme social competition between doctors was the central characteristic of the Hippocratic physician, as suggested by a book in the Hippocratic Corpus, *Precepts* 3-13, which is replete of practical solutions on how to make best impressions in a variety of social situations for the purposes of professional success.⁹²

With death of Alexander the Great and rise of the Hellenistic kingdoms, citizenry bodies no longer appointed civic doctors but council members comprised of members from the upper echelons of society.⁹³ Efforts now were directed by physicians to please these high-ranking officials like benevolent Hellenistic monarchs. This slightly new system of patronage was a mutually beneficial arrangement. Hellenistic kings increased the grandiosity of their royal court because court doctors were considered status symbols.⁹⁴ In turn, strong royal support in large urban centers in the Hellenistic east enabled doctors to pursue a more rigorous study of medicine, especially anatomy.⁹⁵ The two most famous Alexandrian anatomists were Herophilus and Erasistratus. Instead of employing philosophy, attaching oneself to a specific sect, school-doctrine,

⁸⁶ Ibid.

⁸⁷ Herodotus, *Histories*, 3.131-8, quoted in Nutton, *Social history of Graeco-Roman medicine*, 20.

⁸⁸ Nutton, *Social history of Graeco-Roman medicine*, 21.

⁸⁹ Plato, *Gorgias*, 455b, quoted in Nutton, *Social history of Graeco-Roman medicine*, 21.

⁹⁰ Nutton, *Social history of Graeco-Roman medicine*, 22.

⁹¹ Ibid., 26.

⁹² Ibid., 27.

⁹³ Ibid., 28.

⁹⁴ Ibid., 29.

⁹⁵ Ibid., 29-30.

or cultural centre was now the key to impressing people.⁹⁶ However, like in the Pre-Classical period with misleading images of physician training in medical schools, in the Hellenistic era, Nutton argues that the Museum in Alexandria was not a medical teaching institution but more of an intellectual club.⁹⁷ However, Nutton does concede to the high likelihood that the Museum still attracted ambitious medical students. The famous library of Alexandria is believed to have also fostered an atmosphere of intellectual activity but not to the point of teaching medical students.⁹⁸

In early Roman times, very little Latin literature is available and as a result, much discussion regarding medical practitioners is skewed toward the views of Cato and Pliny the Elder.⁹⁹ Together, they portrayed the early Roman medical tradition to be of a domestic, practical variety; it was very antagonistic of medical practices outside this paradigm, especially Hellenic ones.¹⁰⁰ Nutton thinks these conceptions are plausible for the geographical area of Latium and Rome of the third century BCE, because large village communities with specialized occupations were few and health on an isolated farmland would likely rely on self-help medicine.¹⁰¹ Nutton describes the tendency for some historians to link the very first importation of Greek medicine in 219 BCE with the arrival of the civic physician, Archagathus who was a Laconian surgeon invited to Rome with special privileges (i.e. citizenship and a fully subsidized public operating theater at a main crossroads) by the senate.¹⁰² Nutton, however, believes this reflects more of a culminating point, because there is considerable evidence of earlier Hellenization especially from the Greeks in southern Italy and Sicily, *Magna Grecia*.¹⁰³ Nutton also qualifies that not all Greek medical practitioners came to Rome of their own accord, because some were slaves or prisoners of war from Roman imperialism in the eastern Mediterranean; they were treated as foreigners without Roman citizenship, which entailed socioeconomic-political limitations in Roman society.

Under the Roman Empire, Julius Caesar and Augustus conferred Roman citizenship to foreign doctors working in Rome. However, in Rome, citizenship was the norm. From inscriptions, Nutton ascertains a picture of relatively low status of doctors in the western half of the Roman Empire: 80% of doctors lacked full citizen rights in the first century CE, 50% in the second, and 25% in the third when citizenship was extended to everyone in the Roman Empire with the Edict of Caracalla.¹⁰⁴ The disproportion of physicians in favour of working in the east is no surprise to Nutton as the East offered better political prospects and patient

⁹⁶ Ibid., 28-9.

⁹⁷ Ibid., 31.

⁹⁸ Ibid.

⁹⁹ Ibid., 36.

¹⁰⁰ Ibid.

¹⁰¹ Ibid., 37.

¹⁰² Ibid., 35.

¹⁰³ Ibid., 37.

¹⁰⁴ Ibid., 39.

populations in large urban areas (e.g. Galen of Pergamum, Soranus of Ephesus).¹⁰⁵ Although no doctor ascends to the Senate of Rome, a few imperial doctors gained great prominence and became appointed as provincial governors.¹⁰⁶ Their high status may have raised the status of medical practitioners overall; however, Nutton remarks that these high-ranking court doctors had a habit of distancing themselves from their more average counterparts (e.g. Galen passed harsh judgements on his humbler colleagues).¹⁰⁷ Nutton acknowledges that his epigraphical sources may be biased in portraying prosperity in the Eastern provinces under the high-water mark of Antonine rule.¹⁰⁸

Later in Imperial Rome, Nutton notes that the Roman innovation of the hospital did alter social circumstances for the physician, because before, patients were treated haphazardly at any convenient location for a brief amount of time such as one night in an Asclepian incubation room, a short stay at the physician's home, or simply at the patient's own home. Now the development of the hospital, albeit restricted to slaves and soldiers, created a special space for doctors to receive the sick and supervise patients to a closer extent. Therefore, Nutton's work contributes much to Edelstein's work in that Nutton reached similar themes about the social nature of ancient medical practice using a broader range of ancient sources from a vast chronology.

Horstmanshoff (1990)

Hermann Frederik Johan Horstmanshoff, a professor of classical philology and ancient history, cites and accepts the arguments of Edelstein, Temkin, Cohn-Haft, and Pleket (a 1983 German work closely related to a 1995 English publication, which will be discussed next): "The physicians of antiquity were primarily craftsmen. If they sought to appear as 'men of learning,' then it was rather as philosophers or rhetors [using prognosis] than as naturalists or field biologists."¹⁰⁹ Through a forceful historiographical analysis of the Hippocratic tradition, Horstmanshoff contributes new insight into how the popular image of the Hippocratic physician as scientist came about. The traditional image of the ancient Hippocratic physician consists of a doctor who carefully conducts empirical studies, emphasizes the patient rather than disease, stresses observation rather than theory, and makes prognoses.¹¹⁰ Horstmanshoff determined that the prevailing image of Hippocrates as the founder of

¹⁰⁵ Ibid., 42.

¹⁰⁶ Ibid., 41.

¹⁰⁷ Ibid., 47-8.

¹⁰⁸ Ibid., 43.

¹⁰⁹ Hermann Frederik Johan Horstmanshoff, "The Ancient Physician: Craftsman or Scientist?", *The Journal of the History of Medicine and Allied Sciences* 45, no. 2 (1990): 197.

¹¹⁰ Ibid., 183.

scientific medicine was produced through a series of anachronisms made by various medical writers throughout the ages.¹¹¹ He argues that they made the egregious error of retrospectively projecting their own ideals back onto the Hippocratic corpus and it was not until after Emile Littré (1801-1881)—when the Hippocratic Corpus was no longer the daily guide to clinical practice¹¹²—that Hippocrates be understood in his own ancient context.

In Littré's time during the early to mid-19th century, medicine was still wrought complications (e.g. post-operative infections) and Littré returned to Hippocrates for answers. Littré, "steeped in Enlightenment thinking,"¹¹³ published a French translation of the Hippocratic corpus, which arbitrarily labelled certain writings as "authentic" only if it matched with the image of physician-scientist; everything else was rejected as being "not genuine."¹¹⁴ Similarly, Galen sought support in the corpus and distorted it to conform to his own scholarly ideals. Galen had his heart set on portraying the Hippocratic Corpus as a subset of rhetoric, rather than an empirical science, because during Galen's time in second century CE, medicine enjoyed much more prestige as a philosophical art than a technical craft involving manual labour, which resulted in the use of passages opposite to Littré.¹¹⁵ Galen exercised a great deal of influence simply by the sheer volume of his prolific writings.¹¹⁶ Galen's well-received writings decisively installed Hippocrates as the glorious "Father of Medicine".¹¹⁷ Going further back in time to when the Hippocratic tradition began, Horstmanshoff reveals that Littré, in his attempt of hone in the "true" fifth and fourth century BCE Hippocrates, inadvertently reconstructed late third century BCE Alexandrian empiricist viewpoints of Hippocrates. The empiricist of school of medicine, which compiled the *Corpus Hippocratum* from available sources in Alexandria, attributed great importance to works of Hippocrates that promoted observation and drawing conclusions from raw experiences, not theoretical speculation.¹¹⁸ In conclusion, Horstmanshoff provides further evidence for Edelstein's craftsman thesis by exposing how the idealized depiction of Hippocrates as the first scientific doctor is more precisely the product of the Age of Enlightenment and Alexandrian empiricism.

¹¹¹ Ibid., 183-4.

¹¹² Ibid., 183.

¹¹³ Ibid., 186.

¹¹⁴ Ibid., 183.

¹¹⁵ Ibid., 185.

¹¹⁶ Ibid., 184.

¹¹⁷ Ibid., 185.

¹¹⁸ Ibid.

Pleket (1995)

Henri Willy Pleket is another classicist who has published on ancient social and economic history. He approaches the issue of social status by examining the status of public physicians throughout antiquity but mainly focusing on evidence from Hellenistic and Roman times. He does not directly cite Edelstein and heavily relies on Nutton as a supporting reference. Pleket argues that public physicians certainly received some gratitude from clients for their services but were far-removed from sociopolitical prominence in their communities, because they, like their non-public physician counterparts, were still craftsmen.¹¹⁹

According to Pleket, the social status of physicians slightly varied depending on community of practice. Firstly, he immediately dismisses any societal prominence for wandering doctors, because “they were not part of the local social system and at best may have enjoyed some temporary esteem, dependent on their success.”¹²⁰ The rural village doctors of Egypt and Asia Minor had a somewhat better social circumstance. Pleket says that doctors in these settings may have received private honoraria, farmland, and reasonable esteem from the village, but it is not likely they were part of the social elite and might possibly have attained middle-class at best.¹²¹ Pleket believes that the status of urban public physicians (*iatros dêmosioi*) did not really advance much further beyond that of Homeric physicians, the *demiergos*, who enjoyed mid-level social standing.¹²² He contends that it is unlikely that a public physician who was of high social standing would be described as an employee on a salary.¹²³ In addition, a public physician in 300 BCE at Cyrene was considered of similar standing to that of a public trainer and this comparison to trainers reduces the likelihood that public physicians were high-ranking in society. However, post-300 BCE, during Hellenistic times, Pleket is ready to accept that:

not more than perhaps 5% of those urban physicians belonged to the real elite, whereas the others are comparable to the rank and file of *eisphora*-payers: decent citizens but nevertheless (upper-) middle-class, living on the fringe of ‘the territory’ of the real elite.¹²⁴

The social situation of urban public physicians in Greek cities of the Roman Empire changed again. Pleket suggests that about 60% of urban *archiatrio* (successors of the Hellenistic *iatroi dêmosioi*) were not of the

¹¹⁹ Henri Willy Pleket, “The social status of physician in the Graeco-Roman world,” in *Ancient medicine in its socio-cultural context: papers read at the congress held at Leiden University, 13-15 April 1992*, ed. Philip J. van der Eijk, Hermann FJ Horstmanshoff, and Petrus H. Schrijvers (Atlanta: Rodopi Bv Editions, 1995), 27.

¹²⁰ *Ibid.*, 28.

¹²¹ *Ibid.*, 28-9.

¹²² *Ibid.*, 29

¹²³ *Ibid.*

¹²⁴ *Ibid.*, 31.

elite class, because no records reveal that they held any offices (political, religious, or otherwise) representative of the urban ruling class. In conclusion, Pleket posits that the majority of all physicians, whether rural or urban, private or public, never exceeded the social rank of upper-middle class craftsman, which is in agreement with Edelstein.

Chang (2008)

Hui-Hua Chang is an Associate Professor of History from Elon University, North Carolina. She performed a close examination of societal elements, which were likely influential in affecting the lives and careers of physicians in the Classical era. Although she cites and agrees with Edelstein, Temkin, Cohn-Haft, Amundsen, Horstmanshoff, and Pleket, she stresses the importance of her evidence provided by sources from the Classical era such as Hippocrates, Herodotus, Demostenes, Xenophon, Aristophanes, and Euripides.

Chang forwards three major conclusions. Firstly, Chang maintains that physicians of Classical Greece were low status craftsman—ambivalent attitudes at best.¹²⁵ However, there were changes in the sociopolitical climate of the late fifth century BCE that provided some doctors promising opportunities for upward social mobility. According to Chang, the old aristocracy would have considerably declined, because of many deaths that took place during the tumultuous times of the fifth and fourth century BCE (e.g. Peloponnesian War, war with Macedonia, Plague of Athens).¹²⁶ This chaos and loss of human life opened up the upper echelons for a *nouveau riche* to rise through the ranks by way of commerce, marketing, and profit making.¹²⁷

Secondly, in addition to wealth accumulation, Chang contends that physicians could improve their social status if they dressed their medical theories with the same characteristics of rhetorical discourse, because this intellectual culture of rational thinking and logical argumentation was highly regarded by the elites in the Classical era.¹²⁸ The natural philosophy of the Pre-Socratic philosophers and the philosophy of the Sophists were quite in vogue during Classical times.¹²⁹ This line of logic follows from Chang's premise that the upper classes were characterized, not by manual labour, but by a life of academic pursuits to acquire specialized knowledge for learning's sake.¹³⁰

¹²⁵ Hui-Hua Chang, "Rationalizing Medicine and the Social Ambitions of Physicians in Classical Greece," *Journal of the History of Medicine and Allied Sciences* 63, no. 2 (2008): 220.

¹²⁶ *Ibid.*, 226.

¹²⁷ *Ibid.*, 227.

¹²⁸ *Ibid.*, 220.

¹²⁹ *Ibid.*, 229-30.

¹³⁰ *Ibid.*

Lastly, Chang postulates that physicians further endeared themselves closer to the nobility by way of prescribing therapies directed at maintaining a certain lifestyle and diet for optimal health, because the wealthy elite were only patient population who had the leisure to carry out these time-consuming regimens.¹³¹ Chang presents the life and times of Eryximachus as a highly representative case example of all her arguments, because he was a physician who adopted rational medical theories and attached himself to the great intellectual Sophists, which made gained him acceptance into the circle of the elite. Thus, Chang provides corroborating evidence for Edelstein's thesis in describing how doctors engaged in commercial activity using rhetoric and won the confidence of their socially superior clients by prescribing specific therapies, which were only palatable to the elite lifestyle.

Nicholson & Selden (2009)

The most recent piece of major scholarship regarding the social status of ancient physicians appeared in a 2009 neurosurgical journal as a collaborative effort between a classicist, Nigel Nicholson, and pediatric neurosurgeon with a Ph.D. in English, Nathan R. Selden. Although Nicholson and Selden do not cite Edelstein's doctoral thesis, they are familiar with a later work by Edelstein on Asclepius.¹³² Moreover, they essentially agree with Edelstein indirectly through other later authors, Nutton and Chang. However, this duo arrive their conclusions through an analysis of Pindar's poetry and other contemporary and near-contemporary classical sources. Their analysis revolves around "the primacy of the moral framework surrounding different types of exchange in late archaic society...as a key factor influencing the perception of physicians, poets, and other professionals."¹³³ They propose that Pindar's poetry may be the first time a doctor is illustrated to have more appreciation for gold than a patient's health: "Medicine, while with incisions he set others right. But even wisdom is bound by profit. Gold shown in hands, a lordly fee, turned that man too."¹³⁴ For Nicholson and Selden, Pindar's emphasis on the exchange of gold provides considerable social commentary, because taking a fee for a commodity service was highly indicative of a craftsman in the eyes of the aristocracy.¹³⁵ As explained by Nicholson and Selden, gift exchange was the more respectable form of exchange, which characterized the aristocratic social order, and as a result, any living, which had an orientation toward

¹³¹ Ibid., 237.

¹³² Nigel Nicholson and Nathan R. Selden, "Poets, doctors, and the rhetoric of money," *Neurosurgery* 64, no. 1 (2009): 186 n. 12.

¹³³ Ibid., 179.

¹³⁴ Pindar, *Third Pythian Ode*, II.47-60, secondary source author's trans. Nigel Nicholson, quoted in Nicholson and Selden, 179.

¹³⁵ Nicholson and Selden, 185.

commodity exchanges and not gifts, was degrading. Physicians who operated outside the institutions of gift exchanges were also “outside the moral values of the aristocratic community and challenged the social order.”¹³⁶ This explanation corroborates Cohn-Haft and Pleket in which craft (or *techne*) implied commodity exchange of discrete products and services. Although generally perceived as lowly craftsmen, Nicholson and Selden agree with Pleket and Nutton in that there were attempts by some doctors to represent themselves more favourably to the elites such as the doctor who commissioned the Kouros of Sombrotidas, an extravagant funeral marker, to flaunt his final resting place in keeping with aristocratic traditions.¹³⁷ Therefore, this final piece of literature review matches up with Edelstein’s thesis too.

Conclusion

This thorough review of literature since Edelstein demonstrates that later authors on the subject of the social status of ancient medical practitioners have largely agreed with Edelstein. Some approached similar conclusions using different sources whereas others nuanced and further built upon Edelstein’s ideas.

Temkin, using written sources, expanded Edelstein’s thesis by further subdividing professional medical practitioners into two subclasses. Cohn-Haft, from his study of Ancient Greek public physicians using both literary and material sources, provided additional supporting insights into professional recognition and socioeconomic status. Amundsen through his study of popular culture texts in antiquity found ambivalent attitudes toward physicians. Nutton essentially verified Edelstein’s thesis using a broad range of sources including literary and epigraphical evidence from a vast chronology all the way into the Roman period. Horstmanshoff supported Edelstein’s thesis by shattering the popular image of Hippocrates as a scientist. Pleket by examining the social status of public physicians especially in Hellenistic and Roman times found that physicians did receive some gratitude for their work, but were still considered craftsmen nonetheless. Chang closely looked at societal elements of the late fifth and fourth centuries BCE and explained how shifts in the sociopolitical climate, engaging philosophical rhetoric, and prescribing dietetic therapies would elevate the status of doctors. Lastly, Nicholson and Selden, deducing from Pindar’s poetry and other contemporaneous literary and material sources, emphasized that collecting fees for commodity exchange by physicians invited considerable contempt and scorn from aristocracy, because it was outside the cultural norms of the nobility where gift-giving was more customary.

¹³⁶ Ibid., 181.

¹³⁷ Ibid., 183.

Aside from these minor developments, which have only provided further supporting evidence, it is remarkable how one man's work has demonstrated such durability. Therefore, despite initial upsets, Edelstein's interpretation of the ancient Hippocratic physician as craftsman has become well received and it is likely to remain watertight considering how it has withstood 80 years of scholarly scrutiny from authors of various backgrounds and research methodologies. As it stands, the humble image of ancient physician as craftsman will continue to dominate medical debates on status.

THE PHENOMENON OF TREMOR IN GALEN

by
SARA AGNELLI
(University of Florida)
Email: saraclassics@ufl.edu

ABSTRACT: In one of his lectures at la Salpêtrière, Jean Martin Charcot (1825-1893) differentiated action and rest tremors. “The distinction,” he says, “is of the highest importance in the story of chronic diseases of the nervous system accompanied by tremor.”¹ Previously, Van Swieten (1700-1772) recognized the two kinds of tremor. According to him, tremor that persists during bedrest results from irritation that intermittently and rhythmically affects the nervous centers. This then would be a convulsive phenomenon—*tremor coactus*. On the other hand, the tremor presenting during the execution of voluntary movements would indicate a defect of stimulus, itself the result of an insufficiency of the nervous fluid that causes contraction of the muscles under the influence of the will. This, therefore, would be a paralytic tremor—*tremor a debilitate*.²

This two-fold classification actually dates from long before Van Swieten: Galen had established it, distinguishing very minutely these two kinds of trembling and giving them different names. “For a trembling (τρόμος),” Galen explains, “arises from a weakness of the faculty which moves and carries the body; for nobody trembles who does not endeavor to move his limbs. But palpitating parts (τὰ παλλόμενα) will palpitate although you introduce no motion in them.”³

In this paper I shall examine the phenomenon of tremor and other discordant motions (πλημμελεῖς κινήσεις) in Galen, investigating how he defines them in his book *On Tremor, Palpitation, Rigor and Spasm*.⁴ A comparative study of this condition within Galen’s works is a major *desideratum*, as is a more general investigation of its place in ancient medicine more broadly considered. In this brief study, I shall not pretend to fill either of these gaps. It is hope, however, that this paper will serve as a useful *prolegomenon* to these important lines of inquiry.

¹ Charcot, J. M (1879): *Lectures on the diseases of the nervous system delivered at La Salpêtrière*, trans. George Sigerson, Philadelphia, 105-109.

² Ibid.

³ Galen, *De tremore, palpitatione, convulsione et rigore liber*, in *Claudii Galeni Opera Omnia*, ed. Carolus Gottlob Kühn (1964), Hildesheim: Georg Olms, 7.589-642.

⁴ Galen, *De tremore*: 7.589-642.

Text and Sources

Galen probably wrote his short work *De tremore (Peri tromou)*⁵ between 169 and 180 CE, during his second stay in Rome. To my knowledge, it has been previously translated into English only once, by D. Sider and M. McVaugh (1979);⁶ their translation was based not on the text printed by C.G. Kühn, but on an independent collation of manuscripts.⁷ Ten manuscripts survive, of which seven are apographs of MS Vaticanus Graecus 1845, 12th century, ff. 171v-197, and this manuscript together with MS Venetus Marcianus Graecus Z. 282, 15th century, ff. 183-189v, has been of most value in establishing the Greek text. *De tremore* was translated into Syriac by Ḥunain ibn Ishaq and then into Arabic by Ḥubaish in the ninth century. No manuscript of the Arabic or Syriac texts has yet been found, but the Arabic version was rendered into Latin in 1282 by the Catalan physician Arnald of Villanova. The text of Arnald's translation thus represents a very different tradition from that of the surviving Greek manuscripts, and has occasionally proved quite useful in restoring the Galenic original.⁸

Two years before Sider and McVaugh's translation, M. Z. Konstantinides examined and collated all the Greek manuscripts containing Galen's treatise *On tremor*, and he established for these codices a stemma, describing their interrelationship.⁹ He also critically edited the text of the first five chapters of the treatise. Moreover, in his preface, Konstantinides advised that the full text of the treatise together with the consideration of the Latin translations, as well as a glossary and English translation would be published in the *Corpus Medicorum Graecorum*. This work has not yet been published under the CMG.

In Galen's survey of his own literature,¹⁰ the last mentioned books were *On Tremor, Palpitation, Rigor and Spasm* and *The Art of Medicine*:

The forth book of my summary covers the remaining five volumes, from the sixteenth to the twentieth. ... The argument of the nineteenth concerns the nerves that have their origin in the brain, the sense of smell and source of its faculty of perception, the nerves leading to the eyes. ... *Distinctions between Diseases* and *Distinctions between Symptoms*; also, following the former of these, one volume

⁵ *De tremore, palpitatione, convulsione et rigore* = Περὶ τρόμου καὶ παλμοῦ καὶ ῥίγους καὶ σπασμοῦ; cf. *Corpus Medicorum Graecorum: Bibliographies to Galen* (Fichtner online version 08/2012).

⁶ In this study, I refer to this English edition.

⁷ Sider, D. and McVaugh, M. (1979): "Galen, on tremor, palpitation, spasm and rigor", *Transactions & Studies of the College of Physicians of Philadelphia* 1, 183.

⁸ Sider, D. and McVaugh, M. (1979): 184.

⁹ Konstantinides, M.-Z. (1977): *The Greek Manuscripts of Galeni: De tremore, palpitatione, convulsione, et rigore liber, with a critical edition of chapters 1-5*, New York University, ProQuest, UMI Dissertations Publishing.

¹⁰ Galen, *De libris propriis*, in *Claudii Galeni Opera Omnia*, ed. Carolus Gottlob Kühn (1964), Hildesheim: Georg Olms, 19.8-48.

explaining the *Causes of Diseases*; and following the latter, three volumes of the *Causes of Symptoms*, followed in turn by *Affected Places*. Also among those which logically precede my therapeutic works: *Distinctions between Fevers*, *Mass*, *Unnatural Lumps*, as well as *Predisposing Causes*, to which may be added *Continuous Causes* and *Tremor, Twitching, Shivering, and Convulsion*, and the work entitled *The Art of Medicine*.¹¹

However in his citation they also appear in a different order, proof that Galen did not set any importance on exact titles.

The treatise supplements Praxagoras' work and explicitly adheres to his thought. It was written at about the same time in which *De placitis Hippocratis et Platonis* was finished: in fact in the next to the last book of *De placitis*, as well as in *De tremore*, Galen takes his medical exegesis to Plato's *Timaeus* into close consideration. In *De placitis* and in *De tremore*, Galen compares the teachings of Hippocrates and Plato with regard to the human body.¹²

Before I turn to the very subjects treated in the following work, it will be useful to begin with some general remarks about human motions. Galen says: "When we are healthy, there are two kinds of perceptible motions (αἰσθηταὶ κινήσεις): those due to the impulse (καθ' ὀρμήν), or due to the will (κατὰ προαίρεσιν), acting through the nerves and muscles, which physicians call voluntary actions (προαιρετικαὶ ἐνεργεῖαι); those acting through the arteries and the heart, which they call vital actions (ζωτικαὶ ἐνεργεῖαι). When we are sick, a voluntary action—a motion which acts through the muscles and nerves—is manifest in tremors, spasms, rigors and sometimes with palpitations (ἐν τρόμοις καὶ σπασμοῖς καὶ ῥίγεσι καὶ ... παλμοῖς); for all such conditions¹³ (πάντα γὰρ τὰ τοιαῦτα παθήματα) are discordant motions (πλημμελεῖς κινήσεις) of the same organs through which, when they are healthy, the voluntary actions are accomplished."¹⁴

¹¹ Galen: "My Own Books", in *Selected Works*, ed. and trans. Peter Singer (1997), Oxford University Press, 13; cf. Galen, *De libris propriis*, 19.30: τὸ περὶ τρόμου καὶ παλμοῦ καὶ ῥίγους καὶ σπασμοῦ.

¹² Konstantinides M.-Z. (1977): 2.

¹³ In this paper, I have opted for "condition" as translation of the Greek words πάθος/πάθημα. In Galen, the distinction between the Greek words πάθος/πάθημα (usually translated as "affection") and διάθεσις ("condition") is not clear, although it might be said that the former is a change in progress while the latter is an established change. Cf. Galen, *Method of Medicine*, ed. and trans. Ian Johnston and G. H. R. Horsley (2011), Harvard University Press, xxx-xxxii.

¹⁴ Galen, *De tremore*: 7.585.

Tremor

The first condition (πάθημα) investigated is **tremor** (τρόμος).¹⁵ According to Galen, tremor arises from a weakness (ἀρρωστία) of the motive force (δύναμις)¹⁶ that supports and moves the body. The motive force, transmitted from the *arche* (ἀπὸ τῆς ἀρχῆς)¹⁷ through the nerves to the muscles, acts like the motion's carriage or wings (οἶον ὄχημά τι καὶ πτέρωμα τῆς κινήσεως) for the parts of the body. When the body parts lose this force completely, they are paralyzed, like a bird that has lost its feathers; at this point no motion remains in the parts affected. But those parts of the body that only partially lose this force will necessarily be seen to tremble (ἐν τρόμῳ). If this strength should become weak, everything becomes a burden, even if it is very light. Then motions that are too strong (ὑπὲρ τὴν δύναμιν) for weak parts of the body grow violent and involuntary, and hence are tremulous.

In voluntary motions the motive force attempts to lift the members, but due to the weakness it cannot do as much as it wants. The force lifts up a little, but insufficiently, and this leaves the motion incomplete. Again it allows the members to drop. When this happens continually and the motion downward always meets the motion upward, the whole motion becomes double and composite. Therefore, tremor is the name of the condition in which members, falling downward because of their weight, and meet an opposing upward motion produced by the motive force.

The conditioning (διάθεσις) is a weakness of the body's force, with many possible causes (αἰτία).¹⁸ For example, someone who has lifted a heavy burden and then tries to force himself to walk up a step with it, often trembles in the legs; and if he should try to lift something overly heavy with his hands, they tremble no less. On the other hand, the motive faculty can be suppressed by excess of humors (διὰ πλῆθος ὑγρῶν),¹⁹ or when a chilling (ψῦξις) takes hold. Similarly lack of nourishment (τροφῆς ἀπορία), loss of the natural tone (ζωτικὸς τόνος), fear (φόβος), old age (γῆρας), and sickness (νόσος) also reduce the motivating force and cause tremors.

By situating tremor in forces rather than organs, Galen departs from Praxagoras, who said that tremor is a condition of the arteries, and Herophilus, who associated tremor with the nerves. In particular Galen finds fault with Herophilus in attributing to the organs an illness of the motive faculty. To make his point, Galen uses a musical simile: "Lyre-playing is not an activity of the lyre;

¹⁵ Galen, *De tremore*: 7.586-587.

¹⁶ "Faculty", "capacity", "potentiality": various terms that translate the Greek word δύναμις; in Galen, *De tremore*, the term means mostly "the *motive force* that supports and moves the body" (7.586) and "the faculty that uses the instruments (i.e.: nerves and muscles)" for voluntary motions (7.606).

¹⁷ This term, left untranslated, refers to the functional centre (ἀρχή) of the nervous system, that is the hearth – see Tielen, T. (1996): *Galen and Chrysippus on the Soul*, Leiden: Brill, 48-49.

¹⁸ Galen, *De tremore*: 7.601-603.

¹⁹ Cf. Hipp. *De morbis*: 2.4.5.

lyre-playing is an activity of the musician, and the lyre is the instrument. Sometimes the playing of the lyre turns out badly though the musician's fault, and sometimes because of damage to the instruments he uses. Similarly, the craftsman and the artificer of voluntary motion in animal life is the faculty or force (δύναμις), while the instruments (ὄργανα, a word as applicable to musical instruments as to organs of the body) are the nerves (νεῦρα) and muscles (μύες). Therefore, lack of motion and faulty motion are due to conditions either of the instruments (ὄργανα) or of the faculty (δύναμις) using them. Hence, palpitations, spasm and paralysis are injuries of the instruments (ὀργάνων βλάβαι), while tremors are conditions of the unwell faculty (δυνάμεως ἀρρωστούσης πάθη).²⁰

Palpitation

Palpitation (παλμός),²¹ just like tremor, is an unwanted and involuntary motion (κίνησις ... ἀβούλητος and ἀκούσιος), in which the palpitating parts move up and down. Palpitations differ from tremors in site of effect (τόπος), cause (αἰτία), and symptom (σύμπτωμα).

“Tremor never arises in anyone who in no way undertakes to move,” Galen says, “for tremor is a symptom of powerless and weak motion. In a body in which there is absolutely no motion, there can be no weakness or powerlessness in respect to motion.”²² Palpitation, however, happens even to those who are motionless. For example, the eyebrow, eyelid, and eye are often raised involuntarily together. This has great importance both for an understanding of the nature of palpitation and for differentiating between it and tremor. For, what appear to be risings (ἐπάρσεις) and fallings (θέσεις) in palpitating parts are really expansions (διατάσεις) of the bodies as they fill up, followed by collapses (συνιζήσεις) as they are evacuated in turn. Motions in those who tremble are of an entire limb, when it falls or is raised; nothing, however, is expanded and contracted. Because of this, the entire member trembles whenever we undertake to do something, none of it remaining motionless: muscles, arteries, tendons, veins, bones and skin all move upwards and downwards with the same motion. But not everything palpitates. For a tendon, bone, cartilage or anything else like this, do not palpitate: they do not have a cavity (κοιλία), which by expanding and contracting would allow their parts to be lifted up and collapse whenever it contracts.

Motion is common to both tremor and palpitation: but while tremor is an involuntary and alternating up-and-down motion of the limbs (ἀκούσιος δὲ κίνησις ἄνω τε καὶ κάτω τῶν μερῶν ἐναλλάξ φερομένων ὁ τρόμος), palpitation is an unnatural expansion and collapse (διάστασις μὲν τίς ἐστὶ καὶ συνίησις παρὰ φύσιν ὁ παλμός). Things moving upward and downward leave their former place

²⁰ Galen, *De tremore*: 7.605-606. For Herophilus and Praxagoras, see Steckerl, F. (1958): *The Fragments of Praxagoras of Cos and His School*, Leiden: Brill, fr.27.

²¹ Galen, *De tremore*: 7.589-601.

²² Galen, *De tremore*: 7.593.

and move to a new one; things expanding and contracting keep their initial place, alternately filling and leaving the surrounding space. In order to remark better on the difference between tremors and palpitations, Galen describes the recognizable signs (γνωρίσματα) of these illnesses. Often, when a great muscle or several muscles palpitate violently, the limb is lifted up by their expansions (διαστελλομένοις), and it falls back down when muscles contract (συστελλομένοις). But it is not proper to call tremor “this kind of involuntary rising and falling (τὴν ἀκούσιον ἔπαρσιν τε καὶ θέσιν) of the limb”.²³ And the motion itself is unlike that of a tremor. For example, when the motions of palpitating muscles keep the whole limb in motion, each of the motions is complete within its possible range of motion. This is not the case with tremors, of which the upward and downward motions are always incomplete. Involuntary upward and downward motions in muscles palpitating violently are defined by discernible limits while upward and downward motions in tremorous muscles are always incomplete.

Next Galen considers the cause of the condition: a thick and vaporous *pneuma* (πνεῦμα παχὺ and ἀτιμῶδες),²⁴ having no outlet. When a member expands, the *pneuma* has collected in a cavity. A swift emptying or filling, an expansion or contraction, a falling and a rising, or any other motion like these, can be brought about only by *pneumata*. Hence the cause of palpitations: the substance (οὐσία) is *pneuma*, and the qualities (ποιότης) of the substance are moisture and thickness (ὕγρότης ... παχύτης).

Palpitations may take place in two sites: it most often arises in the muscles, where there are many small cavities, but also in the skin, where there are no cavities. In the first kind of palpitation, the *pneuma* fills any cavities the body might have, raising and expanding the surrounding material. In the second kind of palpitation, because the skin has no cavity, the *pneuma* collects under the skin and separates it from the underlying member, making a new cavity itself.²⁵

Those who are colder are more easily affected by palpitation. Warmth rarefies the *pneuma* and renders animal bodies fine and soft. Cold, however, thickens and solidifies the *pneuma*. It is therefore readily retained in cold bodies, unable to dissipate both because of its own thickness and because of the denseness of what surrounds it. In contrast to cold, warmth softens, and relaxes the body, opening its pores and thinning out the *pneuma*, which it stirs into motion. Because of this, remedies for palpitations end to thin and warm the body, helping the *pneuma* exit.

Rigor

²³ Galen, *De tremore*: 7.595.

²⁴ In ancient physiology the term *pneuma* (πνεῦμα) had a number of meanings. Particularly with Erasistratus it was used to describe an air- or spirit like material, derived from the inspired air, which traveled in the arteries either alone (Erasistratus) or with blood (Galenus) and was distributed throughout the body. Cf. Galen, *Method of Medicine*, ed. and trans. Ian Johnston and G. H. R. Horsley (2011), Harvard University Press, XC-CXI.

²⁵ Cf. Praxagoras: Steckerl, F. (1958): fr.27.

After tremor and palpitation, Galen distinguishes **rigor** (ῥῆγος), as follows.²⁶ “One must first consider what rigor is”, he explains; “this seems to be well known to all, but actually is extremely difficult to define, not only because it is not easy to find the cause (αἰτία) or the disposition of the body (διάθεσις) arising from the cause, but also because men seem mistaken in the very description of the concept.” The idea that rigor is “chills with tremor” (τὸ σὺν τρόμῳ λέγειν κατάψυξιν)” is clearly refuted by the fact that not all those who suffer rigor shake, but only those who suffer it violently; and when it does occur, it is not tremor that arises, but something like “shock and agitation” (σεισμοῦ τε καὶ κλόνου). The agitation (κλόνος) associated with violent rigors (σφοδροῖς ῥήγασιν) attacks the body so implacably that it is impossible to be still (ἀμήχανον), no matter how hard one tries. The motion in those suffering from rigor is entirely involuntary. Moreover, while tremor is a condition of one member, rigor affects all the entire body.²⁷

Tremor further differs from rigor in that one may tremble with no sensation of cold, while it is impossible to suffer rigor without a chill. Rigor, therefore, cannot be equated with tremor. “Whenever someone is chilled without shock and agitation”, Galen points out, “he does not suffer rigor: rather, if the condition (τὸ πάθος) is truly to be called rigor, it must be accompanied by an uneven and involuntary motion (τὴν ἀνώμαλον τε καὶ ἀπροαίρετον ... κίνησιν).” Without this, if not even the skin is moved irregularly, it is called chill (κατάψυξιν). If, however, the skin should be disturbed (ταράττοι), and shake (σειοί), from some attacks (κατὰ τινας ἐμβολάς), the condition is called a shiver (φρίκη), so that shivering is an affection of the skin alone, just as rigor is of the whole body. In the case of healthy patients, suffering rigors means every painful chill. Those physicians defining the unhealthy rigor as a chill seem to be describing merely the rigor found in healthy patients. The unhealthy rigor is a painful chill (κατάψυξις ἀλγεινή), with a certain irregular shock (μετὰ τινος ἀνωμάλου σεισμοῦ) and agitation (κλόνου) of the whole body.”²⁸

Having defined rigor, Galen moves to the proximate cause of the condition (ποιούσα τὸ πάθος αἰτία) and its antecedent causes (τίσι δὲ μάλιστα προηγουμέναις αἰτίαις)?²⁹ Recognizing what rigor is, what is the proximate cause of the pathos (ποιούσα τὸ πάθος αἰτία)? What antecedent causes does it most often follow (τίσι δὲ μάλιστα προηγουμέναις αἰτίαις)?

In examining rigor’s causation, Galen insists on the theory of four qualities (hot and cold, wet and dry), which are the four elements of the universe (fire, water, air and earth), and to the four “humors” of the body (blood, phlegm, yellow

²⁶ Galen, *De tremore*: 7.611-638.

²⁷ Galen, *De tremore*: 7.608.

²⁸ Galen, *De tremore*: 7.612-613.

²⁹ For “cause” (αἰτία), one must determine whether Galen means this in the sense of “agent” or “explanation.” In this passage (7.614), Galen distinguishes the proximate cause (ἡ ποιούσα τὸ πάθος αἰτία) from “the antecedent causes (προηγούμεναι αἰτίαι)”, while in other passages from *On tremor*, as in others of his works, Galen generally does not make this distinction. Cf. Johnston, I. (2006): *Galen On Diseases and Symptoms*, Cambridge University Press, 31-32.

bile, and black bile).³⁰ According to this doctrine, an animal is healthy whenever its qualities and humors remain balanced.³¹ If, however, one should predominate over the other, the animal must sicken with an illness similar to the nature of excessive quality or humor. Hence phlegmons (φλεγμοναί), erysipelas (έρυσιπέλατα), herpes (έρπητες), carbuncles (άνθρακες), burning fevers (τά καυσώδη) redness (φλογώδη) and all feverish conditions (πυρετώδη πάθη), occur whenever the quality of heat predominates. Spasms (σπασμοί), tetanus (τέτανοι), palpitations (παλμοί), stupor (νάρκαι), paralysis (παραλύσεις), epilepsy (έπιληψία), and paraplegia (παραπληγία) occur when cold is dominant.

Then to what dispositions does rigor supervene? Rigor is a condition that affects the natural heat of the body (πάθος τοῦ κατὰ φύσιν θερμοῦ).

In regard to the origin of the condition, in rigor there occurs a sudden and violent chill of the innate heat. It is necessary for the heat to be chilled “suddenly and violently”; that is, the heat itself remains strong, weakened neither in substance nor in *tonos*, but affected by an external cause. At this point, Galen employs the simile of “flames” (φλόγα) to describe the external causes that could affect the innate heat.³² rigor occurs when the innate heat, although strong and able to sustain itself, is suddenly checked in the same way that a flame is quenched by water. Confusion results in the body, a double motion occurring as in the tremulous, but for a different reason. The mixed motion of tremor arises due to a weakness of the motive faculty. In the case of rigors, the natural motion of the heat is forcibly checked. With a violent motion, the heat tries to push them aside and to clear the way for itself, but is checked in its motion, and the whole body shakes at the resultant impact. The heat, having become vaporous, collides with what opposes it, rebounds back, suffers something like a stroke, and returns to its source; set in motion again, it pushes outward more violently and again rebounds with this impact; this cycle repeats, as long as the distressing causes remain.

Because of these repeated impacts that distress the body, the condition is painful and the cyclical, opposed motions move the animal irregularly.

Furthermore, the body, heated beyond its natural state, produces sweat, for whenever the heat after many impacts has escaped and can now breathe freely, the body must be heated. In rigor, therefore, it is painful not to warm up after being chilled.

Next, Galen addresses whenever rigor is due to a cold or warm cause. That the condition is cold is manifest (ψυχρὸν τὸ πάθος); but whether the agent causing it (τὸ δρῶν) is also cold seems worthy of investigation. First, rigor is a sign (γνώρισμα) of the tertian fever (τριταίου ἀκριβοῦς), and “not even a madman would say that such a fever is created from a cold humor”.³³ Secondly, rigor supervenes on the bilious, remittent fever and marks its crisis. Finally, “a bitter and warm drug applied to a wound will cause first pain; then it brings about a

³⁰ Singer, P. N. (1997): x.

³¹ Cf. Hippocrates, *De natura hominis* 4.

³² Galen, *De tremore*: 7.621-623.

³³ Galen, *De tremore*: 7.627.

shivering and then rigor on top of the shivering. Phlegmon (φλεγμονή) on the point of abscess is associated too with rigors and shivers (ῥίγος τε καὶ φρίκη).³⁴

So Galen acknowledges that rigor arises from bitter and warm humor, as yellow bile, no less than from cold and congealing humor.³⁵ But how could a cold condition arise from a bitter, warm humor? Galen puts on the question: “To deny what is evident would be like agreeing that we do not see, simply because we do not know how we see”. Galen, therefore, cannot explain how a bitter and warm humor can produce rigor, but because this evidently happens, he is able to establish that “all it takes to bring on rigor is for the cold or the bitter to be in excess.”

Galen then discusses other factors producing rigor. He has already mentioned that rigor may follow the application of hot drugs and that it happens in burning and tertian fevers, when the yellow bile (ξάνθη χολή) moves through the flesh rather than in the hollows of the veins. This rigor arises either by increased production of this humor in the flesh or by its natural purgation through the flesh. Those suffering indigestion, or who are filled with bad humors, or who come into the summer sun or the bath, or those who exercise at once begin to shiver, and some of them suffer rigor too. Both kinds of causes, hot and cold (ψυχρὰ καὶ θερμὰ), produce painful motion in the body.

Rigor, therefore, is likely to arise not only from yellow or black bile (the black bile is cold while the yellow is warm), but from very cold phlegm, as well. Such rigor is not vigorous, even though it sometimes persists for several days.

Finally, in the last paragraph of this section,³⁶ Galen points out “a new and strange rigor called *anekthermantos* (ἀνεκθέρμαντος: *not warmed*), owing to lifestyle changes”. Indolent patients, who bathed after meals would suffer in this way: a sensation of tension or weight would arise in the right *hypochondrium* where the liver lies, because the veins there were blocked by the grossness of the humors. Just as the patients have a feeling of weight and tension in the bowels, they perceive a rigor too.

Spasm

Galen concludes his work discussing briefly **spasms** (σπασμός).³⁷ As in the introduction, Galen explains that all the voluntary motions are accomplished through the muscles, whenever the muscles draw with themselves each of the parts to which they are attached.³⁸ When a condition arises producing tension (εἰς τάσιν) in the muscles, a motion that appears natural (ὁμοῖα τῇ κατὰ φύσιν) but is actually involuntary (ἀβούλητος), follows: this condition is called *spasm* (σπασμός). The muscle is stretched and drawn (τὸ ... τείνεσθαι τε καὶ σπᾶσθαι)

³⁴ Galen, *De tremore*: 7.627.

³⁵ Cf. Plato, *Timaeus* 85; Hippocrates, *Aphorismi* 4.58.

³⁶ Galen, *De tremore*: 7.637-638.

³⁷ Galen, *De tremore*: 7.639-642.

³⁸ Galen, *De motu musculorum*: 4.367-464.

towards its own source, just as the limb to which the muscle is attached is drawn toward the muscle. This is common to both the healthy and to the spastic (τοῖς σπωμένοις) but is involuntary only in the spastic.

Why does this condition arise? In animal bodies excess moisture distends the nerves (τὰ νεῦρα) and the tendons (τοὺς τένοντας), while drying causes contract them. In both cases, the nerves and the tendons enter a great tension similar to what, in the healthy body, produces voluntary motions. It is also possible for a member, severely affected by *phlegmon* or similar causes, to draw the attached nerves along with itself. The origin of the spasm can be found in all these dispositions.

Spasms arise because *phlegmons* of the neural parts (αἱ φλεγμοναί τῶν νευρωδῶν μορίων) stretch and pull the contiguous sinews. If the sinews are stretched, swollen by an imbalance of humors, a condition arises similar to that in which the chords of an instrument are stretched because of atmospheric moisture. The opposite occurs in ardent fevers and severe frenzies; as thongs drying close to a fire are drawn together and tightened, so too spasms arise from an excessive dryness of the sinews caused by disease.

Whenever the members are stretched forward, the spasm is called “emprosthotonos” (ἐμπροσθότονος: *forward-pulling*); whenever backwards, “opisthotonos” (ὀπισθότονος: *backward-pulling*); with equal force in both directions, *tetanus* (τέτανος: *convulsive tension*). Spasms caused by dryness cannot be healed, for these victims will die before a doctor can develop a treatment for them. Spasms arising from imbalance of the humors or from *phlegmon* may be cured by draining the dominant humor or by treating the *phlegmon* with its proper remedies.

Conclusion

In conclusion, when we are sick, involuntary motions appears as tremors, palpitations, rigors, and spasms. All these conditions are discordant motions arising either from dysfunctions either of the organs through which voluntary actions are carried out when healthy (palpitations, rigors, and spasms) or of the faculty that supports and moves the body (tremors). Each condition has its own characteristic: cause (αἰτία), site (τόπος), symptom / disposition (σύμπτωμα / διάθεσις), and signs (γνωρίσματα).

According to Galen, tremor is an involuntary, alternating motion of the limbs resulting from weakness of the motive force that supports and moves the body. It arises from many different reasons (lack of nourishment, loss of *tonos*, etc.), and in many sites. Palpitation is an unnatural expansion and collapse of the muscles caused by thick and vaporous *pneuma* trapped by the cold. Palpitations arise in the muscles and in the skin.

Rigor is a painful chill with irregular shocks and agitation, arising when the innate heat, although strong, is suddenly affected by either a hot or a cold cause. Lastly, spasm is an involuntary motion following tension in the muscles which are stretched and pulled by sinews with excess moisture (e.g. in *phlegmons*) or dryness. Like palpitations and rigors, spasms are a condition of the organs that carry out the voluntary motions.

DECLAMATORY DOCTORS

BY

MILLER KRAUSE
(University of Florida)
miller.krause@ufl.edu

ABSTRACT: The practices and practitioners of the healing arts featured prominently in ancient declamatory performances of *controversiae*. In these fictive speeches, elite Roman men would practice speaking with florid eloquence in mock debates on philosophical issues disguised as court cases¹ like the moot trials of today's law schools. This constituted a core element of elite education, but many Roman men, even emperors, continued declaiming long after their school days,² and the genre's popularity among the Romans stretched from the crumbling of the old Republic through the rise and fall of the Empire.³ In *controversiae*, a speaker plays, as if on stage or in a game, one side or both of

¹ Mario Lentano, "Un nome più grande di qualsiasi legge': Declamazione latine e *patria potestas*," *Bollettino di Studi Latini* 35 (2005): 566, explicitly labels this a juridical form of moral philosophy. Mary Beard, "Looking (harder) for Roman myth: Dumézil, declamation and the problems of definition," in *Mythos in mythenloser Gesellschaft: Das Paradigma Roms*, ed. Fritz Graf, *Colloquium Rauricum* Band 3 (Teubner, 1993) sees in declamation "a fictional world of 'traditional tales' for negotiating, and re-negotiating, the fundamental rules of Roman society" (56) using the (fictive) law as an artificial authority to eliminate moral arbitrariness, comparable to myths negotiating moral questions in light of divine authority. It was Beard who opened up declamation to serious study as a kind of ethical philosophy. Older scholarship, like E. Patrick Parks, *The Roman Rhetorical Schools as Preparation for the Courts Under the Early Empire* (Baltimore: Johns Hopkins Press, 1945) and S. F. Bonner, *Roman Declamation in the Late Republic and Early Empire* (University of California Press, 1949) take little interest in the philosophy or psychology of declamation or even in declamation outside of the schoolroom, preferring instead to consider declamation only as a tool for sharpening students' wit. Parks calls declamation, "merely...an exercise in mental gymnastics," defending the declamations against the charge of presenting the "moral jeopardy" of relativism (81); he never considers the idea talking through moral issues could serve as an ethical prophylactic, giving practice in considering all sides of a dilemma. Bonner, the fantasies of declamation serve as a "gilding of the pill," but he never asks whether the "pill" contains medicine for the soul, or simply "valuable practice in logical thinking, legal interpretation, and clear co-ordination of argument" (39).

² Suetonius, *De Grammaticis et Rhetoribus* 25, lists Cicero, Pompey, M. Antony, Augustus, and Nero as performers.

³ Cicero was known to declaim, although the name "declamation" came into use later; the Christian bishop Magnus Felix Ennodius, in the fifth century AD, gives us the last Latin declamations before the middle ages; for a brief history of the changes between them, see S.A.H. Kennell, *Magnus Felix Ennodius: A Gentleman of the Church* (University of Michigan Press, 2000), 72–79. The declamatory corpus consists in the main of Seneca the Elder's books of *Suasoriae* and *Controversiae* or *Sententiae, Divisiones, Colores* from the early first century AD, the pseudo-Quintilianic *Declamationes Minores* likely of the next generation in the first century, the fragments of Calpurnius Flaccus' *Declamationes* from perhaps the early second century, and the longer pseudo-Quintilianic *Declamationes Maiores* composed some time in or before the fourth century; Ennodius, as a Christian, rarely is considered with the other authors of the declamatory corpus. Rhetorical treatises, including the anonymous first century BC *Rhetorica ad Herennium*, Quintilian's *Institutio Oratoria*, and the minor Latin rhetoricians or *rhetores Latini minores* such as Sulpitius Victor, provide limited examples of *themata*.

a court case founded on a minimal set of assumed circumstances called the *thema*. In these *themata* characters, generally common relations like fathers and sons or neighbors, as well as stock characters like pirates and magi, perpetrate against one another grievous iniquities that motivate the moot trial. Among these characters appear several doctors, whose portrayal offers a view into not only how this genre understands medicine but also how it reflects on the practice of declamation as form of psychological therapy.

How *Controversiae* Work

Each case has a *thema* or set of circumstances explaining the background of the charges argued. These circumstances evolved out of broad, general philosophical questions, known by the Greek name *theses*, such as, “Is marriage a good thing?” These broad *theses*, when attached to specific conditions and characters, become *hypotheses*: “Should Cato marry a younger woman?” Framing the question as a legal case makes this *hypothesis* into a *thema* for a *controversia*: “An old man with a son loses his first wife; he marries a young woman; his son charges him with *dementia*.”⁴ The charge is a fiction: although Roman law provided for appointing a guardian to an incompetent, no action of *dementia* lay for circumstances such as these.⁵ The fiction of the charge allows the declaimer to argue from the son’s perspective against the father’s decision, that is, from a young man’s perspective against an old man regarding the question of whether an old man should marry a young woman. Likewise, a charge of *mala tractatio* (spousal abuse) would let the mother comment on a father’s decision,⁶ and a father who disapproves of his son may present a case for *abdicatio*, a sort of disowning or disinheritance.⁷ One may find a few realistic charges like *veneficium* (poisoning), which the Romans did have in their law codes, but *abdicatio* is the most common charge in the declamatory corpus. The declamations do not teach real legal

⁴ Likewise, one could set the questions as advice to a person or city: “The aged Cato deliberates whether to marry a young woman,” or, “The Senate deliberates whether to ban marriage.” This subset of hypothetical debate is called a *suasoria* and has its own rhetorical theory, allied to that of *controversiae* in the same way that deliberative rhetoric relates to forensic rhetoric. Where the *controversia* generally elicits a prosecution or defense, the simpler *suasoria* looks for a “yes” or “no” with reasons.

⁵ Quintilian, *Institutio Oratoria* 7.4.11 explicitly states that this “law” was a fiction. Cf. Bonner, *op. cit.*, 93–94; for the disconnect between legal practice and declamation in general, see John A. Crook, *Legal Advocacy in the Roman World* (Cornell University Press, 1995), 163–167. Note that *dementia*, a father’s mental decline into incompetence, stands distinct from *furor*, sudden insanity, as in the father’s violent insanity at pseudo-Quintilian, *Declamationes Minores* 256, or the son’s at 290.

⁶ Cf. Bonner, *Roman Declamation*, 94–95 and Bé Breij, “Pseudo-Quintilian’s Major Declamations 18 and 19: Two Figured *Controversiae*,” *Rhetorica* 24 (2006): 89–98. The charge receives something of a definition in pseudo-Quintilian *Declamationes Maiores* 18.5, which includes as grounds for complaint *orbitates ac liberorum suprema*, that is, when the father kills a child. The charge turns up again in the real-world *Liutprandi leges* 6.67 of the eighth century, but more narrowly defined as physical abuse or the failure to monetarily support the wife.

⁷ Cf. Bonner, *Roman Declamation*, 101–103.

substance or procedure, but rather how to consider ethical and epistemological questions from someone else's perspective. In the aforementioned example about marriage, the declaimer considers whether marriage is good, whether it is good for old men to marry young women, and so forth, all from the happy new husband's perspective (the defense) or that of his son (the prosecution), who may well resent his father's happiness with a woman other than his own mother.⁸

Many cases consist of ethical experiments of this sort, while others explore the epistemology of uncertain or conflicting evidence that seemingly supports either side of a case, although even here moral questions often inform the probability of guilt. In the matrimonial example, if the old man has a daughter with the stepmother, and the stepmother poisons her stepson, implicating her own daughter in the crime, is it more likely that the young girl conspired with her mother to eliminate a rival heir, or that the stepmother would sacrifice her daughter to cause the father more pain?⁹

These moral or epistemological quandaries would give any judge a nightmare, but *controversiae* never reach a decision. When a declaimer presents a case, no one pronounces judgment. The speaker only adopts a role and makes arguments according to *status* theory, a body of rules for anticipating an opponent's position.¹⁰ These rules guarantee that, even when preparing only one side of a case, declaimers engage in an internal dialectic that considers both sides of the question, through the perspective of an assumed persona, often quite alien to the speaker's own life experience.¹¹ If declamation is beginning to sound like a psychological therapy for fostering empathy and broadening perspectives, there are ancient sources to support that position.

⁸ Stepmothers are a frequent theme of *controversiae*, usually with all the (alleged) wickedness in their hearts that they bear in literature influenced by declamation. See Patricia A. Watson, *Ancient Stepmothers: Myth, Misogyny and Reality* (Brill, 1995), 92–105.

⁹ Cf. Seneca *Controversiae* 9.6; pseudo-Quintilian, *Declamationes Minores* 381.

¹⁰ Cf. Bonner, *Roman Declamation*, 11–16. For a detailed overview of Greek *status* or *stasis* theories, see D.A. Russell, *Greek Declamation* (Cambridge University Press 1983), 40–73.

¹¹ The question of the degree to which practicing declamation teaches the declaimer to engage others' perspectives has produced some criticism. W. Martin Bloomer, "Schooling in Persona: Imagination and Subordination in Rhetorical Education," *Classical Antiquity* 16 (1997) took the stand that "the whole process of learning to enact characters served as a technique for managing hegemonic identity for a class of speakers" (59). He conceded, however that "to a degree the student learns how others, specifically those denied the right to speak, might speak and feel in some period of crisis" (63). He sustains the position most recently in Bloomer, "Roman Declamation: The Elder Seneca and Quintilian," in *A Companion to Roman Rhetoric*, ed. William Dominik and Jon Hall (Blackwell, 2010), 306.

Declamation as Therapy

The story of declamation as therapy begins in the fifth century BC with Antiphon of Rhamnus,¹² who left us the first written orations, some considered real, others fictive; of the latter, we have three *Tetralogies* or sets of four legal speeches, in which the prosecution and the defense each speak twice about the same case. These *Tetralogies* are the ancestors of declamation.¹³

From the pseudo-Plutarchan *Vitae decem Oratorum* and the anonymous *Vita Antiphontis*, written centuries after the fact and not especially credible sources, we hear that Antiphon not only wrote the *Tetralogies*, but that he also wrote tragedies and invented an art of healing grief through interviewing and counseling patients. These sources disagree on the order of his *curriculum vitae*, but they agree on a general pattern: at some point, Antiphon set up a shop in Corinth, near the central marketplace; there he healed the distressed by speaking to them, by asking them about the causes of their distress, and by counseling them. He even advertised his services. Whether there is any truth to this, or to linking Antiphon the orator with the tragedian of the same name, is irrelevant: biographical traditions forge such anecdotes to make points bigger than names and dates, and here tradition binds in the figure of Antiphon three forms of speech. The same man who supposedly invented a forerunner of psychotherapy and wrote tragedies, known for bringing audiences a catharsis of pity and fear, also tackled rhetoric, which can do something similar to psychotherapy and tragic catharsis by talking through problems. His *Tetralogies*, in which the speaker argues the same point from two different perspectives, provide training in observing and engaging with multiple ethical perspectives on a single issue.

We see this idea of “therapy” most clearly in the late second and early first century BC Greek Academic philosopher Philo of Larissa,¹⁴ preserved in Joannes Stobaeus' fifth-century AD *Florilegium*, 2.7.2. Philo explicitly likens the philosopher to the doctor, in that each must use rhetoric to persuade the infirm first to accept his own *therapeia* (therapy) and then to defeat his opponents' arguments. Philo goes on to prescribe *theses* as a means of philosophizing through rhetoric, and Tobias

¹² For biographical information and works, see Michael Gargarin, *Antiphon: The Speeches* (Cambridge University Press, 1997), 3–9.

¹³ See especially Bonner, *Roman Declamation*, 12; Janet Fairweather, *Seneca the Elder* (Cambridge University Press, 1981), 110–115; Bloomer, "Roman Declamation," 300–301. Like the later declamations, the *Tetralogies* use a common, legal setting to reflect upon peculiar moral meditations and innovations; cf. Michael Gargarin, "The Prohibition of Just and Unjust Homicide in Antiphon's *Tetralogies*," *Greek, Roman, and Byzantine Studies* 19 (1978) and *Antiphon the Athenian: Oratory, Law, and Justice in the Age of the Sophists* (University of Texas Press, 2002).

¹⁴ For biographical information see Charles Brittain, *Philo of Larissa: The Last of the Academic Sceptics* (Oxford University Press, 2001), 38–72.

Reinhardt has shown that Philo taught Cicero this therapy.¹⁵ Reinhardt found it difficult to imagine Philo declaiming *controversiae*, but he notes evidence from Cicero for it. Evidence is also in Philo, who just after dealing with *theses* for the wise suggests that ordinary people, who work for a living and therefore have no leisure for wisdom, would benefit from hypothetical speech—that is, *controversiae*, evolving like shoots or branches from *theses*—philosophy for the common man.

So, if it were possible for all men to be wise, there would be no need for more kinds of questions: for they are the finely divided offshoots of the matters under discussion. But, since one must take into account ordinary people, some of whom happen to profit from rhetoric of encouragement—since they cannot have leisure for intricate discourses, due to lack of time or the necessity of working—one must add *hypothetical* speech, by which they will have advice in digest form for safety and right-dealing in every situation.¹⁶

Cicero uses the same metaphor of shoots or branches in *De Oratore* 3.109–110 when discussing how rhetoricians, in opposition to philosophers, who debate *controversiae* take a bit from civil law, but that Philo, a philosopher, is doing the same thing in the Academy. The word *surculus*, offshoot, is unusual for Cicero:¹⁷ he probably has in mind Philo's παραφυάδες. In the *Tusculanae Disputationes* 2.9, he also mentions Philo as debating both sides of an issue. Cicero himself does the same with *theses* in a letter to Atticus (9.4), where he argues both sides of several *theses* (such as whether one should stay in his homeland if it falls under a tyranny, a *thesis* bringing to mind Cicero's expected political situation, given that the civil war between Caesar and Pompey had recently broken out) to heal his own troubled mind (*ne me totum aegritudini dedam*). Cicero was an educated man at leisure, so *theses* were more fitting therapy than hypothetical speech, but Cicero and Philo both make clear that *hypotheses* had a similar effect to *theses*.

¹⁵ Tobias Reinhardt, "Rhetoric in the Fourth Academy," *The Classical Quarterly* 50 (2000): 531–547.

¹⁶ In Stobaeus, *Florilegium* 2.7.2.45–54: Εἰ μὲν οὖν ἐνεδὲ χετο πά ντας εἶναι σοφού ς, οὐκ ἂ ν εἶδε ἦσε πλειό νων ἔ τι το πων· οἱ γὰ ρ κατα λεπτο ν διαιρου μένοι παραφυά δες εἰσι τῶν προκειμε νων. ἐπει δὲ και τῶν με σως διακειμε νων ἀνθρω πων πρό νοιαν ποιητέ ον, ού ς τινας ἐκ τῶν παραινετικῶν λο γων ὠφελεῖσθαι συμβαῖ νει, μη δυναμε νους προσευκαιρεῖν τοῖς διεξοδικοῖς πλα τεσιν ἢ δια χρο νου στενοχωρι ας ἢ δια τινας ἀναγκαι ας ἀσχολι ας, ἐπεισενεκτε ον το ν ὑποθετικο ν λο γον, δι' οὗ τα ς προ ς τη ν ἀσφα λειαν και τη ν ὀρθο τητα τῆς ἐκά στου χρη σεως ὑποθη κας ἐν ἐπιτομαῖς ἐ ξουσιν.

¹⁷ The only other instance is *De Oratore* 2.278, where the term is literal in a horticultural context.

Doctors in Declamation

To turn now to the declamations themselves, this relationship between oratory, philosophy, and rhetoric is most visible in the case of the Orator, the Doctor, and the Philosopher.¹⁸ A man has three sons; in his last will and testament, he leaves all, or at least a larger share, of his legacy to whichever of the sons proves himself the most useful to the city. This sort of comparison between vocations (and thus between academic fields) was both a staple rhetorical exercise and a building block of larger pieces, but the three figures selected here stand out from the declamatory corpus because they are unusual. Philosophers are rare in *controversiae*; the only other example, also in the *Declamationes Minores*, is a son disowned by his father (an orator) for being, specifically, a Cynic.¹⁹ The more generic label of "philosopher" does not elsewhere occur. Orators are elsewhere in the *Declamationes Minores* called *diserti* instead; only Calpurnius Flaccus later in his declamations uses the word *orator*.²⁰ The comparison of these three professions, and the possibility of arguing all three sides, recalls Philo's intersection of rhetoric, philosophy, and medicine within an art of healing the mind through speeches just like this one. The three practitioners are brothers, and their arts are related. By taking on the role of the doctor and speaking eloquently to resolve the conflict of the three brothers, the orator (the declaimer) ironically shows that even defending the supremacy of medicine is an act of speech that cannot be disentangled from rhetoric, the practice of the declaimer.

Another common narrative, expressed in Seneca, *Controversiae* 6.7, pseudo-Quintilian, *Declamationes Minores* 291, and Calpurnius Flaccus, *Declamationes* 48, represents the declamatory version of an awkwardly romantic story told about Hellenistic doctors.²¹ We find the earliest extant version of the popular story in Valerius Maximus, *Dicta et Facta Memorabilia*, in an extract appended to 5.7; later most notably Plutarch, *Vita Demetrii* 38, and Lucian, *De Syria Dea* 17, tell this story in Greek. At the dawn of the third century BC, Antiochus, son of Seleucus I of

¹⁸ Quintilian, *Institutio Oratoria* 7.1.38; pseudo-Quintilian, *Declamationes Minores* 268. Cf. Sulpitius Victor, *Institutiones Oratoriae* 1, where Victor, in defining rhetoric, first has to differentiate the idea of "speaking well" to differentiate it from a doctor's comparable speaking ability: a doctor speaks well of medical matters, but a rhetorician of "lay questions," those that pertain to no one art but rather to the common opinion of all people.

¹⁹ Pseudo-Quintilian, *Declamationes Minores* 283.

²⁰ *Diserti* occur in pseudo-Quintilian, *Declamationes Minores* 283 and 333, and an *orator* in Calpurnius Flaccus, *Declamationes* 32.

²¹ Bonner, *Roman Declamation*, 37, attempting to show a Roman rather than Hellenistic background, draws an unconvincing parallel with Valerius Maximus, 5.9.1 instead, the case of Lucius Gellius, whose son was accused of committing sexual acts with his stepmother and planning parricide, presumably against Lucius Gellius himself. This parallel is much weaker than those of Erasistratus or Hippocrates.

Syria, fell gravely ill; Erasistratus, the famous cardiologist, knew straightaway the symptoms of love, and sat with his patient as the women and young men of the house entered the room one by one. The wise doctor kept his hand on that member of the patient's body that most clearly reveals a young man's hidden desires—namely the beating, human heart. When the patient's young stepmother, Stratonice, entered the room, Erasistratus knew from his patient's symptoms that Antiochus was wasting away with love for his stepmother; the father gives her to him. The story varies little between authors, except that Valerius Maximus hesitates as to whether the specialist was Erasistratus the doctor or Leptines the astrologer. Soranus, in the beginning of his *Life of Hippocrates*, attributes the cure instead to the great doctor himself and pushes the date back a century to the rule of Perdiccas II of Macedonia. Regardless, all versions praise the expertise of a lone doctor, an example worth celebrating: his skill cures the patient, and because of him the young and beautiful marry, and everyone lives happily ever after.

In the declamations, that happy picture darkens tragically. A team of nameless doctors has replaced the wise Erasistratus or Hippocrates, and their consultation only establishes the illness as psychosomatic without investigating the exact underlying cause of the illness. This leaves the father to uncover the psychological problem himself, with sword drawn. In the Senecan version the father, like Seleucus, hands over his new wife to the son, but his other son charges him with dementia, the fictive charge for objecting to a father's decision. In the later cases, the sick son gets his brother's wife instead, and he kills either her or both wife and brother together when he catches them renewing their formerly legitimate love. The father in these cases expresses his disapproval by disowning the once sick son. The case comes to trial: since the doctors constrained themselves to the physical ailment, the underlying psychological problems tore the family apart until the problem could only be solved before the authority of the law. Only here, where orators practice their art, can the family begin to cease from dysfunction: only through speech can the family's problems be resolved, because healing these patients requires more than healing the body.

Likewise common is the involvement of the doctor in a case of poisoning. Declamation drips with poison: anyone can administer it, even women and children, and its clandestine nature makes for an epistemological puzzle when two people with opportunity and motive accuse each other of the deed. Doctors, however, only become involved in cases of poison through their administration of an antidote. Their patients always die, which brings this kind of physician and his remedy into suspicion: are they failures or murderers?

Brothers quarrel²² and divide their common inheritance, and one makes his friend, a doctor, his own heir. The brothers patch things up. The one whose friend is a doctor begins to suspect that his brother has

²² Seneca, *Controversiae* 6 (excerpta) 7.

poisoned him; the doctor gives what he claims is an antidote, and the patient dies. Both men stand to gain property by convicting the other of poisoning, and both have opportunity to have committed the crime. Indeed, the surviving brother says, “No one is more easily poisoned than one who takes it as medicine”: the doctor merits suspicion precisely because he commands trust.

There is a twist, however: later versions²³ present not a doctor and a brother but two doctors, not accused of but indeed boasting of having administered poison—to a tyrant. The law punishes homicide but rewards tyrannicide, and these doctors compete for the prize. One, the tyrant’s personal physician, had come under his suspicion of administering poison and had denied it under torture. The tyrant called for a second opinion, which confirmed the poisoning; the new doctor administered a potion, supposedly an antidote. The tyrant dies, and the city rejoices, but who really gave the potion, the personal physician or the town doctor? The tyrant’s personal doctor speaks in what survives of Calpurnius Flaccus’ thirteenth declamation. He accuses the city doctor of failing at his art and then pretending to have killed the patient: “They pretend a will to do harm, after they lost the means to heal.” Moreover, he boasts of the murder and, from what fragments remain of the speech, seems to have given a description of his patient’s agony and his own under torture. Setting up the case as a tyrannicide allows Flaccus to paint in the darkest hues a psychological portrait of what we might fear most from doctors, both the incompetent who covers his failure and the competent who does harm intentionally.

Each of the three cases is an epistemological stalemate, one that arises because a doctor may be lying; it is up to the declaimer, the orator, to restore the truth. The antecedent cause of the stalemate lies in greed or failure, coupled with the other actor’s murderous impulse; but the proximate cause is mendacity: as Philo warned, the rhetorician’s duty, like the doctor’s, is to “remove the beliefs that come about falsely” and to add “things that are healthily true” to bring his client to healthy thinking. Practicing this declamation and developing new strategies for arguing each side offers the declaimer a therapy by training him to analyze competing truth claims; it does not give him the truth (the *thema*, after all, is itself fiction) but it does train him, like Philo’s physician and rhetorician, to demolish false beliefs and add his own healthy truth.

Three other cases deal in credibility, explored by juxtaposing consensus opinion of a body of doctors against individuals who contradict that consensus. In the three cases of the boy who grew lovesick for someone else’s wife, the panel of doctors rightly diagnosed a psychosomatic illness, and no one questioned their judgment. In the three cases of doctors accused or boasting of poisoning, individual doctors acting alone either failed to save or deliberately murdered patients. So, one may establish a baseline assumption that medicine as a generalization of

²³ Quintilian, *Institutio Oratoria* 7.2.25 and Calpurnius Flaccus, *Declamationes* 13.

healing arts bears credibility, but that individual practitioners have to fight for their own credibility. The following cases test that baseline.

First, the case of the Cold Water Given to the Son.²⁴ A man has a son and a new wife; the son falls ill; a number of doctors give a consensus opinion that the son will die if he drinks cold water. The stepmother, true to her stereotype, gives the boy cold water. As the doctors predicted, he died. The husband charges the wife with poisoning. At issue is the definition of poison: ordinary people do not consider water a poison, but does medical consensus in a specific case overrule common opinion? The father's case relies on the validity of this consensus, proven by the son's death. If the mother objects that she did not believe the doctors, the father has the *experimenta*, the experience and proof of the art to refute her.²⁵ If one doctor had disagreed and said that drinking water would merely harm the boy, the mother might have an excuse, but the unanimity of the opinion guarantees its validity.²⁶ The profession is vindicated, but the proof of its truthfulness is the patient's death at the stepmother's hands: there remains pain to be healed.

Next, the case of the Ailing Twins.²⁷ Twin infants grew ill, and all the doctors summoned to their aid, except one, gave up all hope of their survival. The dissenter promised a cure for one, if he could perform vivisection on the other. With the father's permission, he carried out the vivisection, killing one son to save the other. The mother sues for spousal abuse. She thinks that the doctors expressing despair either did not know of the cure or hid its monstrosity; either reason is a credit to their humanity.²⁸ She calls them liars as to the fact that one son at least could be saved, but she understands the lie as a noble one that would have lessened her pain. The father trusted in the false hope offered by the dissenting doctor, who admitted he did not know the cause of the illness but promised a cure at the cost of a terrible decision and the psychological consequences of having to live with that decision.²⁹ Of these doctors, the single dissenter healed one patient but killed another and harmed the entire family, bringing grief that requires oratorical intervention; following the majority opinion would have lessened the family's pain.

Finally, the case of the Stepson who was a Doctor.³⁰ A man disowns his son and takes a new wife. The son studies medicine, and the father grows ill. The medical consensus offers the father no hope for survival, but the son arrives, heals him and is reconciled to him. The stepmother in turn falls ill, and the doctors again offer no hope, but, this time, the son also refuses to take the case. The father sues to disown him again, and the son

²⁴ Pseudo-Quintilian, *Declamationes Minores* 350.

²⁵ Pseudo-Quintilian, *Declamationes Minores* 350.12.

²⁶ Pseudo-Quintilian, *Declamationes Minores* 350.11.

²⁷ Pseudo-Quintilian, *Declamationes Maiores* 8. Cf. Antonio Stramaglia, [*Quintiliano*] *I gemelli malati: Un caso di vivisezione* (Università degli Studi di Cassino, 1999), and especially 4–9 for background on ancient vivisection.

²⁸ Pseudo-Quintilian, *Declamationes Maiores* 8.3.

²⁹ Pseudo-Quintilian, *Declamationes Maiores* 8.4.

³⁰ Seneca, *Controversiae* 4(excerpta).3.

offers reasons why the court should not grant the suit—that is, excuses for not healing the stepmother. Chief among them is that the other doctors do not properly diagnose the illness: only the son realizes that it is psychosomatic, that the father suffered a broken heart from disowning his son, but the wicked stepmother suffers from seeing the family's reintegration. Whether he is more skilled at healing the mind as well as the body than the other doctors, or simply a liar and happy to watch his stepmother die, depends on which side of the case one argues. For his part, the son will note how his father sickened in his absence while his stepmother sickened upon his return, because each reacts to his presence in a manner opposite to the other; it didn't take a doctor to cure the father but rather a son's return and the reintegration of the family. He cannot heal the stepmother and fears that the father will hold him responsible for her death if he were to take her case but fail to heal her. Thus he speaks before the court, to heal the family and defend himself from the possibility of being forced into a charge of malpractice.

Conclusion

The case of the love-struck young man was primarily an ethical issue, that of the tyrannicide epistemological, and the complex cases pitting one person against the medical consensus involved both ethical issues of life and death and epistemological issues of individual and group authority. These are branches of philosophy crossed with offshoots of civil law and wrapped in an entertaining form to build empathy and an appreciation of multiple perspectives in any situation. These "cases" all emerge in the fictive "court" because the doctors involved did not satisfactorily handle the ethical issues involved. Where the doctor fails, the rhetorician must heal; where the doctor intentionally harms, the orator's duty is to restore the truth. It falls to the speaker, the rhetorician, to bring relief to his fictional characters and their city. In doing so, he has to contemplate epistemological and ethical questions and thus provide therapy for his real self, to orient him within the social norms of the real world by engaging difficult questions through perspectives outside his own experience: the ludic practice of declamation, pioneered by Antiphon, serves as an early form of psychotherapeutic role-play.

Appendix: Declamatory Themata with Physicians

Quintilian, *Institutio Oratoria* 7.1.38

Qui tris liberos habebat, oratorem philosophum medicum, testamento quattuor partes fecit et singulas singulis dedit, unam eius esse uoluit qui esset utilissimus ciuitati. Contendunt.

A man with three children, an orator, a philosopher, and a doctor, left his estate divided into four parts and gave one share to each, the fourth to go to whoever would be the most useful to the city. They compete.

Pseudo-Quintilian, *Declamationes Minores* 268: **Orator Medicus Philosophus (The Orator, the Doctor, and the Philosopher)**

Contendunt orator medicus philosophus de bonis patris, qui testamento eum heredem reliquerat qui se probasset amplius prodesse civibus.

An orator, a doctor, and a philosopher compete for their father's possessions; he had left them in his will to whoever might prove that he helped the citizens the most.

Seneca, *Controversiae* 6.7: **Demens qui Filio Cessit Uxorem (The Demented Man who Gave his Wife to his Son)**

Dementiae sit actio. Qui habebat duos filios, duxit uxorem. Alter ex adulescentibus cum aegrotaret et in ultimis esset, medici dixerunt animi vitium esse. Intravit ad filium stricto gladio pater; rogavit, ut indicaret sibi causam. Ait amari a se novercam. Cessit illi uxore sua pater. Ab altero accusatur dementiae.

Let dementia be actionable at law. A man who had two sons married a new wife. When one of the young men grew ill and was on the threshold of death, the doctors said that was a psychological problem. The father, with drawn sword, went to his son; he asked him to reveal the cause [of the illness]. [The son] said that he loved his stepmother. The father yielded his wife to him. He is accused of dementia by the other son.

Pseudo-Quintilian, *Declamationes Minores* 291: **Adulter Uxoribus Qua Cesserat Fratri (The Adulterer of his own Wife whom he had Given to his Brother)**

Qui duos filios habebat uni uxorem dedit. Altero aegrotante et dicentibus medicis animi esse languorem, intravit stricto gladio minatus se moriturum pater nisi causam indicasset. Confesso amari a se fratris uxorem, frater petente patre cessit. Ille in adulterio eam cum priore marito deprehensam occidit. Abdicatur.

A man who had two sons arranged for one to marry. When the other grew ill and the doctors said that he was suffering from depression, the father, with drawn sword, went to his son and threatened that he would kill himself unless he revealed the cause [of the illness]. When the son confessed that he loved his brother's wife, his brother, at the father's request, yielded [his wife to him]. When the other [the first brother] caught her in adultery with her previous husband [the second brother], he killed her. He is disowned.

Calpurnius Flaccus, *Declamationes* 48: *Adulter Uxoris* (The Adulterer of his own Wife)

Ex duobus filiis <pater> alteri uxorem dedit, alter incidit in adversam valetudinem. Medici dixerunt animi esse languorem. Quaerenti patri fratris uxorem se amare confessus est. Petit pater a filio, ut matrimonio cederet; impetravit. Inventos in adulterio postea fratrem et uxorem secundus maritus occidit. Abdicatur a patre.

A father arranged for one of his sons to marry, and the other grew ill. The doctors said that he was suffering from depression. When his father asked him about it, he confessed that he loved his brother's wife. The father asked his [other] son to yield his marriage [to the ill son]. The second husband later killed his wife and brother when he caught them in adultery. He is disowned.

Pseudo-Quintilian, *Declamationes Minores* 321: *Invicem Venefici Frater et Medicus* (The Brother and Doctor, Mutually Accused as Poisoners)

Fratres consortes inimici esse coeperunt. Diviserunt. Alter ex his medicum instituit heredem. Postea redierunt in gratiam. Is qui medicum amicum habebat, cum cenasset apud fratrem et domum redisset, dixit suspicari se venenum sibi datum. Respondit medicus potionem se daturum remedii, et dedit; qua epota ille decessit. Invicem se reos deferunt veneficii frater et medicus.

Brothers who jointly possessed property began to feud. They divided the property. One made a doctor his heir. Afterwards [the brothers] reconciled their differences. The one whose friend was a doctor had dinner at his brother's house and, after he returned home, said that he suspected that he had been poisoned. The doctor responded that he would give him a potion of remedy, and he gave it; the man drank it and died. The brother and doctor accuse each other of poisoning.

Quintilian, *Institutio Oratoria* 7.2.25

Tyrannus suspicatus a medico suo datum sibi venenum torsit eum, et cum is dedisse se pernegaret arcessit alterum medicum: ille datum ei venenum dixit sed se antidotum daturum, et dedit potionem ei, qua epota tyrannus decessit. De praemio duo medici contendunt.

When a tyrant suspected that he had been poisoned by his doctor, he tortured him; and when he [the doctor] continued to deny that he had administered any, [the tyrant] summoned another doctor: this one said that poison had been administered and that he would administer a remedy, and he gave him a potion; the tyrant drank it and died. The two doctors compete [in court] for the prize.

Calpurnius Flaccus, *Declamationes* 13: *Medicus Tyrannicida* (The Doctor who Slew a Tyrant)

Tyrannicidae praemium. Tyrannus suspicatus sibi venenum datum ab eo medico, quem in arce habebat, torsit eum; ille pernegavit. Misit ad medicum civitatis. Dixit datum illi ab illo venenum, sed se remedium daturum. Dedit poculum, quo exhausto statim perit tyrannus. Contendunt de praemio.

Let there be a reward for whoever slays a tyrant. When a tyrant suspected that he had been poisoned by the doctor whom he kept in his fortress, he tortured him; he [the doctor] denied it. He sent for the city doctor. He [the city doctor] said that he [the tyrant] had been poisoned by the other one, but that he would give administer a remedy. He gave him a cup; the tyrant drank it and immediately died. They compete [in court] for the prize.

Pseudo-Quintilian, *Declamationes Minores* 350: *Aqua Frigida Privigno Data* (The Cold Water Given to the Stepson)

Qui habebat filium, amissa matre eius, aliam uxorem duxit. Incidit in gravem valetudinem filius. Convocati sunt medici; dixerunt moriturum si aquam frigidam bibisset. Dedit illi noverca aquam frigidam. Perit iuvenis. Noverca accusatur a marito veneficii.

A man who had a son and lost his wife married another. The son fell gravely ill. Doctors were called; they said that [the son] would die if he drank cold water. The stepmother gave him cold water. The youth died. The husband accuses the stepmother of poisoning.

Pseudo-Quintilian, *Declamationes Maiores* 8: *Gemini Languentes* (The Ailing Twins)

Gemini, quibus erat mater et pater, aegrotare coeperunt. Consulti medici dixerunt eundem esse languorem. Desperantibus reliquis promisit unus se alterum sanaturum, si alterius vitalia inspexisset. Permittente patre executi infantem et vitalia inspexit. Sanato uno accusatur pater ab uxore malae tractationis.

Twins, who had a mother and a father, began to sicken. Doctors who were consulted said that both suffered from the same disease. While all the others gave up hope, one [doctor] promised that he would heal one [of the twins] if he inspected the other's vital organs. With the father's permission he cut open the infant and inspected his vital organs. Although the other twin was healed, the mother accused the father of spousal abuse.

Seneca, *Controversiae* 4.5: Privignus Medicus (The Stepson who was a Doctor)

Abdicavit quidam filium. Abdicatus medicinae studuit. Cum pater aegrotaret et medici negarent posse sanari, sanavit. Reductus est. Postea aegrotare noverca coepit; desperaverunt medici. Rogat pater filium, ut curet novercam. Nolentem abdicat. Contradicit.

A man disowned his son. The disowned son studied medicine. When his father grew ill and the doctors said that he could not be healed, [the son] healed him. He was brought back into the family. Later the stepmother began to grow ill; the doctors gave up all hope. The father asks the son to cure the stepmother. When he refuses, the father disowns him. The son speaks against this.

ARISTOPHANES, HIPPOCRATES AND SEX-CRAZED WOMEN

By

KONSTANTINOS KAPPARIS

(University of Florida)

Email: kapparis@ufl.edu

ABSTRACT: This article argues that medical literature corroborates the image of the Greek woman as sexual, lively and assertive, against the image of the Greek woman, as presented in the higher genres of Tragedy, Oratory and Philosophy, as a subdued and demure being, locked away in dark quarters in “oriental seclusion”. Typically such images of women in comedy have been interpreted as gender transgressions or inversions, as jokes intended to create laughter, and consequently as highly inaccurate images of Greek women, and as an unreliable guide towards understanding perceptions on female sexuality in the Ancient Greek World. Medical literature approaches issues of gender from a different angle. It is not devoid of gendered angles; on the contrary, medical literature reflects social stereotypes of gender and sexuality quite accurately. However, unlike the higher genres medical literature does not have moral objectives. Its purpose is not form the character of the patients but to safeguard their health, and character forming only comes in to the extent that it contributes to good health. In this respect medical literature preserves a view of life which is in some ways closer to real life and consequently highly valuable to the social historian who tries to understand gender stereotypes in the ancient world. Medical literature places emphasis on active female sexuality as a guide to good health, and in this respect enhances comedy’s view of the woman as a very sexual being.

One of the most powerful orthodoxies in 20th century scholarship is the essentially pessimistic view of Athenian women as demure, faceless creatures condemned to an uninteresting existence in the women’s quarters. This view of Greek women was consonant with male expectations of women in the first half of the 20th century, when classical scholarship for the first time took its first hesitant steps into the exploration of the social and cultural history of the ancient world.¹ In those earlier days the status and condition of Greek women was often compared with that of 20th century women in the Middle East, living in a state of “oriental seclusion”.² Scholars were searching through the sources for evidence confirming that women were living with high standards of respectability segregated from the undesirable company of strange men, and that the ancient world enforced a morality of silence, seclusion and respectable anonymity. The advent of feminism in the 1960’s paradoxically consolidated this view, as it was consonant with an image of the past where the female voice was silenced.³

¹ See Gomme 1937: 89-115 and also the surveys of earlier scholarship by Katz 1992: 70-97, Fleming 1986: 73-80 and Fantham 1986: 1-24.

² See particularly Katz 1992: 70-97.

³ See for example the important collection of articles by McClure and Lardinois (2001), and, on another note, the delightful poem by the modern Greek feminist poet Ioanna Zervou entitled *King Phallus*:

*I am she who does not speak but is spoken to
she who doesn't write but is written to
she who descends from the night of time mute.
My rage swells the rivers of rebellion
lowering my own cry killing the language*

In this scheme of things major areas of classical scholarship and women's history were sidelined or totally ignored, because they did not fit in with the theory of the obscure respectable figure. For example, the economics of segregation and respectability always assumed that women had the financial comfort and security to be able to stay away from public places and the prying eyes of strange men. However, the Sicilian expedition alone left thousands of widows, many of whom were not independently wealthy with small children and an entire household to provide for, and could not go back to their natal families simply because there was no close male relative left alive to care for them. Many of them did have to work, outside the house and talk to strange men and live in the real world, away from the protective shadows of the *gynaeconitis*. And the only study on women's work in the ancient world until the 1980's was a dissertation by Pieter Herfst, written in 1922,⁴ and even with a few localized contributions in recent years, a complete and systematic study of women's work in ancient Greece, in all its diversity and complexity, is still to be written.

The reason why we still do not have a single comprehensive study in this important area is not because there is not enough evidence. The plays of Aristophanes, Euboulos, Hermippos and almost every other comic poet are full of working women, and abundant references to women's labor can also be found in oratory, medical literature, philosophy and in every aspect of ancient life for which we have evidence.⁵ The reason why this critical chapter in the history of ancient women is so badly neglected is that it does not fit the stereotype, and in fact cancels so many firm assertions in modern classical scholarship about women, their seclusion, isolation, passive attitude to life, silence and exclusion from society. It would be difficult to sustain such assertions in the face of evidence suggesting that thousands of women had to earn a living in classical Athens.

A routine maneuver around this thorny issue has been to argue that the women mentioned in those situations were low class and not respectable, and this is precisely where part of the problem lies. Class and respectability are not the same. A married woman who sold wreaths to feed her children was low class but certainly respectable. Such problems, where modern theories are contradicted by substantial evidence, are certainly not limited to areas that have received little attention, but are manifested just as much in areas which have received more attention, like the representations of female sexuality, or one might say over-sexuality, in Comedy. There we have a similar dilemma. On the one hand the mighty stereotypes of the segregated, effaced and socially inadequate female are looming in the background, but on the other hand there is

*to reach to the root of my passion
to arm itself with the arrows of Sibyl.
Everywhere the king-Phallus
and where can I find my face I the Non-existent.*

⁴ Herfst 1922.

⁵ For example, a play of Euboulos is entitled *Wreathsellors*, and one of Hermippos is entitled *Breadsellors*, both recognizably feminine from the ending. Further evidence about women's work can be found in Aristophanes (*V* 238, 1388; *Lys.* 457-8, 497; *Ra.* 858), Plato (*Th.* 149a), the orators (e.g. *D.* 57. 44-45), and many other places.

an immense diversity, richness, and vivacity in the representations of Athenian women in Comedy, which arguably match better real life than the very schematic and idealized versions of more elevated genres. The wives of Athens in all three women plays of Aristophanes, *Lysistrata*, the *Thesmophoriazousai* and the *Ecclesiazousai*, are respectable, but at the same time highly sexual, lively, passionate, with a proclivity for drink and a fondness of lewd jokes.⁶ Far from the sheltered and isolated figures of high literature they have friends, they know their neighbors and other women of their town, which means that they also have a public life outside the protective walls of the inner oikos. This view of Athenian women is so vastly different from the orthodox view in 20th century literature that scholars had to interpret it as an exception, an aberration or an unrealistic convention specific to the genre of comedy, which does not accurately reflect Athenian life.

For Lauren Taafe the “feminine” in Aristophanes is an imaginative construct, and the Aristophanic woman is not real. John Gilbert, one of Taafe’s reviewers, points out that the bibliography most often quoted in support of her assumptions are 1980’s favorites like Michael Foucault, Froma Zeitlin and Helene Foley. This was the time when the stereotype of the silent, effaced and marginalized Greek woman was at its strongest.⁷ For Eva Stehle the Aristophanic woman is a male theatrical construct, which cannot speak for women, as female roles were played by male actors, and in the *Thesmophoriazousai* this feature is exploited as part of the plot.⁸ Judith Fletcher has argued that the women in *Lysistrata* are so far removed from their traditional role as child-bearers that once they take the oath they start acting like men. The implication of this would be that the pronounced sexuality of the Athenian female as we encounter it in *Lysistrata* is in fact a male attribute temporarily assumed by the women.⁹ Froma Zeitlin has discussed female characters on stage within the context of gender and genre transgressions.¹⁰ Michael Shaw sees a polarization between oikos and polis, and in his scheme of things when women act outside their traditional roles as mothers, wives or legal minors, they transgress into the world of men. Helene Foley accepts the concept of transgression from one sphere to the other, but sees it as a dialectic between the two spheres rather than a contrast.¹¹ In a similar spirit Gwendolyn Compton-Engle sees the changing of cloaks between men and women in the *Ecclesiazousai* as significant not only of a gender reversal but also a dialectic between the oikos and the polis.¹² Ralph Rosen considers feminine roles on the Attic stage as subordinate and employs the image of the obedient and subordinate female to interpret the chorus of the *Poleis* of Eupolis. Rachel Finnegan subscribes to the view of gender transgressions in the case of strong female characters on the comic stage, and further argues that the images of

⁶ For example: *Lys.* 1-145; *Th.* 298-602; *Ec.* 617-624.

⁷ Taafe 1994: 139; Gilbert 1995.

⁸ Stehle 2002: 369-406.

⁹ Fletcher 1999: 108-125.

¹⁰ Zeitlin 1981: 169-217.

¹¹ Shaw 1975: 255-266; Foley 1982: 1-21.

¹² Compton-Engle 2005: 163-176.

female sexuality in comedy are comic *topoi* with no bearing to reality.¹³ Jeffrey Henderson has suggested that female characters did not appear in Attic Comedies before the time of Pherecrates, and in fact *Lysistrata* may have been the first female protagonist. However, B.W. Millis has correctly answered that our evidence is too scant to allow us to draw safe conclusions about the early days of Old Comedy, and when women appear in Comedy there is nothing to suggest that their presence is out of the ordinary.¹⁴

This is only a small sample of a lengthy debate, surprisingly resting on a single assumption and never questioning it. This assumption states that philosophical works like the *Oeconomicus* of Xenophon, and rhetorical platitudes about respectability found in tragedy, philosophy and oratory are the true reflection of the lives of Athenian women, while comedy presents a stylized and essentially unrealistic image. This is a curious assumption in itself, given that very often comedy is funny precisely because it cuts through those social pretensions, and reaches to the core of the inconvenient truth which individuals and society had been trying to disguise. But if comedy can be suspect because of its nature, the more elevated genres like tragedy, philosophy and oratory come under suspicion just as much, because they serve certain agenda, sometimes a didactic purpose, sometimes a very schematic and one-sided presentation of morality, and sometimes a pretence that the world is not what it seems to be. The central question in this quest is whether we can find a genre which is, at least for the most part, devoid of the agenda of high literature and more straight-faced than comedy. It is the contention of this study that medical literature can handsomely fulfill this role and help us decide how seriously we can take the issues of female respectability, spatial segregation and sexual subordination. It can also help us decide whether comedy is subverting the rules of society and the roles of each gender, or simply reflects common, mainstream views, albeit presented through a distorting mirror in order to achieve its primary goal to induce laughter. Comedy, it appears, has an unexpected ally and defender in the relatively plentiful writings of the Greek physicians which have reached us.

The representation of women in the Hippocratic corpus has been the subject of several studies so far. Representative of the tone of these studies is Helen King's assertion that "Her virginity (sc. the Greek woman's) is both socially desirable and medically dangerous".¹⁵ This paradox is only created if one assumes that from a social point of view sexual abstinence is a desirable state for Greek women, as that assumption would be in direct conflict with the dominant view in Greek medical literature until the time of Soranos that virginity is neither desirable nor medically recommended for young girls who have started their menstrual cycles. But this assumption is far from safe, and it is my contention in this study that it is a modern creation on the basis of limited evidence. Studies analyzing the construction of the feminine in Hippocratic medicine, rely on the same 1980's favorites to reconstruct the social background of these works as studies regarding the construction of the feminine in Greek comedy, and as in the

¹³ Finnegan 1990: 100-106;

¹⁴ Millis 2001.

¹⁵ King 1998: 203; for the chapter on the Green Sickness see pp. 188-204.

case of comedy what modern scholarship argues and what the classical texts say do not match, equally in medical literature there is a conflict between the construction of feminine ideology, as concocted in 20th century studies, and the actual works of the Hippocratic corpus. The only difference is that in the case of medical literature it is considerably harder to explain the discrepancy as a result of “gender inversion” or “comic fantasy”.

What needs to be re-examined is neither the sources nor their interpretation, but the almighty stereotypes in the construction of the feminine in 20th century literature. This, of course, would be a vast topic which not even a hefty monograph would be able to discuss in sufficient detail; here I have no such ambitions. I narrowly focus on the issue of female sexual activity in comedy and medical literature and argue that both genres suggest a much more sexual image of the Greek woman that philosophy, oratory and to a certain extent tragedy would dare to admit. This image would not be consonant with the unrealistic ideal of Xenophon’s *Oeconomicus*, but it would be perfectly in line with the physicality, cult of beauty and the body, overt sexuality and unashamed sensuality of the period before embarrassment over one’s body became the norm and the rule in later antiquity. The highly sexual female of the Greek comedy and the Greek medical literature is not a caricature but a more realistic representation of the Greek woman than the unrealistic caricature of the wife of *Ischomachos*.

That ancient medical literature reflects contemporary social views has been noticed by previous scholars, most notably, Helen King, Lesley Dean-Jones and Ann Elis Hanson. Here it would be sufficient to offer a couple of brief examples. In the Hippocratic *Aphorisms* (5.42) we read:

Γυνὴ ἔγκυος, ἣν μὲν ἄρσεν κύη, εὐχροός ἐστίν· ἣν δὲ θῆλυ, δύσχροος.

A pregnant woman has a healthy color if she is going to give birth to a male, but an unhealthy color if she is going to give birth to a female.

In this case one can see patriarchal social attitudes coloring medical opinion. Giving birth to a female is socially undesirable, thus the unhealthy look. The actual wording, however is interesting; in Greek an adjective is used for male/female, and although a child is implied no noun is used at this point. One would think that the use of a noun like Παιδίον “child”, κοῦρος “son”, κόρη “daughter”, and so on, might change the dynamic.

Another statement from the *Aphorisms* (7.43) was as puzzling to Galen, as it is to us. The Hippocratic author thought that no woman can be ambidextrous (Γυνὴ ἀμφιδέξιος οὐ γίνεται). Galen did not understand this statement either, and he is guessing that it could be because of the weakness of the muscles in a woman’s hand, compared to a man’s. In reality probably the reasons for this perception were social: men were forced to develop ambidexterity more than women, and a good example would be the way a man would need both hands used in a specific way in the Greek phalanx formation. The left hand always held the shield and the right held the sword or spear. A left-handed man would need to learn very early in life to handle his sword with the same dexterity as a right-

handed man, if he wanted to live. A woman at home would be more at liberty to use whichever hand she felt more comfortable for her tasks and duties.

Skills and dexterities developed in social settings and roles were interpreted as biological facts. Much of the female biology, as viewed by the mostly male medical practitioners of the classical period, was a social construct based on attitudes affirming male dominance and superiority, and this is why it is important to take notice of those instances where medical literature does not seem to conform with the 1980's stereotypes. In those instances our perceptions of the stereotypes are misaligned, not the sources themselves.¹⁶

J.R. Pinault has noticed that Soranos contradicts 500 years of medical literature in order to explain that sexual abstinence was not harmful to the body. Pinault explains this as the result of changing attitudes towards sexuality in the 1st century AD. The message of abstinence, at least outside marriage, is becoming stronger, and Soranos is perfectly in tune with views which were gaining ground in his time, like those of the Jewish philosopher Philo, who wrote around the same time:

We the descendants of the Jews have excellent customs and laws. Everywhere else it is permitted after their 14th year of age to use with great insolence prostitutes and all kinds of lowly whores and women who earn a living with their bodies. Among us, however, it is not even permissible for a courtesan to be alive, but the death penalty has been established for a woman who practices prostitution. We do not go with any other woman before lawful intercourse, but pure we enter into marriage with pure virgins, because we prefer its purpose to be not pleasure but the sowing of legitimate children.¹⁷

Paola Manuli has interpreted the entire *Gynaecology* of Soranos as a eulogy of abstinence, but Ann Elis Hanson countered this argument by pointing out that so much in this work is about pregnancy and childbirth, and that Soranos does not consistently advocate abstinence.¹⁸ It is fair to conclude that the *Gynaecology* has been influenced by contemporary social views about sexuality, and serves as an important witness to the changing social attitudes about virginity and female sexuality, as it enshrines those attitudes into biological and medical explanations. As the pagan Greek world was coming to a close, and the ideologies which had fueled its energetic march through history were changing, so was medical science.

However, what is true for the 1st century and the transition into a more prudish and sexophobic era, must also be true for the preceding centuries. Until the time of Soranos, the view that sexual abstinence was harmful to the female body, and just as much the male body (retention of sperm), was one of the most universal and long lasting medical orthodoxies. This view is firmly established into medical doctrine in several Hippocratic studies, such as *Afflictions of Virgins*, *Nature of*

¹⁶ Add studies....

¹⁷ Philo *De Josepho* 43

¹⁸ Manuli 1980: 393-408; Hanson 1990: 309-38.

Woman, and elsewhere in the corpus.¹⁹ The author of *Afflictions of Virgins* observes:

Πρῶτον περὶ τῆς ἱερῆς νόσου καλεομένης, καὶ περὶ τῶν ἀποπλήκτων, καὶ περὶ τῶν δειμάτων, ὅκόσα φοβεῦνται οἱ ἄνθρωποι ἰσχυρῶς, ὥστε παραφρονέειν καὶ ὀρῆν δοκέειν δαίμονας τινὰς ἐφ' ἑωυτῶν δυσμενέας, ὅκοτε μὲν νυκτὸς, ὅκοτε δὲ ἡμέρης, ὅκοτε δὲ ἀμφοτέρησι τῆσιν ὥρησιν· ἔπειτα ἀπὸ τῆς τοιαύτης ὄψιος πολλοὶ ἤδη ἀπηγγονίσθησαν, πλέονες δὲ γυναῖκες ἢ ἄνδρες· ἀθυμοτέρη γὰρ καὶ ὀλιγωτέρη ἢ φύσις ἢ γυναικεῖη. Αἱ δὲ παρθένοι, ὅκόσησιν ὥρη γάμου, παρανδρούμεναι, τοῦτο μᾶλλον πάσχουσιν ἅμα τῇ καθόδῳ τῶν ἐπιμηνίων, πρότερον οὐ μάλα ταῦτα κακοπαθέουσαι·

First, regarding the so-called sacred disease and apoplexy and terrors, those afflictions of which people are so terrified that they lose their minds and they think that they see hostile demons going after them, some times during the night, sometimes during the day, and sometimes both. After such a vision many hang themselves, more women than men, because feminine nature is less brave and more timid. When it comes to virgins, those who are of a marriageable age but left without a man, suffer this affliction especially during menstruation, while they were not afflicted by this condition before.²⁰

The medical orthodoxy in Hippocratic medicine and subsequent centuries, all the way down to the time of Soranos, was that sex was necessary for a woman's good health, while virginity was harmful. Giulia Sissa has defined virginity in ancient Greek culture as a concept broader than the state before the breaking of the hymen, one that occasionally was sanctioned by some cultic significance, but otherwise undesirable and dangerous.²¹ Helen King while discussing a medical condition named *Chlorosis* (the Green Disease), which appears for the first time in Renaissance medical manuals and supposedly afflicted young girls, convincingly argues that it is derived from Hippocratic beliefs about virginity as a harmful state. King correctly traces the name of the disease back to a famous fragment of Sappho, where love is presented as a disease taking over the body, and making someone sweat and turn "green" or "pale" (*chlōros*).²² The cure for chlorosis, as with the Hippocratic condition which afflicted virgins, was marriage and regular sexual intercourse:

ὅκοτε δὲ ἄνευ φαντασμάτων, ἡδονὴ τις, ἀφ' ἧς ἐρᾷ τοῦ θανάτου ὥσπερ τινος ἀγαθοῦ. Φρονησάσης δὲ τῆς ἀνθρώπου, τῇ Ἀρτέμιδι αἱ γυναῖκες ἄλλα τε πολλὰ, ἀλλὰ δὴ καὶ τὰ πλουτελέστατα τῶν ἱματίων καθιεροῦσι τῶν γυναικείων, κελευόντων τῶν μάντεων, ἐξαπατεώμεναι. Ἡ δὲ τῆσδε ἀπαλλαγὴ, ὅκοταν τι μὴ

¹⁹ Hip. *Nat.Mul.* 3 (cf. *Superf.* 34); *Mul.* 127; *Virg.* 1.

²⁰ *Virg.* 1

²¹ Sissa 1990.

²² Sappho Fr. 31 and 130; King 1996: 372-387

ἐμποδίσει τοῦ αἵματος τὴν ἀπόρρυσιν. Κελεύω δ' ἔγωγε τὰς παρθένους, ὁκόταν τὸ τοιοῦτον πάσχωσιν, ὡς τάχιστα ξυνοικῆσαι ἀνδράσιν·

Sometimes, even without the hallucinations, there is a certain pleasure in thinking of death as if it were a good thing. If the woman goes back to her senses, the other women dedicate many other gifts, and especially very luxurious women's garments to Artemis, deceived by the advice of the soothsayers. But the real reason for the recovery is that there is no longer anything preventing the flow of the blood. My advice is that as soon as something like this afflicts virgins, they must immediately be given in marriage to a man.

The condition described here is probably Type I Bipolar Disorder with psychotic features. The author considers traditional recourse to religion a deception and provides a scientific explanation, instead. As with many other conditions which affected women the ready-made scientific explanation that retention of menstrual blood caused the affliction is routine.²³ The body is sick because there is too much blood trapped inside it, and the correct course of action was to release that blood. This would happen if the woman had intercourse, which would open the closed mouth of the womb. This is why the ancient physician suggests that the correct treatment of bipolar disorder is marriage.²⁴ Regular sexual intercourse afterwards would restore the woman's health as the menstrual blood could flow freely from the widened mouth of the womb, or be used to nurture the embryo during pregnancy.

The view that marriage and regular sex are necessary for a woman's well-being is also consonant with legal provisions regulating marriage. A family was expected to find a husband for a daughter from a very young age, as soon as she reached sufficient physical development to have sexual relations with a man. This happened around the age of 14, an age not very different from the age of consent in many modern countries.²⁵ More importantly, if no living male relative legally entitled to conduct a marriage contract with the future husband of the woman on her behalf was alive,²⁶ the automatic process of *epidikasia* (namely marriage through adjudication) was activated as soon as the woman reached the age of 14. The woman became an heiress (*epikleros*) and the nearest male relative of her father ought to marry her, or step aside in favor of the second nearest relative. The property of the family went with the woman to her new husband, who would

²³ Lesley Dean-Jones and Helen King have explained in sufficient detail this fundamental premise of Hippocratic Medicine.

²⁴ *Synoikein* is a term which applied to lawful marriage, not to simple cohabitation or sexual relations between a man and a woman.

²⁵ Modern legal systems set the age of consent usually around 16. Among different US states it fluctuates between 14 and 18, with 16 been the most common. A slightly lower age of consent is generally the rule among European countries: 14 is not uncommon (e.g. Italy, Estonia, Bulgaria, Albania), and in some places it is set even lower (e.g. 13 in Spain). 14 is also the age of consent in China. Throughout the world it fluctuates between 12 and 21 (online data: <http://www.avert.org/age-of-consent.htm>).

²⁶ A woman could be given in marriage through a standard contract by her father, brother or paternal grandfather.

be essentially the manager until children were born in the marriage, who inherited the property of their grandfather. As a result of this process a husband was always found for the woman. These arrangements may seem strange to the modern reader, but they were intended to ensure that every woman in Athens had a husband from a young age. Even if menstruation normally began at a later age, as some studies have argued, the family did not take the risk of keeping a young girl for too long without a husband. Sound medical advice from the period would certainly have told them to do so. Although the reasons behind these provisions are obviously socio-economic, medicine sanctioned tradition and provided a rationale and a further incentive why marriage at such a young age was very highly recommended.

Medical literature, comedy and the laws of Athens agree on this point, that women needed regular sex in order to keep their good physical and mental health and balance. The women of Aristophanes are respectable, and yet sex-crazed; this was their nature, and a man's penis was not just an instrument of pleasure, although it was unashamedly that too, but also a necessary accessory for a healthy life. The fear of overt sexuality, and the social rules of feminine respectability in the first half of the 20th century were responsible for the dismissal of the evidence from comedy as nothing more than a joke, a poetic transgression or a male fantasy. Overt sexuality, which seemed incompatible with the etiquette of civilized feminine behavior in the 20th century, was extended to the Greeks, despite good evidence that they did not have the same hung-ups and anxieties, and that it was not until later antiquity that sex was associated with moral degradation. In reality, the comic representation of the highly sexual woman is compatible with the provisions of Athenian law, which go to unusual lengths to ensure that no woman is left without a man, and also with contemporary medical views on the female body. In this respect comedy and medical literature probably preserve more authentic images of Greek women than the stylized literature from which 20th century scholarship drew to justify its own prejudices and insecurities.

Bibliography

- Compton-Engle, Gwendolyn Leigh. 2005. "Stolen cloaks in Aristophanes' « Ecclesiazusae »." *TAPhA* 135: 163-176.
- Dobrov, Gregory W. (ed.). 1997. *The City as Comedy: Society and Representation in Athenian Drama*. Chapel Hill: University of North Carolina Press.
- Fantham, E. 1986. "Women in antiquity: a selective (and subjective) survey 1979-84" *Echos du monde classique/Classical Views* 30: 1-24.
- Finnegan Rachel. 1990. "Women in Aristophanic comedy." *Platon* 42: 100-106
- 1995. *Women in Aristophanes*. Amsterdam: Adolf M. Hakkert.
- Fleming, Thomas. 1986. "Review: *Des Dames Du Temps Jadis*". *The Classical Journal*. 73-80.
- Fletcher, Judith. 1999. "Sacrificial bodies and the bodies of the text in Aristophanes' « Lysistrata »." *Ramus* 28: 108-125.
- Foley, H. P. (ed.). 1981. *Reflections of women in antiquity*. New York: Gordon & Breach Science Publishers.
- 1982. "The 'Female Intruder' Reconsidered: Women in Aristophanes' Lysistrata and Ecclesiazusae." *CP* 77: 1-21.
- Gilbert, John. 1995. Review of Taafe 1994. *BMCR* 95.05.07.
- Gomme, A.W. 1937 "The Position of Women in Athens in the Fifth and Fourth Centuries B.C.,". *Essays in Greek History and Literature*. Oxford: Blackwell. Pp. 89-115.
- Hanson, A. E. 1990. "The Medical Writers' Woman." In D. M. Halperin, J. J. Winkler, and F. I. Zeitlin (eds.), *Before Sexuality: The Construction of Erotic Experience in the Ancient Greek World*, Princeton, NJ: 309-38.
- Henderson, Jeffrey. 2000. "Pherekrates and the women of Old Comedy". In Harvey, D - Wilkins, J (eds). *The Rivals of Aristophanes. Studies in Athenian Old Comedy*. London: Duckworth and The Classical Press of Wales *The rivals of Aristophanes*: 135-150.
- Herfst, Pieter. 1922. *Le travail de la femme dans la Grèce ancienne*. Utrecht: Oosthoek.
- Katz, Marilyn. 1992. "Ideology and "The Status of Women" in Ancient Greece." *History and Theory* 31: 70-97.
- King, Helen. 1998. *Hippocrates' Woman: Reading the Female Body in Ancient Greece*. London: Routledge.
- 2004. *The Disease of Virgins: Green Sickness, Chlorosis and the Problems of Puberty*. London: Routledge.
- 1996. "Green sickness: Hippocrates, Galen and the origins of the 'disease of the virgins'" *International Journal of the Classical Tradition*, Vol. 2: pp. 372-387.
- Manuli, P. 1980. "Fisiologia e Patologia del Femminile negli Scritti Ippocratici dell' Antica Ginecologia Greca." In M. D. Grmek (ed.), *Hippocratica. Actes du Colloque hippocratique de Paris. September 4-9, 1978*, Paris: Editions du CNRS: 393-408.
- AGELESS ARTS: The Journal of the Southern Association for the History of Medicine and Science, Vol. 1 (2015) 155-170

- McClure, L – Lardinois, A. 2001. *Making Silence Speak: Women's Voices in Ancient Greek Literature & Society*. Princeton: Princeton University Press.
- Millis, B.W. 2001. Review of Harvey – Wilkins 2000. *BMCR* 2001.05.17.
- Pinault, Jody Rubin. 1992. “The medical case for virginity in the early second century C.E. : Soranus of Ephesus, Gynecology” 1.32. *Helios* 19: 123-139
- Rosen, Ralph M. 1997. “The gendered polis in Eupolis' « Cities ».” In Dobrov 1997: 149-176.
- Sissa Giulia. 1990. *Greek virginity* (Trsl. A. Goldhammer). Cambridge, Ms.: Harvard University Press.
- Stehle, Eva M. 2002. “The body and its representations in Aristophanes' « Thesmophoriazousai » : where does the costume end ?” *AJPh* 123: 369-406.
- Shaw, M. 1975. “The Female Intruder: Women in Fifth-Century Drama.” *CP* 70.4: 255-266.
- Sulprizio, Chiara. 2007. *Gender, space and warfare in the early plays of Aristophanes*. Ph.D. Thesis, University of Southern California.
- Taaffe, Lauren K. 1994. *Aristophanes and Women*. London and New York: Routledge.
- Zeitlin F. I. 1981. “Travesties of gender and genre in Aristophanes' Thesmophoriazousae. In Foley 1981: 169-217.

THE MAINTENANCE OF AGED PROPERTY: HEALTHCARE AND MEDICINE OF ELDERLY SLAVES IN THE ANTEBELLUM PERIOD

by

Savannah Williamson
(University of Houston)

ABSTRACT: The elderly, along with infants and children, often fell victim to illness and disease in larger numbers, due to the weakened immune systems that accompanied the aging process; a lifetime of illness and malnutrition made the aged increasingly susceptible to respiratory infections, fevers, and the long-term effects of venereal diseases. Within larger metropolitan areas, such as Charleston or Richmond, epidemics often struck the elderly and the infantile the hardest. Although many slaveholders provided elderly slaves with medical attention upon the onset of illness, it often fell upon the slave community to provide medical care to the elders of the slave community. Sometimes, healthcare was provided by slaves and to slaves, out of necessity. This was due to lack of care from the master; other times, slaves trusted their community members to care for them above white physicians. Additionally, in times of medical crisis, elders within the slave community served as healers, midwives, and nurses to slaves and whites alike. This paper will examine the relationship between the elderly slaves of the Old South and the medical practices of both African and European origins. The ultimate goal of medicine was always to preserve the life of an infirmed slave. This preservation was an informal display of power between slave and free. For slaves, medicine functioned as a form of power and resistance against slaveholders, as an expression of African heritage in the face of cultural repression.

An economic investment first and foremost, the job of a slave was to contribute to the commercial growth of the farm or plantation of his or her master throughout the course of a slave's lifetime. As a slave got older, his or her roles and jobs changed in order to accommodate their changing bodies and physical conditions. As slaves' bodies aged and weakened, he or she became economic and social liabilities; slaveholders could not profit as much from the work of elderly slaves. The primary reason for this is physical limitations brought on by the environment, working conditions and labor demands, illness, weakened joints and muscles, a lifetime of poor nutrition, or venereal diseases. While laws existed in the Old South to, supposedly, protect slaves in their old age, these laws also relieved slave owners of the responsibility or burden of caring for their aged slaves.

The elderly, along with infants and children, often fell victim to illness and disease in larger numbers, due to the weakened immune systems that accompanied the aging process; a lifetime of illness and malnutrition made the aged increasingly susceptible to respiratory infections, fevers, and the long-term effects of venereal diseases. Within larger metropolitan areas, such as New Orleans or Charleston, epidemics often struck the elderly and the infant the hardest. Although many slaveholders provided elderly slaves with medical attention upon the onset of illness, it often fell upon the slave community to provide medical care to

the elders of their community. Sometimes, healthcare was provided both by slaves and to slaves out of necessity, due to lack of care from the master. Other times, slaves trusted their own to care for them instead of white physicians. Additionally, in times of medical crisis, elders within the slave community served as healers, midwives, and nurses to slaves and whites alike. This article will examine the relationship between the elderly slaves of the Old South and the medical practices of both African and European origins.

The ultimate goal of medicine was always to preserve the life of an infirm slave. This preservation was an informal display of power between slave and free. For slaves, providing their own medical care functioned as a form of power and resistance against slaveholders, as an expression of African heritage in the face of cultural repression. For masters, medicine was a method of asserting dominance over slaves, preventing them from caring for themselves as independents. At times, masters held the power; other times, slave medicine mastered the masters. Ultimately, however, the treatment of aged slaves was a complicated effort to balance medicine and luck in order to preserve the life of both a valued member of the slave community and a valued member of a work force.

The process of aging is not a pretty one; muscles weaken, bones become brittle, joints are inflamed, and stamina fades. During the nineteenth century, however, age was not a legitimate excuse for retirement. Racism transcended ageism, regardless of one's ability to work. But how did slaveholders of the Old South define gerontology in slave communities? Some considered the elderly to be those over the age of fifty, some defined those of sixty years or older as elderly, and others believed that seventy was the mark of an elderly slave.¹ While moving out of the childbearing years brought the stigma of agedness for female slaves, it was after slaves reached the age of fifty that many owners believed that the work capacity and monetary value of slaves had declined to the point of having little or no value at all within the slave market.² Furthermore, gerontologists today tend to view old age as beginning somewhere between fifty and seventy years of age. For these reasons, this article will apply the terms aged or elderly to slaves fifty years and older.

Within the slave community, elderly slaves often took on the roles of healers, physicians, midwives, or nannies to care for sick slaves. Older male and female slaves cared for children while parents worked in the fields. Elderly female slaves, in particular, were known for their medical expertise. The aged wife of Old Sam, owned by Theodore Chapin of South Carolina, cared for her sick husband for three years through his paralytic convulsions. The Manigault Plantation community regarded their old nurse Bina as a woman of the highest medical skill because she administered medicine to any ailing plantation member. While most

¹ Floyd M. Wylie, "Attitudes Toward Aging and the Aged Among Black Americans: Some Historical Perspectives," *Aging and Human Development*, (1971), 68.

² Leslie Pollard, "Aging and Slavery: A Gerontological Perspective," *Journal of Negro History* (66, no. 3, Fall, 1979), 229.

remedies used by older female slaves were less aggressive than prescriptions from white doctors, some practices administered by midwives and granny healers were more harsh and dangerous than traditional herbal teas. One old Butler Island, Georgia midwife assisted women in childbirth by tying a cloth tightly around the throats of women in labor, drawing it taut until they were nearly strangled. This supposedly reduced the extreme pain and difficulty of childbirth.³ On a Virginia plantation, a two year old child named Molly was ill and in need of a nurse. Her master wrote to his overseer that the seventy-one year old grandfather, Payne, “ordered for to Cancer Plantation and live at Suckey’s house to have the care of both his grandchildren.”⁴ It is likely that increased exposure to children also exposed these older slaves to disease and contamination that led to their own eventual illnesses as their physical health deteriorated over time.

In addition to basic childcare, older male slaves functioned as plantation physicians, a traditional role of elders in Africa. While the plants and animals used for healing differed in the United States, aged men and women in slave communities learned to procure and concoct herbal remedies and treatments by word of mouth, passed from generation to generation. In this way, slave healers served as a link to African heritage, preserving culture and tradition within the secrecy of the slave quarters. The old slave Uncle Louis used butternut root, goldenseal (butternut flower), and onion tea in his homemade cure-all remedies. Slaves often preferred the medical attention of fellow slaves to white physicians, who were fond of bleeding and purging their patients. For example, South Carolina planter Henry Ravenal’s slave, Old March, treated the ills of slave families with proficiency and prowess that raised the curiosity and interest of even the visiting white physician on the Ravenal plantation.⁵ While typically a female occupation, older male slaves also served as midwives. Ex-slave Ferebe Rogers remembered that while female midwives were more prevalent, “there were men and women midwives” caring for pregnant slaves. As a result of their diminished physical abilities, old slaves had more time to practice medicine than younger slaves. Frederick Douglass’s Old Uncle Isaac Cooper was the doctor of medical and religious needs of the slaves on the plantation where

³ Rinald Killion and Charles Waller, eds. *Slavery Time When I Was Chillun Down on Master’s Plantation* (Savannah: Beehive Press, 1973), 115; Theodore Rosegarten, *Tombee: Portrait of a Cotton Planter* (New York: William Morrow and Company, Inc., 1986), 56; Martin W. Phillips and Franklin L. Riley, “Diary of a Mississippi Planter, January 1, 1840 to April, 1863,” in *Publications of the Mississippi Historical Society X* (1908): 465; Frances Kemble, *Journal of a Residence on a Georgian Plantation* ed., John A. Scott (New York: Alfred A. Knopf, 1961), 34, 251; George P. Rawick, ed., *The American Slave: A Composite Autobiography*, vol. 3, parts 3-4 (Westport, Conn.: Greenwood, 1972), 87; Rawick, *The American Slave*, vol. 7, part 2, 714, 722; Kemble, *Journal of a Residence on a Georgia Plantation*, 317.

⁴ Leslie Owens, *This Species of Property* (New York: Oxford University Press, 1976), 203.

⁵ Rawick, vol. 15, 222; George P. Rawick, ed. *The American Slave: A Composite Autobiography*, supplement series 2, vol. 1 (Westport, Conn.: Greenwood, 1979), 263; Norman R. Yetman, ed., *Voices from Slavery* (New York: Oxford University Press, 1970), 286.

he resided. Cooper's only duties were to "use Epsom salts and castor oil for diseases of the body."⁶ By serving as the plantation doctor, Cooper continued to uphold his value well into his older years.

The age of a slave was important in the evaluation of a slave's value in the marketplace and on the farm or plantation. As a slave advanced in age, his or her capacity for work decreased. An entrepreneurial buyer refused to purchase a slave whose age kept her from doing more work than the cost of her own upkeep. A master would likewise not buy a slave who was close to a particular age because his investment would have a shorter life expectancy. After a slave reached the age where the profits his work produced did not offset his upkeep, he became more and more a liability to the economic prosperity to his master. While an aged slave woman might be sold as a nanny or a nurse to a family with children, an old male slave might have found work in a market if he were skilled. But, as a general rule, the demand for slaves advanced in years was small and of little significance in a slave auction. The typical slaveholder preferred slaves in their twenties, who were in their physical prime and could labor hard to produce more profit, as well as more slaves. Elderly slaves, therefore, held less economic value to their owners than younger slaves and were, therefore, less desirable from a financial perspective. Elderly slaves held a valued place in the plantation community, but not in the wallets of their masters. As valued as elderly slaves were in the plantation community, the time eventually came when some elderly had to be taken care of by others.

While some slaveholders cared for their elderly slaves, seeing them as a profitable investment that should be cared for, many slave owners saw elderly slaves as a detriment to a farm or plantation because youths were more productive and, therefore, more profitable property. If an older slave was purchased while ill and died of his or her ailments, the buyer expected a full refund on his purchase. This was the case when an old slave woman in Virginia was bought in January 1856 with a guarantee of soundness, despite the fact that she had a cough. Twenty-one days later, she was sick in bed and attended regularly by a physician. On the first day of February, she died of pneumonia. Ford, the man who purchased her, demanded the \$1,050 he had paid for the woman, based on an argument that the slave was not sound in body. In a similar case, an elderly slave woman was sold, despite the fact that she had a bad cold at the time of her sale, under a warrantee of soundness. She died soon after of consumption (pulmonary tuberculosis). Old and ill slaves were, resultantly, a source of economic distress in the market and at home. However, the laws protecting old slaves, care given by younger slaves, manumission and trading slaves often resolved the issue of elderly care.

Slave owners could certainly expect costly medical expenses associated with elderly slaves, as fees charged for attending slaves were often significant. The Touro Infirmary in New Orleans, Louisiana charged

⁶ Yetman, ed., *Voices From Slavery*, 258; Frederick Douglass, *My Bondage, My Freedom* (New York: Arno Press and the New York Times, 1968), 71.

a master \$1.00 per day per slave that was treated. Meanwhile, Dr. James Boisseau of Virginia visited Old Isaac, a slave, on February 25, 1855, March 1, 3, 6, 8, 10, 12, and 14 of 1855. While Isaac's condition was unknown, each visit from the doctor cost Isaac's owner \$2.25. Residents of Natchez who sent their slaves to the local hospital could expect to pay \$3.00 per day per slave, and \$1.00 per day per servant. Dr. B.D. Knapp of Mississippi presented a bill for over \$75.00 for attending the aged slave Edgerton for three to four weeks. Meanwhile, Dr. J. J. Pugh, the family physician of W .P. Perkins of Madison County, Mississippi charged \$100.00 for attending the elderly slave woman, Lucinda. Because house calls from physicians were often so expensive, many slaveholders provided medical care themselves, without the aid of a doctor. However, elderly slaves did not get the same level of care from doctors that younger slaves received. Although larger plantations and regions maintained infirmaries or hospitals for sick slaves, Frances Kemble observed that these facilities were primarily built to address the medical needs of younger slaves rather than convalescing old slaves.⁷

While states in the Old South had laws requiring owners to provide health care for old slaves, these laws were not systematically enforced. These laws dealt particularly with manumitted slaves. Under the Code of 1806, "those slaves disabled on Louisiana plantations through old age, sickness, or any other cause, whether their diseases were incurable or not were to be fed and maintained by their owners." Georgia had a similar law to that of Louisiana. In 1815, the Georgia General Assembly enacted the Old Age Relief Act for slaves, which gave county courts the right to make inquiries in cases of neglect of old slaves by owners.⁸ One master revealed his displeasure with retaining old slaves, arguing that his "10 broken-down old men and women in the harvest of 1864 [w]as...poor business." Some masters sought to rid themselves of the expenses of caring for elderly slaves by manumitting them or turning them out. Cut off from their traditional quarters and steady food supply, these slaves often fell victim to starvation or the elements.⁹ It is unclear whether or not these laws

⁷ *Woodville Republican*, April 15, 1837; J.H. Ingram, *Southwest by a Yankee II* (New York: Harper and Brothers, 1835), 60; *Woodville Republican*, October 20, 1827; Charles S. Snyder, *Slavery in Mississippi* (Gloucester, Mass.: Peter Smith, 1965), 136; Weymouth T. Jordan, "Plantation Medicine in the Old South," *The Alabama Review* 3 (April 1950): 83-107; Katherine Bankole, *Slavery and Medicine: Enslavement and Medical Practices in Antebellum Louisiana* (New York: Garland Publishing, Inc., 1998), 92; Snyder, *Slavery in Mississippi*, 138; Inventory of the Estate of John W. Gilliam, Charlottesville: University of Virginia Library Manuscripts Department; Kemble, *Journal of Residence on a Georgian Plantation*, 202; J.S. Bassett, *The Southern Plantation Overseer as Revealed in his Letters* (Northampton, Mass.: 1925), 109, 115, 139, 141, 142, 168, 199, 200; *Natchez Mississippi Free Trader*, January 24, 1852.

⁸ Kemble, *Journal of Residence on a Georgian Plantation*, 254, 256, 287; Stacey K. Close, *Elderly Slaves of the Plantation South* (New York: Garland Publishing, Inc., 1997), 47.

⁹ Kenneth Stamp, ed., *A Guide to Records of Ante-Bellum Southern Plantations from the Revolution through the Civil War*, (Frederick, MD: University Publications of America, 1986), 1; John Blassingame, ed., *Slave Testimony* (Baton Rouge: Louisiana State University Press, 1977), 401; James Redpath, *The Roving Editor: Talks with Slaves in Southern States* (New York: A.B. Burdick Publishers, 1859), 147-8, 178-9.

existed solely to prevent neglect of the elderly enslaved population through manumission, out of a paternalistic concern with old and ill slaves, or to prevent the growth of an elderly, free black, impoverished class that would likely be a burden on Southern societies. In all likelihood, the answer is both.

One alternative to caring for elderly slaves or manumission was to get rid of them. While the selling of old slaves did occur, it was often difficult for slaveholders to do so because of the poor marketability of elderly slaves. For this reason, elderly slaves were oiled or greased before sale in order to make them look younger. Joe Brown, a former slave, explained how he and other slaves were oiled, washed, combed, shaved, and had their gray hairs plucked in a Georgia slave market for this purpose. Ex-slaves indicated that “the aged and the infirm slaves had no value at all” to slave traders.¹⁰ The assistance provided by the slave community, however, was more pertinent than that by the slave owner. Younger relatives often cared for older slaves in their quarters at night, providing them with food from their allowances and performing chores required of the aged. In many slave quarters, it was customary for the elderly to move in with their children after they became too feeble and old to work in the fields. For these reasons, care provided by fellow slaves was often of higher quality than care provided by slave owners or even professional physicians.¹¹

Throughout their daily lives, elderly slaves were more susceptible to illness than younger slaves. One fundamental cause of the susceptibility and compromised immune systems of elderly slaves was poor diet. A basic diet of salted pork, potatoes, and cornmeal meant that slaves spent their entire lives on an unfavorable dietary regiment. Excess fat and salted meats, rather than fresh fish or unsalted proteins, prevented slaves from consuming the proper amount of iron, and led to anemia and clotting disorders. The fruits and vegetables consumed by slaves depended on their location and on the generosity of their masters. Some slaveholders provided slaves with additional fruit and vegetables from gardens or allowed them to pick local trees. Alternately, older slaves may have tended gardens and could have taken extra produce for themselves or their families, with or without the permission of their owners. Slaves also lacked milk in their diet, possibly causing calcium deficiencies and bone diseases by the time they reached old age. Without a steady supply of fruits and vegetables, however, slaves could not obtain the proper levels of nutrients for strong bones, healthy growth, or a stable immune system. This caused

¹⁰ Joe Brown, *Slave Life in Georgia* ed., L.A. Chamerovzow (Freeport, New York: Books for Library Press, 1971), 112; George P. Rawick, ed., *The American Slave: The Georgia Narratives* vol. 3, suppl. Series 1 (Westport, Conn.: Greenwood Publishing Company, 1977), 69.

¹¹ Moses Grandy, *Narrative in the Life of Moses Grandy, Late a Slave in the United States of America* (Boston: Oliver Johnson, 1844), 57; Thomas L. Webber, *Deep Like Rivers* (New York: W.W. Norton Company, 1978), 174, 237; Arney R. Childs, ed., *Rice Planter and Sportsman: Recollections of J. Motte Alston 1821-1909* (Columbia: University of South Carolina Press, 1953), 55-6; *The Southwest: By a Yankee* (New York: Harper and Brothers, 1835), 241.

increased susceptibility to illness, weakened muscles and joints, organ damage, and a more compromised immune system among slaves, as they got older.¹²

Former slave Sam Boykin of Morehouse Parish, Louisiana recalled how the elderly enslaved often suffered physically as a result of cotton labor; lack of shoes while laboring all day in the frost put older slaves at greater risk for respiratory infections or frostbite, due to worsening circulation in the extremities as a result of aging.¹³ Skeletal evidence and oral testimony has indicated that aged slaves succumbed to physical trauma related to a lifetime of intense labor. Such injuries include hernias in the hands, elbows, and shoulder joints of men and women due to prolonged and heavy lifting.¹⁴ Lindy Joseph, an ex-slave of Baton Rouge, provided remedies for rheumatism that included tea made from warmed coal oil and salt, or applying hot ashes and salt that has been soaked in vinegar.¹⁵

Elderly Africans and African Americans were predisposed to respiratory infections, partially due to age, and partially to the presence of sickle-cell anemia in many slaves. Sickle cell anemia is an inherited disease in which irregularly shaped red blood cells slow or block blood flow. As a result, oxygen is not carried throughout the body in sufficient quantities, resulting in fatigue, pain, swelling in the extremities, or even a stroke. Presence of chronic leg ulcers among aged slaves also points to the presence of sickle cell in the Old South. The Touro Infirmary Record of slave deaths between 1855 and 1860 indicated that elderly slaves suffered most commonly from pneumonia and dropsy. Pneumonia, inflammation of the lungs, often results from increased exposure to the cold while lacking the ability to fight off infection. Slaves, who worked outdoors in all seasons and often lived in drafty, damp living quarters, were therefore more likely to contract respiratory diseases. The chances of contagion to the very old or very young increased in cramped living conditions. The most common nonfatal manifestation of exposure and respiratory or circulatory problems was frostbite. Rheumatic fever, an infection of the joints that affects mostly the elderly, causes damage to the heart. Meanwhile, dropsy, more commonly known as edema, is swelling that results from the buildup of fluid under the skin, due to heart failure or blood clots. Both of these diseases noted in the elderly at the Touro Infirmary could have been attributed to compromised heart and immune systems, common signs of old age, as well as potential exposure of the body to sickle cell anemia. Slaves between fifty and sixty years also showed signs of respiratory problems.¹⁶ A slave named Mother Duffy cured

¹² Savitt, *Medicine and Slavery*, 91-98.

¹³ John B. Cade, "Out of the Mouths of Ex-Slaves," *Journal of Negro History* (July 1935): 331;

¹⁴ Cade, "Out of the Mouths of Ex-Slaves," 313; Jennifer O. Kelley and J. Lawrence Angel, "Life Stresses of Slavery," *American Journal of Physical Anthropology* 74, No. 2 (1987): 199-211.

¹⁵ Ronnie W. Clayton, *Mother Wit: The Exslave Narratives of the Louisiana Writers Project* (New York: Peter Lang, 1990), 114-5.

¹⁶ Savitt, *Medicine and Slavery*, 33, 37-38, 54; Bankole, *Slavery and Medicine*, 86, 89.

pneumonia with “hog’s hoofs” tea, for which the additional ingredients are unknown.¹⁷

The aged population of slaves was also more likely to experience health complications as a result of prolonged exposure to venereal diseases. While elderly slaves were not the only group affected by sexually transmitted diseases, they were the group that often went the longest without diagnosis or treatment, compared to younger slaves or even whites. Syphilis and gonorrhea caused great discomfort to slaves who carried these diseases. Gonorrhea could lead to joint infections, inflammation or infection of the heart valves, abscesses around the genitals, and scarring of the urethra, leading to urinary tract infections. Meanwhile, long time carriers of syphilis could expect to experience sores, skin rashes, fever, swollen lymph nodes, headaches, muscle aches, fatigue, brain damage and loss of brain function, damage to the eyes, heart, liver, bones, joints, nerves, and blood vessels. Severe cases may also include difficulty coordinating muscle movements, paralysis, numbness, blindness, and dementia. Ultimately, the side effects of either of these diseases could cause death, particularly among elderly slaves who carried the disease for a prolonged period of time.¹⁸

Slaves often treated illnesses with herbal remedies and healing traditions that were passed down from generation to generation. Colds, fevers, chills, and bile were all cured in the slave quarters with “yarbs” made of boneset, blackroot (a substitute for calomel), hazel bark, and tar water. This concoction was also prescribed to treat sore throats. Soft soap, mixed with sugar, was used as a poultice for boils, in order to draw the infection to a head in order to drain the fluid. After a winter diet, slaves believed that the blood had to be thinned in order to restore full health and prevent spring diseases. This was particularly dangerous, as circulatory and clotting problems, including anemia, more often prevailed in aged slaves due to a lifetime of malnourishment. In order to thin the blood, slaves consumed mixtures of sulfur and molasses. Unbeknownst to healers of the Old South, sulfur causes circulatory problems, heart damage, compromised immune systems, liver and kidney damage, and respiratory distress when taken in large enough quantities. In effect, these preventative measures further compromised the health of elderly slaves.¹⁹

Conversely, slaveholders preferred to personally treat ill slaves rather than pay a trained physician to visit his infirmary. In addition to how-to guides of medical treatments and procedures, masters typically

¹⁷ Clayton, *Mother Wit*, 64.

¹⁸ Savitt, *Medicine and Slavery*, 77-80.

¹⁹ Peter McCandless, *Slavery, Disease, and Suffering in the Southern Lowcountry* (Cambridge: Cambridge University Press, 2011), 156; E.R. Jobe, “Social History of Ante-Bellum Mississippi” (PhD diss., University of Mississippi, 1930), 44-45; Phillips and Riley, eds., “Diary of a Mississippi Planter, January 1, 1840 to April, 1863,” in *Publications of the Mississippi Historical Society X* (1908): 342, 346; BG Ferris, Jr., et. al., “Effects of Sulfur Oxides and Respirable Particles on Human Health: Methodology and Demography of Populations in Study,” *The American Review of Respiratory Disease* 120.4 (1979): 676-79.

kept a medicine chest stocked with basic ingredients for cure all remedies and treating common ailments. These kits often included salts, calomel, castor oil, vermifuge (to expel worms), skin ointment, blister ointment, pain extractors, copper, sulfur, bluestone, turpentine, and whiskey. The elderly slaves Eliza and Nanny, whose exact ages remain unknown, both came down with the same unknown illness on a Mississippi plantation. Eliza's owner gave her an emetic for her fever. When Eliza developed chills the next day, with no break in her fever, her owner prescribed ipecac, rhubarb, and cream of tartar. He prescribed a younger slave ipecac, calomel, and opium for the same symptoms.²⁰

Planters exercised unusual care in time of epidemics. On some of the larger estates there was a separate hospital building. Slaves who were dangerously ill remained in the plantation hospital or in their cabins and were visited daily by the owner, overseer, or a slave nurse. As slaveholders feared a lack of cooperation from elderly slaves who preferred African herbal remedies and treatments from fellow slaves, prescribed medicine was taken under supervision in slave quarters and hospitals. In hospitals, nurses recognized that aged sick slaves needed supplements in their diets in order to help the slaves recover. On one plantation, the planter supplied the nurses with sugar, coffee, molasses, rice, flour, and tea for this purpose.²¹

In the 1780s, German traveler Johann Davis Schoepf coined one of the most frequently quoted descriptions of the Old South, when he wrote that it was "in the spring a paradise, in the summer a hell, and in the autumn a hospital." Schoepf's emphasis on the unhealthiness of the region was not unusual, because areas of the South, the lowcountry most often, were considered to be the least healthy places in the British North American colonies. The anonymous author of *American Husbandry* wrote that the excessive heat of the climate, along with wetlands, swamps, marshes, and rice and cotton fields produced a deadly miasma, whereby inhabitants inhaled the stink of the mud, sewers, and putrid flesh. It was malignant with fevers, hot most of the year, and mosquitoes made the nights barely tolerable. In the 1840s, wealthy planters fled to the large cities, such as Charleston, to avoid the "country fever [malaria]." When the malaria epidemics waned, masters traveled back to their plantations in the country. While wealthy white men could afford to pay their way to the cities for unknown periods of time, they rarely brought more than a few slaves with them.²²

²⁰ Sydnor, *Slavery in Mississippi*, 50; Phillips and Riley, *Diary of a Mississippi Planter*, 332, 334, 335, 359.

²¹ JH Ingram, *Southwest by a Yankee II*, 120-124; Susan Dabney Smedes, *Memorials of a Southern Planter* (Baltimore: Cushings & Bailey: 1887), 84; J.S. Bassett, *The Southern Plantation Overseer as Revealed in His Letters* (Northampton, Mass.: 1925), 90.

²² Johann Davis Schoepf, *Travels in the Confederation, 1783-1784* (New York: Burt Franklin, 1968), 172, 216-217; Harry J. Carman, ed., *American Husbandry* (Port Washington, NY: Kennikat Press, Inc., 1964; originally published in London, 1775), 264; George Lewis, *Impressions of America and the American Churches* (Edinburgh, 1845), 112, Ruffin quoted in Joseph I. Warring, *A History of Medicine in South Carolina, 1829-1900* (Charleston: Medical Society of South

The threat of fevers transformed the white elite into a migratory species. Each summer, they left their plantation homes for healthier locations, attempting to avoid disease from town to country, country to town, lowcountry to backcountry, and even the Old South to the North or Europe. Edmund Ruffin expressed it well in 1843: “The mansion houses of different plantations are numerous, and evidently the situations were beautiful in past time. But now almost every place is deserted as a residence and there is in all such places a melancholy appearance of abandonment and decay.” These planter elite returned to their homes only in the winter months, when the pattern of disease typically subsided. As a result, white mortality rates dropped after the late eighteenth century. Slaves and poor whites in the South did not have the financial option to move away. Meanwhile, thousands of slaves were exposed to country epidemics, far from professional medical care. For the slaves who were lucky enough to escape the country fevers, outbreaks of city diseases threatened their wellbeing. Dams that were created to flood rice fields held stagnant waters, the result of which was “corrosive vapours...evaporating and mixing with the air becoming prejudicial to health by cloaking the stomachs of the inhabitants with slime, and corrupt[ing] their blood.” That resulted in ubiquitous fevers that spread throughout the city. These epidemics took the greatest toll on children and the elderly of both white and black populations prior to the discovery and acceptance of the germ theory later in the nineteenth century. Tragically, the slaves affected by cholera, tuberculosis, or smallpox did not receive the same medical privileges as whites, lessening their chances of survival.²³

Malaria affected elderly slaves along the East coast most severely. This disease was known by many names: ague, ague and fever, intermittent fever, remittent fever, bilious fever, nervous fever, and country fever. However, malaria provoked less conversation than smallpox

Carolina, 1967), 26; John G.W. De Brahm, *Report of the General Survey in the Southern District of North America* ed. Louis De Vorse, Jr. Columbia: University of South Carolina Press, 1971), 79; Charles Joyner, *Down by the Riverside: A South Carolina Slave Community* (Urbana: University of Illinois Press, 1984), 9-40.

²³ Chapman J. Millings, ed., *Colonial South Carolina: Two Contemporary Descriptions by Governor James Glen and Dr. George Milligen-Johnston* (Columbia: University of South Carolina Press, 1951), 44-45; Frederick Law Olmstead, *A Journey in the Seaboard Slave States* (New York, 1856), 419; Jill Dubisch, “Low Country Fevers: Cultural Adaptations to Malaria in Antebellum South Carolina,” *Social Science Medicine* 21 (1985), 641, 645; Lawrence F. Brewster, *Summer Migrations and Resorts of South Carolina Low-Country Planters* (Durham, NC: Duke University Press, 1947); Frederick Dalcho, *An Historical Account of the Protestant Episcopal Church in South Carolina* (Charleston: E. Thayer, 1820), 263; Samuel Henry Dickinson, “Account of the Epidemic which Prevailed in Charleston, S.C. during the Summer of 1827,” *The American Journal of the Medical Sciences* 2 (1828), 3; Edmund Ruffin, *Agriculture, Geology, and Society in Antebellum South Carolina: The Private Diary of Edmund Ruffin, 1843*, ed. By William M. Matthew (Athens: The University of Georgia Press, 1992), 92; Benjamin West, *Life in the South, 1778-1779: Letters of Benjamin West*, ed. James S. Schoff (Ann Arbor, MI: The William Clements Library, 1963), 2; Carman, *American Husbandry*, 276-277; J.F.D. Smyth, *A Tour of the United States of America*, 2 vols. (London, 1784), 2: 53-54; Newton D. Mereness, ed., *Travels in the American Colonies* (New York, 1916), 399.

or yellow fever, despite the fact that its mortality and morbidity were greater than either. This is probably because malaria is a parasitic disease native to Africa and, presumably, healthy, younger slaves had genetic immunities to the disease. The elderly, on the other hand, were less likely to have immune systems strong enough to fight off the malarial parasite. Furthermore, while yellow fever and smallpox were often short-lived epidemics, malaria lasted throughout most of the eighteenth and nineteenth centuries, particularly in the low country. It did not completely disappear from Charleston until the 1950s. The most common symptoms of malaria included fever, chills, and aches. The fevers were traditionally intermittent. In several cases among aged slaves, malaria produced vomiting, severe migraine headaches, anemia, convulsions, rashes, hemorrhages, hypoglycemia, liver dysfunction, swelling of the spleen, kidney failure, and excess fluid in the lungs. Due to compromised immunities and predisposition for many of these symptoms, malaria was particularly dangerous among aged slaves.²⁴

While malarial infections generally began in the early summer and autumn to early winter, cases contracted in the fall often lingered into the winter, weakening resistance to respiratory disorders. Relapses occurred in the spring when the seasons changed and storms spread pathogens in the air. Depending on the type, the effects of malaria could last months or years. Due to the fact that mosquitoes remain abundant in the South during summer and autumn months, exposure to malaria was unavoidable. This was particularly true for slaves, who labored outside and lived in quarters with little or no protection from insects. One report from the *Tabulated Mortuary Record of the City of Savannah, From January 1, 1854 to December 31, 1869* suggests that malaria was more widespread in harsh conditions, as nearly one third of all African American deaths in Savannah, Georgia during 1865 were attributed to malaria. Furthermore, low country and coastal slaves were at greater risk of contracting malaria due to the large bodies of swampy, stagnant waters and harsh climates associated with sugar and rice cultivation.²⁵

Like malaria, the presence of yellow fever in the Old South was due to the warm, humid climate. Yellow fever epidemics, like the one in Savannah in the 1850s, could trigger a mass exodus from cities because,

²⁴ Lionel Chalmers, *An Account of Weather and Diseases of South Carolina* 2 vols. (London: Edward and Charles Dilly, 1776) I: 178-179, 2: 6-7, 62-63; Margaret Humphreys, *Malaria: Poverty, Race, and Public Health in the United States* (Baltimore: Johns Hopkins University Press, 2001), 26-28; Leonard Jan Bruce-Chwatt, *Essential Malariology*, 2d edition (New York: John Wiley and Sons, 1985), 38, 62-65; Herbert M. Giles and David A. Warell, *Bruce-Chwatt's Essential Malariology* 3d edition (New York: Oxford University Press, 1993), 36-49; Randall M. Packard, *The Making of a Tropical Disease: A Short History of Malaria* (Baltimore: Johns Hopkins University Press, 2007).

²⁵ Humphreys, *Malaria*, 26-28; Asa C. Chandler, *Introduction to Parasitology with Special Referenc to the Parasites of Men* (9th ed., New York, 1955) 201; W. Duncan, "Tabulated Mortuary Record of the City of Savannah: From January 1, 1854, to December 31, 1869. Comp. from the Mortuary Reports on File in the Mayor's Office," *Savannah Morning News Steam-Power Press* (1870).

unlike malaria or smallpox, yellow fever was an urban disease. From the 1730s and into the nineteenth century, people identified yellow fever by a multitude of names, including: malignant fever, pestilential fever, putrid bilious fever, Sam distemper, black vomit, or simply plague, pestilence, or sickness. Into the nineteenth century, people began to call it “a yellow fever.”²⁶ Also like malaria, mosquitoes transmit yellow fever and epidemics begin in the warm summer months and end with the onset of cold weather, October to December. The method of transmission of yellow fever, however, was not known until the mid-nineteenth century. Yellow fever was largely confined to urban areas because it is spread by *Aedes aegypti*, a domestic mosquito that is well adapted to densely populated cities, preferring to lay its eggs on manmade structures such as barrels, pots jugs, and cisterns. In other words, it flourishes in the places where people collect rainwater. Along the coasts, where the ground water is brackish, rainwater was the only alternate source of drinking water. Yellow fever also spread in ports and down rivers, where barrels of drinking water traveled with trade ships. It was largely along these rivers, when slaves were being transported for sale, that they were exposed to and infected with yellow fever. The youngest and oldest were, again, the most susceptible.²⁷

“Yellow fever” derives from the most identifiable symptom of the disease: jaundice caused by the virus’s attack on the liver. Other symptoms include high fevers, vomiting, exhaustion, convulsions, delirium, severe body aches, and internal and external bleeding. Severely ill patients vomited dried blood, which had the appearance of coffee grounds, giving it the name “the black vomit.” Mortality in Charleston slaves was as high as eighty percent after the yellow fever epidemic of 1819, with an average overall mortality rate of fifty percent. Mortality among slaves was, however, difficult to report in exact numbers, because many cases were not reported or causes of death often remained unknown. Additionally, yellow fever could have easily been mistaken for malaria, dengue, hepatitis and other liver diseases, relapsing fever, spirochetal diseases (diseases from parasites such as ticks), typhus, typhoid, and scurvy.²⁸

Thanks to recurring outbreaks of smallpox in the South, by the time the first cholera epidemic struck Virginia in 1832 residents had already established procedures for handling contagious diseases. Unfortunately, methods of isolation had no effect on the outbreak of cholera. Nor were there effective health measures, such as vaccination, street and house

²⁶ Kenneth Kiple, ed., *The Cambridge World History of Human Disease* (Cambridge: Cambridge University Press, 1993), 1100-1103; Henry Rose Carter, *Yellow Fever: An Epidemiological and Historical Study of Its Place of Origin* (Baltimore: The Williams and Wilkins Co.: 1931), 197-.

²⁷ Dickinson, “Account of the Epidemic which Prevailed in Charleston, S.C. During the Summer of 1827,” 2:2; John Robert McNeill, *Mosquito Empires: Ecology and War in the Greater Caribbean, 1620-1914* (Cambridge: Cambridge University Press, 2010), 59.

²⁸ Margaret Humphreys, *Yellow Fever and the South* (Baltimore: Johns Hopkins University Press, 1992); John B. Blake, “Yellow Fever in Eighteenth Century America,” *Bulletin of the New York Academy of Medicine*, XLIV (1968): 673-686; McCandless, *Slavery, Disease, and Suffering*, 65-66.

cleaning, or stagnant pond drainage that could reduce its contagion. In the three major outbreaks prior to the Civil War, free blacks and slaves were affected the most. This is probably because urban slaves usually lived in the lowest parts of town, near rivers or streams, which served as both a source of portable water and as depositories of fecal matter. Additionally, a life of poverty and intense labor brought with it unsanitary living conditions, poor nutrition, and diminished resistance to disease. Todd Savitt, a medical historian of the South, argued additionally that intemperance in slaves, particularly over the span of a lifetime, further reduced the possibilities of good health. Although, it should be noted that it is impossible to determine how much alcohol slaves consumed on average in comparison to other lower class members of society or to what extent alcohol compromised their immune systems. After two outbreaks occurred around the James River in the 1850s, Virginia slaveholders and city council members concluded from costly experience that clean water was much safer than well, spring, river, or even bayou water in the middle of a cholera epidemic. In 1866, an outbreak of cholera in Savannah killed ninety-two whites and 228 blacks. Most physicians were unaware of how cholera spread, much less of how to stop its spread, and a majority of white southerners believed that cholera affected blacks in much greater numbers due to their supposed cramped living conditions and lack of sanitation experienced by slaves. Clinging to miasmatic theory, slaveholders claimed that clean air, a luxury of upper class white members of society, was the key to avoiding the cholera epidemics, despite the fact that cholera did not pass over whites by any means. This moral argument of cleanliness and purity provided an additional justification of the racial hierarchy that surrounded the system of southern slavery.²⁹

The toll taken by malnutrition, fevers, and severe epidemics was written on the bodies of slaves. A lifetime of poor diet and intense working conditions weakened slaves' resistance to diseases. Aged slaves who died of respiratory diseases and infections in the winter months probably had their immune systems weakened by malaria and dysentery, as well as by overwork and malnutrition.³⁰ Lionel Chalmers, a South Carolinian physician, noticed that enslaved populations, in particular, aged prematurely because of their constant battles with sickness: "Few live above sixty years; and the bald or hoary and wrinkled appearances of old age, often shew themselves at the age of thirty years." The bodies of aged slaves were marked with prolonged swelling and hardening of the spleen and obstruction of the liver, both common side effects of a prolonged period of malnutrition, as well as fevers and diseases such as malaria. Newcomers to the South often commented on the pale, sallow, or tawny

²⁹ Savitt, *Medicine and Slavery*, 226-234; William Dunbar Jenkins, "The Cholera in 1849," in *Publications of the Mississippi Historical Society VII* (1903): 277; Duncan, "Tabulated Mortuary Record," 1870.

³⁰ Elizabeth Donnan, ed., *Documents Illustrative of the Slave Trade to America* 4 vols. (Washington, D.C.: Carnegie Institute of Washington, 1930-1935), 4: 343.

skin and prematurely aged constitutions of slaves.³¹ If an elderly slave had a preexisting condition that affected the liver, lungs, or heart, the conditions were aggravated by exposure to these epidemics, meaning that it is unclear whether they died from malaria, yellow fever, or a preexisting medical condition.

Elderly slaves in the Old South suffered physically from more illness and epidemics than either younger slaves or whites. The cause of increased susceptibility to disease among the aged slave population was, fundamentally, insufficient diet. Malnutrition, in addition to a lifetime of vigorous labor and exposure to the elements, put superannuated slaves at greater risk of contracting respiratory infections, heart disease, malaria, yellow fever, cholera, rheumatism, and clotting problems. Furthermore, prolonged exposure to venereal diseases, which often went untreated, created additional health problems for elderly slaves, even aggravating preexisting medical conditions. All of these health risks, in addition to the diminished ability of the elderly to work due to basic health issues that accompanied old age, were an economic liability to slaveholders.

In order to obtain some benefit from keeping older slaves around, slaveholders often used them as healers, midwives, or nannies on the farm, plantation, business or home. However, the time came when slaves were no longer able to pull their own weight, due to illness or simply old age. It was at this time when slaveholders had to choose whether or not to invest the time and money to treat a slave's condition. While professionally trained physicians were more common in the Old South to treat slaves, the cost of treatment was often expensive and did not guarantee that a slave would return in better health, or return at all. In an attempt to save money caring for their older slaves, many slaveholders treated the sick themselves, with amateur medical kits and how-to guides for performing medical procedures. If a slaveholder did not want to spend his time or money treating a slave whom he believed had passed his or her expiration date, he would often forego treatment. Under these circumstances, younger members of the slave community stepped in to care for the older members of their community, using traditional African remedies and cures, rather than treatments preferred by white physicians and masters. In this way, medicine became a display of power by the slaves: sometimes, the master and white physicians controlled treatments; other times, slaves used their own traditions of healing to care for the sick and aged members of their community, preserving their own heritage and usurping the authority of the master over the medical care of a slave. In times of epidemics, however, there was often nothing that either master or slave could do to save the aged enslaved population. Ultimately, the medical treatment of elderly slaves in the Old South was filled with uncertainties. Whether or not a slave survived depended, more than anything, on how many cards in the deck were stacked against him.

³¹ Chalmers, *An Account of the Weather and Diseases of South-Carolina* (London: printed for Edward and Charles Dilly, 1776), I: 38, 2: 21-22.

Works Cited

Primary Sources

Inventory of the Estate of John W. Gilliam. Charlottesville: University of Virginia Library Manuscripts Department; Kemble, *Journal of Residence on a Georgian Plantation*: 202.

Natchez Mississippi Free Trader, January 24, 1852.

Woodville Republican. April 15, 1837.

Woodville Republican. October 20, 1827.

Alston, Jacob Motte, and Arney Robinson Childs. *Rice Planter and Sportsman: The Recollections of J. Motte Alston, 1821-1909*. Columbia: University of South Carolina Press, 1953.

Andrews, William L., and David A. Davis. *North Carolina Slave Narratives: The Lives of Moses Roper, Lunsford Lane, Moses Grandy & Thomas H. Jones*. Chapel Hill: University of North Carolina Press, 2003.

Bassett, John Spencer, and James K. Polk. *The Southern Plantation Overseer as Revealed in His Letters*. New York: Negro University Press, 1965.

Blassingame, John W., ed. *Slave Testimony: Two Centuries of Letters, Speeches, Interviews, and Autobiographies*. Baton Rouge: Louisiana State University Press, 1977.

Black, John Ballard, and Medicine New York Academy of. *Yellow Fever in Eighteenth Century America* [in English]. New York: New York Academy of Medicine, 1968.

Brown, John. *Slave Life in Georgia: A Narrative of the Life, Sufferings, and Escape of John Brown, a Fugitive Slave*. ed. C.A. Chamerovzon. Freeport, NY: Books for Library Press, 1971.

Cade, John B. "Out of the Mouths of Ex-Slaves." [In English]. *Journal of Negro History* 20, no. 3 (1935): 294-337.

Carman, Harry James, Arthur Young, and John Mitchell, ed. *American Husbandry*. Port Washington, N. Y: Kennikat Press, 1964.

Chalmers, Lionel. *An Account of the Weather and Diseases of South-Carolina*. London: Printed for Edward and Charles Dilly, 1776.

Childs, Arney R., ed. *Rice Planter and Sportsman: Recollections of J. Motte Alston 1821-1909*. Columbia: University of South Carolina Press, 1953.

- Clayton, Ronnie W. *Mother Wit: The Exslave Narratives of the Louisiana Writers Project*. New York: Peter Lang, 1990.
- Dalcho, Frederick. *An Historical Account of the Protestant Episcopal Church in South Carolina*. Charleston: E. Thayer, 1820.
- De Brahm, John Gerar William. *Report of the General Survey in the Southern District of North America*. ed. Louis De Vorsey, Jr. Columbia: University of South Carolina Press, 1971.
- Dickson, Samuel Henry. *Account of the Epidemic Which Prevailed in Charleston, S.C., During the Summer of 1827. The American Journal of the Medical Sciences 2* (1828).
- Donnan, Elizabeth. *Documents Illustrative of the History of the Slave Trade to America., V.1-4*. Washington, D.C.: Carnegie Institute of Washington, 1930-1935.
- Douglass, Frederick. *My Bondage and My Freedom*. Amherst, N.Y: Arno Press, 1968.
- Duncan, W. "Tabulated Mortuary Record of the City of Savannah: From January 1, 1854, to December 31, 1869. Comp. from the Mortuary Reports on File in the Mayor's Office." *Savannah Morning News Steam-Power Press*, 1870.
- Grandy, Moses. *Narrative in the Life of Moses Grandy, Late a Slave in the United States of America*. Boston: Oliver Johnson, 1844.
- Ingraham, J. H. *The Southeast by a Yankee I & II*. New York: Harper and Brothers, 1835.
- Kemble, Fanny. *Journal of a Residence on a Georgian Plantation in 1838-1839*. ed. John A. Scott. New York: Alfred A. Knopf, 1961.
- Killion, Rinald, and Charles Waller, eds. *Slavery Time When I Was Chillun Down on Master's Plantation*. Savannah: Beehive Press, 1973.
- Lewis, George of Ormiston. *Impressions of America and the American Churches*. Edinburgh, 1845. in *A History of Medicine in South Carolina, 1829-1900*, by Joseph I. Warring. Charleston: Medical Society of South Carolina, 1967.
- Mereness, Newton Dennison. *Travels in the American Colonies*. New York: 1916.
- Millings, Chapman J., ed. *Colonial South Carolina: Two Contemporary Descriptions by Governor James Glen and Dr. George Milligen-Johnston*. Columbia: University of South Carolina Press, 1951.
- Olmsted, Frederick Law. *A Journey in the Seaboard Slave States in the Years 1853-1854, with Remarks on Their Economy*. New York: G.P. Putnam's Sons, 1856.
- Philips, Martin W., and Franklin L. Riley, ed. *Diary of a Mississippi Planter, January 1, 1840, to April, 1863*. Oxford, Miss.: Mississippi Historical Society, 1908.
- Rawick, George P., ed. *The American Slave: A Composite Autobiography*, vols. 8-19. Westport, Conn.: Greenwood, 1972.
- Rawick, George P., ed. *The American Slave: A Composite Autobiography*, supplement series 2, vols. 1-10. Westport, Conn.: Greenwood, 1979.

- Redpath, James, and John R. McKivigan. *The Roving Editor, or, Talks with Slaves in the Southern States*. New York: A.B. Burdick Publishers, 1859.
- Ruffin, Edmund. *Agriculture, Geology, and Society in Antebellum South Carolina : The Private Diary of Edmund Ruffin, 1843*. ed. William M. Matthew. Athens: University of Georgia Press, 1992.
- Schoepf, Johann David. *Travels in the Confederation, 1783-1784*. New York: Burt Franklin, 1968.
- Smedes, Susan Dabney. *Memorials of a Southern Planter*. Baltimore: Cushings & Bailey, 1887.
- Smyth, J.F.D. *A Tour in the United States of America : Containing an Account of the Present Situation of That Country ; the Population, Agriculture, Commerce, Customs, and Manners of the Inhabitants ; with a Description of the Indian Nations, the General Face of the Country, Mountains, Forests, Rivers, and the Most Beautiful, Grand, and Picturesque Views Throughout That Vast Continent ; Likewise Improvements in Husbandry That May Be Adopted with Great Advantage in Europe*. London, 1784.
- Warring, Joseph I. *A History of Medicine in South Carolina, 1829-1900*. Charleston: Medical Society of South Carolina, 1967.
- West, Benjamin. *Life in the South, 1778-1779 the Letters of Benjamin West*. ed. James Stanley Schoff Ann Arbor, Mich.: William L. Clements Library, 1963.
- Yetman, Norman R. *Voices from Slavery*. New York: Holt, Rinehart, and Winston, 1970.

Secondary Sources

- A Guide to the Microfilm Edition of Records of Ante-Bellum Southern Plantations from the Revolution through the Civil War, Ser. H*. United States 1985.
- Bankole, Katherine Kemi. *Slavery and Medicine: Enslavement and Medical Practices in Antebellum Louisiana*. New York: Garland, 1998.
- Blake, John W. "Yellow Fever in Eighteenth Century America." *Bulletin of the New York Academy of Medicine*, XLIV (1968):673-686.
- Brewster, Lawrence Fay. *Summer Migrations and Resorts of South Carolina Low-Country Planters*. Vol. ser. 26. Durham. N.C.: Duke University Press, 1947.
- Bruce-Chwatt, Leonard Jan. *Essential Malariology*. New York: John Wiley and Sons, 1985.
- Carter, Henry Rose. *Yellow Fever; an Epidemiological and Historical Study of Its Place of Origin*. Baltimore: The Williams and Wilkins Co., 1931.
- Close, Stacey K. *Elderly Slaves of the Plantation South*. New York: Garland, 1997.
- Dubisch, J. "Low Country Fevers: Cultural Adaptations to Malaria in Antebellum South Carolina." *Social Science & Medicine* 21, no. 6 (1985): 641-9.
- Essential Malariology*. [in English]. London; New York: Arnold, 2002.

- Ferris, B. G., Jr., F. E. Speizer, J. D. Spengler, D. Dockery, Y. M. Bishop, M. Wolfson, C. Humble, and Boston M. A. Harvard School of Public Health. "Effects of Sulfur Oxides and Respirable Particles on Human Health. Methodology and Demography of Populations in Study." *American Review of Respiratory Disease* 120:4 (1979): 767-79.
- Giles, Herbert M., and David A. Warell. *Bruce- Chwatt's Essential Malariology* 3d edition. New York: Oxford University Press, 1993.
- Humphreys, Margaret. *Malaria : Poverty, Race, and Public Health in the United States*. Baltimore: Johns Hopkins University Press, 2001.
- Humphreys, Margaret. *Yellow Fever and the South*. New Brunswick: Rutgers University Press, 1992.
- Jenkins, William Dunbar. "The Cholera in 1849." *Publications of the Mississippi Historical Society VII* (1903): 271-279.
- Jobe, Euclid Ray. "Social History of Ante-Bellum Mississippi." PhD diss., University of Mississippi, 1930.
- Jordan, Weymouth T. "Plantation Medicine in the Old South," *The Alabama Review* 3 (April 1950):84n-85n.
- Joyner, Charles. *Down by the Riverside: A South Carolina Slave Community*. Urbana: University of Illinois Press, 1984.
- Kelley, Jennifer O., and J. Lawrence Angel, "Life Stresses of Slavery." *American Journal of Physical Anthropology* 74, No. 2 (1987): 199-211.
- Kiple, Kenneth F., ed. *The Cambridge World History of Human Disease* [in English]. Cambridge: Cambridge university press, 1993.
- McCandless, Peter. *Slavery, Disease, and Suffering in the Southern Lowcountry*. Cambridge: Cambridge University Press, 2011.
- McNeill, John Robert. *Mosquito Empires: Ecology and War in the Greater Caribbean, 1620-1914*. Cambridge: Cambridge University Press, 2010.
- Owens, Leslie Howard. *This Species of Property : Slave Life and Culture in the Old South*. New York: Oxford University Press, 1976.
- Packard, Randall M. *The Making of a Tropical Disease : A Short History of Malaria*. Baltimore: Johns Hopkins University Press, 2007.
- Pollard, Leslie J. "Aging and Slavery: A Gerontological Perspective." *The Journal of Negro History* 66, no. 3 (1981): 228-34.
- Rosengarten, Theodore, Thomas Benjamin Chaplin, and Susan W. Walker. *Tombee: Portrait of a Cotton Planter*. New York: Morrow, 1986.
- Savitt, Todd Lee. *Medicine and Slavery: The Diseases and Health Care of Blacks in Antebellum Virginia*. Urbana: University of Illinois Press, 2002.
- Snydor, Charles S. *Slavery in Mississippi*. New York: D. Appleton-Century company, incorporated, 1933.

- Stamp, Kenneth, ed. *A Guide to Records of Ante-Bellum Southern Plantations from the Revolution through the Civil War*. Frederick, MD: University Publications of America, 1986.
- Webber, Thomas L. *Deep Like the Rivers : Education in the Slave Quarter Community, 1831-1865*. New York: Norton, 1978.
- Wylie, Floyd M. "Attitudes toward Aging and the Aged among Black Americans: Some Historical Perspectives." *The International Journal of Aging and Human Development* 2, no. 1 (1971): 66-70.

THE IDLE WOMAN IN THERAPY AND FICTION: S. WEIR MITCHELL'S
LITERARY CAREER AND THE GILDED AGE FEAR OF MALINGERING.

by

BRENT RUSWICK
(West Chester University of Pennsylvania)

ABSTRACT: As one of America's most prominent physicians in the Gilded Age and a successful novelist, S. Weir Mitchell sought to secure the professional reputation and authority of scientific, clinical medicine. Historians have given great attention to the ways that his treatment of women suffering from exhaustion or nervousness reinforced and created highly restrictive, gendered norms; more recently, historians have explored how Mitchell's literary career augmented and echoed his approach to medicine. This article extends the historical analysis of Mitchell's literary career by examining one of his lesser novels, *Circumstance*. Through the novel's protagonist, an archetypically virtuous physician, and the antagonist, a cunning woman looking to con her way into a life of ease, Mitchell expresses a concern for exposing malingering and fakery that echoes his work in an Army hospital during the Civil War, his "Rest Cure" treatment of nervous women, and the policy debates among social reformers about how to identify and treat charity frauds and the chronically idle.

Silas Weir Mitchell ranks as one of the most prominent—and infamous—of American physicians. He launched his career with groundbreaking work in toxicology and the study of rattlesnake venom in the 1850s before serving in a Philadelphia army hospital during the Civil War, which drew him to gunshot wounds and amputations, and with them, neurology. There too he made singular contributions to the study of phantom limbs and the general foundation of the modern field, including the opening of the first private neurological clinic after the war. He is most well known for his approach to diseases that he diagnosed as cases of neurasthenia and hysteria—an interest that grew out of his work studying the linked physical and psychological effects of the Civil War on male soldiers. His treatments for such-diagnosed women from the 1870s through the nineteen-aughts gained international notice and then historical scrutiny, due to the ways in which it seemingly projected both his specific, personal misogynistic views and the broader cultural milieu of his time.

The themes that permeate Mitchell's professional career—establishing the professional reputation of scientific medicine, cultivating absolute obedience to the authority of the physician, and treating women as inherently susceptible to illness, unreliable observers of their illnesses, and hostages to emotion and biology—also highlight Mitchell's second and nearly as prolific career as a popular, if not necessarily talented, author. After several hagiographic treatments focusing on his medical work, in 2012 Mitchell finally received a comprehensive biographical analysis that explores the interplay of his medical and literary careers, in Nancy Cervetti's masterful *S. Weir Mitchell, 1829-1914: Philadelphia's Literary*

Physician.¹ Cervetti offers an illuminating and even-handed treatment of how these two careers informed each other, and here I wish to extend that work to an examination of one of Mitchell's lesser novels, *Circumstance*, left unexplored by Cervetti. This examination offers more than another opportunity to pick apart Mitchell's views on gender, authority, and medicine; it also provides a new and previously unexplored context for thinking about Mitchell's medical and literary work: the Gilded Age obsession with malingering and indolence, the faking of illness or weakness to avoid "honest" labor. Generally imagined as a man's trick, through both his medical practice and his writing Mitchell transformed malingering into an art also practiced by women, one that could be solved through proper medical intervention. Mitchell's approach closely resembles and likely drew from the assumptions and methods then prevalent in charitable work: another rapidly professionalizing field that dealt with distinguish legitimate from illegitimate grounds for idleness in men.

Mitchell's Concern for Malingering

Mitchell had paid for a substitute to serve for him in the Union army, and suffered a nervous breakdown in 1864. Perhaps with a tinge of self-awareness, that same year Mitchell observed in *Gunshot Wounds* that "of late, especially, malingerers have shammed diseases of the back to such an extent that 'back cases' in general are a matter of utter disgust to hospital surgeons."² Distinguishing between fakers and the truly wounded became an increasingly important concern for Mitchell as he moved in the 1870s to treat women whose ills often had no discernable organic cause. He did so at the same moment that paupers—able-bodied men who supposedly chose idleness and supposedly attempted to live a life of leisure by winning charitable aid through fake claims of hardship—were becoming public enemy number one in the field of charity.³ Mitchell's private practice

¹ Nancy Cervetti, *S. Weir Mitchell, 1829-1914: Philadelphia's Literary Physician*. University Park, PA: The Pennsylvania University Press, 2012. See also Anna Robeson Burr, *Weir Mitchell: His Life and Letters*. New York: Duffield, 1929; Earnest, *S. Weir Mitchell, Novelist and Physician*. Philadelphia: University of Philadelphia Press, 1950; David Rein, *S. Weir Mitchell as a Psychiatric Novelist*. International University Press, 1952; Richard D. Walter, *S. Weir Mitchell, M.D.—Neurologist: A Medical Biography*. Springfield, IL: Charles C. Thomas, 1970.

² S. Weir Mitchell, George R. Morehouse, and William Keen, *Gunshot Wounds and Other Injuries of Nerves*, Philadelphia: J. B. Lippincott, 1864, p. 21. See also Mitchell, Morehouse, and Keen, "On Malingering, Especially in Regard to Simulation of Diseases of the Nervous System." *American Journal of the Medical Sciences* 48 (1864):367-94

³ Elizabeth N. Agnew, *From Charity to Social Work: Mary E. Richmond and the Creation of an American Profession*. Urbana: University of Illinois Press, 2004; Sherri Broder, *Tramps, Unfit Mothers, and Neglected Children: Negotiating the Family in Nineteenth-Century Philadelphia*. Philadelphia: University of Pennsylvania Press, 2002; Frances Fox Piven and Richard A. Cloward, *Regulating the Poor: The Functions of Public Welfare*. New York: Pantheon Books, 1971; Dawn Greeley, "Beyond Benevolence: Gender,

similarly focused on women who claimed an inability to work, or even to get out of bed.

At risk of over-generalizing Mitchell's approach to individual cases, after he eliminated the possibility of an organic cause for a woman's exhaustion, Mitchell diagnosed her with neurasthenia or hysteria. He theorized that attempts to emulate men in their professional goals caused young women to wear out, and suggested it would be better to not educate adolescent girls at all than to educate them without care for their more frail nervous systems. Cases of bed-ridden, hysterical exhaustion, however, might also be due to the lifestyle of "oversensitive, refined, and educated women," or to the "self love" that makes some women desire the "daily drama of the sick room, with its little selfish indulgences and its craving for sympathy."⁴ In other words, a woman's idleness might be due to her aspiring to too much in life and causing actual harm to the nervous system, or due to bad habits or even fakery. A proper diagnosis required distinguishing one from the other.

Both to treat truly neurasthenic women and to suss out fakes, Mitchell submitted patients to the "Rest Cure," which featured a regimen of dieting, massage, electricity, isolation, and inactivity, all to be unquestioningly followed as administered by a forceful, male physician. Mitchell felt little inclination to believe the sincerity of his patients' complaints. He called a hysterical patient the "domestic demon" who "wears out and destroys generations of nursing relatives," and warned "only the doctor knows what one of these self-made invalids can do to make a household wretched. Quoting his friend, the physician Oliver Wendell Holmes Sr., Mitchell explained in *Wear and Tear* that the nervous woman "is like a vampire, sucking slowly the blood of every healthy, helpful creature within reach of her demands."⁵ Cervetti offers an example of one of Mitchell's patients who "appeared to eat a chop for breakfast and no other food throughout the day. When Mitchell discovered the oranges, bananas, and bread under her pillow, she said coolly, "Well, now I am caught."⁶ Mitchell also was known for his frequent and not quite friendly threats to set fire to a rest bed, or to strip naked and enter a bed, in order to rouse a supposedly exhausted patient and expose her as faking exhaustion.⁶

Class, and the Development of Scientific Charity in NYC, 1882–1935." PhD diss., New York State University–Stony Brook, 1995; Peter Mandler, ed. *The Uses of Charity: The Poor on Relief in the Nineteenth-Century Metropolis*. Philadelphia: University of Pennsylvania Press, 1990; Brent Ruswick, *Almost Worthy: The Poor, Paupers, and the Science of Charity in America, 1877-1917*. Bloomington, IN: Indiana University Press, 2012.

⁴ S. Weir Mitchell, *Fat and Blood: An Essay on the Treatment of Certain Forms of Neurasthenia and Hysteria*. Eighth ed. Philadelphia: J.B. Lippincott Co., 1902, p. 52.

⁵ S. Weir Mitchell, *Wear and Tear, or Hints for the Overworked* eighth edition, Philadelphia: J.B. Lippincott Co., 1897, 32.

⁶ Cervetti, *S. Weir Mitchell*, 110.

Mitchell's Literature: Fakery and Idleness in *Circumstance*

A prolific and popular writer, Mitchell rarely is confused for a good one. An early biographer dismissed his writings as “slightly less effective than phenobarbital.”⁷ A conservative on most every matter other than religion, Mitchell dismissed literary realism in favor of a more Victorian style. Characters are given names that suggest their personal attributes. Treacherous women and weak men are hostage to their appetites; heroic men are simple, decisive, and upright. Women who aren't treacherous are inconspicuous.

Mitchell professed that he disliked writing novels about medicine, and Cervetti observes that he rarely made hysteria and exhaustion subjects of his novels.⁸ Both claims might nominally be true, yet Mitchell's novels regularly featured physicians for protagonists and bad physicians as antagonists. Even more frequently, Mitchell selected for his antagonists cunning women who chose to act contrary to their physiology, traditional gender roles, and the advice of modern medicine. Historians most frequently note the character Octopia Darnell in the novel *Roland Blake*, whom Cervetti says represents “this kind of couch-loving invalid” whom Mitchell compares to “home predators. Over time, through inactivity and excessive self-study of every ache and pain, these spoiled women developed serious physical problems and hysteria.”⁹ The name Octopia suggested her octopus-like tentacles ensnaring the rest of the household in her moral and then physical degradation. Octopia represents one manifestation of an idle and deceitful woman, the sort that Mitchell might have treated in his professional practice. But Mitchell also used his fiction to discuss other ways that women with inclinations to idleness might use deception to win a life of ease, and to promote his belief that only a professionally trained physician could spot and root out the fake.

Mitchell wrote *Circumstance* in 1901, in the middle of his most prolific stage as a writer and as he began slowing down a forty-year medical career. The novel is driven by the villainous Lucretia Hunter, typically shortened in the novel to Hunter, and her tracking and snaring of the flawed but virtuous Fairthorne family. Hunter's almost hard-wired preference for a life of ease features prominently in Mitchell's account of her actions.

Despite vigor of mind and body, she was prone to yield to moods of self-indulgence. Rich food and all forms of luxurious rest she found pleasant, and would have used strong scents, such as musk, if she had not been sure that to do so subjected her to disagreeable

⁷ Walter, *S. Weir Mitchell, M.D.*

⁸ Cervetti, *S. Weir Mitchell*, 162-3.

⁹ *Ibid.*, 110.

comment. She was, however, capable of much temporary sacrifice of her desires. Power she liked for itself, as well as for any practical values it might have, as people like food without reference to its nutrient possibilities, and here was one source of weakness which she could not resist and did not always apprehend.¹⁰

Portrayed as mysterious and with a trace of “Oriental” features, Hunter eventually is revealed to have some “Gypsy” blood. Her views on medicine were similarly exotic. “She had no belief in doctors, bad or good. At her rare need, she took certain of what she called Indian remedies, or credulously entrusted herself to what she had learned in New England to call “mind cure.”¹¹

To attempt to simplify an absurdly convoluted story, Hunter is a con artist motivated by her cool indifference to men, her class resentment over being barred admission to the genteel class (something she shared with the author), her love of adventure and thrills, her corrupted biology, and her surprisingly devoted, unflinching dedication to her younger brother Lionel, whom she wishes to grow up to be the virtuous adult she can not be. Mitchell’s narrator explains:

As far as possible, she hid from him what might appear too crooked in a rather seamy life. She wished the only person she loved to think well of her. But far more did she desire him to be all that she was not. Her own cravings were for ease, luxury, dress, music. Her ambitions for him were far higher. With his looks and manners, for here she lost power to be critical, what might he not do and be?¹²

These character flaws notwithstanding, Hunter has a moral code that keeps her from committing any outright criminal acts. This is not exclusively or even primarily a fear of the law, but instead is identified by the narrator as part of her ethical code. Conning wealthy men, drifting and grifting were fine; stealing or working for wages was not. Although Mitchell certainly did not intend it or realize it, Hunter is the most fully formed, complex character in *Circumstance*, and it is easy to re-imagine her as a sympathetic anti-hero in a modern adaptation. In a turning point to the novel, Hunter risks her life to save her brother from a burning building, only to discover that he already had fled, without regard for finding her. She quickly forgives him, and Lionel’s alcoholism, wastefulness, crookedness, and utter laziness drive Hunter to progressively riskier efforts to subsidize his lifestyle.

To do so, Hunter ingratiates herself to the Fairthorne family’s patriarch, John Fairthorne, an eighty year-old man in declining health, obsessed with his collection of autographs and rare books, impertinent, of

¹⁰ Mitchell, *Circumstance*. New York: The Century Co., 106.

¹¹ *Ibid.*, 233-4.

¹² *Ibid.*, 124.

patrician wealth, expecting to be humored in all of his whims, and distrustful of physicians. She does so by way of Fairthorne's niece Kitty, whose appetite for toying with men is surpassed only by her appetite for flattery, and the narrator's appetite for pointing out the symbolism in her name. When Hunter flatters her, the narrator notes "If Kitty had been able to purr, it is probable that she would have vibrated with that instinctive signal of feline satisfaction. She was young, pretty, fain, greedy of all forms of homage."¹³ Hunter insinuates herself into becoming Fairthorne's personal secretary, where she excels at her job, skims a little off the top while executing his buying and selling of autographs, isolates him from the influence of his family, and arranges to have herself entered into his will in a codicil, to receive \$30,000: a sum small enough that it would not significantly diminish the fortunes to be inherited by the rest of the family, but large enough to outrage them. Hunter only needs Fairthorne to find two witnesses to approve the codicil, which he can never quite be bothered to doing.

What unfolds is a battle of wills for Fairthorne's attention and his health. On one side is Hunter, who for most of the novel wants Fairthorne to be well enough to keep subsidizing her and to finalize the codicil, but weak enough to be dependent upon her. She is aided by the witless sycophant Dr. Soper, a "petticoat" doctor not skilled enough to see through Hunter's ruse. Soper is described by Fairthorne as "soporific" and by the narrator as a "pliant, self-satisfied physician."¹⁴ Soper obliges Fairthorne's desire to remain ignorant of the gravity of his heart condition by lying to the old man. When Soper suggests milk—a staple of Mitchell's Rest Cure diet—and Fairthorne objects, Soper accommodates him with a recommendation of Cocoa. Soper believes that any prescription for Fairthorne truly is an inconsequential matter of cosmetic appearance to appease him. This is agreeable to Hunter, since she does not believe in the efficacy of medicine, and instead tells Fairthorne, "What is needed is to know you, sir, your vitality, your will-power, your recuperative energy."¹⁵ When Fairthorne complains of heart troubles and he and those near him fear he is near death, Soper declares it just a case of "latent gout." When Fairthorne insists he knows what is wrong with him and that he is losing his mind, Soper dismisses it and reassures him that everything is fine.

Hunter's machinations are thwarted by the protagonist, Dr. Archer. Archer is Mitchell's archetype for the virtuous and authoritative practitioner of scientific medicine. A good artist and teacher, Archer

gave himself head and heart to a business which requires ideal patience, perfect sweetness of character, and sympathetic insight. ... [P]erhaps in his early life his sense of his own mental powers had made him a little too positive, even a trifle vain. All that had gone,

¹³ Ibid., 8-9.

¹⁴ Ibid., 346, 302-3.

¹⁵ Ibid., 301-2.

or was going. He was of those who prosper morally in the sunshine of success.”¹⁶

Of being a physician, Archer gushes, “Take the best and ablest of men, give him the heart of St. John, give genius, every accomplishment, and he will never rise to the ideal level of the perfect physician. There is no life fit to compare it.”¹⁷

Archer decides to save Fairthorne, his family, and several other impenetrable subplots including one that risks provoking a banking collapse and nationwide economic panic, and flush out the Hunter. He does so not out of any sense of obligation to the family, the law, the economy, or a sense of morality, but out of his professional outrage that Hunter would enable Fairthorne’s indulgences and obstinacy in the face of medical expertise. Here too we see echoes of Mitchell’s professional writing, where he explains the need for isolating patients with nervous diseases was to remove them from their enablers. It also is an echo of charity reformers and anti-poverty crusaders, warning how sentimentality from charities only enabled the cunning pauper. With the keen eye of an empiricist and casual, confident authority of one who expects orders to be followed, Archer sleuths through Hunter’s lies and corners her into a situation where she must leave the Fairthorne house and never return. Hunter recognizes she is trapped and, for reasons too convoluted to explain in brief, concludes that it now is in her best financial and legal interest for Fairthorne to die. She goes to the druggist to fill a prescription for aconite, which Soper had unquestioningly written for her when she once complained of a heart palpitation. The druggist ominously warns her of its poisonous nature. Returning home, Hunter is about to hand a glass of medicinal sherry laced with the poison over to Fairthorne, but cannot bring herself to do it. Impetuous about his sherry, Fairthorne demands it and causes a confrontation when she refuses, which escalates until he has a heart attack and die. The novel’s loose ends are wrapped up with similar haste, and the novel ends with Kitty and Lionel burning through the inheritance in Monaco.

Proper Work and Idleness, Independence and Dependence: The Parallels with Pauperism

Mitchell’s fiction typically is analyzed for how it, like his professional writing, invokes medical authority in support of his vociferous defense of a patriarchal society. There are several examples of this to choose from in *Circumstance*. But what strikes me about the novel in particular and Mitchell’s work more generally is the way they express gilded age anxieties about malingering and idleness, and efforts to subvert or avoid the

¹⁶ Ibid., 52-3.

¹⁷ Ibid., 119.

emerging economic order of wage-based industrial capitalism. Mitchell's professional treatment of female hysteria cases and literary presentation of Hunter and Octopia have striking resemblances to his contemporaries' discussions about how to handle the tramps and pauper men who supposedly choosing to avoid reputable employment by instead roving from town to town, taking part-time, off-the-books work, and scamming the naïve with fabricated stories of hardship. These all are traits shared in common with Lucretia Hunter. Phrases like "self-made invalids" who were "like a vampire, sucking slowly the blood of every healthy, helpful creature within reach" echo the terminology and imagery used to describe paupers and tramps as parasites whose choice of idleness sucks the economic and biological health of the host-society. As one nationally prominent advocate of "scientific charity" warned about the paupers, they are ones "whose Saxon or Teutonic self-help has given place to a parasitic life. He hangs upon the city, sucking thence his sustenance and giving nothing back."¹⁸

Mitchell's medical and literary tactics for dealing with fakers also resemble the main concern of the scientific charity movement and city officials who sought to enforce the poor laws. A wealth of secondary literature on gilded age poverty indicates that the objective of charity and social relief was to make the conditions for getting relief so miserable and onerous that no shirker would seek it. Only the most truly desperately poor would accept such offers of "help." The most visible manifestation of this policy was the "work test," in which a night's lodging and meal for a tramp in the poorhouse was contingent upon first splitting wood in the lumberyard, whether or not there was need for firewood. The logic of the work test is perfectly articulated in Mitchell's explanation of the rest cure, as he described it in *Fat and Blood*:

To lie abed half the day, and sew a little and read a little, and be interesting as invalids and excite sympathy, is all very well, but when they are bidden to stay in bed a month, and neither to read, write, nor sew, and to have one nurse who is not a relative, then repose becomes for some women a rather bitter medicine, and they are glad enough to accept the order to rise and go about when the doctor issues a mandate.¹⁹

It similarly is seen in his threat to burn down or leap into beds in order to test the resolve of supposedly bed-ridden women, or in his depiction of Hunter, who seems to delight in working as hard as she needs to in order to avoid doing an "honest" day's labor.

¹⁸ Oscar McCulloch, "Annual Public Meeting of the Indianapolis Benevolent Society," 30 November 1879, in Indianapolis Benevolent Society Minute Book, 1879–1918, BV1178, Family Service Association Family Service Association of Indianapolis Records, 1879–1971, Collection MO102, Indiana Historical Society, Indianapolis.\

¹⁹ Mitchell, *Fat and Blood*, 51.

Mitchell's fictional treatment of Hunter and charity workers' actual treatment of the poor each suggests a belief that idleness is not just a moral wrong, but also a contagion that can infect others, and a sign of biological degeneration. Among charity workers it motivated calls to remove children from their parents for fear of both moral and biological degeneration, and some of the earliest suggestion for eugenic measures to restrict reproduction among the "unfit" by sequestration.²⁰ Mitchell similarly used removal and isolation as a means for treating patients and also for avoiding "contagion" of willful idleness and nervous exhaustion. Both Mitchell's novels and the tracts of anti-poverty crusaders suggest that off the books employment, what might now be called freelancing, was fundamentally dishonest and in need of channeling: for men, into the wage economy and for women, into domesticity. Guiding these efforts in medicine and charity was an ambitious professional class looking to preserve or introduce order upon those who would make the willful choice to drop out of the emerging economic and cultural ordering of the gilded age.

Are these similarities between Mitchell's professional practice and fictional writing about invalid women and scientific charity reformers' treatment of paupers mere coincidence, indicative of a common worldview shared by different branches of the professional class? Perhaps, but there appear to be more immediate connections that suggest Mitchell drew from the world of charity reform in his thinking about the nature of honest and dishonest forms of idleness. Mitchell's Philadelphia was one of the most important centers for the "scientific" charity and "charity organization" reform movement that began in the late 1870s and grew to be the preeminent national movement in charity by the early 1900s. Mitchell finally gained access to the genteel world that had long spurned him, when, in 1875, he married the aristocratic Mary Cadwalader. Among his new relatives was Dr. Charles D. Cadwalader, who served the Society for Organizing Charitable Relief and Suppressing Mendicancy in Philadelphia, and gained national significance through his work at the National Conference of Charities and Correction, where he served on the committee concerning medical charities and another on the organization of charities in cities. In Mitchell's professional and literary works, including *Circumstance*, he frequently and passionately discusses his concern for improving care for the poor after treatment in hospitals.²¹ While I do not wish to claim too much with these associations and interests, Mitchell nicely fits the profile of the odd demographic mish-mash of politically conservative, religiously non-conformist, reform-oriented, urban

²⁰ Nathaniel Deutsch, *Inventing America's "Worst" Family: Eugenics, Islam, and the Fall and Rise of the Tribe of Ishmael*. Berkeley: University of California Press, 2009; Greeley, "Beyond Benevolence,"; Daniel Kevles, *In the Name of Eugenics: Genetics and the Uses of Human Heredity*, Cambridge: Harvard University Press, 1985; Ruswick, *Almost Worthy*; Karen Tice, *Tales of Wayward Girls and Immoral Women: Case Records and the Professionalization of Social Work*. Urbana: University of Illinois Press, 1998.

²¹ Mitchell, *Circumstance*, 245, 276.

professionals who sought methods to diagnose and distinguish honest cases of poverty from the dishonest fakery of the pauper at the same moment in time that Mitchell began describing methods for distinguishing the truly sick neurasthenic patient from the fake, and then writing about such persons in his fiction.

THE WOODHOUSES' USE OF AN APOTHECARY: THE AMBIGUOUS MR. PERRY□

by

HALEY RUSSELL
(Murray State University)

ABSTRACT: For years, the texts of Jane Austen have been examined and scholars have not waned in their studies of her 1815 novel, *Emma*. This scholarship, however, lacks any sort of analysis of Mr. Perry, the Woodhouse's beloved apothecary, while scholars that do briefly mention the medical man often incorrectly name him "Doctor Perry." In this paper, I examine the importance of Mr. Perry's character and the stance Austen is taking on the apothecary's rise to general practitioner. Using dated periodicals, Austen's novels and original letter manuscripts, and medical journals, it is evident that Regency England's medical system saw a massive transformation throughout the mid-1700s to early 1800s. Physicians donned the peak of this hierarchy, genteel in class and manner and serving those like him. Surgeons and apothecaries followed after: surgeons were believed to work using solely the hand, not the head, treating topical issues. Apothecaries were, then, considered "lower class" medical men, focusing on the prescription of (sometimes bogus) drugs, diagnosing only low-class patients and those who were out of reach of a traditional physician. None such qualities define the rich and worrisome Mr. Woodhouse. His use of Mr. Perry's services allows Austen to rebel against the traditional idea of the worthless, low-class apothecary and participate in a social debate that defines their worth as family practitioners and valuable medical professionals. This understanding of Austen's argument against the social medical ranks is critical to the understanding of *Emma*, as Mr. Perry plays a huge role in not only the plot's overall development, but also the development of Highbury and Surrey's social structures.

When reading Jane Austen's *Emma* (1815), scholars tend to quickly fall in love with Mr. Woodhouse, and rightfully so: he is elderly, unrealistic, comedic, and endearing. Why, though, is his diagnosis so important? Numerous scholars have diagnosed Mr. Woodhouse: Nicola Cummins believes his condition to be dyslexia, and Ted Bader believes he is not suffering any illness; he is simply an aging man, more aware of his body and health than most. Mr. Woodhouse's diagnosis is not my concern, however. His worry, no matter where it is rooted, requires him to see an apothecary, Mr. Perry, despite the Woodhouses' wealth. The Woodhouses' financial situation is made clear early in the novel. Their house sits on a large garden; Mr. Woodhouse is able to provide his daughters with a governess—a luxury some of Austen's other characters were unable to afford, such as the Bennets in *Pride and Prejudice*. The Woodhouses also hire coachmen and own carriages, also a luxury at the time. There is nothing, especially money, to "distress or vex" our heroine *Emma* (Austen 23).¹ If this is the case, if the Woodhouses are so fortunate to be more than financially stable, there is no reason for Mr. Woodhouse to continually call upon Mr. Perry, a mere apothecary. Mr. Woodhouse, the ever-habitual old

¹ When referring to Jane Austen's *Emma*, I will leave out the author's name and simply cite the page, as per MLA style. When referring to other of Austen's works (*Pride & Prejudice*), I will include an abbreviated title of the work along with the page number.

man, is comfortable with Mr. Perry, a medical practitioner who not only indulges his hypochondria, but also allows Austen to participate in a social debate concerning the rising credibility of apothecaries as medical practitioners.

A strict hierarchy of medical practitioners was in place in eighteenth century medical communities in England. At the top of this hierarchy came physicians, followed by surgeons, and lastly were the apothecaries (Porter 11). Physicians were medical professionals who had been university educated and whose job was to “diagnose the complaint, make a prognosis of likely developments, prescribe treatments and medicines (which the apothecary would then dispense), and provide attendance and advice” (11). These physicians were given the title “doctor,” unlike surgeons and apothecaries. Because of their education and certification, physicians were used mostly by upper-class families and, like their patients, had a genteel manner and status in society.

Unlike physicians’ internal diagnoses, surgery was thought to be performed solely with the hand, making no use of the head, earning them a lower status in the medical community. The surgeon would “treat external complains (skin conditions, boils, wounds, injuries and so forth), to set bones and perform simple operations” (Porter11). Unlike the liberal, formal education physicians received at a university, surgeons underwent apprenticeships to qualify for admission to the London Company. These apprenticeships lasted approximately seven years (12). No such external complaints are mentioned in *Emma*; most sickly characters are suffering from internal ailments requiring a physician’s advice and an apothecary’s drugs. Despite the lack of the use of surgeons in *Emma*, Austen employs surgeons in her other novels, namely *Persuasions*, when Louisa Musgrove, a headstrong young girl jumps down a flight of stairs and falls unconscious. In the scene, Anne Eliot, *Persuasions*’ heroine, calls for a surgeon: “‘A surgeon!’ said Anne. He caught the word; it seemed to rouse him at once and saying only, ‘True, true, a surgeon this instant,’” (132). Louisa’s diagnosis comes from a surgeon, who determined “the head had received a severe contusion, but he had seen greater injuries recovered from” (133). Louisa’s injury was not one of internal issues, such as an infection, or virus: it was head trauma, and therefore could be treated by a surgeon, not a physician or apothecary.

An apothecary is, by simple definition, “one who prepared and sold drugs for medicinal purposes” until approximately 1700, when “apothecaries gradually took place as general medical practitioners” (OED). Still, though, apothecaries remained at the bottom of the medical hierarchy, constantly at war with the physicians. Much like the surgeon, only more so, the apothecary was considered nothing more than a tradesman because “he kept shop and pursued trade; his education was the ‘mechanical’ one of apprenticeship rather than the liberal one of the university” (12). Apothecaries were less expensive than physicians and often times prescribed their own medicines, sometimes contradictory to the prescription the physician had written. The concern with these

prescriptions was that apothecaries often “cheated the patient by prescribing bogus drugs: as they made their prescriptions up themselves” (Inglis 135). Apothecaries served only lower classes’ medical needs. The use of physicians by the upper class is seen in Austen’s novel *Pride and Prejudice* when Mr. Jones, an apothecary, is called to see Jane Bennett, who has fallen ill at Netherfield, the Bingley’s residence. When Jane has still not rallied from her cold, Bingley suggests they call for Mr. Jones again, but his sisters were “convinced that no country advice could be of any service, recommended an express to town for one of the most eminent physicians” (P&P 28).

These two professions, apothecaries and physicians, are not to be confused, though they often are. In *Emma*, there are mentions of two apothecaries, Mr. Perry and Mr. Wingfield, Isabella and John Knightley’s apothecary. Mr. Perry is an ambiguous character and often overlooked and occasionally even misnamed as in George Dunea’s “Jane Austen’s Doctors and Patients,” where Dunea incorrectly states that Mr. Woodhouse “forever call[s] on his physician, Dr. Perry.” In another article, “The Setting in *Emma*,” George Bramer classifies Mr. Perry as a “Doctor Perry,” part of the “professional class” (Bramer 153). Mr. Perry is first introduced on chapter two: “[Mr. Woodhouse] had been at the pains of consulting Mr. Perry, the apothecary, on the subject.” A footnote is left at the first mention of the character by Editor Alistair M. Duckworth that cites the importance of the social roles apothecaries had at the time. Duckworth states that “the medical role and social status of apothecaries were the subject of contentious debate in the years leading up to the passing of the Apothecaries’ Act in July 1815...apothecaries had in many areas effectively become medical practitioners, and not merely dispensers of drugs” (Duckworth 34). This Apothecaries’ Act of 1815 stated that “those who did not hold a university degree were bound by law to take the license of Apothecaries Hall if they wished to practice as a general practitioner or apothecary” (London Hospital System). Students were required to take courses on and produce certificates of attendance in anatomy, physiology, medicine, chemistry, and material medica. Despite their newly regulated education, the apothecary’s merit was still below that of a physician. Their concern was “the dispensing of medicine with the diagnosis of disease, and the physicians who, having been educated at Oxford or Cambridge, belonged to the learned world of the day” (LHS).

This Act shows that, though apothecaries were still considered beneath physicians, the apothecary’s credibility was rising steadily and continued to do so throughout the remainder of the medical reformation. Austen could have been—and seems to be—under the belief that because this new generation of apothecaries had been more educated than their predecessors; they were a perfectly reliable medical source. Still, though, they carried a very negative reputation and because of this, the Woodhouses should have never been consulting Mr. Perry. Indeed, it is logical that Isabella and John Knightley consult Mr. Wingfield because they are not as wealthy as the Woodhouses. But, given the information,

there is no reason as to why the worrisome Mr. Woodhouse would consult any practitioner who is at the risk of being unqualified.

When questioning Mr. Perry's role in the novel, it is possible to argue that Austen abided by the old adage "write what you know," as much of the medical issues—bathing, embrocation, the setting of Bath, etc.—stemmed from her experiences while she was writing the novel. Austen's father was a county clergyman, a profession that would not allow enough money for a physician. However, at the time of her writing *Emma*, Austen's wealthy brother Henry, who lived in London, fell ill and was under the care of a physician, a physician who also served the Prince Regent, an admirer of Austen and to whom *Emma* is dedicated. Austen met the Prince Regent while caring for her brother in London (Haggerty 35). This interaction diffuses this possible argument as it is clear that Austen was well aware of doctors at the time, the practices they performed and, more importantly, the social status of their patients. Though Henry shared the Prince Regent's doctor, he was also seen by several other practitioners (Cecil 176). Henry had also seen an apothecary, Mr. Haydon. In Austen's 1815 letter to her sister Cassandra—the year in which *Emma* was published—Austen tells her sister "there is no chance of [Henry] being able to leave town on Saturday. I asked Mr. Haydon that question to-day. Mr. Haydon is the apothecary from the corner of Sloane St*" (Letter 111). Later, Austen tells Cassandra that Mr. Haydon has suggested Henry not take a carriage (Letter 116). It is clear, however, in another one of her letters in 1815 that Austen is among the few who believe apothecaries to be credible medical sources when she scolds even her beloved sister Cassandra for calling Mr. Haydon "an Apothecary; he is no Apothecary, he has never been an Apothecary, there is not an Apothecary in this Neighbourhood—the only inconvenience of the situation perhaps, but so it is—we have not a medical Man within reach—he is a Haden [sic], nothing but a Haden [sic], a sort of wonderful nondescript Creature on two legs, something between a Man & an Angel—but without the least spice of an Apothecary" (Letter 118). Austen's chastising from Letter 118 when she argues that Mr. Haydon is not a mere apothecary not only shows her true feelings on the medical men, but also the negative reputation and connotations the profession and word carried with it. It is probable, given this letter, that Austen subscribed to the growing belief that apothecaries were able and credible medical professionals.

This belief provides some rationale for Mr. Woodhouse's constant communication with Mr. Perry; however, it does not account for their relationship in its entirety. Though Mr. Perry is around the Woodhouses and their family friends—the Westons, the Knightleys, etc.—at several points in the novel, he is still not considered the same social rank as the Woodhouses and acts as such. Mr. Perry and his family attend the Weston wedding early on in the novel, but, aside from the gathering, there are not many times where he interacts socially with the group of characters in *Highbury*. He, as a class-abiding apothecary—is only present when called upon by Mr. Woodhouse, Mrs. Goddard, or Jane Fairfax. Even though

Austen is participating in what scholars would mark as “the beginning of the process of medical reform in England,” she is unwilling to prescribe to the belief that apothecaries are equal to upper middle class families like the Woodhouses.

Though apothecaries were beginning to gain more credibility, physicians were still preferred among the genteel class, unless these high-class families lived in rural areas. Hartfield, the Woodhouse’s estate at Highbury, is only 16 miles from London and located in Surrey, where Highbury is considered a “large and populous village almost amounting to a town” (7). It is never mentioned in the novel whether a practicing physician is present; however it is logical to assume there is one, given the size of Surrey and Highbury. Even if there were not a doctor practicing there, though, the Woodhouses could have easily sent for a doctor in London if the illness at hand was not in need of immediate attention. In an examination of the setting of *Emma*, George Bramer claims a trip to London “for larger services—the framing of a painting, a dental check, delivery of a large folding-screen, or perhaps a haircut” were entirely reasonable voyages. This journey is even seen in the novel when Frank Churchill travels to London supposedly for a haircut (171). There are no setting boundaries binding Mr. Woodhouse from seeking a doctor’s advice instead of an apothecary’s.

Mr. Woodhouse is not only a worrisome father; he is a hypochondriac who is fortunate enough to have the funds to provide himself with an on-call medical professional, whatever status that may be. He worries over his daughters, his grandchildren, and, mostly, himself. His worry—whatever it may be—causes his constant calling upon Mr. Perry. When attempting to find how many specific instances there are of Mr. Woodhouse calling Mr. Perry, there are fewer than readers would suspect. Mr. Perry is mentioned, altogether, 32 times in the novel. Though difficult to examine each instance in its entirety, labeling each instance allows us to see, specifically, what kind of role Mr. Perry played in the novel, and, more importantly, what kind of argument Austen could be making through him. For the sake of clarity, five categories can be made: the first would be each mention of the man in terms of direct consultation of or mention of Mr. Perry by Mr. Woodhouse; the second, the consultation of characters outside Mr. Woodhouse (i.e. Jane Fairfax, Miss Goddard, or Harriet Smith); third, the mention of Mr. Perry by Mr. Woodhouse without regard to medicine; fourth, a simple mention of Mr. Perry by the narrator; and fifth, a mention of the man by a character other than Mr. Woodhouse.

Given these five categories, Mr. Woodhouse mentions Mr. Perry or receives his direct consultation eight times in the novel. Mr. Perry conducts examinations outside of Mr. Woodhouse eight times and there are three mentions of him by Mr. Woodhouse that are not concerning medicine (for example, the scene in which the group discusses the riddles where the apothecary is labeled Mr. Woodhouses “good friend”). The loyal apothecary is mentioned offhandedly in narration five times (for example,

Mr. Perry “walking hastily by” outside of Ford’s), and characters other than Mr. Woodhouse refer to him or his services eight times. Mr. Perry’s lack of exclusivity to Mr. Woodhouse begs the question: why is Mr. Woodhouse using the same apothecary used by orphans, spinsters, and widows—all those of a lower class than he? In an instance that would fall under the mention of Mr. Perry by Mr. Woodhouse, the old man and his daughter, Isabella, argue the benefits of traveling to the sea either at South End or Cromer. Mr. Perry has suggested Cromer, more than 100 miles further away than South End, because he believes it is “the best of all bathing places” (100). This is a key passage in the novel concerning Mr. Perry’s role at Hartfield. Here, it is established how much Mr. Woodhouse looks to him for his advice. Isabella and Mr. Woodhouse continue to argue over the differences in expertise of Mr. Perry and Mr. Wingfield, until the subdued Mr. John Knightley makes clear that he does not want Perry’s “directions no more than his drugs” (101). Though the Knightleys consult an apothecary themselves, they treat them as society does: as if he is lower in class. Sensitive Mr. Woodhouse is mortified, of course, at the belittling of his friend and medical practitioner.

When dissecting the advice from Mr. Perry that Mr. Woodhouse gives Isabella, Mr. Perry’s tone is somewhat decipherable and is seen when he tells Mr. Woodhouse “where health is at stake, nothing else should be considered” (100). Medical discoveries and inventions were allowing individuals outside of the medical community to understand different ailments however, the severity of different illnesses were not considered as important during the time. The relationship between the two, Mr. Perry and Mr. Woodhouse, is good for both men. Mr. Perry is never without work because of Mr. Woodhouse’s trust in him; likewise, Mr. Woodhouse is perpetually cared for, understood, and coddled. There was an understanding that Mr. Perry would tell Mr. Woodhouse exactly what he wanted to hear. Often times, Woodhouse would even give medical advice “per Perry” to his daughters and other characters in the novel when, in fact, Perry had never given Woodhouse the advice. An example of Perry’s coddling Mr. Woodhouse is apparent when Mr. Woodhouse dissuades guests from eating the Weston’s wedding cake per Perry’s instructions. Later, though, the narrator suggests that “all the little Perrys [were] seen with a slice of Mrs. Weston’s wedding cake in their hands: but Mr. Woodhouse would never believe it” (34). He would never believe it because of his trust that Mr. Perry was handing him the correct diagnoses, the correct drugs, and treatments for whatever ailed him that day. Here, though, there are questions raised: is Mr. Perry simply feeding into Mr. Woodhouse’s worry? The answer is clear when, later, Perry has nothing to contribute to the David Garrick riddle “Kitty, a fair but frozen maid” (73). The fact that Perry does not have an answer for the riddle—any well-read individual at the time would have known this famous puzzle—ends the conversation. His unavailability in social situations—when it is proper and appropriate for him to participate—allows us to wonder if Mr. Perry is only interested in Mr. Woodhouse’s company and questions when it involves

medical advice that he will, in turn, be paid for.

Mr. Perry's payments, though, are not enough for him to fall into the respect and love the rest of Hartfield has for the Woodhouse family. The Woodhouses are the leaders of the community and citizens of Highbury wish to befriend the Woodhouses and often do, despite their lower class. This is seen in the friendship between Miss Bates, though she is a spinster, and Harriet Smith. Mr. Perry, an individual who is considered lower in social rank than the Woodhouses, does not make any efforts toward being near the Woodhouses until called. Perry is wanted, though, all around the country, and though there is no specific evidence, Perry's elusive and ambiguous presence in the novel leaves readers questioning his legitimacy and his motives behind his "advice" that Mr. Woodhouse is able to dole out to others so quickly (97). This ambiguity is an example of how Mr. Perry could be considered simply greedy.

The last logical reason Mr. Woodhouse would continue to use the apothecary is because of his resistance to change. Within the first few pages of the novel, he is described as "hating change of every kind" (25). This hatred of change results in a very strict routine, seen in his walks around the shrubberies at Hartfield, though not in its entirety. These habitual tendencies are also an indication of why Mr. Woodhouse would continue to seek the medical advice of an apothecary. It is also made clear throughout the novel that Mr. Woodhouse is comfortable with Mr. Perry. Because Mr. Perry is so accepted around Highbury and a familiar face at Hartfield, Mr. Woodhouse would have nothing to do with another physician, simply because it would mean a change in routine. And, though physicians at the time were expected to behave as their upper class patients did, it is plausible (and likely) that any physician would quickly become annoyed with Mr. Woodhouse's continual calls and ridiculous inquiries.

The little information Austen includes about Mr. Perry and the Woodhouses leave no satisfaction in understanding why she chooses to write an apothecary instead of a physician for the wealthy family. Mr. Perry's role aids in the development of the complexity of the characters and the movement of the plotline, but there is no reason for a wealthy family to even consider seeking any medical practitioner other than a physician. Why, then, the Woodhouses continue to take the medical advice of Mr. Perry the apothecary is vague, but is most likely attributed to Austen's feelings of apothecaries and their rise in credibility at the time, the medical reformation taking place in England at the time, Mr. Woodhouse's habitual tendencies seen throughout the novel, and the apothecary's indulgence of the old man's outlandish fears.

Works Cited□

- Austen, Jane. *Emma*. 1816. New York: Bedford/St. Martin's, 2002. Print. *Case Studies in Contemporary Criticism*.
- . *Jane Austen's Letters To Her Sister Cassandra and Others*. Electronic Text Center, University of Virginia Library. N.p. N.d. Web. 20 Nov. 2012.
- . *Pride and Prejudice*. 1813. New York: Dodd, Mead & Company, 1945. Print. *Great Illustrated Classics*.
- . *Persuasions*. 1818. First Signet Classics Printing, October 1964. Print.
- Bader, Ted. "Mr. Woodhouse Is Not a Hypochondriac!" *Persuasions On-line*. 21.2 (2000): N.p. Web. *MLA International Bibliography*. 25 Oct. 2012.
- Bramer, George M. "The Setting in *Emma*." *National Council of Teachers of English*. 22.3. (Dec. 1960): 150-156. Web. *JSTOR*. 1 Nov. 2012.
- Brontë, Charlotte. *Jane Eyre*. 1847. New York: Barnes & Noble Classics, 2003. Print.
- Cecil, David. *A Portrait of Jane Austen*. New York: Hill & Wang, 1979. Print.
- Cummins, Nicola. "'A Nervous Man, Easily Depressed': What Is Wrong with Mr. Woodhouse?" *Persuasions On-Line*. 28.1 (Winter 2007): N.p. Web. *MLA International Bibliography*. 1 Nov. 2012.
- Duckworth, Alistair M., Ed. *Emma by Jane Austen, 1816*.□
- Dunea, George. "Jane Austen's Doctors and Patients." *BMJ: British Medical Journal*. 212.7055 (Aug. 25, 2012): 498. Web. *JSTOR*. 1 Nov. 2012.
- Haggerty, Andrew. *Writers and Their Works*. "Jane Austen *Pride & Prejudice* and *Emma*." New York: Marshall Cavendish Benchmark, 2008. Print.
- Inglis, Brian. *A History of Medicine*. New York: World Publishing, 1965. Print.□*Oxford English Dictionary*. oed.com. N.p. n.d. Web. 12 Nov. 2012.□
- Rivett, Geoffrey. *National Health Service History*. nhshistory.net. N.p. n.d. Web. 4 Dec. 2012.

THE MEDICAL WORLD OF AUGUSTA, GEORGIA, 1830-1860

by

JENNIFER ROGERS*
(Iowa State University)

ABSTRACT: This paper places the Augusta medical community and its journal in the context of nineteenth century medicine. In the early to mid-nineteenth century southern and western physicians were isolated geographically and in some regards isolated from major medical centers. The southern physicians in Augusta, Georgia sought to make their profession their own. They sought to connect to other physicians in the South and elsewhere. They furthered the mechanistic view of the body in medicine and used this mechanistic view to aid in medical treatment. The physicians of Augusta also used the mechanistic view of the body to develop new gynecological procedures for previously untreatable conditions, and for establishing their authority to enter the birthing room. The physicians of Augusta, Georgia, in the 1830's forward, saw themselves as being on the frontier of American medicine and they actually were.

There are many areas of Southern medicine that have yet to be explored proclaimed the editors of *Science and Medicine in the Old South*.¹ Numbers and Savitt invite scholars to further examine Southern medical history, including antebellum Southern hospitals, medical journals, and societies.

The place of medical societies and journals in the professional lives of southern physicians also deserves attention. It would be useful to know, for example, how popular they were, how they influenced medical practice, how they differed from those in other regions, and how they were used by the medically orthodox to combat the threat of irregular practitioners—another topic in search of a historian.²

* I would like to thank Renee Sharrock, Medical Library Associate of the Robert B. Greenblatt, M.D. Library at the Medical College of Georgia, Augusta, Georgia, for showing me the *Southern Medical and Surgical Journal* and for aiding in the finding of many of the primary sources that are used in this paper. I would also like to thank Renee for her patience with this first time researcher. I am very grateful for her assistance and I would not have been able to do this paper without her. I would also like to thank Bruce Henson, Head, Information Services & Subject Librarian for the School of History, Technology and Society, Georgia Institute of Technology, for his help in finding both primary and secondary sources for this paper and for many others as well. I would like to thank Autumn McDaniel for her editing and comments on an early draft of this paper and also for her friendship. I would like to thank Dr. John Tone, at the Georgia Institute of Technology, for his guidance over the years and particularly with this paper.

¹ "Introduction" in *Science and Medicine in the Old South*, ed. Ronald L. Numbers and Todd L. Savitt (London : Louisiana State University Press, 1989), 151.

² *Ibid.*, 151.

For Numbers and Savitt, Southern medical history is itself a frontier in need of a historian³. Before the Civil War, many parts of the American South and West were frontier. They were removed from not only mainstream American life but also from mainstream American medical practice. Southern physicians, understanding, their perceived remoteness strove to create medical organizations and schools that would move Southern medicine from the backwoods and into the forefront of American medicine. One such organization was the Augusta Medical Society, established 1822 for the purpose of enhancing the medical education and knowledge of Southern physicians particularly those in Georgia. Out of this society came both the Medical College of Georgia, founded in 1829 and *The Southern Medical and Surgical Journal* founded in 1836, both of which sought to further medical education in the South. The College sought to provide students with a quality medical education. *The Journal*, which was originally edited by the founder of the Medical College of Georgia, Dr. Milton Antony, served as a locus for continuing medical education in the South. *The Journal* provided a place where Southern medical practices were written about by Southern physicians. It also provided a community where Southern physicians could learn from each other.

One Southern medical journal that has not been explored is the *Southern Medical and Surgical Journal*. *The Journal* shows that Southern medicine was practiced on the geographic frontier and it was also on the frontier of medical practice. *The Journal* was inline with the prevailing trends and beliefs of American medicine of the time. Southern medicine as seen in *The Journal* made inroads into the modern conceptions of the causes of diseases. It also made inroads into the workings of the human body. The grass roots of the modern twentieth century medicine can be found in the American South, in *The Southern Medical and Surgical Journal*. In *The Journal*, Southern physicians maintained connections to Europe through reviews of European medical works and correspondence with major European medical centers. This correspondence with Europe ensured that the Southern physicians who read *The Journal* were informed about medical developments in Europe. Southern physicians kept up with medical developments in Europe and in the rest of the United States and they made medical developments of their own. *The Journal's* contributors, because of their increased mechanistic understanding of the human body, were able to perform surgical operations and to understand how the human body worked. Southern physicians in the *Journal* were able to make advancements in gynecological surgery because of their mechanical knowledge of the female body. These advancements in gynecological surgery helped Southern physicians to improve not only their knowledge of the body, but also the lives of their patients. In addition to performing pioneering surgeries, Southern doctors in Augusta and in

³ Though *Science and Medicine in the Old South* is twenty years old, Numbers and Savitt's call for Southern medicine, frontier medicine and the intellectual history of Southern medical journals to be explored has yet to be answered.

the rest of the South also performed experiments that furthered the development of scientific medicine and contributed to the prestige of the profession. Southern medical journals such as the *Southern Medical and Surgical Journal* allowed Southern physicians to be able to continue their education and to close the gap of their geographical remoteness that separated them from the rest of the country. *The Journal* from the 1830's onward provided Southern physicians with a forum to show not only themselves but also the other American physicians how Southern physicians were on the frontier of medicine.

American Physicians of the Nineteenth century

American physicians, both in the North and in the South, took the European knowledge of the workings of the human body and further extended this knowledge to their medical practices. American physicians made many improvements in the practice of medicine in the early to mid-nineteenth century, including the development of gynecological surgeries to treat previously untreatable gynecological conditions, and the employment of ether in surgical procedures to reduce sensation and pain. As the nineteenth century progressed, American physicians were no longer being trained in Europe, but in American medical schools⁴ instead. American physicians did, however maintain familiarity with European medical developments. The exchange of medical information was by no means unidirectional: as the nineteenth-century progressed American physicians began to share medical knowledge with the Europeans as well.

The Southern frontier

The American South prior to the Civil War was still considered to be on the geographic frontier of the country. With few urban centers, the South was rural in comparison to the major population centers such as New York and Philadelphia. The practice of medicine in the South was also considered by the rest of the country to be rural, rudimentary, and backwards. Richard Dunlap in his *Doctors of the American Frontier*⁵ writes about the practice of medicine on the western frontier and how frontier doctors were used to making do. Even though the physicians who contributed to *The Journal* were not as geographically isolated as the doctors in *Doctors of the American Frontier*, the Southern physicians of Augusta and the surrounding areas, were still relatively isolated from major medical centers. Augusta at the time *The Journal* began had a small population in comparison with the population of New York or Philadelphia. At the time that The College and *The Journal* were founded,

⁴ American physicians at the time were also being trained in medicine through apprenticeship; Paul Starr, *The Social Transformation of American Medicine: The Rise of a Sovereign Profession and the Making of a Vast Industry* (United States of America: Basic Books, 1982), 40.

⁵Richard Dunlap, *Doctors of the American Frontier* (Garden City: Doubleday & Company, Inc., 1965).

Augusta, Georgia must have seemed, to Northern physicians like an unlikely place to start a medical school, much less a medical journal. Dr. Antony created *The Journal* in part to help Southern physicians to be on the frontiers of medicine and not just to be on the geographic frontier of the country. With *The Journal* Southern physicians could share their frontier medicine including their creativity in their medical practices and their resourcefulness with their limited resources with other Southern physicians. This is similar to the frontier physicians that Dunlap discusses. They were able to share their medical experiences with other physicians. The contributors and the readers of *The Journal* were able to receive through *The Journal* an ongoing medical education in how those before them had practiced medicine and also how their contemporaries nationally and in Europe and in the South were practicing medicine. Richard Dunlop writes in his *Doctors of the American Frontier* that frontier physicians had to endure rugged conditions “At the end of a long and wearisome ride, the doctor set broken limbs, bound up wounds and injuries, delivered babies, fought smallpox, pneumonia, and diphtheria.”⁶ In these rugged conditions frontier doctor performed a wide array of medical procedures and cures. On the frontier there was no such thing as medical specialization. Ann Novotry agrees with Dunlop

As Americans moved West in increasing numbers in the first half of the 19th century, physicians, lured by the same prospect of adventure, glory and wealth, followed suit. The reality, however, showed a pioneer physician’s life to be one of peril, toil and privation. Conditions were primitive, and because manufactures medicine were often unavailable, doctors frequently concocted their own. Thus the “primitive” medicine of the frontier became the foundation on which a modern science was building.⁷

Dunlop argues that for frontier doctors, geographic remoteness and the limited supplies did not hinder their creativity or their resourcefulness. In fact being on the frontier for Dunlop augmented the creativity and resourcefulness of frontier doctors.

Great medical scientists even arose in the dark forests of the American frontier. Ephraim McDowell in backwoods Kentucky braved a lynch mob and performed the first ovariectomy in medical history⁸ “The doctor was undismayed. His frontier medical practice had accustomed him to “making do.”⁹

⁶ Richard Dunlop, *Doctors of the American Frontier* (Garden City: Doubleday & Company, Inc, 1965), 2.

⁷ Ann Novotry and Carter Smith eds., *Images of Healing: A portfolio of American Medical & Pharmaceutical Practice in the 18th, 19th & early 20th Centuries*, (New York; Macmillan Publishing Co. Inc, 1980).43.

⁸ *Ibid.*

⁹ *Ibid.* 190.

In *Science and Medicine in the Old South* edited by Ronald L. Numbers and Todd L. Savitt proclaimed that “Unlike science, which directly involved only a small percentage of antebellum southerners, medicine influenced the lives of virtually everyone in the Old South¹⁰. Southern physicians also believed that because of their frontier location that they could improve Southern specific medical knowledge from each other.

Influencing Southern medical institutions

The first medical school in the South was the Medical College of South Carolina This School was founded by the Medical Society of Charleston and served as a guide for other Southern medical schools. In addition to Southern medical schools, local and sometimes state wide medical societies began to arise in the South. With the Georgia Medical Society being founded in 1808, in Savannah, Georgia and the Augusta Medical Society being founded in 1822, these medical societies served as organizations where local physicians could come together and discuss medical practice. These societies helped Southern physicians to continue their medical education and to improve their medical practice. The Medical Society of Augusta was, like other localized medical societies, founded under a *Constitution and Bylaws*. The constitution in its Preamble proclaims to purposes of the Society to be:

When we reflect on the importance of the medical professions; when we consider the high rank it holds in the circle of the Science and Arts: when we take into view that the happenings and prosperity of society are intimately connected with its advancement; we are irresistibly impelled to make every exertion for its improvement, and to render it as perfect as possible. Also influenced by these considerations, and reflecting on the importance of having medical institutions among us ¹¹

The Medical Society of Augusta, Georgia issued another constitution in 1829 which gave more detail about how the society expected its members to behave and it also set standards for medical practice including consultations: “Consultations should be encouraged in difficult and frustrating cases, as they give rise to confidence, energy and more

¹⁰ Introduction” in *Science and Medicine in the Old South*, ed. Ronald L. Numbers and Todd L. Savitt (London : Louisiana State University Press, 1989), 151.

¹¹ *The Constitution Rules and Bye Laws of the Medical Society of Augusta Georgia* (Medical Society of Richmond Co. Georgia 1822).

entured views in practice”¹². In encouraging consultations between physicians, the society was encouraging the physicians in Augusta to share with each other their medical expertise. These consultations would in some ways serve as continued medical education for the members of the society. The 1829 constitution also states in section 13 “Essays” that “At each regular meeting, an essay on some medical subject should be read by one of the members, proceeding in alphabetical order; which shall be laid upon the table, after to discussion.”¹³ These essays were to be read before the society, encouraging its members to formulate their own medical experiences into formats that could be discussed by their peers. These essays and their presentations also showed that the members of the society were concerned with expanding the medical knowledge of its members. The medical societies of the early to mid-nineteenth century were very valuable to medical practice in the South because in an era in which the majority of medical education took place in the context of apprenticeships, continued, albeit, it informal medical education was essential to any possible medical advancements that were made. Medical societies like the one in Augusta influenced medical journals in their quest to further medical education in the South. The medical journals took up where the medical societies left off. The journals provided continued medical education and opportunities for the advancement of medical knowledge. For Southern physicians, the journals were wider in scope than the publications of the local medical societies and because of this; the journals were also able to connect their readers to the rest of the nineteenth century medical world.

The founding of the Augusta Medical College

The Augusta Medical College was founded by Dr. Milton Antony with help from the town of Augusta and the Augusta Medical Society. Dr. Antony’s medical education was an apprenticeship under Dr. Joel Abbott in Washington, followed by the “University of Pennsylvania’s medical course in 1808, where Antony completed only one year of lectures”.¹⁴ Antony saw the need to have more formalized medical education in the South. Dr. Antony founded a school that would provide a good medical education which included anatomy, physiology, and chemistry for aspiring Southern physicians. For Antony, a complete medical education consisted not only of an apprenticeship but also of formalized learning. Dr. Antony sought to make the Medical College of Augusta an accredited medical school. Antony sought the aid of the Medical College of South Carolina in determining if the medical education the Augusta Medical College was at the same level

¹² *The Constitution Rules and Bye Laws of the Medical Society of Augusta Georgia* (Medical Society of Richmond Co Georgia 1829).

¹³ Ibid.

¹⁴ Phinazy Spalding, *The History of the Medical College of Georgia* (Athens: The University of Georgia Press, 1987), 12.

as that of the Medical College of South Carolina. “In addition, the secretary was instructed to send the rules and regulations to the Academy to the Medical College of South Carolina’s trustees to see if the Georgia diploma might be considered “as equivalent to one course of lectures in their school”.¹⁵ The Augusta Medical College adjusted its curriculum and hired new faculty so that it could become a legitimate medical school. The Augusta Medical College with its curriculum adjustments including a pioneering six month lecture term provided a quality medical education for its students. Phinizy Spalding in his *The History of the Medical College of Georgia* discusses the six month lecture term was employed by the founders of the Medical College of Georgia to improve medical education in Georgia and to combat the threat of non-regular medical practices.

The implication was that it was the new and vibrant Medical College, with its extended academic term and its emphasis on thorough educational planning that caused Georgia to be peculiarly effective in resisting the botanic blandishments of the herbalists. ... The school had tired, since 1830, to make its six-month term the norm instead of the traditional four.¹⁶

While medical schools in the rest of the country had lecture terms that were four months long, the Augusta Medical College had six month long lecture terms. The extended terms allowed the students at the College to hopefully have a more complete medical education. This pioneering six month term and the desire to improve medical education continued with the founding the *Journal*.

The founding of the Southern Journal of Medicine and Surgery

Dr. Antony, after the founding of the college saw the need for not only quality medical education but also for the continued medical education of Southern physicians. For this reason Dr. Antony started the *Southern Medical and Surgical Journal* in 1836 The *Journal* was published monthly by the physicians of the Medical College of Georgia and other contributors from all over the South. Antony started *The Journal* as a means for Southern physicians to communicate and learn from each other ways to improve and advanced medical practice in the South. *The Journal* included original articles by Southern physicians, as well as commentary on recent articles published both locally and nationwide. It also included commentary on medical articles that had been published throughout the country. *The Journal* also included reports on medical events throughout the United States and Europe. *The Journal* in addition to reporting national and international medical events, reported local medical events.

¹⁵ Phinizy Spalding, *The History of the Medical College of Georgia* (Athens: The University of Georgia Press, 1987),15.

¹⁶ *Ibid.*, 27-28.

It provided Southern physicians a place to debate, and discusses not only their medical practices but the practices of other physicians as well. With *The Journal*, Southern physicians wanted to push medical frontiers. The common perception of Southern physicians practicing frontier medicine by themselves in rural locations is shattered by the ways in which *The Journal* demonstrates how Southern physicians were in communication with each other. Dr. Antony in his introduction to the first issue of *The Southern Medical and Surgical Journal* in June of 1836 lays out the purpose for the publishing of the journal.

But although they have done and are still accomplishing much for the improvement of medicine, and are justly entitled to the gratitude of physicians, and the appellation of benefactors of mankind- the profession at the South have long regarded and anticipated, as a most desirable object, the establishment of a Journal that should collect and preserve the valuable discoveries and improvements of Southern practitioners relative to the nature and treatment of diseases incident to southern climates. Which for the want of some such convenient and suitable repository, are generally entombed with him with whom they originate, and thus forever lost to the world.¹⁷

For Antony, the South needed a medical journal to further medical advancements and to provide a place where the specificity of Southern medicine could be discussed by southern medical practitioners. Antony next asks for his medical contemporaries to co-operate with him and his colleagues in the maintenance of *The Journal*:

We offer to our contemporaries the pages of a monthly periodical, cordially inviting them to co-operate with us in the enterprise, and confidently trusting that they, with equal zeal and interest, will come to our assistance, and sustain a work so desirable, so important to science and to humanity!¹⁸

For Antony, *The Journal* will be essential to the continuation of the advancement of medicine in the South. Anthony next discusses how the format of *The Journal* will contribute to advancement in medical learning by Southern physicians:

As the principal design for this Journal is to collate and communicate practical information; practical essays of all kinds, histories of epidemics, reports of cases, the application of new remedies, and all interesting medical facts and experiments will be thankfully received. Long theoretical disquisitions, and prolix

¹⁷ *Southern Medical and Surgical Journal*, (June, 1836.). Vol. I. No. I 2.

¹⁸ *Ibid.*, 3.

discussions on controverted points, will be excluded from our number: place, however, will always be given to communications on the collateral sciences, and to all treatises that have a useful bearing, or that may be calculated to promote the grand object in view—the improvement of medicine¹⁹.

The format of *The Journal* indicated that Anthony and the other founders of *The Journal* were striving to push medical boundaries and to expand medical practice and knowledge and to build upon previous and current medical knowledge. The way in which *The Journal* was formatted indicates the kind of education and advancement in medicine that the founders of *The Journal* sought to encourage. As the founder of both the college and *The Journal*, Dr. Antony saw a need for continued medical education in the South and also he also saw a need for Southern physicians to have a forum for discussion and debate of medical practice. *The Journal* served to continue medical education and it also served to advance the practice of medicine in the South. *The Journal* itself was on the frontier because it filled a need for Southern physicians and it put their advancements in medical practice into a format that could be read both locally and nationally.

Connections to Europe in the Southern Medical and Surgical Journal

It has been said that American physicians before the mid-nineteenth century owed the majority of their medical knowledge and medical practices to European physicians and to the already existing and richly established European medical and scientific traditions.²⁰ European medical traditions served as a building block for American medical training, knowledge and practice. American physicians even in the early to mid nineteenth century were becoming builders of a kind of medicine that by the twentieth century would be uniquely American. This being said the Southern physicians who contributed to and edited the *Southern Medical and Surgical Journal* sought to provide Southern physicians with not only regional medical education, but also with education in the classic and newer medical practices from not only the United States but also from Europe. Many members of the faculty of the College, who also wrote regularly for *The Journal*, had connections to Europe for example, Dr. Newton, Dr. Paul, Dr. Eve and Dr. Dugas had “extended and deepened their medical educations by periods of work in Paris, where much of the advanced research in medicine was being done”²¹ all these men brought to

¹⁹ Ibid.

²⁰ John Harley Warner, *Against the Spirit of the System: The French Impulse in Nineteenth-Century American Medicine* (Baltimore, 1998), 3.

²¹ Phinizy Spalding, *The History of the Medical College of Georgia* (Athens: The University of Georgia Press, 1987), 23

Augusta a kind of experience and background that was surprising in its depth and must have inspired awe among the students at the College most of whom came from rural Georgia or similar areas in South Carolina and Alabama”²². The connections to Europe that the faculty possessed helped them to be on the frontier of medicine despite the remoteness of Augusta. These connections also influenced the faculty of the school to each contribute about 1000 dollars so that, in 1834 Dr. Dugas could acquire classic medical texts from Europe. In this way, the library of The College could be enriched and the students of the Augusta Medical College could gain both a practical medical education based on the study of chemistry, anatomy and physiology and a medical education in the classic texts from Europe²³.

With an adequate room to house these volumes in the new building and a place for museum space and reading as well, the Medical Collage could boast an atmosphere that was conducive to study and learning. Dugas acted as the librarian.²⁴

In the tradition of the College and the Medical Society of Augusta, *the Journal* throughout its run, maintained close connections to Europe and, the rest of the country. In *The Journal*, there are many examples of foreign influence including monthly reviews of European medical discoverers and reviews of the writings of European physicians. In the Monthly Periscope of the July 1836 issue of the Journal an extensive review appeared of M. Louis’s discoveries regarding the “Pathological Anatomy of Phthisis”:

Extremely accurate and minute observations of M. Louis on the whole one hundred and twenty- three cases of his inspection, do not confirm the observation of Laennec and others, of the existence of cavities communicating with the bronchia, and lined, as in tuberculous excavations of long standing...²⁵.

The editors of *The Journal* feel it is not really possible that M. Louis’s results deviated so much from the historic medical knowledge about Phthisis:

We think it strange, but not impossible, that the observations of all may have been correct, and that in Louis’ one hundred and twenty three cases, there may have been none of those cicatrices which were observed by others. But we would suggest a view of this phenomenon, which may perhaps tend to reconcile these apparently opposite observations. We are of the opinion that

²² Ibid., 23.

²³ Ibid., 33.

²⁴ Ibid., 34.

²⁵ “In the Monthly Periscope “Pathological Anatomy of Phthisis” *Southern Medical and Surgical Journal*, (July 1836, 1836) 113.

abscesses do form in the lungs, a simple, and every way of the same character as those which form in the superficial cellular tissue; that they terminate by suppuration, and discharge through the bronchi; and entirely heal, and the patient recovers from all appearance or evidence of disease²⁶.

The editors of *The Journal* have found a compromise between M. Louis's new discoveries and older established medical knowledge. In forming this compromise the physicians of *The Journal* were using their anatomical knowledge to critique and improve on medical research from France. This willingness to challenge European conventions shows that the physicians of *The Journal* were confident in their ability to add to medical knowledge.

The contributors to *The Journal* often when writing about various medical topics give a history of the previous medical knowledge about the topic. These histories include major European contributions to whatever medical practice or procedure that the physician was writing about as is evident in the case of the double inclined plane, where J.C. Nott, M.D. reports that "Sir Salty Cooper, Dupuytren, Travers, Charles Bell... and other surgeons of high repute in Europe, have recommended different modification of the double inclined plane in certain cases of fracture".²⁷ Nott like so many other physicians who wrote in the journal searched in Europe for the history of the thing that he was writing about. They sought at times to challenge, the conventions and confines of established European medical traditions. It is because of these challenges that Southern physicians were able to show that they were on the frontiers of medicine.

Southern Physicians and the Mechanistic man

Southern physicians were greatly influenced by the European proponents of the mechanized body. Though heroic medical practices based on humoral theory was still part of medical practice for southern physicians in the early to mid-nineteenth century. Southern physicians were increasingly participating in a very nonhumoral in the mechanization of the human body. The increased mechanization of the human body led not only Southern physicians, but also physicians in the rest of the country and Europe to gain intense knowledge of the workings of the human body. This intense mechanical knowledge contributed to much medical advancement in the early to mid-nineteenth century. Southern physicians as expressed in *The Journal* were also increasingly viewing the human body as working like a machine. When a part was broken that it could be fixed and then the whole machine (body) would again be in working order. The mechanistic view of the body was exemplified in Southern medical

²⁶ Ibid.

²⁷ J.C. Nott "The Case of the Double Inclined Plane" *Southern Medical and Surgical Journal*, (May, 1839,) 452.

practice was in direct contradiction to the humoral theory of medicine because the mechanistic view of the body separates the disease from the patient and allows for the specific correction and treatment to specific diseases. The physicians who published in the *Southern Medical and Surgical Journal* increasingly described the workings of their patient's bodies as mechanical. W.H. Robert, M.D., in his piece *Surgical cases occurring in the practice of L. A. Dugas, M.D. Professor in the Medical College of Georgia* discusses multiple surgical cases of Dr. Dugas. One such case is that of an *Aneurism-Ligature of the Brachial Artery*. Dr. Robert reports that Dr. Dugas wants to explain why the wrist of the patient experienced convulsions after the operation:

The only explanation we can offer for this is, that on the day after the operation, there existed a considerable degree of febrile action, by which the blood was propelled with more force through the new channels of circulation than subsequently when the excitement subsided, and that the heart's ordinary impulse was again felt only when the anastomosing vessels has acquired an increased caliber.²⁸

Dr. Dugas was give the problem of unexpected convulsions after an operation comes up with a very mechanical possible explanation. Ideas of blood being propelled by large amounts of force are reminiscent of steam or water being forced through pipes in a locomotive which would cause the locomotive to shake or convulse. Dr. Dugas sees the human body as working like a machine and this helps him understand previously unexplained consequences of surgery. The hand of Dr. Dugas's patient was not the only part of a body that was mechanized by the physicians who contributed to *The Journal*.

Not only were the bodies of the patients of Southern physicians, who wrote in *The Journal*, mechanized, but Southern physicians were pioneering the use of mechanical devices in their medical practices. These mechanical devises extended the physician's mechanical knowledge of the workings of the body to the tools that they employed to correct conditions and diseases in the human body. The contributors to *The Journal* often wrote about machines that they used in their medical practices. Dr. Antony in his article "Cases of fracture of the Os Femoris –Adjustment by weight and fulcrum" discusses how fractures of the leg can be treated by the use of a simple machine. Dr. Antony describes the machine that was put in place to correct the fracture:

A short roller bandage was then passed around the ankle and the bottom of the foot, where a string was attached, which, passing over the foot of the bed or platform about six inches beyond the heel, suspended a piece of brick, weighing about two and a half pounds.

²⁸ W.H. Robert M.D. "Surgical cases occurring in the practice of L. A. Dugas, M.D. Professor in the Medical College of Georgia" *Southern Medical and Surgical Journal* (Feb, 1839), 295.

After adjusting the fragments by extension and counter-extension, made by the hands of assistants, four short splints made of veneering, were then placed on the thigh and secured by a many-tailed bandage, as snugly as possible without being uncomfortable.

²⁹

Dr. Antony also describes why this procedure is important to medical practice.

Duty to the science of Surgery, as well as to the cause of humanity, seems to demand of me this exposition of my practice in cases of fracture of the femur, which establishes in the most satisfactory manner, the propriety of a plan of management at once calculated to ensure the best success, with the simplest apparatus and the least distress³⁰

Antony has used his new understanding of the human body as well as his desire to further medical knowledge, to modify machines in order to fix broken legs that without the machine would not have been able to be repaired with the same results that Dr. Antony achieved. Dr. J.C. Nott ³¹ of Mobile Alabama also used a machine to aid the treatment of a patient. Instead of using a weight and a fulcrum Nott used a truss and a plane to treat and correct a fracture of the femur. Nott wrote in his “The use of the Double Inclined Plane in Fractures of the Lower Extremities” that:

I am not so wedded to my own opinions or inventions as to believe that the apparatus I propose is perfect (for my objective has been to contrive the simplest one possible which would fulfill the indications,) but I assert boldly that all the fractures of the thigh

²⁹ M. Antony, “Cases of Fractures of the Os Femoris --- Adjustment by weight and fulcrum” *Southern Medical and Surgical Journal*, (Oct. 1836, 1836) 281.

³⁰ *Ibid.*, 285.

³¹ Dr. J.C. Nott wrote extensively about race and disease. He also theorized that mosquito as the vector for malaria and he also wrote about yellow fever. Nott is a controversial figure for his work on the racial differences that showed that African Americans were biologically different from whites and thus inferior. The work of Nott and others was used to justify not only slavery but also some of the racist attitudes that still persist today. Medically enforced racism is another topic in Southern medicine that has been heavily analyzed by historians of not only race but of gender also. While J.C. Nott is viewed as a perpetrator of scientific racism, his work in advancing a mechanistic view of the human body must not be underestimated. This understanding allowed Nott to use machines to aid in the medical practice and to advance Southern physicians abilities to treat patients. This mechanistic view of the body is inline with many other physicians who contributed to *The Journal*. ; Reginald Horsman, *Josiah Nott of Mobil: Southerner, Physician, and Racial Theorist* (Baton Rouge, 1947).

and leg can be treated with more comfort to the patient less risk of deformity by some apparatus acting on the same principles³².

Nott next describes how the double inclined plane is constructed:

The apparatus was constructed in the simplest manner. We procured two pieces of white pine board, five inches wide, and long enough when placed under the limb, to reach from the tuberosity of the ischium three inches below the sole of the foot. One of the boards was then sawed in two, exactly opposite the knee joint. We thus had at once, a thigh piece, a leg piece, and a horizontal piece to rest on the bed and support the other two—the thigh and leg pieces were then hinged together with leather and tacks and the thigh piece was fixed...³³.

In describing the double inclined plane, Nott sounds more like an engineer or a mechanic than a physician but his description of the double inclined plane can be attributed to his mechanical understanding of the human body and how he has extended comprehension to the machines that he uses to fix broken bodies. Nott's willingness to use machines for medical purposes demonstrates that Southern physicians were willing to expand their medical frontiers by expanding their mechanical understanding of the human body. The aforementioned use of the truss and plane (or the double inclined plane) to mend broken legs, which was pioneered by Dr. Nott, is still being used in various forms today for the same purpose. Dr. Nott's double inclined plane is just one of many examples of how Southern physicians were willing to experiment with mechanical tools and these experiments resulted in different ways of correcting conditions.

Pioneering surgeries

Not only did Southern physicians in *The Journal* employ machines to aid in the treatment of their patients, in pioneering ways, they also began to use their mechanistic knowledge of the human body to perform surgeries that previously not been able to be performed. Southern physicians who were writing in *The Journal*, when they encountered seemingly incurable conditions and diseases often used their new found mechanical knowledge of the human and in this case female, body to push the boundaries of medical practice. It was also at this time that American medicine was developing specializations in medical practice. The contributors to *The Journal*, who were becoming increasingly specialized, sought like physicians in the rest of the country to make medical advancements. One of these specializations was the participation of American physicians in general and Southern physicians in particular in the treatment of gynecological conditions and female diseases. The

³² J.C. Nott, "The Use of the Double Inclined Plane in Fractures of the Lower Extremities" *Southern Medical and Surgical Journal*, (1839), 449.

³³ J.C. Nott, "The Use of the Double Inclined Plane in Fractures of the Lower Extremities" *Southern Medical and Surgical Journal*, (1839), 456.

gynecological medicine that was being developed in the early to mid-nineteenth century by Southern physicians not only included the development of new gynecological surgeries but also the participation of Southern physicians in prenatal care and the attending of births. Since Southern physicians were attending more births, they wrote in *The Journal* about the ones that they found to be unusual and thus medically interesting, so that other physicians might benefit from how the Southern physicians handled the unusual cases. Dr. Antony wrote in his article “Contributions from the Obstetric record” about how physicians nationally and also in the South were increasingly entering into obstetric practice. Antony states that because physicians were relatively new to obstetric practice they needed to learn as much about it as they could about female anatomy and the birthing process.

That is to this preparatory knowledge, as that of chemistry, anatomy, physiology, &c. is to the business of curing diseases. The practitioner must learn thoroughly, healthy, healthy, natural labor with all its circumstances and characteristics, before he can be supposed in possession of ability of proper diagnosis a science itself, in importance, not less to the regarded, studied, and values in obstetrics, then in general pathology. And he must learn to determine, not only the phenomena which characterize those labors which may need no more than ordinary friendly services in the lying-in room, but also all those which distinguish the various deviations there from.³⁴

Antony also writes about the merits of having a physician accoucheur instead of a mid wife:

Here is the merit of the accoucheur. Familiar with all ordinary and all extraordinary occurrences and with knowledge of the physiological and pathological nature of each, and their deviations from one another, he is at once prepared for efficient action, or prudent inaction, according to the real demands of the case.³⁵

Antony is acknowledging not only the shift from midwives to physicians when it came to the attending of births but is also acknowledging that southern physicians, because of their understanding of the female body and the birthing process, as authorities in gynecological medicine:

Most of these births went normally following the natural progression of birth while others did not. The Southern physicians wrote in the journal about the cases of unusual births because they wanted to seek advice from their medical community as to, best handle regular and

³⁴ *Southern Medical and Surgical Journal* Vol., I Jan, 1838 No. I 331.

³⁵ *Ibid.* 332

non regular births. One physician wrote about a case of a child that was born after the mother had died:

All of the bones of the head were removed, and the child still did not advance. The uterus was in a very unfavorable condition for and operation of this kind, and the patient suffered so much, and was so much exhausted, that we thought it most prudent to desist for the present... She had become distended to fully twice her natural size with gas—not only the abdomen and thorax, but the head, neck, and extremities. I have no doubt that the child was forced out by this extrication of gas.³⁶

Since the physician knew that a baby could not be born after its mother was deceased. The physician was able to use his mechanical understanding of the female body and the birthing process to determine a mechanical explanation for the unusual birth. Included in these births were those that were unusual due to anatomical anomalies in the mother. Professor Meigs wrote about a very unique anatomical anomaly that he encountered when he was attending two separate births. The first case occurred in October of 1846 after observing that a mother was having great difficulty with a birth Dr. Meigs proceeds to manually determine why the birth is not proceeding normally:

It was but as moment that I indulged the idea of a rupture of the cervix, for upon pushing the index farther, and flexing the finger. I found I could draw the point of it outwards, pulling along with it the bridle in question. Still I did not understand the case until, having withdrawn the indicator. I examined with it the structure of the external parts, and then learned that the lady was possessed of a double vagina.³⁷

Dr. Meigs, after discovering that his patient had the double vagina, had to perform surgery in order for the woman to be able to give birth. Dr. Meigs found it necessary to use his mechanical knowledge of the birthing process and of female anatomy to correct an anatomical anomaly and to deliver the fetus safely. Southern physicians in *The Journal* also wrote about unusual births that included twins and triplets. One case in particular involved the delivery of triplets two of which were head locked in the vagina making the delivery of all three babies incredibly difficult.” On this examination the doctor discovered the head of a third child below the superior strait, whilst the head of the second, whose body was delivered, was still above the same strait, constituting a case of locked head.”³⁸ In

³⁶ *Southern Medical and Surgical Journal* Vol., I May 1839 No.III 461 J.C. Nott.

³⁷ Ed. Paul F. Eve and I.P. Garvin M.D. *Southern Medical and Surgical Journal* Vol., III 1847 New Series Augusta GA. James McCafferty, printer and publisher, 1846. March 1847. 17.

³⁸ *Southern Medical and Surgical Journal* Vol., I Oct, 1837 No. I 181

order to deliver the triplets the physician had to use his knowledge of the normal birthing process and his experience with abnormal births to determine the best course of action. The physician had to know the limits of the human machine and his own limits as to how much he could interfere and impact the mechanical process an abnormal birth. These records not only show that Southern physicians were attending more births, but that they were needed as medical professionals to perform deliveries of infants, that midwives might not have been able to. By writing about these unusual births in *The Journal*, the physicians who had attended the births were trying to advance the medical practices of other southern physicians. These advancements led to a better understanding of birth and augmented the physicians' mechanical understanding of the body. The gynecologicaly based articles in *The Journal* further the continued desire of the editors and contributors to *The Journal* to further the continued education of the readers of *The Journal*.

Southern physicians and birthing

Southern physicians were often also called into births that had started normally, but ended abnormally, thus going beyond the expertise of the midwives. One such case involves the failure of the placenta to be expelled with the fetus. In this case the placenta was retained for thirteen days and then expelled.³⁹ The physician combined his mechanical understanding of the human body with heroic medical practices, the administration of ergot, and manual manipulation of the uterus, in which he attempted to manually remove the placenta that natural labor had failed to remove.

Having secured it there, the index finger of my right hand was introduced, per vaginam, slowly and cautiously. The complaints of the patient were boisterous during the stage of the examination, and when my finger reached the os uteri her agony seemed very great. I examined it, however, in the most gentle manner possible ⁴⁰

The physician is using his own hands as mechanical objects to aid in the mechanization of birth. This case once again demonstrates that not only were southern physicians attending more and more births but they were using anatomical knowledge to help correct gynecological conditions that sometimes resulted from those births.

Childbed convulsions

³⁹ *Southern Medical and Surgical Journal* Vol., I June, 1836 No. I 195. M. Anthony.

⁴⁰ *Southern Medical and Surgical Journal* Vol., I June, 1836 No. I 195 M. Anthony.

Southern physicians were also interested in finding a treatment for childbed convulsions that sometimes occurred after a birth and were one of the contributing factors for high post-partum mortality rates. One physician was able to stop childbed convulsions in one patient when he manually created convulsions of the uterus thus stopping the convulsions of the whole body. This physician was pioneering a new medical technique and was making advancement in gynecological medicine.

The uterus was immediately grasped and agitated repeatedly through the abdominal parietes until its contractions could be distinctly perceived to return with increasing strength, every four or five minutes. From the first application of the hand, no other paroxysm returned, and after about fifteen minutes from the commencement of this operation. The apoplectic symptoms disappeared, and she opened her eyes with intelligent expression⁴¹

This physician also used his hands as a kind of machine and thereby was able to help the mechanical body of his patient work better. Southern physicians used not only their mechanical understanding of how the body worked in their medical practices, but they also employed tools such as the forceps and the speculum to aid in the deliveries they participated in and also in the gynecological surgeries that they performed.

Southern physicians, as the nineteenth century went on, performed more and more gynecologically-based surgeries, which became increasingly advanced and diversified as the nineteenth century went on. These surgeries were largely corrective in nature and demonstrate how Southern physicians were pioneering in a largely new field. One surgery that was increasingly performed was the correction of the prolapsed uteri. Another Southern physician writes to Dr. Antony about one of the cases of Prolapsus Uteri that he encountered in order to seek Dr. Antony's advice about how to go about treating the painful condition:

But as uterine—i.e. prolapsus uteri as the original disease, and dysmenorrhoea, & c., as consequences of the primary displacement. To verify my diagnosis, I requested and was primary displacement. To verify my diagnosis, I requested and was permitted to make a vaginal examination, and thus found the os uteri resting on the perineum: its lips anterior and posterior, and its neck enlarged, indurated, and painful. ⁴²

The ability to correct gynecological conditions such as the Prolapsus Uteri was a new advancement physician. Such new developments in gynecological surgery, reported in *The Southern Medical and Surgical*

⁴¹ Ibid. 25.

⁴² *Southern Medical and Surgical Journal* Vol., I April, 1839, No. I 426. Vol.III. Augusta GA. Printed by Guieus & Thompson McIntosh street

Journal represent just another medical frontier that Southern physicians were blazing.

Medical experimentation and the development of scientific medicine in the South

The contributors to *The Journal* were not only performing pioneering surgeries but also participated in experimentation for the purpose of expanding their medical knowledge. This experimentation took several forms and further shows the eagerness of Southern physicians to advance medical knowledge and to report these advancements for the benefit of other in *The Journal*. It also shows that Southern physicians were advancing the development of scientific medicine. One area where the physicians of *The Journal* performed experiments and made medical discoveries was with regards to Galvanism. Southern physicians performed experiments to determine the medical usefulness of Galvanism. The contributors to *The Journal* had high expectations for Galvanism:

We look with pleasure to the day when galvanism will become one of the most important and agreeable agents at the command of the practitioner for the regulation of excitement, especially local excess and deficiencies. We have witnesses for many years its decided power of lessening action at one pole and increasing it at the other—thus proving its power of translation or revulsion.⁴³

These high expectations led the physicians of the journal to perform experiments using galvanism to treat a variety of medical conditions. In the September 1839 issue *The Journal* once again discusses the medical benefits of Galvanism. Dr. J.A. Hamilton of Waynesboro Georgia writes that:

I applied the box once, and let it remain fixed to the knee for one hour: at the end of which time, he was able to extend his leg nearly to its greatest length.... The next day, however, I found him, when sitting, or in a recumbent posture, able to extend the limb perfectly; but when in an erect posture, he was only able to bring the toes of the diseased limb to the floor. The Box was now applied again, and in one hour he was able to stand firmly on his feet. Two days after this second application, I saw him again, and was happy to learn that he had suffered no return of pain, and was able to pronounce himself perfectly well.⁴⁴

⁴³ “Medical Application of Galvanism Part III.-Monthly Periscope” *Southern Medical and Surgical Journal*, (Aug. 1836),183

⁴⁴ “Medical Electricity” *Southern Medical and Surgical Journal*, (Sept. 1839), 764-765.

Dr. Hamilton has used the Electrical box, or Box of Sousselier which he had just obtained to treat a patient who had always suffered from bad health. Hamilton's experimentation with the box does not contain any of the data collection that is now associated with experimentation but it is still a physician experimenting with an unknown tool. At a time when Galvanism and the nature of electricity in and outside of the human body were still being discovered, Southern physicians like Hamilton were using it with success to treat patients. However, Dr. Hamilton was not the only Southern physician experimenting with Galvanism E. L'Roy Antony, M.D. in his article "Hemiplegia: Notes on the Application of Galvanism with Sherwood's Vibrating Battery." Describes the mechanical electrical working of the human body:

That the human organism was nothing more or less than an electrical machine—that the various functions, secretion, assimilation, conception, &c., were only the results of the diversified plays of electricity under various forms and circumstances—that the "vis nervosa," with its hundred cognomena, was electricity, galvanism, magnetism, or any other name, but still the same active and all pervading agent—that the nerves were only telegraphic wires, holding in communication the capital and every extremity of the empire- that animal life, in short, was only a result of its affinities!⁴⁵

Dr. Antony places his research with galvanism in the context of his training, which taught him to look at the human body working not just as a machine but as an electric machine. The electro-mechanical conception of the body prompted Dr. Antony to experiment using Galvanism to treat a variety of conditions including paralysis, Rheumatism and pleuritis.⁴⁶ The contributors to *The Journal* recognized they were in a unique position to expand to potential for medical practice. Southern physicians with their medical experiments regarding Galvanism generated a jumping-off point for further exploration and experimentation of the effects of electricity on the human body. This pioneering research provided insights into the electrical workings of the human body which is still being studied in modern medicine in modern medicine. Because Dr. Antony and the other contributors to *The Journal* wrote about their experiments, their results could be compared with the results of other physicians using Galvanism across the country. Also because the access to the machines used in Galvanism and the knowledge of how to use the machines was somewhat limited. The physicians who wrote about their experiments with Galvanism in *The Journal* were pioneers and provided examples for other Southern physicians, who would not have been able to be educated about

⁴⁵ E.L'Roy Antony, M.D. "Hemiplegia—Notes on the Application of Galvanism with Sherwood's Vibrating Battery" *Medical and Surgical Journal* Edited by Paul F. Eve MD Vol. IV 1848 New Series Augusta G James McCafferty printer and publisher , 79.

⁴⁶ *Ibid.*, 83.

the potential benefits of Galvanism any other way. The experimentation of the physicians of *The Journal* on Galvanism expanded scientific knowledge and it expanded scientific medicine in the South. This research into the use of Galvanism increased medical knowledge about the electromechanical workings of the human body and contributed to many modern medical developments including pacemakers.

Southern medical experimentation with anesthetics

Up until the mid-nineteenth century, the possibility of eliminating or reducing pain or sensibility during surgery had eluded physicians and surgeons.⁴⁷ With the discovery of ether and chloroform a whole surgical frontier was opened. The first physician to employ ether in a surgical procedure was “Without question the first individual to use ether as a surgical anesthetic was Dr. Crawford W. Long (1815-78) of Jefferson, Georgia (a Southern physician) ...On March 30th, 1842, he removed a small wen or tumor from the neck of one James Venable while the patient was under the influence of ether”⁴⁸. Dr. Long, a physician who practiced medicine on the American frontier was inventive in his medical practice by employing ether in his medical practice he was able to alleviate pain. Though Dr. Long was the first recorded use of ether in surgery, the first published surgery performed with ether was performed by Dr. Morton and Dr. Warren. Jacob Bigelow (1818-1890) in his article “Insensibility during Surgical Operations Produced by Inhalation” describes the first publicized surgery that was preformed while the patient was under the influence of either.

On the 16th of Oct., 1846, an operation was performed at the hospital, upon a patient who had inhaled a preparation prepared by Dr. Morton, a dentist of the city, would be alleged intention of producing insensibility to pain. Dr. Morton was understood to have extracted teeth under similar circumstances without the knowledge of the patient. They present operation was performed by Dr. Warren and, though comparatively slight, involved an incision near the lower jaw of some inches and extent. During the operation, the patient muttered, as in a semi-conscious state, and afterwards stated that the pain was considerable, though mitigated.⁴⁹

Because of the use of ether, surgery started to become no longer a last resort for patients. Before discovery of the use of ether, patients usually only opted for surgery if they had conditions that that they were most likely going to die from if they did not have surgery.

⁴⁷Roy Porter, *Blood & Guts: A Short History of Medicine* (New York: W.W. Norton & Company, 2002).

⁴⁸ John Duffy, *From Humors to Medical Science A History of American Medicine* 2nd ed.(Chicago: University of Illinois Press, 1993)113.

⁴⁹ Gert Brieger,ed., *Medical America in the Nineteenth Century: Reading from the Literature* (Baltimore: The Johns Hopkins Press, 1973),170.

With this opening of a surgical frontier, surgeries began to be considered as viable medical treatments and were no longer the last resort of desperate physicians. Another area where Southern physicians experimented was in anesthetics. In the late 1840's Southern physicians began to employ chloroform and ether in their medical practices. Though the usage of chloroform had been started in Europe it was tested in surgical cases that were reported in *The Journal*. In the medical intelligence section of the February 1848 issue the editors report that:

The announcement of a new anesthetic agent, by Prof. Simpson of Edinburgh, has created quite a sensation in the medical profession of Europe. Etherization has been far more generally employed abroad than in the United States. It is there used extensively in the practice of Surgery and Midwifery, The distinguished Professor of Obstetrics in the Scottish capital, Dr. S., has been pursuing this subject like a true philosopher: and having satisfied himself and other that chloroform possesses decided advantages over either, he has like Jenner, presented in it an invaluable agent to the medical profession- a great boon to the suffering humanity.⁵⁰

The editor has declared the discovery of chloroform to be a monumental medical advancement. The editor in the educational spirit of *The Journal* sought to inform his readers of the potential uses of chloroform. The physicians of *The Journal* did not leave the discovery of the potential medical uses for chloroform to the Europeans, but performed their own experiments with both ether and chloroform:

Jan 5th Amputation of the Leg, for necrosis – complete insensibility was produced by the inhalation of sulphuric ether. The patient was a youth; aged 20,... He had to be urged for several minutes to breath the ether; experienced disturbed dreams, but states he knew nothing of the operation.⁵¹

Jan 29th Amputation partial of the foot—complete, death- like insensibility produced by chloroform. ... A sponge saturated with chloroform was forcibly held to her nose and mouth, and in a few seconds she was rendered insensible. She remained so for more than half an hour after the operation was performed and the dressing applied⁵².

The editors of *The Journal* after performing their experiments proclaimed that:

⁵⁰ *Medical Intelligence: Medical and Surgical Journal* Edited by Paul F. Eve MD Vol. IV 1848 New Series (Augusta: James McCafferty printer and publisher February, 1848), 122.

⁵¹ *Ibid.*, 187.

⁵² *Ibid.*, 187.

The chloroform acted promptly and efficiently in all the cases to which it was applied, giving entire satisfaction; but the insensibility was not continued long enough in one case, on account of the limited supply of it. We give out decided preference to chloroform, over ether.⁵³

The editors, like physicians in the rest of the country, performed scientific experiments in order to determine the usefulness of both ether and chloroform in surgical operations. The editors after seeing the benefits of anesthesia to surgical patients proclaimed that in surgical operations particularly birth that ether or chloroform should be employed:

Whether we shall be 'justified' in using this agent under the circumstances names, it will become, on the other hand, necessary to determine whether, on any grounds, moral or medical, a professional man could deem himself 'justified' in with holding and not using any such safe means, as we at present presuppose this to be,) provided he had the power, by it, of assuaging the pangs and anguish of the last stage of natural labour.⁵⁴

In sharing the results of experiments in surgeries using either and chloroform in *The Journal* the editor is encouraging his readers to make experiments themselves and to develop their own conclusions based on their own experiments on the medical usefulness of ether and chloroform . The editor is encouraging his reader to practice scientific medicine and to be on the frontier of medical practice. The editor is also encouraging the readers to make strides in the continuation of the medical education of the readers of *The Journal*.

The increased experimentation with regards to chloroform, ether, and Galvanism is in line with feelings all over the South at the end of the 1840's of heightened excitement about the progress of medicine at the time. This excitement was paired with a common desire to continue to improve and change medical practice. In his introductory address Dr. Daniel Drake addressed the incoming class at the University of Louisville in 1847. Dr. Drake encourages the students to advance the science of medicine.

Our students do not propose to themselves, that they will strive to enlarge the boundaries of our science. But why should they not? The American mind is not inferior in strength or invention to that of Europe⁵⁵.

⁵³ " Medical Intelligence: *Medical and Surgical Journal* Edited by Paul F. Eve MD Vol. IV 1848 New Series (Augusta: James McCafferty printer and publisher February 188)

⁵⁴ *Ibid.*, 191.

⁵⁵ Daniel Drake M.D. *Strictures on some of the defects and infirmities of intellectual and moral character, in students of medicine; and introductory lecture, delivered in 1847.* Published by Prentice and Weissinger Louisville Ky. 1847) 15.

For Dr. Drake, Southern medical students should expand medical science. Also for Drake American medicine was becoming distinctive from European medicine. Dr. Drake hope for the future of American medicine was it would continue to push the boundaries of medical science. Dr. Drake also hopes for the continued medical education of Southern physicians through Southern medical schools, societies and journals. Drake was not the only physician who saw the potential for American (Southern) medicine to make its own frontiers. In his introductory statement to the 1850 edition of *The Journal* the new editor I.P. Garvin M.D. says

The medical profession in the south contains within its ranks as much intellect and scientific attainments as that of any other section, and an effort is all that is necessary to secure that place in the public estimation to which it is justly entitled. Already many of the contributors to this Journal have made themselves favorably known to their brethren throughout our country, and we hope that many more through the same agency, will obtain a like honorable distinction⁵⁶.

Garvin wants to continue in *The Journals'* tradition of advancing medical knowledge in the South. He also wants southern physicians to seek to further scientific medicine and he sees great possibility for this in not only the *Southern Medical and Surgical Journal* but in other Southern medical journals as well. Garvin sees that *the Journal* will continue in the mission of its founder Dr. Antony for medical advancement and exploration of medical frontiers. The physicians who wrote in the *Southern Journal of Medicine and Pharmacy*, which was published in Charleston and was edited by J. Lawrence Smith, M.D. and S.D. Sinkler M.D. also called for their readers to expand medical science. They characterize medical practice in the South as pioneering:

In our section of the country, something has been and may still be done, in aid of the advancement of medicine, which during the present age, has progressed with far more rapidity than could have been anticipated by the most sanguine of its professors. The microscopist and the chemist are now among the most conspicuous of its friends, and their labors have left an indelible stamp upon the future study of medicine.⁵⁷

By their journal, as with *The Southern Medical and Surgical Journal* they hoped to continue to advance medical knowledge in the South and to

⁵⁶ I.P. Garvin, M.D. "To the Reader" *Southern Medical and Surgical Journal* Vol. VI. 1850-New Series, (Augusta, Ga. James McCafferty Printer and Publisher 1850),1.

⁵⁷ *Southern Journal of Medicine and Pharmacy*. Edited by J. Lawrence Smith M.D. and S.D. Sinkler M.D. "Art. I. ---Introduction." Vol. I. No. I (Charleston, S.C. January, 1846). 1-2.

continue to encourage southern physicians to make and explore their own medical frontiers.

The excitement of the Southern physicians for the possibility of further medical advancement who wrote in *The Journal* corresponded with the national excitement of physicians across America. With the formation of the American Medical Association and meetings of the National Medical Convention in 1848, American physicians had high hopes that they would be able to solidify their professional eminence as the primary providers of health care in America. The struggle for professionalization for American, both northern and southern, physicians had been going on since colonial days. Southern physicians like physicians in the rest of the country⁵⁸ knew of the lower-than-desired public opinion of physicians and that Northern physicians and others, sometimes viewed the Southern practice of medicine as backward because of its geographic remoteness. Southern physicians also knew that they were not backward and that they could be on the geographic and medical frontiers of the country. In order to expand the medical frontiers of nineteenth century American medicine, Southern physicians built on European traditions and used their European connections to further their understanding of the human body. Southern physicians expanded on and challenged European medical advancements. This desire to advance medicine throughout the South was facilitated in part by the increased mechanistic understanding of the working of the human body that the contributors to *The Journal* employed in their medical practices and then shared this mechanistic understanding of the human body with other physicians through *the Journal*. Southern physicians used their mechanistic understanding of the body to develop pioneering surgeries including gynecological ones. These surgeries led to the correction of previously uncorrectable conditions. They also used the new paradigm to employ machines in their medical practices, which, like the surgeries, corrected conditions that without the machines not have healed as well as they could have. Southern physicians continued to push the frontier of medicine with their experiments with Galvanism and anesthesia. The *Southern Medical and Surgical Journal* provided Southern physicians a place to report and discuss their pioneering medical findings and practices. *The Journal*, just like the findings contained within, was itself pioneering. I.P. Garvin M.D. in 1850 in a letter to the subscribers to *The Journal*, when he took over as editor outlines the purpose for *The Journal* and that purpose is to continue to be pioneering:

The legitimate object of the medical press is not the advancement of pecuniary interests, or the gratification of personal ambition- it had higher ends and nobler aims in view: therefore, among them can be now rivalry, but rather a noble emulation to excel each other in

⁵⁸ Paul Starr, *The Social Transformation of American Medicine: The Rise of a Sovereign Profession and the making of a Vast Industry* (United States of America: Basic Books, 1982), 17.

efforts to advance the cause of medical science, and thus to promote the physical welfare of their fellow man.⁵⁹

For Dr. Garvin and the other editors and contributors to *The Journal*, It would serve to encourage not only physicians in the South but also all American physicians to be pioneers on the frontiers of medicine. As the editors of *Science and Medicine* pointed out, Southern medical journals, like *The Southern Medical and Surgical Journal*, are calling out to be explored both for what they can teach us about medicine in the South and are also calling out to be explored for what they can teach us about the American medical frontier of the nineteenth century. The physicians who contributed to *The Journal* were aware of their potential contributions to the science of medicine, paradoxically in the modern day, the *Southern Medical and Surgical Journal* and others like it, Southern medical practice and the medical world of the nineteenth century are still wild frontiers that have only just started to be explored.

⁵⁹ I.P. Garvin, M.D. "To the Reader" *Southern Medical and Surgical Journal* Vol. VI. 1850-New Series, (Augusta, Ga. James McCafferty Printer and Publisher 1850).2.

**“NOT JUST THE WEATHER:” THE ENVIRONMENT CREATING
MARTIN DELANY’S *THE ORIGIN OF RACES AND COLOR***

by

J. ERIC ROBINSON, MA
(Saint Louis College of Pharmacy)

Widely—and correctly—perceived as a refutation of Charles Darwin’s *The Origin of Species*, Martin Delany’s *The Origin of Races and Color* (1879) serves also as a refutation of the political climate of South Carolina after Reconstruction.¹ It may have also been intended to rehabilitate Delany, in the eyes of some, after previous decades’ support of the American Colonization Society and more recent support of former slaveholder, Confederate general, and South Carolina governor Wade Hampton. His essay presaged arguments against Darwin, by figures in the South who, ironically, appropriated Darwin to justify Jim Crow. More importantly, however, it served as Delany’s way of making peace with a bitter episode immediately preceding its publication. Thanks to it, we can see a continuation of Delany’s career-long emphasis upon pride and actualization at any cost.

In character, Martin Delany stood out as a nineteenth century figure among American Negroes in many ways.² When it came to issues of race, Delany was unapologetic. When necessary, according to his own judgment, he went his own way. For example, he embraced the designation “African” with pride, naming his children after Toussaint L’Ouverture, the leader of the Haitian slave revolt, and Alexander Dumas, the famed father-son pair of French writers of mixed ancestry. He also saw allies in his colleagues’ adversaries. For example, at a time when the American Colonization Society advocated emigration for slaves and free persons of color alike, with the support of slaveholders and state governments such as Pennsylvania,³ leading most free Blacks to suspect

¹ One reaches this conclusion from Delany’s failure to offer any cogent evidence from the natural world that would have rebutted Darwin. Instead, the evidence Delany offers comes from the humanities, from the Bible and history, and centers upon the questions of the relative worth of the African in the eyes of Europeans, *not* upon the question whether human being and other life forms evolved from lower life forms by means of natural selection. An argument can even be made that Delany did not consider Darwin’s theories worth dignifying.

² Because terminology for the people who were American slaves was complexion-based in the 1800s, they commonly called themselves “colored people” or “Negroes” without a pejorative application, as used here. “African” was the preferred term in the 1700s (e. g., “African Methodist” and “Free African Society”), but fell out of favor in the early 1800s when the term became associated with the American Colonization Society.

³ In “Political Aspect of the Colored People of the United States,” delivered to his National Emigration Convention’s board of commissioners (24 August 1855), Delany reports that Pennsylvania appropriated “two thousand dollars to aid the state Colonization society” in

their intentions and to denounce them, Delany embraced its cause with some enthusiasm. To him, Africa offered a logical expression of racial pride, especially considering the hostility of most White Americans to slaves and to free people of color alike.

To Delany, American Negroes emigrating to Africa existed independent of the American Colonization Society. He seemed to have viewed that organization—perceptively—as a mere articulation of the Jacksonian idea that America was for White people only. His career, like those of his contemporaries, employed opportunism when someone of similar purposes appeared. Throughout his career, Delany prized the self-actualization of the Negro above all else, and he seemed to have cared little as to the entities he needed to embrace to reinforce that idea.

Delany's trip to Liberia in 1858 emphasizes this perspective. That trip was funded, in part, by the American Colonization Society. The Americo-Liberian clergyman and diplomat Edward Wilmot Blyden recounted Delany's visit in the *Liberia Herald*. Before an audience in Monrovia's Methodist church, Delany states "it is the desire of an African nationality that has brought me to these shores." (Reader 333). A few years earlier, at a convention in Cleveland, Delany advocated emigration as a means of "elevation of the African...to some country where the colored man might be able to establish a distinct nationality." (Reader 334) This was at variance from many of Delany's colleagues in the Black anti-slavery community, such as the educator George Vashon of Pittsburgh, who publicly articulated a position on emigration originally stated by Richard Allen in the 1700s: "We were born in America; in America we were reared; in America we will live; in America will we die, and be buried with our fathers and mothers." (Reader 334)⁴

Just as there was a reluctance among Delany's colleagues to embrace emigration to Africa before the Civil War, reluctance to embrace former Confederates existed among Delany's associates after the Civil War. Generally, these Confederates—both political and military figures—banded with former slave owners to enforce a *status quo ante bellum* when it came to the freedman. In 1865 and 1866, they used the state legislatures, which they controlled, to maintain the free supply of labor that the former slaves represented. The South's vagrancy laws, which coupled impecuniousness as a crime with a stipulated term of service working for private land owners, stood out especially. Defense of these laws and of the labor supply they created mandated control of legislatures and of voters.

1852 (Reader, p. 284). For Delany, the appropriation, coupled with the state's withdrawal of the right to vote, underscored American hostility to the Negro.

⁴ In this debate, fellow educator Martin H. Freeman had his own saucy retort to Vashon: "We were born on massa's plantation; on massa's plantation we were reared; we will live on massa's plantation; (provided he don't send us to Georgia,) we will die on massa's plantation, and be buried with the rest of massa's niggers." Freeman subsequently emigrated to Liberia during the American Civil War. (Reader, p. 334, n. 3).

After the Reconstruction Act of 1867, however, the political environment in the South changed to the point that even a Black abolitionist would find it home.

A Harvard-educated northerner who had once resided and practiced medicine in Canada, Delany settled in South Carolina after the Civil War. Perhaps that seems odd. Before the Civil War, South Carolina had one of the largest slave communities, and one of the most brutal communities of slaveholders, but, during Reconstruction, the South Carolina freedman enjoyed some significant political advantages. Its Reconstruction-era constitutional convention was the only one among the former Confederate states which consisted of a majority of Blacks; led by Beverly Nash, its membership opposed disqualifying any voter, including former Confederates. Its first legislature under Reconstruction was over two-thirds Black; in 1872, both the state's lieutenant governor and its speaker of the house of representatives were Black, a phenomenon unheard of until the twenty-first century (Franklin and Moss 237-239).

For a man such as Delany, who saw the status of the African in America in political terms, Reconstruction-era South Carolina must have seemed the promised land.

Delany settled in Charleston, South Carolina, in April 1865, on the orders of the United States Army, from whom he had received the commission of major. As a physician with officer's rank, Delany helped process displaced persons as part of the Freedmen's Bureau until 1868. He involved himself in real estate and in politics, and won appointment as a customs-house inspector. In 1874, he ran unsuccessfully for lieutenant governor as an "independent" Republican.⁵

Electoral defeat may have soured the "promised land" for Delany. His unsuccessful campaign, however, came as the man changed his perceptions. When considered in context of other events in his career, such as his stance on African emigration, we can see the electoral defeat as part of the man's character and approach, in which tactics changed as times demanded, and the consequences of these changes were accepted as no surprise.

Based upon his various writings and speeches, Delany seemed to have always harbored political ambitions. Reconstruction politics in South Carolina, though, made acting on political ambitions disheartening. While he associated himself with able and honest men, like Richard Cain and Robert Elliott, both of whom represented South Carolina in Congress, there were always the adventurers who stood at cross-purposes. The carpetbaggers from the North stood out in this regard. They seemed more interested in manipulating the state's economy and government, such as the railroads and their support and development, for their own gain. In

⁵ Recounted in Dorothy Sterling's *The Making of an Afro-American: Martin Robison Delany, African Explorer, Civil War Major, and Father of Black Nationalism* (New York: Da Capo Press, 1996), Delany's defeat had more to do with the corruption of the "Railroad Ring" of Northerners, which engaged in widespread graft throughout the Reconstruction, than to any shortcoming in or discomfort about Delany (290-298).

1870s South Carolina, Delany and his allies found themselves occasionally as their opposition.

In this regard, we see Delany taking a track that he would take in writing *The Origin of Races and Color*: he expressed a willingness to “strike a bargain.” Since the 1830s, Delany viewed the slaveholder and the Jacksonian, as his adversary. Beginning in 1873, largely in reaction to carpetbagger duplicity during a recent senatorial campaign, Delany compromised with former slaveholders to preserve the South Carolina freedman’s political gains. (Sterling 294-295) The former slaveholder simply seemed a more dependable ally. Chief among Delany’s new allies was Wade Hampton, the hero of the Confederacy who, reportedly, owned more human beings in 1860 than any man on the North American continent.

Both beloved and revered by his command, Hampton had followed Robert E. Lee’s example of accepting defeat and of making peace with the Union. His political involvement came as a direct result of the Democratic Party wanting to reassert itself in South Carolina. Hampton represented many things to South Carolinians, the “old way of life” chief among them. He also represented the return of the gentry that had dominated the South for generations, as well as the dominance of White men and women that would exist for almost a hundred years.

Arguably, Hampton was a risky ally. During his campaign for governor in 1876, Hampton made some public statements supporting the thirteenth, fourteenth, and fifteenth amendments to the Constitution of the United States, which guaranteed citizenship and suffrage for the freedman. These statements were important, for the environment of South Carolina politics can be acidic, even today. But the freedman had a long memory. Trust for Hampton’s word seemed to have existed only among a select few. (Sterling 309)

The political art necessitates trusting friends and adversaries equally. In the 1870s, Delany had to trust as many South Carolinians as possible. Not long before working with Hampton, Delany had been convicted of stealing money from a Black church, for which he received a pardon. A city justice in Charleston at the time, he must have felt the sting of this turn of events; Hampton even provided Delany support during this episode. Delany responded by endorsing and campaigning for Hampton in a race against the governor who had pardoned him. This endorsement caused a violent reaction among freedmen. On Edisto Island, for example, where he campaigned for Hampton in mid-October, the women crowded around Delany, shaking their fists angrily at him, saying “we won’t listen to the damned nigger Democrat.” (Sterling 312).⁶ In the village of Cainboy some days later, a mob of Blacks tried to kill Delany.

Hampton viewed Delany’s support as a prize, but suppression of the Black vote guaranteed his victory. In different parts of the state,

⁶ An account of this appeared anonymously in the *Charleston News and Courier* 16 October 1876 (p. 4) and appears reprinted in *Reader*, pp. 456-457.

“Straightouts,” led Ben Tillman, and “Red Shirts” both terrorized the freedman to keep him away from the polls. Perhaps men of Wade Hampton’s class employed bribery of voters as well. In this general environment, and the widespread fraud that raised doubts about the truth in South Carolina’s ballot, Reconstruction ended.

After a term as governor, in 1878, Hampton joined the United States Senate. Delany’s tenure as a justice in Charleston ended with Hampton dispatch to Washington. By that time, *Origin of Species* and *The Descent of Man* both had gained respectability. To some, the book seemed to have justified the hierarchy of races that they—Europeans and Americans both—accepted fervently, with or without a physical record. This period saw the beginnings of “Social Darwinism.” At the very least, news from South Carolina’s elections that decade seemed to have verified that the fittest would survive.

Delany’s response to Darwin, *The Origin of Races and Color*, appeared in 1879. It lends itself to multiple interpretations. For one, its emphasis upon Biblical readings, particularly the descriptions of the repopulation of the Earth after the Flood, provides a reiteration of evangelical Christianity’s belief in biblical truth and inerrancy; in Delany’s time and place, such an argument would have resonated. In doing so, it bares commonality with evangelical Christianity’s refutation to Darwin, made famous in William Jennings Bryan’s prosecution during the *Scopes* “monkey trial” in 1925 Tennessee and employed against Darwin ever since. Delany’s audience seemed to have been “good Christian men and women,” such as Hampton and the Democrats, and perhaps even the Straightouts and Red Shirts.

But Delany’s discussion moves beyond the Bible. He cites ancient sources, such as Heliodorus, the Roman author of *Aethiopica*, a novel, to emphasize the value of both Egyptian and Ethiopian culture.⁷ We need not consider such references gratuitous, as they seem to refute the popular and age-old interpretation that Africa was dark and ignorant. In this regard, Delany appears as the proud “African nationalist” speaking. Again, his audience seemed to have been learned men, yes, but his audience may have been other Negroes, who might have taken offense at Bishop Samuel Wilberforce’s question to Darwin—“so, was it from your grandmother or your grandfather that you had descended from apes?”—and who may have heard similar questions about them from a variety in the Darwin debate.⁸ In that regard, *The Origin of Races and Color* can be seen as what would

⁷ For a much more detailed discussion of *Aethiopica*, please see either *Blacks in Antiquity* (Cambridge, MA: Harvard University Press, 1970) or *Before Color Prejudice* (Cambridge, MA: Harvard University Press, 1983), both by the late Frank M. Snowden, Jr., Professor of Classics at Howard University. An undergraduate at Howard in the mid 1980s, I had the tremendous pleasure of hearing Snowden discuss *Aethiopica* many times, and the memory of his stentorian voice as I tried translating it still makes me jump.

⁸ Bishop Wilberforce’s question appears in a variety of texts and it might be apocryphal, but the poet Paul Laurence Dunbar touches a similar vein to Delany’s in “Ode to Ethiopia.” Published in 1893, that poem includes the lines “Be proud, my Race, in mind and soul;/Thy name is writ on Glory’s scroll/In characters of fire.” (ll. 25-27)

become known in the early twentieth century as a “race book” by a “race man.”⁹

Nevertheless, one can see this book in the context of 1870s South Carolina. The violent reaction against his support for Hampton hurt Delany, as the account of his visit to Edisto Island attests. In using both Biblical sources and racial pride, Delany may have attempted to reconnect to the same people who had helped him in times of need, such as after his conviction. His audience may not have been entirely Darwin’s audience; rather, his audience may have been the same group who viewed him as a “damned nigger Democrat.” That audience’s attack hurt; *The Origin of Races and Color* may have attempted to assuage the hurt.

⁹ I am persuaded that Delany’s arguments against miscegenation, which introduces the last chapter (91-93), have little to do with appealing to Democrats and evangelicals and everything to do with racial pride.

LIST OF SOURCES

Delany, Martin R. *Principia of Ethnology: the Origin of Races and Color* (Philadelphia, PA: Harper and Brothers, 1879).

Franklin, John Hope and Alfred A. Moss, Jr., *From Slavery to Freedom: A History of African Americans*, Volume Two, Seventh Edition (New York: McGraw-Hill, 1998).

Levine, Robert S. ed. *Martin R. Delany: A Documentary Reader* (Chapel Hill: University of North Carolina Press, 2003).

Megginson, W. J. *African American Life in South Carolina's Upper Piedmont, 1780-1900* (Columbia: University of South Carolina Press, 2006).

Simkins, Francis Butler. *Pitchfork Ben Tillman, South Carolinian* (Columbia: University of South Carolina Press, 2002).

Sterling, Dorothy. *The Making of an Afro-American: Martin Robison Delany, 1812-1885* (New York: Da Capo Press, 1996).

**ADMITTED UPON ARRIVAL:
THE FAMILY'S ROLE IN LATE NINETEENTH CENTURY MISSOURI
ASYLUM ADMISSIONS**

by

MATTHEW REEVES
(University of Missouri-Kansas City)

ABSTRACT: This paper examines structural aspects of insane asylum commitment in late nineteenth-century Missouri, analyzing the crucial role that family members played in committal. My research suggests that the mechanics of commitment relied heavily on patient family members and local county medical and judicial personal. While treatment undeniably occurred at regional asylums, the extent that these superintendents meaningfully defined insanity for the broader community has been overstated. Asylum letters offer insights into the ways that family members, local courts, and community physicians qualified patients for asylum admissions. These local personnel identified the insane and made the critical determination whether or not they should be committed for asylum care, suggesting that lay definitions of insanity dictated which patients the professional insanity doctors treated.

Keywords: asylums; committal; St. Joseph, MO; Missouri, George Catlett; insanity, late nineteenth century

Four men were forcing the women onto the train but she still would not go quietly. A reporter was there, in Milan, Missouri, in the mid-summer of 1886, recording the event as it unfolded. The train was bound for St. Joseph, Missouri, but the unnamed women's final destination was not St. Joseph proper, but the Missouri State Lunatic Asylum #2, an imposing three-story brick structure situated about 2.5 miles from downtown St. Joe. After "struggling with all her might and mane" to avoid boarding the train, it became clear that the woman could not out-muscle her fate. Switching tactics, she pleaded with anyone who would listen that she was not insane, and that she wanted to "return to her home and children." She offered proof of her sanity, stating that she had made her daughter's dresses earlier that day, suggesting that no insane women could display such feats of domesticity. Talking among themselves, the other passengers on the train agreed that these did not seem like the deranged words of a madwomen. "Her language was chaste and elegant," and "she did not talk like one bereft of reason." Though her pleas created doubt in the mind of the passengers, they did not move the party responsible for her plight: her husband. Staring him right in the eyes, she said that he "ought to be ashamed to take me away from my home and my children, when you know that I am as sane as you are, and you only want to get rid of me."¹

The preceding drama has an undeniable gendered aspect, but for the purposes of this paper, it also illustrates the important but underappreciated role of patient's families in nineteenth-century American asylum admissions. The unnamed woman at the center of the

¹ "Clippings," *Weekly Graphic (Kirksville, MO.)*, July 09, 1886, page 2.

drama saved her strongest vitriol for her husband – not the courts, not the medical profession, not any of the lawyers associated with her case. Indeed, according to the woman, her husband’s perfidy led to her forcible commitment to the asylum. He was the one that knew she was sane, and had somehow convinced the local medical and legal establishments otherwise.

This paper examines those structural aspects of asylum commitment in late nineteenth-century Missouri, analyzing the crucial role that family members played in committal. My research suggests that the mechanics of commitment relied heavily on patient family members and local county medical and judicial personal. While treatment undeniably occurred at regional asylums with professional staff, the extent that these superintendents and staff meaningfully defined insanity has been overstated. Instead, it becomes clear that patient’s families, their local medical doctors without specialized psychiatric training, and lawyers and judges from the county court identified the insane and made the critical determination whether or not they needed asylum treatment. This suggests that lay definitions of insanity dictated which patients the professional insanity doctors treated.

To call the historiography of nineteenth century mental illness treatment contested is a most diplomatic understatement. The earliest histories, from late nineteenth and early 20th century, predominantly feature a Whig narrative centered on asylums as a positive good in the tradition of Tuke and Pinel, who removed the insane from their chains.² This largely positive interpretation continued on until the mid-1960s, when debates about the nature and even validity of mental illness as a medical condition turned a formerly benign historical field into a viper’s den. Foucault’s seminal *Madness and Civilization* inverted the insane asylum, transforming it from a beneficial institution into a repressive location for confining deviants for their disruptive “unreason.”³ Combined with influential work from sociologists like Erving Goffman and later Andrew Scull, these critical reinterpretations coalesced into a social control thesis, essentially the argument that asylums and medical confinement were a method to control social deviance.⁴ Other historians like Gerald Grob offered a less Pollyannaish but still largely sympathetic asylum narrative that defended the superintendent’s positive intentions, if not always positive results.⁵ Of course, the debate over the superintendent

² Daniel Hack Tuke, *The Insane in the United States and Canada* (London: H. K. Lewis, 1885).

³ Michel Foucault, *Madness and Civilization: A History of Insanity in the Age of Reason*, trans. Richard Howard (New York: Vintage Books, 1988).

⁴ Erving Goffman, *Asylums; Essays on the Social Situation of Mental Patients and Other Inmates*. (Garden City, N.Y.: Anchor Books, 1961); Andrew T. Scull, *Museums of Madness: The Social Organization of Insanity in Nineteenth-Century England* (New York: St. Martin’s Press, 1979).

⁵ Gerald N. Grob, *Mental Institutions in America: Social Policy to 1875* (New York: Free Press, 1973); Gerald N. Grob, *Mental Illness and American Society, 1875-1940* (Princeton, NJ: Princeton University Press, 1983).

and asylum, as either a force for good or a tool for repression – is still essentially an argument about how to interpret the “great white men” of the asylum. It elides a critical debate over how ordinary people ended up sending their friends and relatives to mental institutions in the first place.

Asylum letters offer insights into ways that family members, local courts, and community physicians qualified patients for asylum admissions. In 1874, the second Missouri public asylum opened its doors. George C. Catlett, the institution’s founding superintendent, was kind enough to keep a letter book – a bound set of carbon copies of outgoing asylum mail spanning 1874–1876. The Catlett letter collection includes some 395 missives, written from the superintendent to recipients as far away as New York City and as close as St. Joseph. While all the letters relate in some way to Dr. Catlett’s duties as the asylum superintendent, those duties themselves were a diverse set, including ordering iron bars to cover the asylum’s dormer windows and requesting price estimates for installing institutional washing machines. That said, and the bulk of the letter collection relates to patient admissions and care. Of the 395 letters in the collection, some 319 relate to individual patients. Of those 319 patient related letters, some 66 describe patient admissions. In other words, 16% of Superintendent Catlett’s correspondence related to asylum admissions.

Missouri laws provided a dual framework for asylum admissions, with one path for private pay patients, and another for “indigent patients.” Both admissions pathways relied on local county structures to determine who should be sent to the asylum. According to Missouri Statutes, private pay patient admissions required the signature of two physicians attesting to the patient’s insanity. Additionally, a responsible party, usually the guardian, had to pay for thirty day’s asylum treatment in advance and entered into a bond agreeing to cover the cost of treatment for six months.⁶ Using a justice of the peace as a notary public, pay patient committal did not require a court order or any explicit public announcement.

Indigent patients were afforded no such discretion. Instead, their admissions required a court order, which in turn required a trial where at least one physician witness attested to the prospective patient’s insanity.⁷ If the court found the person insane, they could be sent to asylum, where the county would pay for the patient’s treatment at an estimated cost of \$2.50 per week. The definition of “indigent insane persons” related directly to the value of their estate – in 1873, single individuals were considered indigent if their estates had a net worth of less than \$300 dollars. Prospective patients with a family and a net worth of less than

⁶ Richard L. Lael, Barbara Brazos, and Margot Ford McMillen, *Evolution of a Missouri Asylum: Fulton State Hospital, 1851-2006* (Columbia: University of Missouri Press, 2007), 23–24.

⁷ Missouri and James H. Purdy, *The Statutes of the State of Missouri: To Which Are Prefixed the Constitutions of the United States and the State of Missouri: With Notes, References, and an Index* (W.J. Gilbert, 1872), 168–170.

\$1000 were also considered indigent. For context's sake, a bureau of labor bulletin estimates that Missouri farm laborers averaged a little less than \$17 a month in wages in 1874, which translates to roughly \$200 a year.⁸ Clearly the ranks of the indigent insane were much larger than the private pay elite.

Letters played a key role in executing Missouri asylum admissions procedures. For Dr. Catlett, a common duty was informing parties interested in sending a patient to the asylum about proper procedure. These procedures were a common element in the 66 letters related to asylum admissions. In letters to county clerks and other court officials, there was a typical refrain, that the patient "will be admitted upon arrival," providing that Clerk would "call [the] County Court respectfully to the enclosed circular." In a letter to a Missouri physician, Dr. Catlett did not send an informative circular, but instead wrote out the appropriate private pay patient admissions format. Perhaps Dr. Catlett became tired of these information requests, as the second asylum biennial report featured an appendix that reprinted the state's relevant asylum statutes, including a much more legible type written version of the private admissions form. Missouri law was quite clear that local physicians and courts needed to sign off on the prospective asylum patient's insanity.

The law also provided superintendents with the authority to disagree with these local physicians and courts and reject patients he believed were "not insane." Acknowledging the superintendent's ultimate authority over treatment within the asylum, the law allowed Catlett to send misdiagnosed patients home, but these rejections were rare occurrences. 293 people were admitted to the St. Joseph asylum in its first two years of operations. During that same period, only 4 people were discharged due to being "NOT INSANE."⁹ Catlett's letters provide some insight into these not insane cases. In each instance, Catlett argued that the patient had a physiological disability, not a mental disorder. One such patient was, according to Catlett, "not insane, nor do I think she ever was. I think she ought to be sent to the Deaf and Blind Asylum where she can be taught and educated for some useful purpose."¹⁰ Catlett claimed that another patient's "incapacity of mind is more a natural defect than insanity, and therefore he will not be further benefited by remaining in the asylum."¹¹ Catlett seemed to agree that the vast majority of the patients sent to his asylum were insane, and only appears to have rejected patients that he believed were erroneously admitted because of physical disability.

Missouri asylum law clearly required local physicians to certify insanity, and Dr. Catlett provided an institutional double check, finding

⁸ George K. Holmes and United States Department of Agriculture, "Wages of Farm Labor" (Washington, 1912), <http://hdl.handle.net/2027/mdp.39015070561595>.

⁹ Officers of Missouri State Lunatic Asylum No. 2, *First Biennial Report of the Officers of the Missouri State Lunatic Asylum No. 2, For Two Years, Ending November 9, 1876* (Jefferson City, MO: Regan and Carter, 1877), 16.

¹⁰ Catlett Letter to Patient parent, July 14, 1875, Letter #172, Glore Archives.

¹¹ Catlett Letter to patient parent, July 15, 1875, Letter #174, Glore Archives.

that only 4 out of 293 patients – a measly 1.3% – were admitted based on a misdiagnosis. As the regional insanity expert, the asylum superintendent was in almost total agreement with local practitioners about their insanity diagnoses. While it could be argued that Catlett was merely admitting patients to fill up the newly built institution, the asylum quickly exceeded its capacity. Further, future reports from when the asylum was over-full do not show any increase in the number of not insane patients.¹² As the historian David Wright and others have argued, superintendents were on the receiving end of bureaucratic insanity processes.¹³ Catlett did not himself determine the criteria for admission, but did agree with physicians and courts in various Missouri communities. While the admissions processes in Missouri were clearly not top down authoritarian processes emanating from the superintendent, local community courts and physicians could still have used asylums as tools for social control.

On their face, Dr. Catlett's responses to requests for patient admissions show an overabundance of court ordered indigent patient admissions. County Court personal most frequently requested information about sending patients to the asylum, closely followed by doctors and lawyers. Based on their return addresses and titles, the 66 admissions queries break down as follows: 79% of requests came from individuals associated with medicine or the courts - county clerks, judges, personal lawyers, or local physicians. In contrast, only 6% of requests for admission information came from patient family members, and in 15% of the letters, the relationship between the prospective patient and the person writing the asylum superintendent for admissions information is not clear. County Clerks – the parties responsible for executing the paperwork that sent the indigent insane to the asylum via court order – dominated asylum admission inquiries. These letters do not show, however, if family members were involved in the process of sending indigent patients to the asylum.

While the admissions requests themselves do not show any family interaction with the county clerks, other letters that address patients ongoing care, treatment, and eventual discharge show that in many cases patient families were substantially involved in the decision making process with both the superintendent and county authorities. Based on Catlett's letters, patient families were interested in their patient's prognosis and projected length of treatment. One such case illustrates how county courts operated in a tense space between a family's desire for a loved one to return home and the superintendents beliefs that patients should stay the course of treatment. In a letter to Colonel L.W. Burns, the Clerk of Clay County, Dr. Catlett explained that a female patient was "not as well as she was a month ago," and that she "has never been in a condition to be

¹² No patients listed as "not insane" in Second Biennial report, and just 3 in the Third Biennial Report.

¹³ David Wright, "Getting Out of the Asylum: Understanding the Confinement of the Insane in the Nineteenth Century," *Social History of Medicine* 10, no. 1 (April 1997): 137–155.

released.”¹⁴ In spite of this negative appraisal, Catlett considered the desires of the patient’s stakeholders: “But with the facts before her friends, if they insist on the court asking for her discharge, I will do so if they request it.”¹⁵ Catlett’s medical opinion was only one factor in the decision making process, and the county court considered it along with the stated requests of patient stakeholders. In this particular case, the patient’s relatives appear to have carried the day. Dr. Catlett sent another letter to Burns six days later, arguing that it was most unfortunate that the patient’s relatives still wanted to remove her from the asylum, as the current medical beliefs suggested that a lack of prompt and effective early treatment could “risk making her a lifetime inmate.”¹⁶

In other circumstances, Dr. Catlett offered treatment choices to family members that reflected the realities of indigent patient care in the context of county payments. Asylum treatment was expensive, not only for private pay patients, but also for counties, which typically paid for their share of the bill from a pauper fund drawn from county property taxes. In a letter to a patient’s mother, Catlett asks her to clarify a request. Did she want her son discharged from the asylum, or was she asking Catlett to send him home for a visit? If she was requesting a discharge, then Catlett could use county funds to send her son home. If, however, she wanted him to go home on a trial visit, then she would have to pay her sons transportation costs herself.¹⁷ Catlett was routinely considerate of county budgets. Several letters show his willingness to discharge marginally improved patients, provided they were “easily managed” and would not benefit from further asylum treatment.¹⁸

The high proportion of asylum patients admitted by court order suggests county courts dominated asylum admissions, but upon further investigation, the close ties between local courts and patient families confound that claim. Rather, the high cost of asylum treatment, and the low thresholds for qualifying as an indigent patient dictated that most patients would enter the asylum on the county dime. Indigent in this case did not mean patients were destitute or without substantial kin networks. Significantly, the Catlett letters offer evidence that these kin networks advocated for their indigent insane family members.

Catlett’s letters to patient families do not feature many references to specific medical etiologies for patient insanity, suggesting that the pre-admission diagnosis of general insanity was sufficient. The notable exceptions to this general lack of a specific etiological claim were cases where Catlett attributed the patient’s insanity to menstruation, head trauma, or epilepsy.¹⁹ This somatic focus follows the trend Catlett

¹⁴ Catlett to Colonel L. W. Burns, October 4, 1875, Letter 282, Glore Archives.

¹⁵ *Ibid.*

¹⁶ Catlett to Colonel L. W. Burns, October 10, 1875, Letter 286b, Glore Archives.

¹⁷ Catlett to patient’s mother, December 9, 1875, Letter 360, Glore Archives.

¹⁸ Catlett to patient’s brother, August 25, 1875, Letter 239, Glore Archives.

¹⁹ For menstruation, see Catlett to patient’s mother, February 12, 1876, Letter 431, Glore Archives; for head trauma, see Letter to patient’s wife, December 29th, 1875, Letter 388,

established rejecting as not insane patients with observable physical disabilities. The absence of technical psychiatric language in the letters stands in stark contrast to the asylum's biennial reports, where tables listing the cause and type of insanity are legion. Catlett did not communicate these technical definitions or propose causal etiologies to patient families in his letters. Alienist jargon was not salient to patient families, whom had already formally certified their loved one's general insanity.

Patient family members, lawyers, local doctors, and county court officials all played significant roles in sending patients to the asylum in nineteenth-century Missouri. As this paper suggests, pre-admission processes presented Dr. Catlett and other asylum superintendents with a prescreened patient population, one that family members and local physicians had already identified and diagnosed as insane. While treatment at the asylum may have conferred added legitimacy through supposed expertise in mental healthcare, it is difficult to imagine how superintendents could have used insanity to enforce social standards on deviants. Dr. Catlett certainly made no claim to any special knowledge of the insane mind. "Asylum alienists," he proclaimed, "pretend to no greater knowledge or skill in the treatment of insanity than may be possessed by any qualified physicians possessed of equal advantages for the study and investigation of insanity."²⁰

Catlett was emphatic that alienists possessed no special knowledge, but I must be more circumspect in my claims about family member's roles in asylum admissions. This study sorely lacks the direct voices of patient families. Let me assure you that I am aware of the irony of relying largely on a superintendent's letters to support a paper about patients and their families. My findings in this case study are therefore more suggestive than definitive. That said, nineteenth century community's willingness to send their friends and relatives to the asylum suggest that madness and its treatment were not the results of medical expertise gone awry, but relied on a general consensus about the nature of insanity, and the desirability of institutional insanity treatment.

Glore Archives; for epilepsy, see Catlett to County Clerk of Leclde County, November 4, 1874, Letter 331b, Glore Archives.

²⁰Suggestions to the Public, *Second Biennial Report*, 67.

‘HAPPY DEATHS:’ CMS MISSIONARIES, MEDICINE, AND DEATHBED EXPERIENCES IN WEST AFRICA, 1860-1890

by

John Michael Rankin
(East Tennessee State University)

ABSTRACT: The paper investigates the role played by Church Missionary Society (CMS) missionaries in the health and healing of African converts in West Africa, 1860-1890. It is argued that CMS missionaries did not employ western medicine as a means of spreading the gospel in West Africa nor did they demonstrate much concern for a convert’s health and well-being. Instead of trying to heal, sickness and death were employed as a means of judging sincerity as missionaries watched converts to ensure they placed their faith in Jesus. This desire for sincerity led missionaries away from health and healing, believing that a dying convert could serve as an inspiration not only for potential converts in West Africa but to Christians back home. Framed as a joyous occasion, ‘happy death’ narratives provided missionaries the opportunity to comment upon a range of moral and ethical issues while instructing converts on how a true Christian was expected to act in their final moments. Missionaries reported that dying converts looked forward to the afterlife and did not ask nor want to be healed. This framing of a convert’s final moments may have discouraged and limited the number of medical missionaries sent to West Africa.

Introduction

In 1870, a “dying student” at Fourah Bay College, Sierra Leone, relayed “his last message” to his Christian tutor:

I am going to heaven, that land of bliss, contentment and everlasting love, I trust in my Saviour Jesus Christ: He has died for my sins, and washed them away. Jesus is dear to my soul; He holds me in His bosom; He will be with me though the dark valley of the shadow of death. It is better for me to go than to remain.¹

Recorded in missionary narratives, journals, and reprinted in annual reports by the Anglican Church Missionary Society (CMS), the final confessions of dying converts provides an opportunity to examine the ways in which missionaries presented and described African death and illness to those back home, 1860-1890. In these accounts, missionaries, not physicians, played a central role in the final moments of a convert’s life. Rather than trying to heal or relieve physical suffering, CMS missionaries employed illness and death as a means of confirming the sincerity of conversion. They watched converts to ensure that they displayed a true faith; one that rejected African socio-medical traditions, turning instead to

¹ *Proceedings of the Church Missionary Society for Africa and the East*, 1870, (London: Church Missionary House), 202-203, 15. Later references will be *Proceedings of CMS*.

Jesus as their sole hope and savior. If a convert stayed true to Christ in their last moments, missionaries could be assured of the sincerity of conversion. Framed as a joyous occasion in which a convert died in the arms of the Lord and frequently referred to as ‘happy deaths,’ such passings allowed the CMS to highlight their own achievements while offering indisputable evidence of success in a foreign field. These narratives demonstrated not only the value of missions but also provided a medium in which they could comment upon a range of moral and ethical issues while instructing converts on how a true Christian was expected to act in their final moments.

This paper examines the framing of deathbed experiences by CMS missionaries prior to the medical missionary movement in West Africa which developed - albeit tentatively - in the last decades of the nineteenth century.² Missionaries who wrote these accounts and visited Africans on their deathbeds demonstrated little concern for an individual’s chances for survival. Missionaries rarely recorded the cause of a convert’s suffering nor did their reports mention the presence of physicians, any efforts made to save a convert’s life, or to reduce pain. From the missionary perspective such information was superfluous, for it held little barring upon the greater task of transiting a convert’s soul to the afterlife. While medicine, healing, and the cause of illness were not mentioned, missionaries did highlight the pain and anguish endured by converts. By drawing attention to physical suffering, missionaries’ demonstrate Christian devotion for dying converts were said to have turned not to medicine, but to Jesus for their salvation. From this perspective, death was not an unhappy or unwanted outcome for it ended any chance for backsliding or future sin.

For missionaries of this period, illness offered the opportunity to test the sincerity of converts, just like the frequent attacks of fever and the death of so many colleagues had tested missionary resolve at bringing Christianity to Africa. This need or desire to judge sincerity was an acute focus of the CMS in the second half of the nineteenth century as there was clear concern, and even alarm, about the sincerity of those who professed to walk with Christ. There was real consternation, especially in Sierra Leone, that so-called Christians were not true believers. As one Christian laborer noted: “Inconsistencies among the Christian communicants are lamentably frequent everywhere.”³ The lack of outward Christian devotion was occasionally framed as a generational issue with those born into the faith seen as less motivated by the Holy Spirit. Concerned with this development, missionaries explained to the authorities at home that the

² For the status and development of medical missionaries in the nineteenth century see, Peter Williams, “Healing and Evangelicalism: The Place of Medicine in Later Victorian Protestant Missionary Thinking,” *The Church and Healing*, ed. W. J. Shields (Oxford: Basil Blackwell, 1982), 271-86; Rosemary Fitzgerald, “‘Clinical Christianity’: The Emergence of Medical Work as a Missionary Strategy in Colonial India, 1800-1914,” in *Health, Medicine and Empire: Perspectives on Colonial India*, ed. Biswamoy Pati and Mark Harrison (London: Sagam, 2001), 88-136.

³ *Proceeding of the CMS*, 1875, 20.

situation resembled the problems with Christianity in England: “Hereditary Christianity in England is no preventative against the appalling developments of vice and crime; neither is it so in Africa.”⁴ J. B. Wood, who worked amongst the 5000 worshippers who formed the congregation at Pademba Road, Sierra Leone, reported of his “hard struggle... against the many temptations to immorality arising from the habits of the people.”⁵ Given these trying circumstances, Wood explained the importance of the deathbed in confirming sincerity: “Yet there are not a few whose consistent lives and dying testimonies give proof of the spirit accompanying the word.”⁶ While backsliding was to be lamented, the CMS could count themselves thankful that the deathbed afforded the opportunity to confirm sincerity and to prove, without doubt, the value of their own conversion efforts. Happy deaths quieted internal fears about sincerity providing critics with examples of sincere faith in times of crisis. They also demonstrated the success of missionaries and answered implicitly questions of their value and importance. Concerns about sincerity shaped the ways in which missionaries understood and framed an African’s final words and could explain the didactic nature of happy death narratives.

Missionary control over Africans was rather weak. In West Africa, the CMS competed with: hostile leaders who forbid or put restrictions upon missionaries; other Christian sects; the development of independent ‘Native’ Churches; the expansion of Islam; and a climate which produced a high European mortality rate.⁷ Although the mission offered an array of material benefits, access to education, imperial connections, and a sense of community, the ultimate reward was realized in the afterlife. Cognizant of their precarious position, missionaries became sensitive to insincere converts who exploited missionary connections for personal gain. It also left them keen to prove beyond a doubt the sincerity of church members who had passed on.

The CMS had a very strict and narrow view of how a Christian community should behave and endeavored to force this vision onto followers. Converts were expected to be dedicated to this vision as well, which demanded piety and acceptance of European cultural norms. For missionaries, European culture and Christianity went hand in hand; you could not truly embrace Christianity without adopting western ideas and modes of behavior. Crucial to this conversion from ‘heathen’ to respectable Christian was an outward rejection of ‘traditional’ healing methods. In terms of health, the greatest worry for missionaries was not whether a convert would live or die but whether they would reject Christ

⁴ *Proceeding of the CMS*, 1884, 31.

⁵ *Proceeding of the CMS*, 1871, 12.

⁶ *Proceeding of the CMS*, 1871, 12.

⁷ Philip Curtin has calculated the mortality rate for the 89 CMS missionaries sent to West Africa between 1804 and 1825 to be 606.7 per thousand. Curtin, *The Image of Africa: British Ideas and Action, 1780-1850* (Wisconsin: University of Wisconsin Press, 1964), 484.

and turn instead to their former 'heathenistic' beliefs and forms of healing. This was viewed as the ultimate rejection of Christian principles demonstrating the value of the deathbed in confirming sincerity.⁸

The reporting of happy deaths followed a familiar pattern. The death of John Taylor in 1867 is representative of the standard form. These narratives usually began with a statement establishing that missionaries and the Church had played an important and active role in the convert's life. Keen to highlight their dedication and hard work, missionaries emphasized the frequency of their visits to converts lying on their deathbeds. The missionary attending John Taylor stated: "I visited him many times during his illness."⁹ As stated, narratives would often note the physical suffering endured by a dying convert but omit the precise cause of pain. While the source of distress may not have been reported, missionaries did emphasize the contrast between a convert's physical suffering and the calmness of their demeanor, "...and though his body was suffering from pain, yet no complaint or murmuring ever escaped his lips and his countenance was always mild and placid."¹⁰ After establishing the bravery in which the convert faced pain, narratives explained that the dying convert had not only accepted their pending death but actually looked forward to the afterlife. John Taylor reportedly stated: "I want to go home: I am a stranger here: I am ready to go home."¹¹ As with most narratives, the missionary did not mention the presence of a physician or discuss whether any attempts were made to prolong Taylor's life or ease his suffering. Missionaries were not interested in medical concerns; their focus was solely on the status of the convert's soul. These reports usually ended with a final statement of faith: "I asked him, 'What is your hope?' He quickly replied 'Jesus.'"¹² Deathbed narratives were always clear: No authority or reader could doubt that the convert had died bravely and as a true Christian.

Happy death narratives highlighted the transformative nature of Christianity while also imparting instructions on how to live a 'proper' Christian life. An excerpt from the journal of an unnamed catechist (teacher of Christian principles) reported the transformation of one man, through the grace of God, from a seller of spirituous liquors to an upstanding member of the Anglican community. As with many of these narratives the catechist had not recorded what had brought the convert to the verge of death but only relates that the patient was very sick and near death.¹³ The medical particulars were of little value to missionaries; even if they knew precisely what had brought the convert to the edge of death, they did not relay this information to authorities and audiences back home. According to the catechist, this Christian brother showed much

⁸ *Proceeding of the CMS*, 1870, 31; *Proceeding of the CMS*, 1889, 32.

⁹ *Proceeding of the CMS*, 1867, 14.

¹⁰ *Proceeding of the CMS*, 1867, 14.

¹¹ *Proceeding of the CMS*, 1867, 14.

¹² *Proceeding of the CMS*, 1867, 14.

¹³ *Proceeding of the CMS*, 1876, 11.

resolve and Christian zeal and, despite his reduced state, commenced an impromptu and heart-felt rendition of Amazing Grace. Although worn out from singing, the convert, who was barely holding onto life, marshaled enough strength to exclaim “with an air of triumph:” “Get away from me, Satan; it is too late for you; Jesus has taken possession.”¹⁴ In this example, the convert’s dramatic rejection of Satan laid to rest any doubts concerning sincerity. This narrative allowed the CMS to draw a strict divide between someone who sells alcohol and an upstanding citizen. The message to the reader remains clear: One cannot be both upstanding and valuable member of the Christian community and sell alcohol. The inclusion of Satan and the convert’s battle with temptation served to remind readers of the need to remain vigilant and the importance of resisting sin and choosing the path of righteousness.

Deathbed narratives reported that dying Christians anxiously looked forward to the afterlife. This information may have been intended to dissuade authorities back home from seeing Africa as a location suitable for medical missionaries. Indeed, the lack of attention to the health and well-being of converts may have been motivated, at least in part, by professional concerns of traditional (non-medical) missionaries who feared being displaced by medical missionaries. Certainly, the ways in which missionaries framed and reported happy deaths suggested to audiences back home that dying converts did not want medical intervention or to be healed. Due to these reports, CMS authorities in London may have concluded that medical missionaries were both not needed nor wanted by African Christians for they happily looked forward to the afterlife. For instance, the daughter of Reverend T. P. Wright, Native curate of Faji,¹⁵ told her mother just three days before her passing: “Mother, you have done much for me. You love me. I love you all, but I no more belong to your family, I belong to the family of Jesus.”¹⁶ While the daughter had accepted her fate, others had not, as the missionary mentioned the use of medicine to save her life: “Though means were used, the fever never left her.”¹⁷ The report does not describe what methods were applied to heal the young girl or whether treatments were administered by a physician. Nonetheless, the mention of fever and the (very) limited insight into the efforts used to save her life serves as one of the most detailed accounts of medical intervention. Wright, feeling it was inappropriate to seem overjoyed by the death of a child or to suggest that no one tried to preserve a child’s life, may have felt compelled to mention medicine in this particular case. Her final days were spent praying while attempting to convince others (and maybe herself) that she desired death, exclaiming to those present: “I am ready! I am ready! And care very little

¹⁴ *Proceeding of the CMS*, 1876, 11.

¹⁵ Known today as Faji Kunda, The Gambia.

¹⁶ *Proceeding of the CMS*, 1876, 30.

¹⁷ *Proceeding of the CMS*, 1876, 30.

for earthly things.”¹⁸ In this example, it is her loved ones who tried to heal the young Christian; she joyfully looked forward to the afterlife.

Deathbed narratives occasionally reported that a dying convert had prayed for improved health. It was deemed acceptable that converts may initially pray for health and a full recovery in the understanding that what ultimately mattered was the soul and one’s relationship with God. It was crucial in their search for health that converts did not privilege medicine – western or otherwise – but prayer as the vehicle for achieving health. It should be pointed out that for the most part the examples that mention praying for recovery involved children or young adults. It seems more appropriate that the young, those whose time on Earth had been minimal, were the ones most likely, or at least recorded to be the most likely, to pray for a longer life. For instance, one very ill teenager confessed that “at the beginning of my illness” she prayed for God to save her life. She soon reported that, “the language of my prayer now is, Lord, if it please thee to spare my life, well; if not, please, for Christ’s sake, to let my soul be acceptable in Thy sight.”¹⁹ The prayers of this articulate nineteen year old demonstrated an appropriate compromise between desire to live and acceptance of God’s will. The young girl’s initial prayers for health were not heeded and she soon died a ‘happy death.’²⁰

The CMS monitored the responses of grief-stricken family members and similar to converts on their deathbed, those grieving for lost ones were expected to demonstrate acceptance of God’s divine plan. For instance, Josiah, a man identified as a leader in the Church, lost a daughter (the one in the example above) and his wife all within 12 months. Reflecting upon Josiah’s loss, the senior Native pastor of Abeokuta stated: “This is a great trial to Josiah; but he bears it with becoming submission to the Divine will.”²¹ The emphasis upon acceptance may have dissuaded family members from attempting to heal a loved one or to demonstrate too much despair for fear of being seen as lacking in faith. Converts could lament the passing of a loved one, but were expected to show fortitude and despite feelings of personal loss to find strength in the certainty that the deceased was now in a better place.

Deathbed narratives also included those who had rejected Christianity but in their final moments had seen the error of their ways. An instance of this was reprinted in 1889 when a “powerful heathen chief of Brass” who had tried and failed to prolong his life with “juju medicine” had, in his final moments, assembled his household so he could instruct them about faith:

I have tried all kinds of juju in and around this country and all the adjacent countries; I have bought plantains, killed fowls, goats, and sheep in sacrifice to juju; but, after all, I find it is all in vain. Who ever made better or greater sacrifices to juju more than I? Who in

¹⁸ *Proceeding of the CMS*, 1876, 30.

¹⁹ *Proceeding of the CMS*, 1870, 27.

²⁰ *Proceeding of the CMS*, 1870, 27.

²¹ *Proceeding of the CMS*, 1870, 27.

this land of Brassa has surpassed me in jujuism? Who? I have tried all, but after all I find no peace, no comfort, and no happiness in these things; juju can do no good whatever; and now I am going to die. I shall not live long in this world. I have wasted all my precious time to follow juju in vain; and now I must die. Juju cannot save me now; and if I die, after my death no one belonging to my house, men and women, old and young, should believe in juju any more; no one should offer any sacrifice to juju any more. The God of the Christians is the only true God, whom all men ought to worship, and whom you must all try to worship, and leave juju altogether.²²

Upon finishing this speech, the once powerful ruler of Brassa was reportedly struck “dumb, and could speak no more till he died.”²³ Narratives such as this demonstrate the importance of the deathbed as an opportunity for anyone – not just Christians – to leave their dying testimonies. Such narratives provide cautionary tales; in this case the time and money wasted by ‘heathenism.’ It is interesting to note that neither the dying ruler nor the missionary who recorded his story suggested that had he sought out western medicine instead of “juju medicine” he may have survived. Again, while illness provided the context, health and medicine were not seen as central to conversion efforts. The message was firmly religious and not medical: all should place their faith in Jesus.

Examples of last minute changes of heart also included those who were Christian converts but had lost their way. In these examples, missionary presence at the deathbed provided the opportunity for those who went astray to repent and to offer warnings about the importance of staying true to Christ while highlighting God’s infinite mercy. According to Rev. James White, an African clergyman, two disgruntled and troublemaking former Church members, David Oya and Abraham Ajaka, had attempted to destroy his reputation by spreading lies about him throughout the streets of Otta.²⁴ The rumors gained enough traction to have White brought before ‘native’ authorities. The court dismissed the accusations, clearing White of any wrongdoing. Following the case, Oya became rather ill and while on “his deathbed” sent for White. According to White, Oya confessed his lies and asked for forgiveness. Convinced by the sincerity with which Oya spoke and the depth of his contrition, White agreed, “to pray that God might pardon him.”²⁵ Commenting upon Oya’s final words White stated that: “He left a word of warning to converts against merely outward religion, and admonished them to submit to me as unto God’s minister.”²⁶ In this instance the final words of a misguided

²² *Proceeding of the CMS*, 1889, 29-30.

²³ *Proceeding of the CMS*, 1889, 30.

²⁴ Today known as Ota, Nigeria.

²⁵ *Proceeding of the CMS*, 1871, 30.

²⁶ *Proceeding of the CMS*, 1871, 31.

convert were directed towards increasing the power and authority of a struggling missionary.

After Oya's death there was the matter of what to do with the three children he left behind. According to White:

Heathen relatives, after his death, endeavoured to persuade the children to return to heathenism urging as a reason, that their parents have not prospered by embracing the Christian religion; and had they not forsaken the religion of their forefathers, both father and mother would not have died what they called a premature death.²⁷

Clearly not only were Christians using and framing death as a means to draw attention to their faith and to strengthen their numbers but members of other religions were as well. In this instance, Oya's "heathen relatives" told his children that had their parents not converted they would still be alive today. This must have weighed heavily on the grieving children. Despite the efforts of Oya's relatives, the two eldest boys, both of whom were educated in missionary schools, declared their intention to "live and die as Christians." The other child is not mentioned and presumably went to live with their "heathen relatives."²⁸ Whether this child had been educated at a missionary school or was at an age to profess Christianity is unknown. What is clear is the importance of missionary schools in drawing young people to Christ and that different religious communities framed and understood death differently.²⁹

Although the deathbed provided a chance for recanting or demonstrating regret, some missionaries remained suspicious of those who had rejected Christianity only to accept the faith during their last days. To test the sincerity of those wishing to be baptized while on their deathbed, missionaries could insist that the baptismal be a public event where the candidate would be expected to renounce all of their former beliefs in front of friends and family. The following narrative of Taiwo illustrates this point. Found "lying at death's door" in the Nupe quarter of Onitsha, Taiwo was brought to the nearby hospital.³⁰ The doctor pronounced his case a hopeless one. As far as the authorities could determine he had no friends or relatives willing to take care of him. The missionary explained that "the old or sick too often have no friends, and are just cast out to die when no longer any use."³¹ According to this telling, Taiwo was very fortunate to have been found by Christian authorities.

²⁷ *Proceeding of the CMS*, 1871, 31.

²⁸ *Proceeding of the CMS*, 1871, 31

²⁹ For the importance of missionary education as method of attracting converts see, Edward Berman, "Christian Missions in Africa," in *African Reactions to Missionary Education*, ed. Edward Berman (New York: Teachers College Press, 1975), 7-8.

³⁰ Onitsha is located in southeast Nigeria. *Proceeding of the CMS*, 1889, 37.

³¹ *Proceeding of the CMS*, 1889, 37.

Taiwo, a follower of Islam, showed little enthusiasm or willingness to learn about Christ. However, with time he began to demonstrate “more appreciation of the efforts made...” and soon “professed faith in Jesus.”³² Exactly what the missionary intended by “efforts” is not known but presumably this meant both the medical and religious attention he received. If so, this case is unique within the framework of happy death narratives by demonstrating that western medicine could play a role in proselytizing. Such examples, had there been more of them, may have encouraged the development of medical missions in West Africa. Indeed, compared to China and India, West Africa had been relatively neglected as a site for medical missionaries. Even by the end of the nineteenth century, Africa had received 82 Protestant medical missionaries compared to China and India, which had received 239 and 201 respectively.³³ This means that while health and healing were being celebrated and employed as a means of conversion in Asia, CMS missionaries in West Africa were, for the most part, celebrating happy deaths. The use of medical missionaries as a tool of conversion stood in stark contrast to happy deaths where the sick converts were expected to embrace death and even look forward to it.

During the course of his treatment, Taiwo began to demonstrate an appreciation and understanding of the Christian faith and a desire to be baptized. Sensing a chance to demonstrate the transformative nature of Christianity and possibly worried about Taiwo’s dedication to Christ, the missionary asked whether he would consent to a public baptism in front of not only his friends and family but members of the wider community as well. Taiwo replied enthusiastically exclaiming, “let them all come! Why not? Why should I be ashamed for them to hear the news?”³⁴ Taiwo’s disposition immediately changed; no longer downcast, he had an upright and cheerful demeanor and despite his poor health he no longer complained about his physical condition.³⁵ This was a common theme: true Christians face pain and suffering with bravery and acceptance.

On the day of Taiwo’s baptism numerous members of the community gathered to witness the event. Before being baptized, Taiwo had to answer a series of questions to prove his sincerity to both the crowd and missionary authorities. Taiwo spoke Yoruba, but for the benefit of the audience the Church also had his answers translated into Nupe and English. Despite his “great weakness,” Taiwo answered questions clearly and convincingly. To ensure sincerity, Taiwo, the former Muslim, was asked to profess not only his belief in Jesus but also to renounce all faith in the prophet Muhammad.³⁶ Taiwo did so with enthusiasm and much sincerity. While Taiwo’s disposition may have changed, his health did not as “he only lingered for a week [after conversion], becoming almost

³² *Proceeding of the CMS*, 1889, 37.

³³ Christoffer Grundmann, *Sent to Heal! Emergence and Development of Medical Missions* (New York: University Press of America, 2005), 162.

³⁴ *Proceeding of the CMS*, 1889, 38.

³⁵ *Proceeding of the CMS*, 1889, 38.

³⁶ *Proceeding of the CMS*, 1889, 38.

immediately weaker; but to the last his faith never faltered.”³⁷ Nearing his end, Taiwo demonstrated “again and again” that “he had no fear of death” for “he belonged to God, body mind and soul.”³⁸ Taiwo died eight days after his baptism “in sure and certain hope of a glorious resurrection.”³⁹

The tranquility displayed by ‘true’ Christians facing death was believed to be a powerful tool in converting non-believers, including those who had ardently resisted Christianity. One such narrative involved an elderly woman who contracted a long and painful illness shortly after joining the Church. Since the earliest days of her conversion, this woman uttered “fervent and repeated prayers” that her only surviving son (she had given birth to thirteen children) adopt Christianity. Her son showed no interest in conversion and according to the missionary remained “a stern resister of the truth.”⁴⁰ When his mother became ill, this “stern resister” witnessed first-hand the power of faith as his mother faced death with tranquility and grace. The missionary reported that “her entire resignation to the will of God under the most excruciating pains, wrought so powerfully on her only surviving son... that immediately after her death he resolved to embrace the religion that has supported and comforted his mother in the hours of death.”⁴¹ His wife also converted. Not only did this mother’s dignity and the way she bore her illness encourage her son and his wife to convert but the missionary also noted that “Mohammedans and heathen friends” were also impressed by her strength.⁴² Clearly, even in death a convert could inspire others to accept Christ and this made their passing all the more valuable and, one could imagine, ‘happy.’

According to the CMS the attention paid to the sick by Christian congregations inspired conversion. Evidence of the importance of the care given by a Christian congregation can be found in the story of Sarah (presumably the name given to her at her baptismal), widely known amongst the Christian community for her “notoriously bad character” and devotion to heathenism.⁴³ However, Sarah, who scorned Christianity, had fallen ill and this illness offered the Church the opportunity to demonstrate Christian kindness. While we are not told what caused her suffering, Sarah contracted a “protracted and painful illness.”⁴⁴ According to the report, Sarah received no help from her “Mohammedan friends” who “fled away from her...” while “Church members took particular care of her.”⁴⁵ Presumably taking “care of her” referred to not only her physical needs but also her emotional and spiritual needs as well. Christian communities and their missionaries prided themselves on their ability to offer a nurturing and welcoming environment to all people regardless of

³⁷ *Proceeding of the CMS*, 1889, 38.

³⁸ *Proceeding of the CMS*, 1889, 38.

³⁹ *Proceeding of the CMS*, 1889, 38.

⁴⁰ *Proceeding of the CMS*, 1879, 17.

⁴¹ *Proceeding of the CMS*, 1879, 17.

⁴² *Proceeding of the CMS*, 1879, 17.

⁴³ *Proceeding of the CMS*, 1875, 25.

⁴⁴ *Proceeding of the CMS*, 1875, 25.

⁴⁵ *Proceeding of the CMS*, 1875, 25.

faith. During her illness these visits had a tremendous impact on Sarah, who, inspired by their tender care, converted to Christianity. Sarah developed a deep and unwavering faith described as “strenuously clinging to Jesus and the atonement wrought by him.”⁴⁶ After her conversion Sarah’s health did not improve and members of the congregation continued to provide care and support. Inspired by the care provided by the congregation and the depth of Sarah’s conversion, the missionary confidently explained that these events confirmed “the reality of the invisible world and of Christ as the all-sufficient Savior of sinners....”⁴⁷ Sarah did not survive her illness. While the presence of a medical professional at the deathbed is not mentioned, the reportedly poor care she received from members of her former faith was highlighted. The report concludes by saying that the kindness shown by this Christian community had an effect on the “heathens” who “observed the attention paid by the [Church] members to her when all her friends and relations abandoned her.”⁴⁸ This tender care may have encouraged some members of the “heathen” population to consider conversion.

Through the medium of the deathbed narrative missionaries celebrated the conversion of renowned followers of heathenism. The story of Afresi, “a fetish devotee” is an example of such a narrative. Afresi came from a prominent religious family who was the head of the “fetish worship” in Badagry.⁴⁹ Despite her reported devotion to heathenism, she fell in love and subsequently married a man who had taken an interest in Christianity. Her husband was baptized on the eve of their wedding: she was not. Presumably, at this point, Afresi was neither a Christian nor a “fetish devotee” but was in the transitional phase from one faith to another. The wedding surprised her friends and family; the missionary reported that the Church overflowed with “half-naked” ‘heathens’ “who could scarcely believe their own eyes.”⁵⁰ A few months after the wedding Afresi fell ill. She was attended to by her recently joined congregation. According to the report, the “fetish people,” upon hearing of her illness, attempted to capitalize on her diminished health by organizing three days of dancing and chanting aimed at bringing about her death. The missionary recorded that these “fetish people” asked their “idols” to: “Miserably kill all deserters” and to: “Let nothing satisfy thee but death – miserable death.”⁵¹ Afresi responded with prayer asking God to have mercy on her soul. She asked God to: “Wash my soul and make me clean in Jesus’s blood.”⁵² She prayed for the strength to die in the arms of the Lord: “Help me to never look back nor doubt thy power to save me; but

⁴⁶ *Proceeding of the CMS*, 1875, 25.

⁴⁷ *Proceeding of the CMS*, 1875, 25.

⁴⁸ *Proceeding of the CMS*, 1875, 25.

⁴⁹ Badagry is a coastal town located in southwest Nigeria

⁵⁰ *Proceeding of the CMS*, 1871, 23.

⁵¹ *Proceeding of the CMS*, 1871, 23.

⁵² *Proceeding of the CMS*, 1871, 23.

help me to die in Jesus's hands."⁵³ She held no ill will towards those who had called for her death pleading that God have "mercy on the people of Badagry. They are very wicked: pardon them...."⁵⁴ Afresi did not survive. What is unknown is whether the so-called "fetish people" also interpreted Afresi's death as evidence of the power of their beliefs. If so, a convert's death could be seen and used as evidence to strengthen multiple faiths.

The ways in which missionaries constructed happy death narratives suggests that it was not just the public and missionary authorities who needed reassurance of the value of their efforts, but the missionaries themselves. Missionary work in West Africa was extremely difficult; the challenge of language, climate, and resistance must have worn on missionaries. Knowing definitively that they had saved a soul and seen it – without doubt – transition to the afterlife must have been a reward for what could be a gloomy and difficult occupation. Given such a perspective, it is not surprising that the sincerity of a convert and the preservation of their soul and not health and healing were the chief concerns of missionaries. This desire for sincerity led missionaries away from health and healing, believing that a dying convert could serve as an inspiration not only for potential converts in West Africa but to Christians back home. Neither medicine nor medical missionaries were viewed as a necessary tool of conversion in West Africa. Happy death narratives constructed by traditional (non-medical) missionaries put themselves at the center of the narrative, a position that became increasingly untenable as colonial officials, medical missionaries, and medical practitioners insisted that health was a central concern. By surveying deathbed narratives 1860-1890, it is clear that missionaries privileged the soul over physical concerns, including survival, and that they expected converts to do so as well. The almost total absence of medicine or medical practitioners in these narratives offered CMS authorities an image of converts who neither needed nor wanted to be healed. Such a framing may have delayed the sending of medical missionaries to West Africa and explains in part their rather sparse number compared to other locations within the Empire. One must wonder how different the story might have been for West African people had the focus throughout the nineteenth century been not on happy deaths but healthy lives.

⁵³ *Proceeding of the CMS*, 1871, 23.

⁵⁴ *Proceeding of the CMS*, 1871, 23.

Works Cited

- Berman, Edward. "Christian Missions in Africa." *African Reactions to Missionary Education*, ed. Edward Berman. New York: Teachers College Press, 1975, 1-53.
- Curtin, Philip. *The Image of Africa: British Ideas and Action, 1780-1850*. Wisconsin: University of Wisconsin Press, 1964.
- Fitzgerald, Rosemary. "'Clinical Christianity': The Emergence of Medical Work as a Missionary Strategy in Colonial India, 1800-1914." *Health, Medicine and Empire: Perspectives on Colonial India*, ed. Biswamoy Pati and Mark Harrison. London: Sagam, 2001, 88-136.
- Grundmann, Christoffer. *Sent to Heal! Emergence and Development of Medical Missions*. New York: University Press of America, 2005.
- Proceedings of the Church Missionary Society for Africa and the East, 1870*. London: Church Missionary House.
- Williams, Peter. "Healing and Evangelicalism: The Place of Medicine in Later Victorian Protestant Missionary Thinking." *The Church and Healing*, ed. W. J. Shields. Oxford: Basil Blackwell, 1982, 271-286

THE INTRODUCTION OF FORMAL MIDWIFERY INSTRUCTION IN EIGHTEENTH- CENTURY MILAN, ITALY

by

JENNIFER F. KOSMIN
(University of North Carolina at Chapel Hill)

ABSTRACT: Over the course of the eighteenth century, the professionalization of medical practice and the extension of that practice into traditional spaces profoundly altered the ways in which childbirth was understood and embodied. At the core of these developments were changes in the use of space and the introduction of novel technologies. This paper explores the ways in which the knowledge surrounding childbirth was redefined in the context of new programs of formal midwifery instruction introduced at the *Ospedale Maggiore* in Milan, Italy in 1767. I argue that new childbirth and instructive spaces within the hospital privileged a particular kind of *knowing*. In opposition to the midwife's experiential knowledge, the midwifery course in Milan was steeped in the masculinist paradigms of the university which valued theoretical instruction and promoted visuality over tactility. Instructional techniques centered on the memorization of theoretical principles, the study of anatomy, and the use of wax obstetrical models functioned to normalize such masculinist modes of understanding the body. Along with new obstetrical tools and techniques – such as forceps and pelvic measurement – the instructional methods employed in Milan aimed to reconstitute midwifery as a *science* in contrast to the long-standing but informal principles which had guided female practitioners for centuries.

Francesca Mazzuchelli, a peasant woman from Gallarate, a rural community northwest of Milan, was among the first class of midwives to be trained at the city's new midwifery school. Established in 1767 in Milan's central hospital, the *Ospedale Maggiore*, the midwifery school was the first of its kind in Austrian Lombardy. The reformers who had proposed the school were particularly intent on recruiting provincial women like Mazzuchelli, who, they hoped, would act as ambassadors, bringing to remote communities the new knowledge of childbirth gained in the city. However, despite her success at school (Francesca had "gracefully completed her final exam"), Mazzuchelli's return home was met with disillusion and despair. Instead of the expected benefits of formal education and official license, such as increased pay and a wider client base, Mazzuchelli found herself in a losing competition with two other midwives, Camilla Ceriana and Orsola Brambilla, both of whom had continued to practice "without approval or study" in Francesca's absence. Mazzuchelli discovered that she was rarely called on as a midwife and so had "hardly enough food for her numerous family."¹ Mazzuchelli's experience was one that was shared by many of the midwifery school's newly trained graduates when they returned to their home communities. Rather than embrace this new corps of 'professional' midwives, many

¹ Archivio di Stato di Milano (ASM), Sanità, Parte Antica. 269, Ricorso di F. Ponti Mazzuchelli, 11 Ottobre 1768.

women shunned something they viewed with suspicion and doubt. Neither the theoretical training of the university nor an official license made much of an impact on women who judged the skill of their birth attendants by trusted recommendation earned through years of practice and intimate knowledge of the community.

In this paper, I aim to sort out the reasons behind resistance to the new knowledge of childbirth embodied by the recent graduates of Milan's first midwifery school. The Milanese and Austrian reformers who first envisioned the school were responding above all to widespread outrage at a high infant mortality rate and apparent ignorance of the midwives who assisted at these birth. At the same time, the project represented a newfound confidence in the State's ability to ameliorate such ills. Indeed, the expansion of midwifery education in the Lombard territories was at once an expression of Enlightenment-era assurance of the power of science, the belief in the necessity of the State to involve itself in public health, and in the State's ability to utilize the biopower of its subject population to buttress it in international competition. For the sake of time, however, my discussion today will concentrate not on the broader historical context in which the midwifery program was produced, but rather on the the spatial and epistemological foundations which underpinned the formal instruction of midwives in eighteenth-century Italy.

Milan presents an instructive test case for understanding the interactions between two diverging bodies of knowledge about childbirth. Home to innovative proposals in both midwifery instruction and maternity care, Milan often served as a model for other Italian states experimenting with similar programs. Yet, in Italy more than elsewhere in Western Europe, the management of childbirth was left largely in the hands of women throughout the eighteenth century. Thus the midwifery school project at the *Ospedale Maggiore* was aimed from its inception at training *female* midwives. At the same time, however, the knowledge and praxis of childbirth as taught at the Milanese school was indicative of a new scientific epistemology that would shape the ways in which childbirth was understood, embodied, and assisted in the Western world down to the present day. According to the fundamental organizing principles of the new field of obstetrics, childbirth could be rationalized and universalized in a way that contradicted much of traditional midwifery's concern with the individual female body and woman's unique experience of labor.

On October 28, 1767, an edict was printed in Milan announcing that Austrian Empress Maria Theresa, "commiserating [on]...the inexperience that daily one finds largely in the midwives of the countryside, has ordered that one of the primary responsibilities (*provvidenze*) of the Government relative to the good regulation of the pious places (*luoghi pii*) will be to erect a school in this Venerable *Ospedale Maggiore* where [midwives] can be comfortably trained."² In particular, rural midwives. These would be

² ASM, Atti di Governo, Sanità, Parte Antica, 268, Circolare Stampata, 28 Ottobre 1767, "Commiserando Sua Maesta l'Augustissima Imperadrice Regina Nostra Augustissima Padrona

welcomed to Milan, where they would stay at the *Ospedale Maggiore* during their instruction. Afterwards, it was hoped, the recently trained midwives would “provide aid with their newly acquired knowledge to the poor, and from us distant lands, which are now abandoned to the practice of inexpert and ignorant women.”³

Those women who desired to enroll in the course were required to submit a certificate from their local parish priest attesting to their good morals, a statement of permission from their husbands, and evidence that they were able to read and write at least at a basic level. Local parish priests, liasons in this process, were charged with recommending one or two women from their communities. They were asked to take into account whether the candidate was of “good and regular health...[and good] organic proportions,” and if she demonstrated a “certain natural intelligence [*lume*]” indicating she would be able to handle the rigors and challenges of an intense, theoretically based course of instruction. The requirement of particular physical characteristics, specifically small, strong hands and a robust composition belied the manual component of midwifery. Most tellingly, however, the women were supposed to be of a “natural docility and discrete discernment.”⁴ In other words, officials desired precisely those women who would best conform to the school’s objective of producing a corps of well-trained, modest, and deferential midwives whose loyalty to the state was unquestioned.

By targeting women from the countryside, the Milanese reformers determined to root out the “perverse popular opinion” of rural midwives and the resulting “inconveniences” and “disreputable” practices.⁵ In addition to the unruly persistence of many folk traditions and non-Catholic childbirth rituals, critics believed that rural midwives often hesitated far too long in emergent situations to call in medical assistance; that they applied instruments themselves despite prohibitions; and that they were susceptible (as women) to over-excitement and irrational behavior during the chaotic time of labor. State officials also distrusted midwives’ close ties with their communities, fearing that they would choose loyalty to their clients over, for instance, their obligation to report

l'inesperienza, che giornalmente si scuopre maggiore alla Compagna nelle Ostetrici, ha ordinate, che una delle prime provvidenze del Governo relativamente al buon regolamento de' Luoghi Pii, sia quella di far erigere una Scuola in questo Venerando Spedal Maggiore, ove possano essere comodamente ammastrate.”

³ ASM, Atti di Governo, Sanità, Parte Antica, 268, “...e sovvenire colli acquistati Lumi que Poveri, e da noi lontani Terrieri, li quali ora sono abbandonati alla Condotta di donne inesperte, ed ignoranti.”

⁴ ASM, Sanità, Parte Antica, 268, Istruzione alli cancellieri e deputati dello estimo per l'elezione delle donne che dovranno essere instrutte nell'Ospedale Maggiore di Milano nell'arte ostetricia, 28 Ottobre 1767, “Il principale e più importante oggetto, che deve interessare le persone destinate alla scelta delle donne capaci per l'arte ostetricia...si è quella che oltre la buona e regolare salute, e proporzione organica, abbiano altresì certo naturale lume, e capacità per poter colle maggiore facilità imparare se non le teoriche, almeno le pratiche istruzioni dell'arte. A tale effetto sarà dell'avvedutezza, e diigenza di chi ha tale incarico il ben informarsi del loro temperamento e abituale stato di buona salute, e che...sieno di un naturale docile, e di un discreto discernamento.”

⁵ ASM, Sanità Parte Antica, 268, Lettera di Firmian a Kaunitz, 31 Ottobre 1767, “...perversa popolare opinione reputava disdicevole ed inconveniente l'esercizio suddetto nelle donne del contado.”

illegitimate pregnancies. The midwifery course thus represented the efforts of reformers to refashion the figure of the midwife. No longer would her expertise and reputation be determined by her own personal experience of childbirth, her long activity within the community, or her access to networks of popular medical knowledge; instead, the new midwife was relatively young and preferably married, cosmopolitan, educated in the institutional setting of the hospital, and her knowledge and status were based primarily on her literacy and ability to understand scientifically the workings of the body.

Tasked with direction of the school, the respected surgeon Bernardino Moscati produced a comprehensive midwifery curriculum that highlighted “the theory of childbirth.” Carefully defining situations that were normal as opposed to preternatural, Moscati’s course, through the use of detailed charts and diagrams, attempted to quantify and delimit the totality of potential birth presentations and outcomes. Having as his ultimate aim to elevate the “practices” of midwifery into the “science” of obstetrics, Moscati wrote that, in order to undertake “the profession of childbirth,” it was necessary to learn “the exact anatomy of the parts that serve in conception, [the] bones, muscles, [and] veins. And then the trained midwife should master the mechanism of birth: directions, pushes, forces, changes, passages, stages,” and the “changes that the [anatomical] parts of a woman undergo during birth.” Yet, Moscati was deeply skeptical about the likelihood of the “coarse women” destined for the school, who were “hardly intellectuals” and “barely able to read,” being successful in such a rigorous academic course.⁶

What shape, then, did the actual instruction of novice midwives assume? The student midwives, who boarded on site, followed a daily schedule designed with little flexibility. Rising at five or six AM depending on the month, the women would have an hour for prayer and cleaning, a half hour each for mass and breakfast, three or four hours of instruction and study, and finally two hours for lunch and recreation. Lessons would resume in the afternoon, followed by several hours of dedicated study time, an hour and a half for dinner and recreation, and lastly prayers before bed. On Sundays, the late morning hours typically devoted to lessons were reserved for religious education, while after lunch the students were permitted to “take a walk,” provided they “went in company [of another student] and with [a female] attendant” escorting them. “A single time a month,” after completing their duties for the day, the students would be allowed to leave school grounds in the company of a relative or other approved individual.⁷

⁶ ASM, Sanità, Parte Antica, 268. Lettera di Bernardino Moscati, 1767, “...il timore che l’insegnare verbalmente anche tutti i giorni a rozze donne, e non pensatrici, le quali nemmeno sappino leggere, potesse riuscire di non molto vantaggio...”

⁷ Felice De Billi. *Sulla I.R. Scuola di Ostetricia ed Annesso Ospizio delle Partorienti* (Milano: Società degli Editori degli Annali Universali delle Scienze e dell’Industria, 1844), Tavola A, Orario e Disciplina. “Nel dopopranzo dei giorni di feste, e vacanze ad ore opportune è permesso alle Allieve del Convitto di sortire a passeggio in compagnia e colla scorta di una inserviente. Una sola volta

In an epistemological sense, the most fundamental aspect of the midwifery course was its advancement of a “science of childbirth.” Based upon theoretical and observational knowledge, this new science of birth could be reduced to universal axioms and predictable outcomes. An ironic result of this approach was that Moscati was free to devise a course of instruction that involved very little in the way of actual clinical training, despite the proximity of the hospital’s maternity ward in the nearby *Quarto delle Balie*. Instead, the majority of formal instruction revolved around traditional lecturing and examination procedures. Moscati, like most other male practitioners at the time, had only a very limited firsthand experience with childbirth. As such, he was apparently more comfortable demonstrating obstetrical maneuvers and principles on cadavers and models rather than living patients, who might “misbehave,” either vocally or anatomically. Not only would an obstetrical model not talk back, question the doctor’s maneuvers, or resist his touch, but it would always conform to the ‘rules’ of childbirth being demonstrated.

In fact, Moscati went to great lengths to acquire an obstetrical mannequin to be used as an instructional aide, claiming that it would make the course more accessible to those students whose reading and writing skills were lacking.⁸ Obstetrical machines, which were already commonly in use in Europe as teaching tools by the seventeenth century, were employed in particular by the growing numbers of male midwives, whose practical access to live women’s bodies was necessarily limited.⁹ In fact, Moscati himself seems to have used the Milanese obstetrical model for precisely this purpose – training novice surgeon-obstetricians – later on in his career. Made from a variety of materials, including leather, cloth, and wax, and often incorporating detachable body parts and fetuses, such obstetrical machines enabled students to gain practical experience in manipulating the female body and in observing the changes and movements of the human corpus during the various stages of labor.

Additionally, the midwifery students were required to attend anatomical demonstrations, though these were by necessity performed on an ad hoc basis owing to the unpredictable availability of bodies for dissection. In fact, the choice to house the midwifery school in the *Ospedale Maggiore* was based above all on the fact that “nowhere else is available the quantity of cadavers of pregnant women, or fetuses, or the frequency of occasions to observe the many cases necessarily relative to the theory...of birth.”¹⁰ It was not then the proximity of the students to living patients (clinical instruction) that made the hospital a prime

al mese in detti giorni di festa e di vacanza...possono escire in compagnia di persone parenti o benevole, ad, ore opportune di ogni sabato parlare con queste.”

⁸ ASM, Sanità, Parte Antica, 268. Lettera di B. Moscati, 1767.

⁹ On obstetrical machines, see: Pam Lieske, “Made in Imitation of Real Women and Children’: Obstetrical Machines in Eighteenth-Century Britain,” in Andrew Mangham and Greta Depledge (eds.), *The Female Body in Medicine and Literature* (Liverpool: Liverpool University Press, 2011), 69-88.

¹⁰ ASM, Sanità, Parte Antica, 268. “...ma principalmente perche altrove non è reperibile la quantità de Cadaveri di puerpere, e feti, ne la frequenza delle occassioni per osservare molte cose necessariamente relative alla Teoria, e Pratica de parti.”

location, but rather access to the dead in order to facilitate (conventional) anatomical instruction. When the corpse of neither a pregnant woman nor a fetus could be procured, the women were able to observe the various artifacts of the hospital's extensive medical collection, or anatomo-pathological cabinet. Here, students viewed preserved fetuses at various developmental stages, as well as those with pathologies such as spina bifida. There were examples of "monstrous" births – including fetuses lacking eyes, nose or other body parts - and a variety of other obstetrical specimens.

Finally, Moscati recommended displaying the drawings of "the gravid uterus, and positions of the fetus" as depicted in the well-known anatomical atlases and midwifery manuals of famous men-midwives such as "[Johann Georg] Roederer, [William] Hunter, [and William] Smellie...on the walls of the school, attached to...a written description beneath, an explanation suitably adapted to the need of the midwives."¹¹ Moscati hoped the women would take advantage of these additional instructional aides, observing the images at their leisure and according to their own ability. At the same time, such images underscored the school's emphasis on observational and visual learning, a hallmark of the new clinical medicine emerging in the late eighteenth century. In contrast to traditional midwifery's experiential and tactile modes of training, the use of anatomical illustrations reflected clinical medicine's "belief that visibility itself can reveal the 'facts'" and reinforced obstetrical knowledge as, above all, "a 'seen' knowledge."¹²

Drilling his students on anatomical details and surrounding them with instructive images, having them manipulate obstetrical machines, and letting them observe the various preserved fetal specimens in the anatomo-pathological cabinet Moscati was imparting a particular vision of childbirth that was essential to the emergence of obstetrics as a scientific field of inquiry and knowledge production. At the same time, Moscati's methods must have seemed quite alien to his female trainees – many of whom had long been practicing midwives in their home communities. Critical to the advancement of obstetrics was the development of a theory of birth, from which "a set of principles or axioms to underpin practice" could be derived.¹³ Ludwig Fleck's reminder that not only is theory a fundamental part of all sciences, but that theory is inevitably ideologically laden serves no less for the history of obstetrics. By defining a theory of childbirth and ascribing to it a series of basic organizing principles, male physicians were attempting a process of appropriation, translation, and reinscription of a set of practices and knowledges already in existence.

We began this discussion with the story of Francesa Mazzuchelli of Gallarate. But hers is also the story of Orsola Brambilla, midwife for 22 years in the same town. Unable to attend the midwifery school in Milan for

¹¹ ASM, Sanità, Parte Antica, 268, Lettera di B. Moscati, 1767.

¹² Jo Murphy-Lawless, *Reading Birth and Death: A History of Obstetric Thinking* (Bloomington: Indiana University Press, 1998), 34.

¹³ Murphy-Lawless, 64.

reasons of health and familial demands, Brambilla had become an abusive, technically illegal practitioner almost overnight. Yet, Brambilla's reputation among the community was unassailable. Given the choice between the newly diplomated Mazzuchelli or the long practicing Brambilla, community members consistently chose the latter. Thus one of the most significant outcomes of the institutionalization of midwifery education was to create divisions between women and to highlight popular resistance to the introduction of new modes of legitimation. The force and extent of this resistance was such indeed that authorities in Milan and Vienna were forced to compromise their position – allowing, at least initially, many women deemed to have sufficient practice to continue in their activities as midwives. Apprenticeship under an approved midwife also continued to be a component of midwifery training required before a woman could be licensed in Milan, meaning that the two approaches to childbirth, the theoretical and universalized on the one hand, and the traditional and individualized on the other, continued to coexist side-by-side throughout this period. Although obstetrics aimed to position itself as the only rational, legitimate knowledge and practice of childbirth, local customs and cultural beliefs, at least in Italy, continued to challenge this view well into the nineteenth century.

PROMOTING PROMISES AND MARKETING MIRACLES: AN OVERVIEW OF HOSPITAL ADVERTISING¹

by

LYNNE WELLS GRAZIANO
(Case Western Reserve University)

ABSTRACT: American hospitals have advertised in limited fashion since the late nineteenth century. In 1977, the American Hospital Association (AHA) published its first guidelines for hospital advertising, opening a floodgate for the practice. While relatively uncommon in the late 1970s and early 1980s, hospital advertising inundates the twenty-first century consumer, with advertisements on television, radio, billboards, newspapers, and the Internet. Concomitant with an increase in hospital promotion are the questions about its efficacy, ethical implications, and cost. This paper is designed to provide a brief overview of the history of hospital advertising, an analysis of the oppositional positions, and contextualization of the health care implications through case studies of two Ohio markets, Cleveland and Columbus, where escalating advertising seeks to reach patients not only locally, but nationally. While nearly everyone has seen hospital advertising, most individuals have not considered the social and economic implications of an increasingly common practice. By considering this controversial practice through the lens of local markets, this paper seeks to contribute to the growing dialogue between hospital administrators, health care providers and consumers, and academics. Identifying both positive and negative aspects of hospital advertising illuminates key areas for policy analysis and future research. The socio-economic impacts of this practice intersect with the areas of rising health care costs, the increasing tension between nonprofit and for-profit hospitals, and the ever-eroding power and influence of physicians in patient decision-making.

Introduction

American hospitals have advertised in limited fashion since the late nineteenth century. In 1977, the American Hospital Association (AHA) published its first guidelines for hospital advertising, opening a floodgate for the practice. While relatively uncommon in the late 1970s and early 1980s, hospital advertising inundates the twenty-first century consumer, with advertisements on television, radio, billboards, newspapers, and the Internet. Concomitant with an increase in hospital promotion are the questions about its efficacy, ethical implications, and cost. David Rosner wrote that the “alliance between the hospital as a businesslike enterprise and the hospital as a charitable human service has been uneasy from the start.”² Hospital advertising resides at this awkward intersection of business practice and patient care. This paper is designed to provide a brief overview of the history of hospital advertising, an analysis of the oppositional positions, and contextualization of the health care

¹ Presented at: Southern Association for the History of Medicine and Science (SAHMS) Annual Conference, February 21-23, 2013, Charleston, SC

² David Rosner, *A Once Charitable Enterprise: Hospitals and Health Care in Brooklyn and New York, 1885-1915* (New York: Cambridge University Press, 1982), viii.

implications through case studies of two Ohio markets, Cleveland and Columbus, where escalating advertising seeks to reach patients not only locally, but nationally.

While nearly everyone has seen hospital advertising, most individuals have not considered the social and economic implications of an increasingly common practice. By considering this controversial practice through the lens of local markets (some with regional or even national aspirations), this paper seeks to contribute to the growing dialogue between hospital administrators, health care providers and consumers, and academics. Identifying both positive and negative aspects of hospital advertising illuminates key areas for policy analysis and future research. Hospital advertising is a vital topic that can be seen as hiding in plain sight. The socio-economic impacts of this practice intersect with the areas of rising health care costs, the increasing tension between nonprofit and for-profit hospitals, and the ever-eroding power and influence of physicians in patient decision-making.

Historical Overview of Hospital Advertising

For most of the American nineteenth century, “good treatment was home treatment.”³ In the words of Paul Starr, hospitals were “places of dreaded impurity and exiled human wreckage.”⁴ While the Civil War brought about improvements in hospital care and management, post-war America still considered the hospital as a place for the poor, the indigent, or those without family support. Prior to the rise of sanitary accommodations, antiseptic practices, and the mastery of anesthesia, most Americans chose home care by their local physician except in the most extreme circumstances. Hospitals were considered places of death, not cure, and as such, advertising their services were problematic at best. Near the end of the nineteenth century, with a move away from large ward-style rooms for dying, toward a collection of private and semi-private rooms for care and healing, American hospitals began to draw a paying clientele. Barbara Mann Wall notes that Catholic nuns, leading caregivers in a hospital system heavily populated with Catholic institutions, designed marketing strategies “actively seeking groups of new clients who were ready sources of revenue.”⁵ For illustration, Wall provides an advertisement placed in 1890 by the Sisters of St. Joseph for St. Mary’s Hospital in Minneapolis, MN. They provide a list of their medical and surgical staff including

³ Morris J. Vogel, *The Invention of the Modern Hospital, Boston 1870-1930* (Chicago, IL: The University of Chicago Press, 1980), 1.

⁴ Paul Starr, *The Social Transformation of American Medicine: The Rise of a Sovereign Profession and the Making of a Vast Industry* (New York: Basic Books, Inc., 1982), 145.

⁵ Barbara Mann Wall, *Unlikely Entrepreneurs: Catholic Sisters and the Hospital Marketplace, 1865-1925* (Columbus, OH: The Ohio State University Press, 2005), 106.

consulting physicians, surgeons, and specialists, noting this staff is “composed of some of the ablest talent of the Northwest.”⁶

In their early marketing skill, as well as their early nursing skill, Catholic nuns were pioneers. As hospitals increased, most relied on word of mouth, community loyalty, and religious denominational ties to fill their beds. Between the last decade of the nineteenth century and World War I, the number of hospitals in America rose dramatically. 1873 America had roughly 178 hospitals, including mental institutions, with a total of less than 50,000 beds. By 1909, not including mental hospitals, there were 4,359 hospitals with 421,065 beds.⁷ By 1929, the American Medical Association (AMA) reported 6,665 hospitals with 907,133 beds.⁸ As the number of hospitals increased, the number of physicians with access and associations with a hospital increased as well. Like most professionals, physicians largely did not advertise, “because they considered themselves to be above the mainstream of the competitive marketplace.”⁹ Historically, both the AMA and the AHA implemented policies prohibiting advertising by individuals and hospitals. Throughout the twentieth century, both groups found the practice of medicine increasingly tied to business practices assimilated from corporations. With the adoption of a capitalistic, bottom line mindset, the need for marketing of services to raise revenue increased. Some believe a hospital’s “legal right to advertise has developed as part of the evolutionary interpretation of the First Amendment of the United States Constitution.”¹⁰

By 1975, the Federal Trade Commission (FTC) was investigating anti-competitive practices in health-care. Ironically, this investigation was occurring just after the number of hospitals in the United States peaked at 7,174 in 1974, though the number of beds began declining after the mid-1960s.¹¹ A FTC administrative judge decided that the AMA had caused “substantial injury to the public by restricting advertising and other business practices of health-care providers.” Specifically, restricting advertising deprived “consumers of the free flow of information about the availability of health-care services,” deterred the “offering of innovative forms of health-care,” and “stifled the use of almost every type of health-care delivery that would potentially pose a threat to the incomes of fee-for-service health-care providers in private practice.”¹² By 1977, the AHA approved its first guidelines for the use of advertising. These included five

⁶ Ibid., 119.

⁷ Charles Rosenberg, *The Care of Strangers: The Rise of the American Hospital System* (Baltimore, MD: Johns Hopkins University Press, 1987), 5.

⁸ Susan B. Carter, et al. editors, *Historical Statistics of the United States*, Millennial Edition On Line (Cambridge University Press, 2006), Table Bd158-171, 2-532.

⁹ H. Ronald Moser and Gordon L. Freeman, “How the Public Views Hospital Advertising: An Empirical Analysis,” *Journal of Medical Marketing* 11, no.4 (2011), 320.

¹⁰ Ibid.

¹¹ Carter, et al, Table Bd144-157, 2-530. Only one other year, 1924, had a higher number of hospitals at 7,370, which appears to be a statistical anomaly as 1923’s number was 6,830 and 1925 was 6,896.

¹² Moser and Freeman, 320.

tenets for the content: “truth and accuracy, fairness, no comparisons, no claims of prominence, and no promotion of individual professionals.” The AHA also identified five “legitimate” purposes for these advertisements: “public education about available services, public education about health care, accounting to the community, seeking support, and employee recruitment.”¹³ Like the guidelines, the practice of advertising has evolved over time.

With the litigated approval of medical care advertising, hospitals began dabbling in the practice by the late 1970s. In 1979, the Washington Hospital Center in Washington, D.C. mailed a newsletter, “For Your Good Health,” to 50,000 area residents. It provided information about diabetes, Parkinson’s disease, sunburn, and over-the-counter drugs. Jane Snyder, public relations director for the hospital as well as a member of the AHA advertising guideline committee, argued that this was not marketing, rather another form of the “public information” the hospital had been doing “for years.”¹⁴ That same year, the *Journal of Marketing* reported an increase in hospital administrators attending marketing seminars, and Evanston Hospital, in Illinois, “appointed the world’s first vice president of marketing.”¹⁵ The marketing profession was more than willing to welcome healthcare advertising, noting that marketing “offer a great potential to third sector organizations to survive, grow, and strengthen their contributions to the general welfare.”¹⁶ By appealing to the community benefit standard of hospitals, marketers increasingly worked to draw hospital business into their portfolios.

The 1980s witnessed a rise in hospital advertising as well as increased attention to the problems associated with it. In the *Journal of Medical Ethics*, Allen Dyer argued, “trustworthiness is the pivotal criterion of professional status.” Dyer focused on Max Weber’s theory of professional monopoly, which features steps such as commodity creation, separation of performance from the satisfaction of a client’s interest, creation of scarcity, monopolization on the supply side, restrictions on membership, elimination of both external and internal competition, price fixation above theoretical market value, and group solidarity and cooperation.¹⁷ Professional identity needed settled before the question of whether and how physicians and hospitals should advertise, and this was difficult in a market where “patients have become ‘consumers;’ doctors have become ‘providers;’ health care has become a commodity; and ‘third

¹³ Leonard Sloane, “Advertising: Hospital Promotion Guidelines,” *The New York Times*, September 1, 1977, D11.

¹⁴ B.D. Colen, “Hospitals Turning to Advertising: Hospitals Marketing Their Facilities, Programs by Mail,” *The Washington Post*, June 25, 1979, A1, A6.

¹⁵ Philip Kotler, “Strategies for Introducing Marketing into Nonprofit Organizations,” *Journal of Marketing* 43, no.1 (Jan., 1979), 40.

¹⁶ *Ibid.*, 44.

¹⁷ Allen R. Dyer, “Ethics, Advertising, and the Definition of a Profession,” *Journal of Medical Ethics* 11, no.2 (June 1985), 73.

parties,' including insurance companies, social service agencies, and allied health professionals, are very much a part of the picture."¹⁸

In Minnesota, the Twin Cities saw these ethical concerns played out as hospitals battled for patients with advertisements featuring "loving arms" or "the chance to 'design your own miracle.'" John Klein, the health economics analyst for the Minnesota Department of Health, noted the fear that advertising might be utilized to "generate demand artificially. There's no question there are some advertisements we've seen that get into that area."¹⁹ Nationally, from 1984 to 1985 hospitals tripled their advertising budgets, including in New Jersey where hospitals increased advertising to "try to stem the loss of tens of thousands of patients a year to out-of-state hospitals." Gerald McManis, a hospital consultant, argued this was due, in part, to the desire to "distinguish themselves from competing institutions."²⁰ Roughly a decade removed from the FTC ruling permitting physician and hospital advertising, the issues of competition for patients, differentiation, specialization, and justification of methods had emerged. And while most consumers favored hospital advertising in myriad forms (newspapers, direct mail, television, billboards), physicians, who largely opposed advertising, struggled to reconcile factors such as referral services, patient transience, and services not requiring physician orders.²¹

The rise of managed care also influenced hospital advertising. In the mid-1990s, "the average not-for-profit teaching hospital increased its bed-adjusted advertising expenditures by 140%, (while) for profit hospitals decreased their spending."²² Barro and Chu noted that this dramatic rise in advertising in the 1990s was linked with the rise of health management organizations (HMOs), concomitant with several other factors: An equilibrium shift from advertising as the exception to the rule; nonprofit hospitals experiencing a fundamental shift in objectives; new financial realities "forcing" hospital executives into the practice; and changes in the market structure and hospital reimbursement system.²³ Whatever the specific factors driving an increase in advertising across hospitals differentiated by type of ownership, type of specialties, and locale, the practice continues to grow in most sectors. Meanwhile, several academic studies have confirmed that the practice is profitable, as hospitals that advertise usually "see an increase in the number of middle-to-lower-income patients," while finding the "return on dollars invested by

¹⁸ Ibid., 78.

¹⁹ Martha Malan, "Hospitals Turn to Advertising: Empty Beds, HMOs Spur Competition for Patients in Twin Cities," *The Washington Post*, December 29, 1985, A4.

²⁰ Marian Courtney, "Hospitals Pressing Advertising: Hospitals Pressing Ad Campaigns," *The New York Times*, September 28, 1986, NJ1.

²¹ Caroline M. Fisher, and Claire J. Anderson, "Hospital Advertising: Does it Influence Consumers?" *Journal of Health Care Marketing* 10, no.4 (December 1990), 40, 41.

²² James Barro and Michael Chu, "HMO Penetration, Ownership Status, and the Rise of Hospital Advertising," *The Governance of Not-For-Profit Organizations*, Edwards L. Glaeser, editor (Chicago, IL: University of Chicago press, 2003), online <http://www.nber.org/chapters/c9967>, 102.

²³ Ibid., 105,106.

professionals in advertising was four to six times the cost.”²⁴ Hospitals that advertise use arguments akin to those made by pharmaceutical companies in relation to direct-to-consumer (DTC) advertising: that is, advertising provides education for the consumer and highlights services that can improve health outcomes. The counter arguments are also similar: hospital advertising creates consumer demand that may conflict with their physician’s advice; it may lead to increased medicalization; it may inspire unnecessary care; and it may increase the overall cost of healthcare to all.

Oppositional Positions for Hospital Advertising

While many studies have shown that consumers, in general, favor medical care advertising, medical professionals, especially physicians, tend to oppose it. America’s traditional health care model rests on the physician “as well-informed, benevolent agent, directing what is best for the patient.” As such, “advertising directly to the patients can play very little positive role and may, in fact, be detrimental to patient outcomes.”²⁵ DTC advertising has been recognized for shifting the decision-making aspect of the patient-physician relationship, so too for hospital advertising. The patient, as consumer, conceivably may desire one hospital based on advertising, be influenced by the doctor to choose a different hospital, and ultimately be swayed by his insurance company to delay the procedure, or have it done at another hospital entirely.

In a scenario where the patient is offered the chance to choose independently, studies suggest this is not necessarily ideal. Patients, who are often under “severe emotional and/or physical distress, are influenced by advertisements that more than 60% of the time offer emotional appeals.”²⁶ Advertising slogans tend to lack specificity, while offering upbeat slogans such as “Amazing Things are Happening Here” (New York-Presbyterian), “Any Given Moment” (NYU Langone), and “Hope Lives Here” (North Shore – LIU).²⁷ These sample slogans are derived from 2011 advertising materials in the New York City area where health care institutions spent over \$80 million in advertising, compared with \$69.3 million in 2010, according to Kantar Media, an increase of over 15%.²⁸ Advertising both raises costs and leads to wasteful utilization of services. As hospitals compete for the same pool of patients, even reluctant advertisers find themselves drawn into defensive advertising. Meanwhile,

²⁴ Moser and Freeman, 322.

²⁵ Barro and Chu, 103.

²⁶ David Oxman, “Hospital Advertising,” *The Hospitalist*, January 2007, http://www.the-hospitalist.org/details/article/241425/Hospital_Advertising.html, (accessed 9/16/12).

²⁷ Gale Scott, “Hospital Ads: They’re Everywhere,” *Crain’s New York Business.com*, July 31, 2011. <http://www.craigslist.com/article/20110731/SUB/110739999>, (accessed 10/21/12).

²⁸ *Ibid.*

evidence has indicated that hospital advertising may contribute to “the public’s demand for costly and ineffectual treatments around the end of life, given the perception that higher technology and more advanced procedures are always better.”²⁹ One oncologist would agree that advertisements are not the ideal for patient education, noting that the purpose of advertising is to “sell products, *not* to educate in its broadest sense. The mission is to make money.”³⁰

Another controversial aspect of hospital advertising is the fact that nearly two-thirds of American hospitals are nonprofit institutions. Marketers argue both competitive reasons and public benefit in a marketplace where, admittedly, “the general public doesn’t understand or care whether you are nonprofit or for-profit...(they) just want their needs met.”³¹ Like advertisements for restaurant chains, cosmetics, and soft drinks, hospital advertising is designed to cement brand identity and loyalty. In fact, Anthony Cirillo, a strategic planner and marketing consultant from North Carolina, conceded, “most hospitals are spending most of their marketing dollars on mass media brand advertising rather than on public education and relationship marketing.” These branding efforts often incorporate quality data or rankings based on previous performance standards and evaluations. At times, the data is outdated by the time it is advertised. Cirillo asks, “Because there are so many sources and metrics out there, which are the ones to be believed?”³² Indeed, if the marketers entrusted with advertising campaigns find it difficult to sort out nonprofit and for profit, ratings and rankings, or branding and community benefits, how much less prepared is the average medical consumer?

Yet it is these very same consumers who proponents argue benefit from the educational, “competitive” advantages of hospital advertisements.³³ New York’s Montefiore Hospital CEO, Dr. Steve Safyer, agrees, “if you don’t play a role in defining yourself, others will define you.” Differentiation, the chance to stand out in a tight marketplace of myriad choice, has been a strong driver for many hospitals. From 2009 to 2010, Connecticut saw an 18 percent increase in advertising by the state’s thirty acute care hospitals, largely pushed by “increased pressure to differentiate themselves from the competition, especially as consumers take more control over where they receive healthcare services.”³⁴ In fact, *Advertising*

²⁹ Oxman.

³⁰ Gregory A. Abel, Richard T. Penson, Steven Joffe, Lidia Schapira, Bruce A. Chabner, Thomas J. Lynch, Jr., “Direct-to-Consumer Advertising in Oncology,” *The Oncologist* 11 (2006), 220.

³¹ “Advertising by Nonprofit Health Care Organizations: A Dialogue,” *Inquiry* 45 (Fall 2008), 260. Quote from John Kaegi, group vice president of marketing, BlueCross BlueShield of Florida, Jacksonville, FL.

³² *Ibid*, 257.

³³ Oxman.

³⁴ Greg Bordonaro, “Hospitals Hike Ad Spending to Gain Market Share,” *Hartford Business.com*, January 23, 2012. <http://www.hartfordbusiness.com/apps/pbcs.dll/article?AID=/20120123/PRINTEDITION/301239998&template=printart>, (accessed on 9/16/12).

Age magazine anticipates the Affordable Care Act (ACA), often known as Obamacare, will drive an additional increase in advertising as hospitals are faced with “an influx of new customers and a short-term objective of setting expectations.”³⁵

Other proponents of hospital advertising emphasize issues of choice, access, and empowerment for their consumers, the potential patients. As discussed, hospital advertisements emphasize differentiating features, quality measures, and a dazzling array of services. Print and media advertisements feature smiling doctors, caring nurses, and happy, healing patients; Internet ads feature click and choose menus to study conditions, read success stories, or schedule a visit; while radio spots feature dramatic testimonials by patients who have found their miracle at a certain hospital. The University of Pennsylvania Health System has used Facebook and Google to find new patients for lung transplants. While less than 150 of the nation’s 6000 hospitals use social media to market services, more will follow. The hospital’s \$20,000 campaign had 4,600 clicks, 36 appointments made, one patient placed on the list and others under evaluation – for the lung transplant procedure, which accounts for nearly \$100,000 in revenue.³⁶ Viewed as a “more responsible” type of advertising because interested parties opt in to the pipeline, the University of Pennsylvania officials plan to expand into fertility service and proton therapy for prostate cancer advertisements.³⁷

Another prestigious, well-known hospital, the Mayo Clinic in Minnesota, has promoted accessibility in a series of nationwide advertisements. Even at “the” Mayo Clinic, “anyone can get an appointment.” Similarly, the 20 hospitals of the University of Pittsburgh Medical Center (UPMC) were promoted in a “Life Changing Medicine” series of advertisements highlighting real people helped by their services and community efforts such as a college scholarship program.³⁸ Like many other hospitals, UPMC advertises in key national markets, where its advertisements might appear in *The New York Times* alongside ads for Montefiore, NY Presbyterian, and the Cleveland Clinic. An unanticipated bonus for many of these hospitals: advertisements appear to boost worker morale.³⁹

Promoting community benefit aspects of their institutions may become increasingly significant for nonprofit hospitals with the

³⁵ “Health-Care Ruling Likely to Lead to More Marketing from Insurers, Hospitals: Companies Seek to Differentiate Themselves as They Court New Consumers.” *Advertising Age*, June 28, 2012. <http://adage.com/print/235692>, (accessed on 9/20/12).

³⁶ Phil Galewitz, “Hospitals Finding Patients on Google, Facebook,” *Kaiser Health News*, July 12, 2012. <http://www.kaiserhealthnews.org/stories/2012/july/11/hospitals-google-facebook.aspx?p=1>, (accessed on 9/16/12).

³⁷ *Ibid.*

³⁸ Andrew Adam Newman, “A Healing Touch from Hospitals,” *The New York Times*, September 13, 2011. <http://www.nytimes.com/2011/09/13/business/health-care-ad-special.html>. (accessed 9/20/12).

³⁹ Gale Scott, July 31, 2011.

implementation of the ACA. In theory, traditional “community benefit” opportunities will shrink as more patients acquire insurance. If, as assumed, the uninsured pool dries up in 2014, hospitals will either need to turn themselves into for profit operations or get the state and federal governments to agree on a new community benefit standard.⁴⁰ Regardless of what happens with the ACA, nonprofit hospitals are compelled to compete for patients, often using advertising as a tool. It is expected that nonprofit hospitals will “develop increasingly aggressive business models” to balance the costs of providing community benefit services, such as emergency rooms, while losing profitable procedures to the independent outpatient facilities that are becoming more common.⁴¹

Community benefit is one example of a factor that can be used both in support of hospital advertising, and against it. Should nonprofit hospitals, representing nearly two-thirds of all hospitals in America, be permitted to increase marketing costs in an already precarious economic environment? On the other hand, if a nonprofit hospital truly offers exceptional surgeons and physicians, positive care outcomes, and lower readmission rates – why should it be prohibited from advertising its strengths to the community? Particularly when research has indicated nonprofits “care more about less profitable patients such as Medicaid and uninsured patients than their for-profit counterparts,”⁴² it seems unlikely that nonprofit hospitals will be prohibited from promoting their strengths. In smaller communities, and rural areas, the question of hospital advertising is less relevant since there is often only one hospital providing care. In communities with two or more hospitals, or even competing hospital systems, advertising is considered a cost of doing business, regardless of ownership status of the hospitals. Two such communities, both in Ohio, were studied for this paper: Cleveland and Columbus.

Hospital Advertising Examined: Cleveland and Columbus, Ohio

Look no further than Cleveland, Ohio for hospital competition at its most intense. Light-post mounted banners proclaiming the merits of Cleveland Clinic, and the specialty “rankings” of their institution greet a driver approaching the Cleveland Clinic area from downtown Cleveland on Chester Avenue. Pass the Clinic and turn onto Euclid Avenue, and similar banners promoting University Hospitals (and Case Western Reserve

⁴⁰ David Whelan, “ObamaCare Could Cause Nonprofit Hospitals to Lose Their Tax-Exempt Status: Here’s How.” *Forbes.com*, September 17, 2012. <http://www.forbes.com/sites/davidwhelan/2012/09/17/obamacare-could-cause-nonprofits-hospitals-to-lose-their-tax-exempt-status-heres-how/print>, (accessed on 10/23/12).

⁴¹ David M. Studdert, Michelle M. Mello, Christopher M. Jedrey, Troyen A. Brennan, “Regulatory and Judicial Oversight of Nonprofit Hospitals,” *The New England Journal of Medicine* 356, no.6 (Feb. 8, 2007): 629.

⁴² Esra Eren Bayindir, “Hospital Ownership Type and Treatment Choices,” *Journal of Health Economics* 31 (2012), 365.

University) adorn the light posts. Both hospitals are widespread “systems” throughout Northeast Ohio, and beyond. Both hospitals “tweet.” Both hospitals feature some of the finest physicians in America. Both advertise. In fact, last summer (2012) University Hospitals hired Peter Brumleve, a marketing and branding chief most recently employed in Texas, but a former Cleveland Clinic marketer as well. In the press release about his hiring, it noted that University Hospitals was “going head-to-head with the larger Cleveland Clinic to attract patients and doctors in Northeast Ohio after completing a \$1.2 billion expansion strategy that included two new hospital openings last year.”⁴³ They are competing against one of the “best known (hospital) brands,” in the Cleveland Clinic.⁴⁴ While University Hospitals remains Cleveland-centric, unlike the Cleveland Clinic’s international presence, they have exhibited expanding interests by “buying five Akron-area doctor’s practices.”⁴⁵ The Akron area expansion will be worth watching, as it is an area serviced by Cleveland Clinic, Akron General and Summa facilities. Both regionally and nationally, the trend of hospitals acquiring physician practices is on the rise. Doctors have entered into hospital employment to “ease malpractice rates, lighten their administrative duties, and increase their reimbursements,” while hospitals “gain a stronger referral base for patients.”⁴⁶

Brumleve faces a challenge with University Hospitals marketing. Currently their presence is most prominent in online and employment advertisements, though Rainbow Babies Hospital advertisements have been placed, perhaps due to the competition from Akron Children’s Hospital just south of Cleveland. Rainbow Babies and Children’s Hospital have used a thirty second television advertisement that begins by explaining how parents will do anything for their child, and that Rainbow Babies has “spent over a century building a hospital with a depth of care above and beyond any other.”⁴⁷ The UH Seidman Cancer Center and Ahuja Medical Center are the two new hospitals that have garnered great fanfare and already a steady stream of patients, but nothing on the marketing level that would match the three-year long advertising national brand building campaign by the Cleveland Clinic.

The Cleveland Clinic has established hospitals across America and even in Dubai. Yet even with this high profile as a healthcare provider, Cleveland Clinic’s Chief Operating Officer Paul Matsen contends consumer

⁴³ Sarah Jane Tribble, “With Eye on Growth, University Hospitals Hires New Marketing, Branding Chief,” *The Plain Dealer* (Cleveland), July 26, 2012.

⁴⁴ Brandon Glenn, “Cleveland Clinic ‘unadorned facts’ ad campaign aims for distinct look,” *Featured Story, Hospitals, MedCity News eNewsletter, SYN, Top Story*, October 14, 2011.

⁴⁵ Tribble.

⁴⁶ Cheryl Powell, “University Hospitals acquires five Akron-area doctor practices,” *The Akron Beacon Journal*, July 20, 2012, <http://www.ohio.com/news/top-stories/university-hospitals-acquires-five-akron-area-doctor-practices-1.321643>, (accessed 2/15/13).

⁴⁷ “There’s Only One Rainbow,” advertisement, <http://www.youtube.com/watch?v=FIG7zTe9K6w>. Viewed 2/16/13.

“awareness lags behind several other hospitals and is lower than we want it to be. The goal was to boost people’s top-of-mind awareness of Cleveland Clinic.” The campaign was known as “unadorned facts,” and combined simple factual text with black ink minimalist drawings. Other advertisements promoted innovation in record keeping and robotics, as well as presidential candidate support from both sides. Of significance, this campaign was not flowery and emotional; rather, simple facts about common procedures were presented in an easy to understand fashion. Likewise, the “No Debate” advertisement ran in the *Wall Street Journal* and *The New York Times*, and featured minimalism akin to the unadorned facts ads.⁴⁸ The ad featured outtakes from both presidential candidates applauding the Cleveland Clinic. Earlier in 2012, Cleveland Clinic was noted for buying a spot during the Super Bowl: a thirty-second advertisement with the theme of “Today.” Emphasizing the “power of today,” the promotion was centered on the availability of same day care at Cleveland Clinic: “Call today, we’re here for you.”⁴⁹ The issue of access is central to many print and media hospital-advertising campaigns. As University Hospitals in Cleveland increase their branding and broaden their base, it will be interesting to follow the advertisements from both: will they emphasize rankings, specialties, and simple facts or will they revert to the more common “feel good” approach common in much of the country?

Columbus, Ohio, though only 125 miles south of Cleveland seems further separated by its younger, growing population base and a less industrialized urban setting. It offers four main hospital systems to its citizens. Taken together, these four nonprofit systems spend over \$20 million annually on advertising and promotion. The two systems that have seen increased expenditures since 2008, OhioHealth and Mount Carmel, have employed a marketing system known as “customer-relationship management.” Wexner is considering adopting this tactic soon, as well. Basically the system involves mining health data from patient records to target mailings for, say, diabetes or heart disease. Some hospitals, like OhioHealth, aim these mailings at more-profitable patients to help “cover the cost of their nonprofit mission to provide health care to people who can’t afford it.”⁵⁰ Mount Carmel would not answer whether they use this practice. Both hospitals also refused a full accounting of the types of data they use, but maintain their advertising complies with 1996’s Health Insurance Portability and Accountability Act (HIPAA) and encrypt data so marketers cannot see an individual’s health profile. Mount Carmel

⁴⁸ Dale Buss, “Cleveland Clinic Ad in WSJ, NYT Capitalizes on Debate Praise,” *Forbes*, October 8, 2012. <http://www.forbes.com/sites/dalebuss/2012/10/08/cleveland-clinic-ad-in-wsj-capitalizes-on-debate-praise/print>, (accessed 2/14/13).

⁴⁹ “Today” Cleveland Clinic Television Advertisement, http://www.youtube.com/watch?v=i_ml5lwwGHE, viewed on 2/16/13.

⁵⁰ Ben Sutherly, “Hospitals Use Patient Data to Target Ads,” *The Columbus Dispatch*, November 12, 2012. <http://www.dispatch.com/content/stories/local/2012/11/12/hospitals-use-patient-data-to-target-ads.html>, (accessed 1/10/13).

noted this practice is both educational for the patient, as well as cost effective for the nonprofit hospital. Like Wexner, Nationwide Children's Hospital has yet to adopt the practice, but it is growing more commonplace: Medseek, a third party provider of marketing services, claims "25 percent of United States hospitals use customer-relationship marketing, also called 'predictive analytics.'"⁵¹

This new form of advertising still represents a small portion of dollars spent. Two recent, more traditional print and media campaigns were utilized by Nationwide Children's Hospital and Riverside Methodist Hospital, a member of the OhioHealth system. Riverside's "Innovation Campaign," designed by the Falgren Mortine agency, was designed to counter a loss of market share to two local rivals. The campaign highlighted groundbreaking, internationally recognized medical procedures available locally. Taglines included, "They thought recovering from my stroke would take a miracle. Actually it just took Riverside," and "Our innovations are being felt worldwide." In pre-and post-measures of brand association, "Riverside Methodist gained 9 percentage points or the equivalent of a 41% increase in favorable attributes related to the hospital." The campaign, which focused on innovation and technology, also "strengthened all measures of brand equity."⁵² This campaign was designed both to keep Columbus area residents confidently at home with Riverside's innovative treatments, and also to draw patients from the Midwest region and even nationally for their world-recognized care. Clearly, advertising opponents would point out this campaign sought to attract upper-income patients.

In June of 2012, Nationwide Children's Hospital in Columbus celebrated the grand opening of the "country's biggest pediatric expansion...ever." This fulfilled a promise they made in 2002 that "no child need ever leave central Ohio for world class medical care."⁵³ The media and print advertisements that heralded this opening emphasized the promise kept while highlighting the \$50 million gift from the Nationwide Insurance Foundation that laid the groundwork for a project that cost \$450 million (\$30 million under budget).⁵⁴ The advertisement hits all the themes attributed to medical advertising in general: customer focus through patient-centered design; 525,000 square feet of research space to keep it on the medical cutting edge; renowned physicians and researchers; and seven years in the *U.S. News & World Report* rankings

⁵¹ Ibid.

⁵² "Riverside: Innovation Campaign," webpage on the Falgren Mortine website, <http://www.fahlgrenmortine.com/work/advertising/riverside-methodist-hospital.php>, (accessed 1/10/13).

⁵³ "Celebrating the country's biggest pediatric expansion. Ever." Webpage for Nationwide Children's Hospital, <http://www.nationwidechildrens.org/grandopening>, (accessed 2/17/13).

⁵⁴ Ben Sutherly, "Nationwide Children's Hospital Expands," *The Columbus Dispatch*, June 10, 2012. <http://www.dispatch.com/content/stories/local/2012/06/10/expanding-care.html>, (accessed 1/10/13).

for “Best Children’s Hospitals.” In addition to a new hospital that features tight security, soothing aesthetics, and top-notch care, the hospital has adopted an unusual policy that allows “parents accompanied by social workers to be present in the trauma room during emergency care.” Patty McClimon, senior vice president of strategic and facilities development, explains “The parents’ perception of outcome, even in the worst-case scenario, is much different if they see how hard we tried to help save their child.”⁵⁵ Longitudinal research will be needed conducted to detail the efficacy of this practice, measured in both parental attitudes regardless of outcome, and, in cases of dire outcome, malpractice litigation rates. Still, the new Nationwide Children’s Hospital has much to promote.

The “promise kept” campaign was not the first advertising push from Nationwide Children’s Hospital, long noted for “reaching beyond the region with messages in national newspapers and magazines, and increasingly, on the Internet.” Central Ohio’s tightly competitive hospital market pushed many of the hospitals there to “up the ante in their efforts to be heard and seen.”⁵⁶ For Ohio State’s Wexner Medical Center, the university tie is the “differentiator” they choose to emphasize.⁵⁷ Around the same time Nationwide was unveiling their new children’s center, Wexner launched their first advertising campaign designed to “attract more patients willing to travel for treatment,” spending \$5.65 million on advertising in a period of less than two years. Part of the campaign was designed to raise awareness on specialty services such as “deep-brain stimulation, organ transplants, and cardiovascular care, as well as clinical trials to treat diseases such as cancer.”⁵⁸ The campaign reached across state lines to West Virginia, as well as cities throughout Ohio, including Cincinnati, Dayton, Toledo, and Akron. Cleveland, however, was left untouched. Perhaps that is a battle for another time. And with three other competing systems in their home city, Wexner certainly has ample competition in their own backyard.

Conclusion

The hospitals of Cleveland and Columbus represent a mere sampling of hospital advertising practices and platforms. Any city with more than one hospital or hospital system could be studied for rationalization and implementation of advertising strategies. While advertising expenditures have dropped in some markets, the cities fortunate enough to have

⁵⁵ Ibid.

⁵⁶ Adam Stone, “Hospitals Make Marketing, Advertising Campaigns Priority,” *Business First*, March 23, 2012. <http://www.bizjournals.com/columbus/print-edition/2012/03/23/hospitals-make-marketing-and.html>, (accessed on 10/23/12).

⁵⁷ Ibid.

⁵⁸ Ben Sutherly, “Hospitals Use Ads to Widen Reach,” *The Columbus Dispatch*, June 4, 2012. <http://www.dispatch.com/content/stories/local/2012/06/04/hospitals-use-ads-to-widen-reach.html>, (accessed on 10/21/12).

multiple providers will likely pay the price for that abundance. Higher advertising expenditures, whether for education, information, health care improvement, or revenue generation necessarily force hospitals to recoup their costs, often at the expense of their patients. Unfortunately, opponents face a formidable foe in businesses and organizations designed to encourage the practice in competitive hospital markets. A recent book focused on hospital marketing emphasize the importance of branding, or gaining “buy in” by hospital employees in that brand, and in pursuing “patient acquisition” through customer-relationship marketing and physician-relationship marketing. According to eMarketer, online advertising spending grew 14% in 2010, “pushing total online advertising dollars ahead of those spent on newspaper advertising for the first time.”⁵⁹ Interestingly, this book was sponsored as an online resource by the Society for Healthcare Strategy and Market Development of the American Hospital Association, an organization whose last annual conference had conference registration fees from \$795 for the early bird member to \$1095 for non-early nonmembers. An ironically high priced club for an organization that did not permit hospital advertising until 1977.

Unlike most of the twentieth century, when hospital advertising was limited and local, the twenty-first century, still rife with ACA, Medicaid, and Medicare uncertainties, will continue to face epic competition between hospitals. With unsettled questions of nonprofit status maintenance, mergers between nonprofits and for-profits, escalating pursuit of national and regional rankings, and many profitable aspects of historic hospital services moving to outpatient and satellite facilities, the role of advertising will continue to be a central component of an increasingly complex business. As hospitals become more and more business like, that awkward tension between corporate and care will surely rise. Physicians, an organized, respected profession for nearly a century, face their next century with uncertainty, loss of autonomy, medical school debt, and often, employment by a hospital. Hospitals have evolved from dark and dirty poorhouses, to antiseptic and organized care centers, to access points for high-technology medical treatments and specialized surgical interventions. Some would argue that in this transition, access has increasingly been tied to socio-economic status. Advertisements that appeal to the upscale marketplace do nothing to dispel this notion. If hospitals are going to continue advertising under the guise of patient benefit and public education, they are going to need a better marketing campaign.

⁵⁹ Chris Boyer, Dan Dunlop, Debra Stevens, Jesse Stemcha, Donna Teach and others, *Hospital Marketing: Marketing Ideas from Industry Leaders* (Bierbaum Publishing, LLC, 2011, www.thoughleadersproject.org), online volume made possible by the Society for Healthcare Strategy and Market Development of the American Hospital Association.

Bibliography

Abel, Gregory A., Richard T. Penson, Steven Joffe, Lidia Schapira, Bruce A. Chabner, Thomas J. Lynch, Jr., "Direct-to-Consumer Advertising in Oncology," *The Oncologist* 11 (2006): 217-226.

"Advertising by Nonprofit Health Care Organizations: A Dialogue," *Inquiry* 45 (Fall 2008): 256-262.

Barro, James and Michael Chu, "HMO Penetration, Ownership Status, and the Rise of Hospital Advertising," *The Governance of Not-For-Profit Organizations*, Edwards L. Glaeser, editor (Chicago, IL: University of Chicago press, 2003), online <http://www.nber.org/chapters/c9967>, 101-115.

Bayindir, Esra Eren. "Hospital Ownership Type and Treatment Choices," *Journal of Health Economics* 31 (2012): 359-370.

Bordonaro, Greg. "Hospitals Hike Ad Spending to Gain Market Share," *Hartford Business.com*, January 23, 2012. <http://www.hartfordbusiness.com/apps/pbcs.dll/article?AID=/20120123/PRINTEDITI ON/301239998&template=printart>, (accessed on 9/16/12).

Boyer, Chris, Dan Dunlop, Debra Stevens, Jesse Stemcha, Donna Teach and others, *Hospital Marketing: Marketing Ideas from Industry Leaders*. Bierbaum Publishing, LLC, 2011, www.thoughleadersproject.org.

Buss, Dale. "Cleveland Clinic Ad in WSJ, NYT Capitalizes on Debate Praise," *Forbes*, October 8, 2012. <http://www.forbes.com/sites/dalebuss/2012/10/08/cleveland-clinic-ad-in-wsj-capitalizes-on-debate-praise/print>, (accessed 2/14/13).

Carter, Susan B., Scott Sigmund Gartner, Michael R. Haines, Alan L. Olmstead, Richard Sutch, and Gavin Wright, editors, *Historical Statistics of the United States*, Millennial Edition On Line. Cambridge University Press, 2006.

Colen, B.D. "Hospitals Turning to Advertising: Hospitals Marketing Their Facilities, Programs by Mail," *The Washington Post*, June 25, 1979, A1, A6.

Courtney, Marian. "Hospitals Pressing Advertising: Hospitals Pressing Ad Campaigns," *The New York Times*, September 28, 1986, NJ1.

Dyer, Allen R. "Ethics, Advertising, and the Definition of a Profession," *Journal of Medical Ethics* 11, no.2 (June 1985): 72-78.

Fisher, Caroline M. and Claire J. Anderson, "Hospital Advertising: Does it Influence Consumers?" *Journal of Health Care Marketing* 10, no. 4 (December 1990): 40-46.

Galewitz, Phil. "Hospitals Finding Patients on Google, Facebook," *Kaiser Health News*, July 12, 2012. <http://www.kaiserhealthnews.org/stories/2012/july/11/hospitals-google-facebook.aspx?p=1>, (accessed on 9/16/12).

Glenn, Brandon. "Cleveland Clinic 'unadorned facts' ad campaign aims for distinct look," *Featured Story, Hospitals, MedCity News eNewsletter, SYN, Top Story*, October 14, 2011.

“Health-Care Ruling Likely to Lead to More Marketing from Insurers, Hospitals: Companies Seek to Differentiate Themselves as They Court New Consumers.” *Advertising Age*, June 28, 2012. <http://adage.com/print/235692>, (accessed on 9/20/12).

Kotler, Philip. “Strategies for Introducing Marketing into Nonprofit Organizations,” *Journal of Marketing* 43, no.1 (Jan., 1979): 37-44.

Malan, Martha. “Hospitals Turn to Advertising: Empty Beds, HMOs Spur Competition for Patients in Twin Cities,” *The Washington Post*, December 29, 1985, A4.

Moser, H. Ronald and Gordon L. Freeman, “How the Public Views Hospital Advertising: An Empirical Analysis,” *Journal of Medical Marketing* 11, no.4 (2011): 320-330.

Newman, Andrew Adam. “A Healing Touch from Hospitals,” *The New York Times*, September 13, 2011. <http://www.nytimes.com/2011/09/13/business/health-care-ad-special.html>. (accessed 9/20/12).

Oxman, David. “Hospital Advertising,” *The Hospitalist*, January 2007, http://www.thehospitalist.org/details/article/241425/Hospital_Advertising.html, (accessed 9/16/12).

Rosenberg, Charles. *The Care of Strangers: The Rise of the American Hospital System*. Baltimore, MD: Johns Hopkins University Press, 1987.

Rosner, David. *A Once Charitable Enterprise: Hospitals and Health Care in Brooklyn and New York, 1885-1915*. New York: Cambridge University Press, 1982.

Scott, Gale. “Hospital Ads: They’re Everywhere,” *Crain’s New York Business.com*, July 31, 2011. <http://www.craigslist.com/article/20110731/SUB/110739999>, (accessed 10/21/12).

Sloane, Leonard “Advertising: Hospital Promotion Guidelines,” *The New York Times*, September 1, 1977, D11.

Starr, Paul. *The Social Transformation of American Medicine: The Rise of a Sovereign Profession and the Making of a Vast Industry*. New York: Basic Books, Inc., 1982.

Stone, Adam. “Hospitals Make Marketing, Advertising Campaigns Priority,” *Business First*, March 23, 2012. <http://www.bizjournals.com/columbus/print-edition/2012/03/23/hospitals-make-marketing-and.html>, (accessed on 10/23/12).

Studdert, David M., Michelle M. Mello, Christopher M. Jedrey, Troyen A. Brennan. “Regulatory and Judicial Oversight of Nonprofit Hospitals,” *The New England Journal of Medicine* 356, no. 6 (Feb. 8, 2007): 625-631.

Vogel, Morris J. *The Invention of the Modern Hospital, Boston 1870-1930*. Chicago, IL: The University of Chicago Press, 1980.

Wall, Barbara Mann. *Unlikely Entrepreneurs: Catholic Sisters and the Hospital Marketplace, 1865-1925*. Columbus, OH: The Ohio State University Press, 2005.

Whelan, David. “ObamaCare Could Cause Nonprofit Hospitals to Lose Their Tax-Exempt Status: Here’s How.” *Forbes.com*, September 17, 2012. <http://www.forbes.com/sites/davidwhelan/2012/09/17/obamacare-could-cause-nonprofits-hospitals-to-lose-their-tax-exempt-status-heres-how/print>, (accessed on 10/23/12).

HOW SMALLPOX BECAME A “SUITABLE CANDIDATE FOR GLOBAL ERADICATION”

By **BOB REINHARDT**
(West Oregon University)

ABSTRACT: This article explains how a shifting ecological consciousness after World War II led to the definition of smallpox as a “suitable candidate for global eradication.” Post-war transportation technologies and international institutions created a global environment in which disease eradication, rather than control, became the goal of international health authorities. They first targeted malaria, inspired by the power of dichloro diphenyl trichloroethane (DDT) to rationalize environments. As that power faltered and the hazards of DDT became better known, the public and some health experts questioned the wisdom of efforts to master environments. Smallpox, though, lived only in human bodies and was vulnerable to an effective, modern, and industrialized vaccine. And so efforts to master the nonhuman natural world shifted from malarial environments to smallpox-infected human bodies.

In the spring of 1947, smallpox struck an unprepared New York City. Eugene Le Bar arrived in Manhattan on March 1, six days after boarding a bus in Mexico City, where he worked as an importer. Le Bar was on his way to Maine, but during the course of the bus ride, he developed a headache and unusual rash, and he decided to pause in New York for some rest, sightseeing, and shopping. Four days after arriving, the stricken traveler checked into Bellevue Hospital with a cough and strange rash; the frightened staff quickly transferred him to Willard Parker Hospital, where doctors diagnosed a case of bronchitis with hemorrhages. Le Bar died on March 10 of hemorrhagic smallpox, one of the most gruesome forms of the disease. But lab results did not return a final verdict until April 4, by which time smallpox had infected two other patients. On April 5, readers of the *New York Times* learned of Le Bar’s fate in an article urging the city’s residents to “receive an inoculation at once.” Within a month, the New York Health Department vaccinated 6,350,000 people and tracked the disease to nine more patients, including one who made it all the way to Germany before learning of the infection. Two people died directly from smallpox; three more died of complications from the vaccine.¹

The New York outbreak suggested the need for radical action in a new global environment, in which technological and institutional changes rendered conventional methods of disease control antiquated and even dangerous. Countries in North America and Europe had previously counted on smallpox remaining isolated in less developed countries, but such a defensive strategy no longer provided sufficient safety when airplane travel would facilitate rapid exchange in goods, people, and

¹ Israel Weinstein, “An Outbreak of Smallpox in New York City,” *American Journal of Public Health and the Nations Health* 37, no. 11 (November 1947): 1376–1384; “Smallpox in city, inoculation urged” *The New York Times*, 5 April 1947, p. 2; “Many vaccinated against smallpox,” *The New York Times*, 6 April 1947, p. 27.

pathogens. As the editors of the *New York Times* wrote in the aftermath of the outbreak, “In the twenty-one-day incubation period of smallpox a man can fly twice around the world by commercial plane. The epidemic diseases of Asia are only as distant from New York City as the nearest airway flight schedule.”² If the people of North America and Europe truly wanted freedom from smallpox, they would have to take proactive measures to find, root out, and destroy the disease in its endemic homes in foreign lands. Fortunately, the post-World War II global environment presented not just new disease threats, but also new opportunities through the World Health Organization (WHO), established the year before the New York smallpox outbreak. Like its parent, the United Nations, the WHO both recognized global interdependency and expressed confidence in the possibilities of international cooperation. The world, then, had a choice: stick with local and national smallpox control, which could barely keep up with deadly outbreaks like the one in New York, or forge a bolder path towards global smallpox eradication, by which humans could assert total mastery over an age-old scourge.

Ultimately, the world chose eradication. In 1977, the WHO’s Smallpox Eradication Program (SEP) isolated the last naturally occurring case of smallpox, and the disease has not appeared outside the laboratory since. Participants in and observers of the global eradication program called smallpox a “suitable candidate for global eradication,” meaning that the disease possessed certain qualities that made it vulnerable to human mastery.³ Specifically, smallpox spread through close contact and always displayed symptoms, so health professionals could track and accurately predict the course of a smallpox outbreak. The disease had another critical vulnerability: *vaccinia*, the powerful and effective smallpox vaccine, which inspired dreams of eradication as early as 1806, when Thomas Jefferson wrote that “future nations will know by history only that the loathsome smallpox has existed.” Perhaps most importantly, smallpox had no connection to natural environments. The *variola* virus – the cause of smallpox – infected humans only; there was no animal vector or other nonhuman reservoir. Because of this quality, smallpox control and eradication campaigns could ignore complicated environmental factors and instead concentrate on humans, who, again, could be protected with relative ease by an effective vaccine. In this explanation of eradication, by the mid twentieth century, smallpox’s nature made it a candidate for extinction.

But smallpox did not become the first target for global eradication. Instead, delegates to the World Health Assembly (WHA, the

² “Small World,” *New York Times*, April 12, 1947.

³ For smallpox’s suitability for eradication, see F. Fenner et al., *Smallpox and Its Eradication* (Geneva: World Health Organization, 1988), chapter nine; D. A. Henderson, *Smallpox: The Death of a Disease* (New York: Prometheus Books, 2009), 302–303; Bruce Aylward et al., “When Is a Disease Eradicable? 100 Years of Lessons Learned,” *American Journal of Public Health* 90, no. 10 (October 2000): 1515–1520.

representative decision-making body of the World Health Organization) selected malaria for the first global eradication campaign in 1955, while effectively rejecting smallpox eradication in 1953 and again in 1958. This choice suggests that a disease's "suitability" for eradication should not be seen only as a matter of etiology, but of non-biological factors as well, including ideology and politics, which, as other historians have argued, help "construct" particular diseases as threats requiring particular responses.⁴ The decision to pass over smallpox in favor of malaria was particularly revealing given the relatively complex disease ecology of malaria, with its inextricable relationships to mosquitoes and environments. Of the two diseases, smallpox was the simpler – or, from one perspective, more suitable – disease to eradicate. But global health experts initially devoted their efforts to a disease eradication program premised on control of the nonhuman natural world, specifically, malarial mosquitoes and their environments. Meanwhile, smallpox – a disease with no connection to the natural environment – continued to maim and kill practically unabated until 1965, when global smallpox eradication began in earnest. Although a few historians have observed the seemingly strange decision to pass over smallpox, most accounts attribute the delay to a host of unrelated causes: the need for better smallpox vaccination technology, changing trends in medical science, or a lack of institutional and professional interest in smallpox.⁵ From this perspective, the initiative to eradicate smallpox required the right convergence of contingent factors, but the disease itself was, by its nature, always eradicable.

In contrast, this article argues that smallpox was not always conceptually suitable for eradication, but over time became so as a result of changing relationships, both real and perceived, between human health and environments.⁶ This process unfolded both within and outside the

⁴ Scholars of disease and colonialism have been particularly interested in the social construction of disease; see Sheldon J. Watts, *Epidemics and History: Disease, Power, and Imperialism* (New Haven: Yale University Press, 1997); David Arnold, *Colonizing the Body: State Medicine and Epidemic Disease in Nineteenth-Century India* (Berkeley: University of California Press, 1993); Andrew Cunningham and Birdie Andrews, *Western Medicine as Contested Knowledge* (New York: St. Martin's Press, 1997).

⁵ Anne-Emanuelle Birn and Nancy Lays Stepan have made this observation; see Anne-Emanuelle Birn, "Erradicação da varíola: medida do sucesso?" *Ciência & Saúde Coletiva*, 2011, 16:591+ and Nancy Lays Stepan, *Eradication: Ridding the World of Diseases Forever?* (Ithaca: Cornell University Press, 2011), especially pages 106, 193-194, 197, and 204-206. For contingent factors, see Henderson, *Death of a Disease*, 63 and Fenner, et al., *Smallpox and its Eradication*, 388-389.

⁶ Environmental historians have shown how the health/environment relationship has shaped understandings of and responses to diseases that have clear connections to their nonhuman environments. See Conevery Bolton Valenčius, *The Health of the Country: How American Settlers Understood Themselves and Their Land* (New York: Basic Books, 2004); Gregg Mitman, *Breathing Space: An Ecological History of Allergy in America* (New Haven: Yale University Press, 2007); Linda Nash, *Inescapable Ecologies: A History of Environment, Disease, and Knowledge* (Berkeley: University of California Press, 2006); Gregg Mitman, Michelle Murphy, and Christopher Sellers, *Landscapes of Exposure: Knowledge and Illness in Modern Environments* (Chicago: University of

realms of medical and scientific expertise, and was shaped by evolving American efforts to engage with—and lead—the rest of the world in the post-World War II period. Post-war health professionals, like their colleagues in physics and engineering, sought to improve human lives by using modern science and technology to master environments. Disease eradication efforts began with malaria, a decision inspired in large part by the synthetic chemical dichloro diphenyl trichloroethane (DDT), which promised control over the environments in which mosquitoes and other pests thrived – better health through chemical mastery of the nonhuman natural world.⁷ Smallpox eradication, on the other hand, would require intimate interactions with complicated and diverse people and cultures, and that prospect led global health authorities to twice reject smallpox eradication proposals. Instead, the WHO embarked on a global malaria eradication program that, not incidentally, suited American foreign policy interests in the early Cold War.⁸

But as DDT-driven malaria eradication continued, global health authorities became increasingly concerned with the limits of chemical prophylaxis, just as the public and some health professionals expressed anxiety about the potential hazards of DDT to both humans and their ecosystems. In this broader context of shifting ecological consciousness, smallpox – isolated from environments and vulnerable to a modern, industrialized vaccine – seemed like a much simpler, safer, and surer target for elimination. This shift did not immediately produce a global smallpox eradication program; Cold War antagonisms and a particular approach to U.S. foreign policy delayed a coordinated, earnest effort to eliminate the disease until 1965. But by then, smallpox had already displaced malaria as a conceptually suitable candidate disease for global eradication.

Chicago Press, 2004); Michelle Murphy, *Sick Building Syndrome and the Problem of Uncertainty: Environmental Politics, Technoscience, and Women Workers* (Durham: Duke University Press, 2006).

⁷ For DDT and confidence in the power of science and technology as important factors in malaria eradication efforts, see Randall Packard, *The Making of a Tropical Disease: A Short History of Malaria* (Baltimore: The Johns Hopkins University Press, 2007), chapter six; Amy L. S. Staples, *The Birth of Development: How the World Bank, Food and Agriculture Organization, and World Health Organization Changed the World, 1945-1965* (Kent, Ohio: Kent State University Press, 2006), chapter ten; James Webb, *Humanity's Burden: A Global History of Malaria* (Cambridge: Cambridge University Press, 2009), chapter six; David Kinkela, *DDT and the American Century: Global Health, Environmental Politics, and the Pesticide That Changed the World* (Chapel Hill: University of North Carolina Press, 2011).

⁸ Socrates Litsios, "Malaria Control, the Cold War, and the Postwar Reorganization of International Assistance," *Medical Anthropology* 17, no. 3 (May 1997): 255–278; Marcos Cueto, *Cold War, Deadly Fevers: Malaria Eradication in Mexico, 1955-1975* (Washington, D.C.: Woodrow Wilson Center Press, 2007); Randall Packard, "Visions of Postwar Health and Development and Their Impact on Public Health Interventions in the Developing World," in *International Development and the Social Sciences: Essays on the History and Politics of Knowledge* (Berkeley: University of California Press, 1997), 93–118; Staples, *The Birth of Development*, 166–167 and 170–171.

From Quarantine to Eradication

In the interwar period, smallpox continued to take lives, steal sight, and scar faces throughout much of the world. From 1919 to 1938, health authorities worldwide reported nearly five and a half million cases of smallpox and over one and a half million deaths from the disease.⁹ Smallpox experts later concluded that these estimates reflected no more than 1-2% of cases, meaning that the disease struck perhaps more than 350 million people during the interwar period.¹⁰ Most of that pain and suffering occurred in Africa, Asia, and Latin America, which accounted for all but two of the world's endemic smallpox countries in 1939. In Europe and North America, smallpox had become a foreign disease, rather than an endemic danger. Soon after Edward Jenner's discovery in 1796 that cowpox protected against smallpox (thus "vaccine," from *vaca* for cow), vaccination spread throughout the Atlantic world and beyond.¹¹ By 1936, endemic smallpox had disappeared from Europe (except for Spain and Portugal, where relatively poor health infrastructures delayed eradication until 1948 and 1953, respectively); in the United States and Canada, smallpox carried on only in the much less dangerous form of *variola minor*, with a case-fatality rate of 0.3% in 1938.¹² In that year, smallpox accounted for just 412 deaths in Europe and North America, compared to 47,922 deaths reported in the rest of the world. Empowered by centralized states and expanding health infrastructures, medical authorities effectively eliminated smallpox from the disease environments of Europe and North America.

In addition to national vaccination and relatively well-funded public health systems, rigid defensive procedures increasingly isolated smallpox in tropical and subtropical environments. Local and national governments had long taken it upon themselves to identify, isolate, and

⁹ For smallpox morbidity (cases), see Fenner et al., *Smallpox and Its Eradication*, chapter eight; and League of Nations Health Organization, *Annual Epidemiological Report*, 1922, 21–27; for smallpox mortality (deaths), see Cyril William Dixon, *Smallpox* (Churchill, 1962), appendix two.

¹⁰ Fenner et al., *Smallpox and Its Eradication*, 173–175; William Schneider argues that colonial health records in Africa were not as inaccurate as claimed by Fenner, et al.; see William H Schneider, "Smallpox in Africa during Colonial Rule," *Medical History* 53, no. 2 (April 2009): 193–227.

¹¹ For overviews of the history of vaccination, see Donald Hopkins, *Princes and Peasants: Smallpox in History* (Chicago: The University of Chicago Press, 1983) and the 2009 special issue of the *Bulletin of the History of Medicine*, with introduction by Sanjoy Bhattacharya and Niels Brimnes, "Simultaneously Global and Local: Reassessing Smallpox Vaccination and Its Spread, 1789–1900," *Bulletin of the History of Medicine* 83, no. 1 (2009): 1–16.

¹² Fenner et al., *Smallpox and Its Eradication*, p. 328–332.

expel potential cases of smallpox.¹³ Such national defensive efforts began to expand across borders in the mid-nineteenth century. In Europe, health professionals held the first International Sanitary Conference in 1851; the United States participated in the 1881 conference and was a founding member of the first international public health office, the Office International d'Hygiène Publique (OIHP) in 1907.¹⁴ The US also helped form the first regional health bureau, the International Sanitary Bureau (later the Pan-American Sanitary Bureau, or PASB) in 1902.¹⁵ These international organizations helped disseminate knowledge about communicable diseases like smallpox, transmitted warnings of epidemics, and recommended standards for vaccination and quarantine procedures.

The need for such coordination increased as European countries and the United States engaged in colonial adventures, further integrating disease environments and facilitating the exchange of both viruses and vaccines. Colonial health authorities made smallpox vaccination one of their first disease control priorities, for reasons ranging from genuine interest in the health of native populations to expanding the power of the imperial state.¹⁶ But those colonial efforts failed to eliminate smallpox, for a variety of reasons: it was logistically difficult (tracking down and vaccinating widely dispersed and often mobile populations), technically challenging (heat-sensitive liquid smallpox vaccine perished in tropical environments), politically troublesome (native populations sometimes co-opted or outright resisted colonial vaccination programs), and perhaps even contrary to the long-term reformist (rather than short-term

¹³ Peter Baldwin, *Contagion and the State in Europe, 1830-1930* (New York: Cambridge University Press, 1999), 246–249, 319–325, 338–342.; Elizabeth Fenn, *Pox Americana: The Great Smallpox Epidemic of 1775-82* (New York: Hill and Wang, 2002), 30–31; Michael Willrich, *Pox: An American History* (New York: Penguin Press, 2011), 38, 80–81, 218–221.

¹⁴ For international health history, see Staples, *The Birth of Development*, chapter eight; Kelley Lee, *The World Health Organization* (London: Routledge, 2009), 1–9; World Health Organization, *The First Ten Years of the World Health Organization* (Geneva: World Health Organization, 1958), chapters one and two.

¹⁵ On US involvement in international health, see Karen A. Mingst, “The United States and the World Health Organization,” in *The United States and Multilateral Institutions: Patterns of Changing Instrumentality and Influence*, ed. Margaret P. Karns and Karen A. Mingst (New York: Routledge, 1992).

¹⁶ For colonial smallpox vaccination, see Sanjoy Bhattacharya, Mark Harrison, and Michael Worboys, *Fractured States: Smallpox, Public Health and Vaccination Policy in British India, 1800-1947* (Hyderabad: Orient Longman, 2005) and William H. Schneider, “Smallpox in Africa During Colonial Rule”; for the diverse motivations and effects of colonial medicine more generally, see Emmanuel Kwaku Akyeampong, “Disease in West African History,” in *Themes in West Africa's History*, ed. Emmanuel Kwaku Akyeampong, (Athens: Ohio University Press, 2006), 186–207; John Farley, *Bilharzia: A History of Imperial Tropical Medicine*, Cambridge History of Medicine (Cambridge: Cambridge University Press, 1991); Warwick Anderson, *Colonial Pathologies: American Tropical Medicine, Race, and Hygiene in the Philippines* (Durham: Duke University Press, 2006); David Arnold, *Colonizing the Body*; Andrew Cunningham and Birdie Andrews, *Western Medicine as Contested Knowledge*; Sheldon J. Watts, *Epidemics and History*.

interventionist) impulses of the imperial state.¹⁷ And so, by the beginning of World War II, European and North American health professionals had created a world in which smallpox was an endemic menace of certain tropical and subtropical areas.¹⁸

World War II then initiated a shift in the global disease environment and undermined the viability of smallpox control. *Variola* posed a much smaller wartime threat than diseases like malaria and typhus, since smallpox no longer existed in the European theater and because soldiers received an effective vaccine.¹⁹ But increased contact with smallpox-endemic areas of Africa and Asia increased the threat of smallpox importation into North America and Europe.²⁰ For instance, smallpox imported from northern Africa in 1944 led to a three-year outbreak in Italy that produced in excess of 6,000 cases.²¹ The end of the war would bring more, not less, exchange of people, goods, and plagues. Wartime developments in transportation technology – from automobiles to steamships to air travel – promised to increase and quicken peacetime trade and travel. A case of smallpox could incubate as long as two weeks before revealing its telltale spots – plenty of time to travel thousands of miles from a smallpox-endemic country in the tropics or subtropics to a smallpox-free country in North America or Europe. Between January and July of 1946, for example, fifteen passengers infected with smallpox from India and the Middle East disembarked in England; thirteen by boat and two by plane.²² In that year alone, a total of 2,178 cases of smallpox slipped past quarantine lines in Europe and North America.²³ As the barriers between different disease environments fell before new technologies, a more integrated global disease environment emerged, one in which the health problems of one country threatened to become the health problems of all.

Recognizing the dangers presented by a global environment transformed anew by artifice, delegates to the United Nations Conference on International Organization – the meeting that would create the United

¹⁷ Schneider, “Smallpox in Africa during Colonial Rule,” 206; Sanjoy Bhattacharya, Mark Harrison, and Michael Worboys, *Fractured States: Smallpox, Public Health and Vaccination Policy in British India, 1800-1947* (Hyderabad: Orient Longman, 2005); Arnold, *Colonizing the Body*; Warwick Anderson, “Immunization and Hygiene in the Colonial Philippines,” *Journal of the History of Medicine and Allied Sciences* 62, no. 1 (January 1, 2007): 1–20, doi:10.1093/jhmas/jrl014.

¹⁸ For historical rates of smallpox infections, see Fenner et al., *Smallpox and Its Eradication*, chapter 8.

¹⁹ For disease in World War II, see J.E. Gordon, “The Strategic and Tactical Influence of Disease in World War II,” *The American Journal of the Medical Sciences*, 1948, 215:311-326.

²⁰ J. Fabre, “Smallpox Prevalence Throughout the World During and After the Second World War,” *Epidemiological and Vital Statistics Report*, 1948, p. 268–289; Fenner et al., *Smallpox and Its Eradication*, p. 348, 351.

²¹ Fabre, “Smallpox Prevalence,” 288.

²² Fabre, “Smallpox Prevalence,” 287.

²³ Fabre, “Smallpox Prevalence,” 287.

Nations – called for an International Health Conference, which met in New York in 1946.²⁴ Health professionals from around the world gathered at the Henry Hudson Hotel to discuss a new vision: a truly global organization that would supersede all previous international health arrangements.²⁵ The conference welcomed not only delegates from the member states of the United Nations, but also representatives from thirteen non-member states, ten international organizations interested in public health, and the Allied Control Authorities for Germany, Japan, and Korea. Such a gathering of so many health officials from every corner of the world signified deep concern about new threats in the global disease environment. It also expanded the reach of international health institutions – heretofore largely the domain of North American and European health officials – and reinforced a growing awareness of an inseparably interconnected world; no nation, organization, or individual should be excluded from the reach of the new global organization, just as none could escape the global disease environment. In his message of welcome, President Harry Truman reminded the delegates that, “modern transportation has made it impossible for a nation to protect itself against the introduction of disease by quarantine.”²⁶ While each country had its own public health responsibilities, that work “must be co-ordinated through international action.” A new world needed a new, global approach to old plagues.

Responding to Truman’s call, delegates laid out an ambitious agenda for the new World Health Organization. In this world of rapid trans-Atlantic travel and enthusiasm for international cooperation, health care professionals and government bureaucrats adopted a loftier goal than ever before: the eradication, not just control, of disease. The health professionals at the conference in 1946 could not entirely avoid the tensions of the early Cold War and decolonization era, bickering over everything from the voting status of colonial territories to the definition of health (eventually defined “positively and broadly,” as “a state of complete physical, mental and social well-being”).²⁷ At the time, with the complexities of human culture, society, and politics outside their control, these health professionals decided that they would focus their energies on attacking disease. As the American delegation argued, “the fight against disease should outweigh any political considerations.”²⁸ And that fight should become a total war.

²⁴ Health cooperation was not originally part of the San Francisco agenda, but was added by delegates from Brazil and China; see Lee, *The World Health Organization*, 13.

²⁵ For the global vision and ambition of the health conference and the subsequent development of the WHO, see Staples, *The Birth of Development*, 132–136 and chapter nine.

²⁶ WHO Interim Commission, *Official Records of the World Health Organization, No. 2: Proceedings and Final Acts of the International Health Conference* (Geneva: World Health Organization, 1946), p. 31.

²⁷ WHO Interim Commission, *Official Records, No. 2*, p. 16, 18-19.

²⁸ WHO Interim Commission, *Official Records, No. 2*, p. 18.

Article (g) [2(g)] of the WHO's constitution stated that the organization would "stimulate and advance work to eradicate epidemic, endemic and other diseases." This represented a significant change in the international health regime. The concept of eradication wasn't particularly new; humans had long dreamed of complete elimination of their disease enemies. There had even been efforts to do so, including, most famously, the Rockefeller Foundation's eradication programs against hookworm in the American South (started in 1909; later extended to 52 other countries), yellow fever in the Americas (started in 1918), and two disease-carrying species of mosquitoes, *Anopheles aegypti* and *Anopheles gambiae*, in Brazil (1934 and 1939, respectively), led by the "arch-eradicationist" Dr. Fred L. Soper.²⁹ All of these programs succeeded in reducing suffering and death from disease; none eliminated their targets throughout the entire world. In fact, although eradication advocates like Soper hoped that these national and regional eradication programs would spread to other places in the world, none of these efforts advanced a coherent, integrated, global approach to disease. These were, at most, international, not global, eradication programs.³⁰ In contrast, the delegates who designed the World Health Organization created a truly global institution, unshackled (in concept, at least) by the parochialisms and politics of national boundaries. The founders of the WHO saw it as a new kind of global body for a new global era, advocating a new global vision. Instead of maintaining the status quo of national vaccination and international quarantine, the world would embark on a cooperative program of total and complete mastery over all diseases.³¹

Smallpox's Suitability for Eradication

Before such a program could begin, scientists needed to know and better define smallpox's eradicable qualities. In April 1948, the WHO convened an expert study group, which concluded that scientific medicine had established important facts about smallpox: its method of transmission, its

²⁹ The title "arch-eradicationist" is from Stepan, *Eradication*; for more on Soper, see "The Fred L. Soper Papers: Biographical Information," *Profiles in Science, National Library of Medicine*, accessed February 4, 2014, <http://profiles.nlm.nih.gov/ps/retrieve/Narrative/VV/p-nid/76>; and Fred Lowe Soper, *Ventures in World Health: The Memoirs of Fred Lowe Soper*, ed. John Duffy (Washington, D.C.: Pan American Health Organization, 1977); for brief survey of other eradication programs, see Fenner et al., *Smallpox and Its Eradication*, 373–379.

³⁰ Theodore M. Brown, Marcos Cueto, and Elizabeth Fee, "The World Health Organization and the Transition From 'International' to 'Global' Public Health," *American Journal of Public Health* 96, no. 1 (January 2006): 62–72, doi:10.2105/AJPH.2004.050831; David P. Fidler, "From International Sanitary Conventions to Global Health Security: The New International Health Regulations," *Chinese Journal of International Law* 4, no. 2 (November 1, 2005): 325–392, doi:10.1093/chinesejil/jmio29.

³¹ WHO Interim Commission, *Official Records, No. 2*, 18, 49.

incubation period, and the efficacy of the vaccine.³² The group expressed particular enthusiasm about laboratory work that promised to isolate the virus from its environments. Scientists had recently used the electron microscope to accurately diagnose smallpox from tissue taken from a victim of the New York outbreak, the first such use of the device for any virus. This level of precision would help prevent misdiagnosis of clinically similar diseases, such as chickenpox or syphilis, which would threaten any comprehensive smallpox control efforts.³³ Other research sought to further isolate the virus from complicating factors. In smallpox-endemic environments, local people had long known that smallpox took more victims during cool, dry weather than during hot, wet monsoons. Bengals, for instance, called smallpox “gutt bashunto,” the spring rash.³⁴ In 1948, Sir Leonard Rogers, doctor and professor at Calcutta Medical College, built on this local knowledge to create a predictive model of smallpox’s behavior: “increased prevalence [of smallpox] in any year may usually be foreseen by watching the meteorological records in time to control the expected increase to some extent by increased use of vaccination.”³⁵ Combining forecasts for smallpox transmission in the field with control of the virus in the laboratory, scientists drew closer to the level of mastery necessary for disease eradication.

Smallpox experts also developed a modern, industrial weapon that would overwhelm the disease. Since the mid nineteenth century, vaccinators had procured their material by cultivating and harvesting the vaccine on live animals of different types (such as cows, sheep, and water buffalo) and processed in different ways.³⁶ For instance, some producers killed and exsanguinated the animal before scraping off the vaccine pulp, while others only used anesthetic. As D. A. Henderson, the head of the WHO smallpox eradication campaign, later wrote to a colleague, vaccine production was “as much of an art form as it was a science.”³⁷ This particular “art form” left modern medicine dependent on the variables of local animals, cultures, and environments, producing an irregular vaccine – an unacceptable situation in the drive to more perfectly know and master smallpox. The barnyard had to become sanitary, modern, and industrial. The Michigan Department of Health set the standard at its facility in Lansing, where every aspect of the vaccine production process

³² WHO Interim Commission, *Official Records of the World Health Organization, No. 11: Reports of Expert Committees and Other Advisory Bodies to the Interim Commission* (Geneva: World Health Organization, 1948), p. 18–20.

³³ For example of problems of misdiagnosis, see C. Simpson Smith, “Smallpox in Staffordshire, 1947,” *British Medical Journal*, 1948, 1:139–142.

³⁴ Fenner et al., *Smallpox and Its Eradication*, 179.

³⁵ Leonard Rogers, “Further Work on Forecasting Smallpox Epidemics in India and British Tropical Countries Based on Previous Climatic Data,” *The Journal of Hygiene*, 1948, 46:19–33, on p. 33.

³⁶ Fenner et al., *Smallpox and Its Eradication*, p. 277–294.

³⁷ D. A. Henderson to Frank Fenner, 5 January 1983, “Correspondence with D.A. Henderson and F. Fenner, ‘Smallpox and its Eradication,’ 1981–1983,” Box 667, ID 1242, Archives of the Smallpox Eradication Program, World Health Organization, Geneva.

proceeded under strict guidelines, from the precise mixture of feed for the cows (“1 1/2 quarts of rolled oats and 1/2 of a pitchfork full of good-quality alfalfa hay”) to the process of “sacrific[ing] the calf” on the seventh day of virus growth.³⁸ Although smallpox experts looked forward to developments that would bring vaccine production entirely within the confines of the lab, for now, the thorough and rigid procedures exemplified in Lansing would help standardize the quality and potency of the vaccine.

Advances in freeze-dried preservation further modernized the smallpox vaccine and rationalized the disease’s relationship to people and their environments. Even the purest and most potent smallpox vaccine lost its power in tropical and subtropical environments; without refrigeration, liquid vaccine quickly became useless. Building on French colonial innovations, American scientists refined a process for freeze-drying vaccine in 1938, publishing what would become the standard guide for the process of “lyophilisation,” the appropriately modern moniker they gave to this laboratory procedure.³⁹ Technological developments during World War II enabled further industrialization of “lyophilised” vaccine. In 1948, an English graduate student, Leslie Collier, used a large centrifugal dryer developed by British scientists during the war to produce heat-stable vaccine that retained its potency up to four years, a dramatic improvement over the month-long stability then standard.⁴⁰ This new freeze-drying process was quickly scaled up to industrial production using the latest marvels of modern technology. For instance, the centrifugal freeze-driers produced by the Edwards High Vacuum company of Sussex, England consisted of two machines: one that spun the vaccine under vacuum to eliminate 95% of the liquid, and a secondary drier that used both vacuum and chemicals to eliminate the remaining 5%.⁴¹ Equipped with such advanced devices, a laboratory could produce thousands, even millions, of doses of potent, pure, and stable vaccine – a powerful weapon for a global offensive against smallpox.

Choosing a Candidate for Eradication

With these developments in scientific knowledge of the disease and the modern vaccine, smallpox became increasingly attractive as a suitable candidate for the ambitions of global health authorities. In October of 1950, the Pan American Sanitary Conference, the governing body of the

³⁸ “Production Method of Smallpox Vaccine at the Michigan State Laboratories, Lansing, USA,” October 25, 1955, WHO/Smallpox/4, World Health Organization Library, Geneva (hereafter cited as WHO Library).

³⁹ R. & J. Fasquelle, “Desiccation of Vaccinia Virus and Smallpox Vaccination,” November 8, 1950, WHO/BS/105, WHO Library.

⁴⁰ Fenner et al., *Smallpox and Its Eradication*, p. 286–288.

⁴¹ “Methodology of Freeze-Dried Smallpox Vaccine Production,” July 22, 1968, SE/68.3, WHO Library.

Pan American Sanitary Bureau, passed a resolution calling for a hemisphere-wide smallpox eradication campaign.⁴² The initiative inspired hopes for global, not just regional, eradication, and in 1953, WHO Director-General Brock Chisholm proposed the first-ever global campaign against smallpox.⁴³ Chisholm believed that the time had come for the WHO to commence “world-wide campaigns” that would “demonstrate [the WHO’s] essential place in the interest of *all* countries,” transforming the organization into a real force for good in global health.⁴⁴ The Director-General nominated smallpox for this demonstration, arguing that the disease represented a “suitable candidate for action.” Chisholm noted its universal nature (“people of all races and ages may contract the disease”), the virus’s vulnerability to the vaccine (“it can be prevented by simple and effective methods”), and the threat that smallpox importation posed to the developed world. Chisholm called on the WHO to seize the opportunity presented by smallpox and show what the organization could do within the global disease environment.

Few of Chisholm’s colleagues shared his certainty that smallpox was a “suitable candidate.” During discussions of Chisholm’s plan by the World Health Assembly’s Committee on Programme and Budget, only three delegations voiced support: Uruguay, France, and Panama. But India, Indonesia, the Netherlands, the United Kingdom, Venezuela, Finland, Spain, Belgium, the USA, El Salvador, and South Africa all rejected Chisholm’s plan. Of course, no one opposed the idea of smallpox eradication. As Colonel Whayne, the US delegate, explained, his resistance should not “in any way be interpreted as minimizing the importance of the disease and the necessity of combating it by every possible means.” But a comprehensive, world-wide campaign was not one of those means—smallpox was simply too difficult and complicated. Dr. Mackenzie, representing the United Kingdom, cited “practical difficulties such as the lack of public education, general apathy and the physical and economic difficulties connected with vaccination.” More to the point: “Such a campaign might prove uneconomical.” Dr. Pandit, the Indian delegate, objected to the proposal on the grounds of national autonomy, insisting that “the problem of smallpox would have to be tackled first of all on a regional basis, since it involved public-health services, laboratories for production of vaccines, and machinery to ensure vaccination.”⁴⁵ In short, as Dr. Mackenzie explained, “The problem was a vast and complicated

⁴² Pan American Sanitary Organization, “XIII Pan American Sanitary Conference Resolutions,” October 1950, http://www.paho.org/english/gov/csp/ftcsp_13.htm#R19.

⁴³ World Health Organization Interim Commission, *Official Records of the World Health Organization, No. 48: Proposals for World-Wide Campaigns: Smallpox* (Geneva, 1953).

⁴⁴ Executive Board, “Further Action on General World Health Problems” (World Health Organization, January 12, 1953), EB11/63, WHO Library.

⁴⁵ Sanjoy Bhattacharya has deftly explored the complexities of post-independence efforts to rid the subcontinent of smallpox; see Sanjoy Bhattacharya, *Expunging Variola: The Control and Eradication of Smallpox in India, 1947-1977* (New Delhi: Orient Longman, 2006).

one.” Rather than calling for a global smallpox eradication campaign, the committee passed a resolution calling for more study of the problem.⁴⁶ It hardly mattered. Brock Chisholm soon left the WHO, and the World Health Assembly elected a new Director-General, Marcelino Candau, who would lead the organization into its first global eradication campaign – but not against smallpox.

Instead, global health experts targeted malaria, embracing the promises of new human efforts to master the environment. The process began in the early years of the WHO. In April of 1947, a WHO Expert Committee on Malaria heralded scientific and medical advances that introduced what the Committee called a “new era” in malaria control.⁴⁷ Specifically, wartime science had revealed the amazing power of dichloro diphenyl trichloroethane (DDT), a long-lasting synthetic pesticide that killed insects by destroying their nervous systems, as demonstrated by US military programs in Algiers, Naples, and the South Pacific. The miraculous power of the new chemical suggested that malaria eradication – which the Committee noted had been “impossible, in fact unthinkable, in pre-war days” – had become possible.⁴⁸ The chemical gave a boost to eradication advocates like Fred Soper, who saw in DDT a powerful weapon for his on-going war against malaria.⁴⁹ DDT-inspired and -driven malaria eradication programs were quickly underway. The US’s Communicable Disease Center (CDC) and the Pan American Sanitary Bureau initiated anti-malaria programs in 1947.⁵⁰ The CDC declared total victory over malaria in the United States in 1953, and PASB redoubled its efforts in 1954, setting a goal of eradication by 1955.⁵¹ That same year, at the World Health Assembly in Mexico City, Marcelino Candau shepherded a plan for global malaria eradication through the gauntlets of committee work and budget evaluations.⁵² On May 26, 1955, the World Health Assembly passed resolution WHA8.30, which initiated the worldwide eradication campaign

⁴⁶ World Health Organization, Resolution WHA6.18, *Handbook of Resolutions and Decisions of the World Health Assembly and the Executive Board, Volume I, 1948-1972* (Geneva: World Health Organization, 1973).

⁴⁷ WHO Interim Commission, *Official Records of the World Health Organization, No. 8*, p. 8–16; “Expert Committee on Malaria, Report on the First Session,” June 30, 1947, WHO.IC/Mal./4, WHO Library.

⁴⁸ “Expert Committee on Malaria,” p. 3.

⁴⁹ For Soper, DDT, and malaria eradication, see Stepan, *Eradication*, 110–112 and Socrates Litsios, “Rene J. Dubos and Fred L. Soper: Their Contrasting Views on Vector and Disease Eradication,” *Perspectives in Biology and Medicine*, 1997.

⁵⁰ Elizabeth W. Etheridge, *Sentinel for Health: A History of the Centers for Disease Control* (Berkeley: University of California Press, 1992), 11–22; Pan American Sanitary Organization, “Eradication of Malaria in the Americas,” October 8, 1954, Pan American Health Organization (PAHO) Library, http://hist.library.paho.org/English/GOV/CSP/14_36.pdf.

⁵¹ Margaret Humphreys, “Kicking a Dying Dog: DDT and the Demise of Malaria in the American South, 1942-1950” *Isis*, 1996, 87:1–17. Pan American Health Organization, Resolution CSP14.R42, “XIV Pan American Sanitary Conference Resolutions,” October 1954, PAHO Library, http://www.paho.org/english/gov/csp/ftcsp_14.htm.

⁵² Cueto, *Cold War, Deadly Fevers*, 35.

against malaria.⁵³ In short, international health experts, who rejected smallpox eradication two years earlier citing the “difficulties” of such a “complicated problem,” enthusiastically embraced a program against malaria – a disease that, by nature of its transmission through mosquitoes and their habitat, was inextricably connected to complicated environments.

And they would reject smallpox eradication again just three years later. At the 1958 World Health Assembly, held in Minneapolis, Soviet delegate and minister of health Dr. Viktor Zhdanov called for a global campaign against smallpox.⁵⁴ Zhdanov began by quoting Thomas Jefferson’s 1806 prediction that “future nations will know by history only that the loathsome smallpox has existed” – a thinly veiled jab at the failure of the United States to fulfill the prophecy of one of its Founders. After noting that the Soviet Union had eradicated endemic smallpox within its enormous borders twenty years previously, Zhdanov made a scientific argument for the candidacy of smallpox, noting advances in the “modern status of medical science and health protection,” especially the “high grade smallpox vaccine” produced by the Soviet industrial machine. With an effective vaccine, scientific knowledge of the virus, and historically-proven vaccination programs like the Soviet Union’s, “there can be no doubt,” argued Zhdanov, that “smallpox, which has been a scourge of mankind for centuries, will be practically eradicated within five years.”

Again, WHA members greeted a proposal for global smallpox eradication with skepticism. The Belgian delegation wondered if the Soviet timeline “might be too optimistic”; Australia and South Africa also expressed doubts.⁵⁵ Rather than initiating such a program, the delegates gave tepid support to the desirability of smallpox eradication and asked for further study and a new report.⁵⁶ The next year, the WHA discussed the study, which estimated that eradication would cost nearly \$98 million; the delegates unanimously passed another resolution that recognized the “urgency of achieving world-wide eradication,” while completely ignoring the WHO budget, which allocated only \$55,568 for smallpox control.⁵⁷ Meanwhile, the malaria eradication program consumed ever more resources: total WHO expenditures on the initiative increased from \$2.4 million in 1955 to more than \$13 million in 1958.⁵⁸

⁵³ World Health Organization, Resolution WHA8.30, *Handbook of Resolutions and Decisions of the World Health Assembly and the Executive Board, Volume I, 1948-1972*.

⁵⁴ “Eradication of Smallpox (Draft Resolution Proposed by the Government of the USSR),” March 6, 1958, page 4, A11/P&B/1, WHO Library.

⁵⁵ “Committee on Programme and Budget, Provisional Minutes of the Fifteenth Meeting, Eleventh World Health Assembly” June 11, 1958, page 23, A12/P&B/Min/15, WHO Library.

⁵⁶ Fenner et al., *Smallpox and Its Eradication*, p. 369–371.

⁵⁷ World Health Organization, Resolution WHA12.54, *Handbook of Resolutions and Decisions of the World Health Assembly and the Executive Board, Volume I, 1948-1972*; Fenner, et al., *Smallpox and its Eradication*, Table 9.1, 369-370.

⁵⁸ Fenner, et al., *Smallpox and its Eradication*, Table 9.2, p. 383.

Of course, the World Health Organization had very good reasons to attack malaria; namely, the disease affected millions of people throughout the world every year. In the *First Report on the World Health Situation, 1954-1956*, the WHO estimated 150 million cases of malaria per year, with 1.5 million deaths.⁵⁹ Relative to smallpox, which health authorities blamed for 39,899 deaths in 1955, malaria was a much more dangerous killer, at least from a statistical point of view.⁶⁰ Additionally, health experts worried that DDT might not always retain its power against mosquitos, adding urgency to a malaria eradication scheme that depended on the chemical.⁶¹ But this perspective diminished the World Health Organization, at least to some international health experts who argued that the WHO ought to eradicate both diseases. As the Ecuadorian delegate to the WHO's Committee on Programme and Budget said in support of the Soviet proposal in 1958, "the eradication of smallpox was just as important as the eradication of malaria."⁶² Why shouldn't the WHO fulfill its constitutional promise to eradicate smallpox with the same vigor as it applied to malaria? Why didn't more WHA delegates agree with their Peruvian colleague, who said that smallpox eradication "deserved the same full support from WHO as was accorded to the malaria eradication programme"? Why didn't smallpox eradication receive the same support as malaria eradication? Why, to be more precise, did the WHA twice reject a world-wide campaign against smallpox, a disease that only infects humans and for which the world has long possessed a simple vaccine, while malaria, with its much more complicated disease ecology, became the first target for a global eradication campaign?

Compared to malaria, smallpox was not "suitable" for eradication for two reasons that had very little to do with the diseases themselves. First, political and institutional contingencies in the early 1950s had empowered advocates of malaria eradication. The United States possessed remarkable influence in the WHO between 1949 and 1957, when the Soviet Union (and the rest of the Eastern Bloc) abandoned the organization, citing its bloated bureaucracy and failure to invest sufficiently in social health programs.⁶³ Acting as the sole superpower in the WHO, the United States threw its support behind global malaria eradication, beginning with

⁵⁹ World Health Organization, *Official Records of the World Health Organization: First Report on the World Health Situation, 1954-1956* (Geneva: World Health Organization, 1959), 20, <http://apps.who.int/iris/handle/10665/85718>.

⁶⁰ Dixon, *Smallpox*, appendix III.

⁶¹ World Health Organization, *Expert Committee on Malaria, Athens, 20-28 June 1956: Sixth Report* (Geneva: World Health Organization, 1956); Packard, *The Making of a Tropical Disease*, 154-155; Webb, *Humanity's Burden*, 166-167.

⁶² "Committee on Programme and Budget, Provisional Minutes of the Fifteenth Meeting," June 11, 1958, A12/P&B/Min/15, WHO Library.

⁶³ Christopher Osakwe, *The Participation of the Soviet Union in Universal International Organizations: A Political and Legal Analysis of Soviet Strategies and Aspirations inside ILO, UNESCO and WHO* (Leiden, The Netherlands: Sijthoff, 1972); Javed Siddiqi, *World Health and World Politics: The World Health Organization and the UN System* (Columbia, SC: University of South Carolina Press, 1995).

its advocacy of Candau's 1955 proposal, which the US advanced over the objections of some important allies, including the UK and France. As other historians have explained, the United States supported the malaria program partially because its potential foreign policy gains could be won without direct, potentially redistributionist (that is, socialist or communist) anti-poverty efforts.⁶⁴ Congress made DDT-driven malaria eradication part of the nation's Cold War soft-power campaigns when it amended the Mutual Security Act in 1957 to "declare it the policy of the United States...to assist other peoples in their efforts to eradicate malaria."⁶⁵ And in his State of the Union address the next year, President Eisenhower lauded the global malaria eradication campaign and challenged the Soviet Union "to join with us in this great work of humanity."⁶⁶ Instead, the USSR called for its new program against smallpox, offering a competitor for the budget and attention allocated to the WHO's malaria eradication program, thereby potentially threatening American foreign policy interests.⁶⁷

More fundamentally, smallpox eradication posed an essentially different challenge than malaria eradication: rather than simplified environments, a smallpox campaign would confront diverse peoples and cultures – the "difficulties" to which Chisholm's opponents alluded in 1953. Such differences represented a level of complexity, or even backwardness, that might undermine any effort to eliminate smallpox. In an influential study published in 1948, Dr. C.W. Dixon (who would literally write the textbook on smallpox in 1962) blamed a recent outbreak in Tripolitania (now part of Libya) on Arab cultural practices: concealment of cases during Ramadan, the reluctance of women to visit vaccination centers, and the "Arab experience of insect pests," which allegedly made

⁶⁴ See Marcos Cueto, *Cold War, Deadly Fevers*; Harry Cleaver, "Malaria and the Political Economy of Public Health," *International Journal of Health Services*, 1977, 7:557-579; Staples, *The Birth of Development*, 170-171; and the "Malaria and Development" special issue of *Medical Anthropology* from May 1997, edited by Randall Packard.

⁶⁵ "Disease Eradication," January 1966, 4-5, Folder "Diseases - Disease Eradication," Committees-Diseases, Correspondence 1949-1969, Box 40, Office of International Health, Records of the Public Health Service, Record Group 90, National Archives, College Park, MD (hereafter cited as RG 90, NA).

⁶⁶ Dwight D. Eisenhower, "Annual Message to the Congress on the State of the Union," January 9, 1958, *The American Presidency Project*, <http://www.presidency.ucsb.edu/ws/index.php?pid=11162>.

⁶⁷ For Eisenhower and Congress's anxiety about the Soviet foreign aid and how that anxiety shaped American foreign aid policy in the 1950s, see Burton Ira Kaufman, *Trade and Aid: Eisenhower's Foreign Economic Policy, 1953-1961* (Baltimore: Johns Hopkins University Press, 1982); for an example, see "Memorandum of Meeting re: Establishment of an Interdepartmental Committee on International Health Policy and World Health Organization Fund for Conquest of Disease," March 13, 1959, RG 59, General Records of the Department of State, Records Pertaining to the World Health Organization and the Committee on International Health Policy, 1945-1962, Box 4, Folder: "Health--Interdepartmental Committee on International Health Policy--Memoranda (Miscellaneous)," NARA.

them more tolerant of the presence of potentially-infectious flies.⁶⁸ Health authorities also warned that, left to their own devices, the people of the tropics and subtropics would destroy the modern defense against smallpox. A WHO survey of smallpox in 1948 quoted a 1940 report by Dr. Van Hoof, Medical Superintendent of Belgian Congo, who attributed the continued prevalence of smallpox in part to “natives [who] try to neutralize the vaccine by exposing scarifications to the sun, by treating them with acid fruit juices or by mechanical means, and often succeed if they are not closely watched.”⁶⁹ Although the study did not address the reasons for these practices, it seemed clear that the people of the “black continent” (as the WHO study referred to Africa) simply did not understand smallpox or its vaccine.⁷⁰ The lesson, like Dixon’s conclusions, seemed clear: the people of smallpox endemic environments would frustrate any eradication efforts. These were the “complexities” and “difficulties” to which opponents of smallpox eradication in 1953 and 1958 referred.

Smallpox, then, was not yet a “suitable candidate for global eradication,” in part because that category was defined by the capacity to rationalize environments, rather than people. DDT-driven malaria eradication simultaneously expressed and reinforced a worldview that put faith in the ability of science to eliminate the “complicated” and “difficult” elements of the nonhuman natural world. In an era when technology promised absolute control over the atom, synthetic chemicals promised absolute control over environments and the diseases in them. A human-produced chemical, concocted in a laboratory, promised to reduce malaria’s disease ecology – a complex relationship between humans, insects, environments, and the parasite – into a simple matter of chemical application.⁷¹ Smallpox eradication, on the other hand, would demand that physicians and healthcare technocrats assert control of human nature and culture. Whereas malaria eradication pitted global health professionals against mosquitoes and the environments in which they lived, smallpox eradication would require intimate interactions with millions of individuals in the developing world – a backwards world, to many health professionals, where neither patients nor local healers could be trusted to

⁶⁸ C. W. Dixon, “Smallpox in Tripolitania, 1946: An Epidemiological and Clinical Study of 500 Cases, Including Trials of Penicillin Treatment,” *The Journal of Hygiene*, 1948, 46:351–377.

⁶⁹ “World Prevalence of Smallpox During and After the Second World War,” p. 280.

⁷⁰ Such direct references to race (“the dark continent”) were increasingly rare among smallpox experts; instead, concerns about the non-white other were usually much more oblique, focusing primarily on cultural differences. For racialized discourses about disease, see Anderson, *Colonial Pathologies*, especially chapter eight, “Malaria Between Race and Ecology.”

⁷¹ Many histories of malaria control note the simplifying effects and intent of DDT. See Margaret Humphreys, “Kicking a Dying Dog”; Stepan, *Eradication*; Litsios, “Malaria Control, the Cold War, and the Postwar Reorganization of International Assistance”; Anderson, *Colonial Pathologies*; Packard, *The Making of a Tropical Disease*; Webb, *Humanity’s Burden*; Kinkela, *DDT and the American Century*.

understand modern medicine, including an industrialized smallpox vaccine. And so smallpox initially failed to meet the standard for a suitable candidate for global eradication, as established by DDT-driven malaria eradication.

Smallpox Becomes Suitable

Yet even the latest medical and scientific breakthroughs could not completely rationalize malaria's relationship to humans, their environments, and mosquitoes. From the outset, malaria eradication had been premised on the power of DDT to kill insects without regard for their environments. But as early as 1947, scientists learned of cases in which house flies developed resistance to DDT, and at the 1953 World Health Assembly – the same gathering at which he proposed smallpox eradication – Director-General Brock Chisholm confirmed that mosquitoes could, in fact, develop resistance to DDT within just a few years of spraying.⁷² Such concerns lent urgency to malaria eradication, which, supporters argued, must move forward quickly, before DDT lost too much of its power.⁷³ But the news kept getting worse. Researchers found more species of mosquitoes in more parts of the world developing resistance to DDT, and they discovered that lower primates could host malaria, introducing yet another natural factor in the process of transmission.⁷⁴ It also became clear that DDT did not work equally well in all environments; for instance, the walls of adobe and mud huts quickly absorbed DDT, rendering it useless against mosquitoes.⁷⁵ In response to these challenges, eradicationists made a variety of adjustments, applying additional or alternative chemicals like dieldrin, distributing salt mixed with anti-malarial drugs, and varying insecticide concentrations and spraying schedules. With each new chemical, new drug, and new approach, anti-malarial efforts became increasingly complicated and difficult, and malaria became a less ideal candidate for global eradication.⁷⁶

⁷² Gregory Livadas and WHO Expert Committee on Malaria, "Do Anophelines Acquire Resistance to DDT?" 1951, WHO/Mal/74, WHO Library; Pan American Sanitary Organization, "Eradication of Malaria in the Americas," 28.

⁷³ For urgency in DDT-driven malaria eradication, see Pan American Sanitary Organization, "Eradication of Malaria in the Americas," October 8, 1954, PAHO Library, http://hist.library.paho.org/English/GOV/CSP/14_36.pdf.

⁷⁴ "Expert Committee on Malaria, Lisbon, Seventh Report," September 15-23, 1958, page 21, WHO/MAL/197-214, WHO Library; WHO Expert Committee on Malaria, *Eighth Report*, Technical Report Series, No. 205 (Geneva: World Health Organization, 1961), p. 46–48. For disease ecology of malaria, see Packard, *The Making of a Tropical Disease*.

⁷⁵ E. Bordas, "Inactivation of DDT by Mud Surfaces" (Geneva, World Health Organization, 1952); for more on DDT resistance, see Kinkela, *DDT and the American Century*, 58, 93–95.

⁷⁶ For problems with DDT and the failure of the malaria eradication program, see Staples, *The Birth of Development*, 173–179; Webb, *Humanity's Burden*, 174–177; Packard, *The Making of a Tropical Disease*, 162–176.

More troublingly, the safety of DDT came under question. In 1951, the WHA commissioned a report on the potential hazards of the chemical.⁷⁷ Submitted to the World Health Assembly in 1953, the report noted that “there is no shred of experimental evidence” of dangers to humans from DDT.⁷⁸ “On the other hand,” the report admitted, “there is no one yet in a position to say with any confidence that the ingestion of small quantities of a material like DDT over the virtual life-span of a human being would be entirely harmless.” Despite such doubt, the WHA-commissioned report remained confident in DDT, and the WHO’s malaria eradication program went forward, emphasizing not the unknown hazards of DDT, but the ability of experts to manage the power of the chemical and control environments and improve human health. But the more scientists learned about DDT, the more uncertain, complicated, and potentially dangerous malaria eradication became.

As problems with malaria eradication raised questions about the program’s feasibility and safety, the concept of eradication itself increasingly came under fire. Eradicationism was hardly a universal creed among health experts. Some doctors and medical scientists embraced an evolutionary theory of disease’s relationship to humans, in which people, microbes, and their environments were inextricably linked in a process of continual change and adaptation.⁷⁹ Microbiologist René Dubos (who coined the phrase, “think globally, act locally”) was perhaps the most well-known medical scientist to advance this understanding of disease ecology.⁸⁰ Dubos argued in his 1959 book *Mirage of Health* that humans would never master nature enough to eradicate diseases, and that health professionals could best serve humanity by observing evolutionary processes and carefully calibrating their responses to disease.⁸¹ Although less fervently opposed to the concept of eradication, Frank Fenner, an Australian microbiologist who had witnessed first-hand the capacity of

⁷⁷ WHO, *Official Records of the World Health Organization, No. 13: First World Health Assembly, Geneva, 24 June to 24 July 1948* (Geneva: World Health Organization, 1948), 304.

⁷⁸ J. M. Barnes, *Toxic Hazards of Certain Pesticides to Man: Together with a Select Bibliography on the Toxicology of Pesticides in Man and Mammals* (Geneva: World Health Organization, 1953), 33.

⁷⁹ For physicians and scientists developing “disease ecology” as an approach to infectious diseases, see Warwick Anderson, “Natural Histories of Infectious Disease: Ecological Vision in Twentieth-Century Biomedical Science,” *Osiris* 19, 2nd Series (2004): 39–61; for a comparison to conventional disease concepts, see Litsios, “Rene J. Dubos and Fred L. Soper”; see also Stepan, *Eradication*, especially chapters four and five; for disease ecology as historical analysis, see examples by J. R. McNeill, *Mosquito Empire: Ecology and War in the Greater Caribbean, 1620-1914* (New York: Cambridge, 2010) and Guenter Risse, “Epidemics and History: Ecological Perspectives and Social Responses,” in *AIDS: The Burdens of History*, ed. Elizabeth Fee and Daniel M. Fox (University of California Press, 1988), 33–66.

⁸⁰ For an excellent biography, Carol Moberg, *René Dubos: Friend of the Good Earth* (Washington, D.C.: ASM Press, 2005).

⁸¹ René Jules Dubos, *The Mirage of Health: Utopias, Progress, and Biological Change* (New Brunswick: Rutgers University Press, 1959).

rabbits to develop resistance to a cousin of smallpox, doubted whether humans could ever exercise total control over disease environments. Fenner saw a world in which human populations grew ever larger and closer together, creating a “single ecological unit” in which old diseases thrived and “‘new’ viral disease for man himself” developed.⁸² Although Dubos, Fenner, and other disease ecologists carefully avoided misanthropic neo-Malthusianism, their arguments about human-environment-disease interrelationships carried ominous implications: disease eradication would produce too many humans, upsetting the balance of nature on which the species depended.⁸³ From this perspective, in which humans were intimately and inextricably connected to the nonhuman natural world, disease eradication was highly improbable or perhaps very, very dangerous.

Such doubts about eradication among health professionals merged with deeper and more popular concerns about humanity’s efforts to control complex ecological systems. Worries about the toxic effects of chemicals like DDT increased during the 1960s, despite assurances from insecticide manufacturers and the WHO. The publication of Rachel Carson’s *Silent Spring* in 1962 and the ensuing storm of publicity and controversy surrounding the book marked a watershed moment in concern about human intervention in ecological processes, bringing obscure scientific discussions to a broader public and vice-versa.⁸⁴ Carson began *Silent Spring* with reference to tragic changes to the environment, but she ultimately focused on the human body’s inextricable connection to the nonhuman natural world. The book’s themes spoke directly to the debate about eradication: Carson doubted that humans would ever master nature enough to eradicate any part of it (hence her reminders of the failures of insect control programs), but in the process of trying to do so, they would create a miserable, unlivable world.

Appearing at a conference of the American Public Health Association just one month after the publication of *Silent Spring*, Dr. Anthony Payne, chairman of the Department of Epidemiology and Public Health at Yale University, called on his colleagues to think carefully about eradication, evoking Carson’s “imaginative phantasy” of a world suffocated

⁸² Anderson, “Natural Histories of Infectious Disease.”

⁸³ René Jules Dubos, *The Mirage of Health: Utopias, Progress, and Biological Change* (New Brunswick: Rutgers University Press, 1959), chapter 7; for concerns about health programs and population, see William Vogt, *Road to Survival* (W. Sloane Associates, 1948) as analyzed by Thomas Robertson, *The Malthusian Moment: Global Population Growth and the Birth of American Environmentalism* (New Brunswick: Rutgers University Press, 2012), 52–53 and; Packard, *The Making of a Tropical Disease*, 146–147 and Paul Farr Russell, *Man’s Mastery of Malaria* (Oxford University Press, 1955) as analyzed by Anderson, *Colonial Pathologies*, 225; and Stepan, *Eradication*, 181.

⁸⁴Linda Lear, *Rachel Carson: Witness for Nature* (New York: H. Holt, 1997); Priscilla Coit Murphy, *What A Book Can Do: The Publication and Reception of Silent Spring* (Amherst: University of Massachusetts Press, 2005).

by insecticides.⁸⁵ “The phantasy is quite frightening, but at the same time it is a real possibility,” warned Payne, “It is not science fiction.” As the heavy application of insecticides disturbed “ecological balance,” so too might eradication produce a dangerous shift in the relationship between humans and disease. Echoing Carson’s warnings about the ecologically insidious effects of pesticides, Payne cautioned that the full costs of eradication had not been accounted for, quoting from Albert Schweitzer: “‘man can hardly even recognize the devils of his own creation.’ What devils,” Payne asked, “might lie in wait for us along the road to eradication?” Payne did not ask his colleagues to surrender to disease. He admitted that eradication “might be preferred” for some diseases, specifically naming smallpox, cholera, and malaria. But the decision to eradicate must be “subject always to ecological considerations,” and he justified malaria eradication in just those terms: “the continued use of insecticides for [malaria] control rather than eradication would prove more dangerous ecologically.” But “the best candidates of all for eradication,” argued Payne, were “man-made diseases mostly due to chemical and physical agents” which “have upset the ecological balance by causing disease.” The gravest threat to humanity came not from natural enemies, but from foolish efforts to control the nonhuman natural world.

From this ecologically-sensitive perspective of the mid 1960s, DDT-driven malaria eradication seemed to have become one of these foolish, and perhaps even dangerous, efforts, despite Payne’s efforts to justify malaria eradication in ecological terms. The WHO’s malaria eradication campaign relied on a deceptively simple strategy: kill mosquitoes, eliminate malaria. The approach assumed that DDT worked equally well against all mosquitoes in all environments. But this idea of a simplified interaction between humans, a pathogen, and a vector ran into a much more complicated reality. Mosquito resistance and variability, sub-primate malaria hosts, and other nonhuman factors revealed a disease ecology that stymied the WHO’s DDT-driven eradication program. The folly of such an effort compared only to the hazard of the exercise. Chemical insecticides might pose a danger to human health, and, if not, they would certainly disrupt the ecological balance on which humans depended. In short: the very thing that promised to make malaria eradication possible – DDT – had created experiences and understandings of the relationship between humans, diseases, and their environments that undermined malaria’s suitability for eradication.

At the same time, and for the same reasons that malaria fell out of favor, smallpox became an attractive candidate for eradication. Though the Soviet proposal in 1958 did not initiate a global smallpox eradication campaign, it did inaugurate a new phase in the process of knowing and mastering the disease. In November 1958, the WHO convened a “Study

⁸⁵ Anthony M.M. Payne, “The Role of Health Today in Social and Economic Development,” *American Journal of Public Health and the Nation’s Health*, 1963, 53:369–375.

Group on Recommended Requirements for Smallpox Vaccine” to draw up international standards for vaccine production and administration, based primarily on national regulations recently developed by the UK, Japan, the USSR, and the US.⁸⁶ The Study Group called for still more research, and in the six years following the Soviet proposal, the *Bulletin of the World Health Organization* published twice as many articles about smallpox than it had run during the twelve years previous. The publication explored diagnosis, transmission, and, of course, improvement in vaccine potency, purity, stability, and delivery. The WHO also sponsored training sessions for freeze-dried vaccine production and conferences to disseminate knowledge about the disease and encourage individual nations to step up their fight against smallpox. In these ways, smallpox experts both revealed and reinforced how smallpox could be isolated from its environments – an increasingly important consideration, given the concern over manipulation of ecological systems.

Smallpox literally knocked malaria from the top of the list of eradicable diseases. In 1963, the American Public Health Association’s Committee on Eradication drew up a list of six diseases potentially suitable for eradication, based on “public health importance, ease of identification, knowledge of epidemiological characteristics, knowledge of methods of control and ease of eradicability.”⁸⁷ The last factor – “ease of eradicability” – depended on the role of the environment; if eradication required intervention in complex ecological systems, then it might not be possible or even safe. By this reckoning, the APHA’s Committee on Eradication ranked smallpox as its first choice, while malaria finished last. Citing the expense and duration of malaria eradication campaigns, and the discoveries of “reservoirs in sub-human primates,” the Committee “put malaria eradication in the ‘perhaps’ category.” Smallpox, on the other hand, presented a perfect opportunity. “Besides the scientific feasibility of eradication,” explained the Committee, “psychological factors (universal knowledge and fear of the disease) and logistical factors (availability of vaccine, methods and resources) make this the top priority target for eradication.” Malaria, interconnected to so many dynamic nonhuman forces that its eradication seemed both foolish and dangerous, did not offer the “scientific feasibility” and “logistical factors” that made smallpox so perfect for eradication.

In January of 1964, a WHO Expert Committee on Smallpox conclusively defined smallpox as an eradicable disease.⁸⁸ Field research

⁸⁶ WHO, *Requirements for Biological Substances: 5. Requirements for Smallpox Vaccine, Report of a Study Group, 3-8 November 1958*, Technical Report Series No. 180 (Geneva: World Health Organization, 1959).

⁸⁷ “APHA Discussions on Eradication Possibilities,” 1962, Folder “APHA (Committee on Disease Eradication),” Correspondence 1949-1969, Administrative - Associations 1964-1966, Box 22, RG 90, NARA.

⁸⁸ WHO Expert Committee on Smallpox, *First Report*, Technical Report Series, No. 283 (Geneva: World Health Organization, January 14, 1964), WHO Library; “Expert

had shown that transmission of smallpox depended on only three “extrinsic” factors: a victim’s mobility, her or his family size (which determined the amount of contact with an infected patient), and the threat posed by some occupations – hospital workers, for instance, had more potential exposure to smallpox. The natural environment, in other words, was definitely not a factor in the quest to eliminate smallpox. At the same time, diagnosis techniques in the lab had advanced to provide quick and accurate identification of infected specimens, thus bringing the target for eradication more clearly into view. The committee also clarified the best procedures for vaccine production and storage and compared vaccine strains from different laboratories to identify the most powerful weapon for the task of eradication. Based on all of the above, the committee concluded, “As the only source of the virus is man and as vaccination provides good protection...eradication of smallpox in endemic areas is well within the compass of modern preventive medicine.” From the perspective of scientific medicine, smallpox had become a suitable candidate for global eradication.

Smallpox, then, suited evolving understandings, both in the public and among health professionals, of human bodies and disease ecology. With just one application of simple, potent, and heat-stable vaccine, a human body gained complete protection from smallpox. No swamps to drain, no chemicals to spray, no insects to eliminate or primate hosts to track down: smallpox eradication pitted humans vs. a virus, a contest that represented a much simpler endeavor than malaria eradication. Dr. T. Aidan Cockburn, one of the most active members of the APHA’s Committee on Eradication, provided a clear explanation of the essential difference between the two diseases in his book *The Evolution and Eradication of Infectious Diseases*, published the year after Carson’s *Silent Spring*. Cockburn explained that the nature of malaria – moving through mosquitoes to humans, and also infecting nonhuman animal reservoirs – made it entirely possible that “after the eradication measures had been halted, man would be reinfected.” Smallpox, on the other hand, infected only humans, so “the chances, therefore, of permanent eradication of the infections seem good.”⁸⁹ Frank Fenner, who had questioned the feasibility of eradication in general within the “single ecological unit” of the global environment, harbored fewer doubts about smallpox eradication specifically. Fenner eventually chaired the global commission that certified the eradication of smallpox in 1979 and co-authored the WHO’s official history of smallpox eradication. Explaining the ultimate success of the program and his participation in it, Fenner argued that, “the case of smallpox is unique,” pointing to the list of reasons that made smallpox so special: the vaccine, the obvious symptoms of infection, and its lack of a

Committee on Smallpox (Conference Proceedings),” January 14, 1964, Smallpox/WP/1-28, WHO Library.

⁸⁹ Aidan Cockburn, *The Evolution and Eradication of Infectious Diseases* (Baltimore: The Johns Hopkins Press, 1963), p. 140–142.

non-human animal reservoir and vector.⁹⁰ In light of increasing anxiety about the dangers of interfering with complex ecological systems, smallpox had become unusually—perhaps even uniquely—vulnerable to eradication.

Conclusion

In 1964, though, smallpox had yet to supplant malaria as the main target for global eradication. Scientific medicine and international health experts had confirmed smallpox's vulnerability to a global eradication program, but international politics stood in the way of any such effort. Instead, the WHO's malaria program monopolized the organization's attention and resources, with thousands of staff members and millions of dollars dedicated to the program. In 1965, the WHO spent more than \$12.6 million on malaria eradication, while spending just \$233,000 on smallpox.⁹¹ Observing this disparity in the WHO's approach to the two diseases, the USSR delegation to the WHA complained that "malaria eradication seemed to have been the favoured daughter of WHO, whereas smallpox eradication seemed to have been treated rather as a foster child."⁹² And so it would continue, as long as American foreign policy in health concentrated on malaria. Implementing a global smallpox eradication program would require changes in how American doctors, bureaucrats, and politicians understood the purposes of international health programs, a process that would eventually bear fruit under the administration of Lyndon B. Johnson. But even before then, smallpox had started on its path to eradication. The scientific developments of the post-war era and a shifting ecological consciousness had transformed smallpox into a suitable candidate disease, joining inextricably this unique disease to its unique fate.

⁹⁰ Frank Fenner, "Smallpox: Emergence, Global Spread, and Eradication," *History & Philosophy of the Life Sciences*, 1993, 15:397–420.

⁹¹ Fenner et al., *Smallpox and its Eradication*, table 9.3, p. 384.

⁹² "Committee on Programme and Budget, Provisional Minutes of the Twelfth Meeting, Eleventh World Health Assembly" May 17, 1965, page 27, A18/P&B/Min/12, WHO Library.

