MEDICAL HUMANITIES EDUCATION AT SIX TEXAS MEDICAL SCHOOLS

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I intend to submit a copy of my Health Science Scholars & Plan II joint thesis to the Texas ScholarWorks (TSW) Repository. For more information on the TSW, please visit https://repositories.lib.utexas.edu/.

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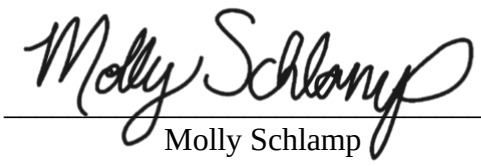

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Abstract

Medical humanities has existed since the 1960s, and research shows that it can improve important physician facets such as empathy, well-being, and critical thinking disposition. However, because of the challenging nature of evaluating the impact of medical humanities implementation in medical education, no single best practice for its incorporation can be identified. Medical humanities programs and curricula vary from each other wildly, and in Texas, a state with 14 medical schools, it is especially challenging for students, educators, and administrators to get a sense of what opportunities exist across the state. In this thesis, I review the existing literature regarding medical humanities education at large and interview key experts from six prominent Texas medical schools. In doing so, I explore medical humanities, its value to medical education and practice, its common programs and curricular structures, and its particular implementations within select Texas medical schools. I bring all of this information into one central location that is easy to access and navigate. This is valuable to undergraduate students navigating medical school admissions, medical students seeking opportunities at their own schools, educators seeking collaboration with other institutions or models to implement at their own, administrators curious about the inclusion of medical humanities in an already packed curriculum, and several others. I also draw attention to trends in medical humanities education in Texas medical schools and subsequently make suggestions regarding how Texas medical schools could improve upon the current state of their medical humanities education in the future. One such suggestion involves the inclusion of programs and curricula from each of an integrated-longitudinal approach, an elective-based approach, and a scholarly concentration approach.

Key Terms: medical humanities, health humanities, medical education, Texas, medical school

Introduction

Applying to medical school can be a long and treacherous journey for a multitude of reasons. It requires years of preparation in the form of schoolwork, significant extracurricular experiences, entry exams, and more. Then come applications, personal statements, interviews, and hopefully admission. One challenge not as commonly discussed however, is the difficulty of selecting medical schools to apply to and eventually deciding upon which school to attend. While schools do their best to inform applicants about their programs through websites and on interview days, the majority of the responsibility is placed on the student to research their options and carefully weigh the information that they uncover. It would be reasonable to assume that students who have clear idea of what they want from a school would come into this process with an advantage and find it to be easier, but this is not always the case.

I am one of those students who approached medical school applications and admissions with a clear priority in mind: the humanities. I have always been drawn to medicine precisely because of its position as an intersection point between the sciences and the humanities. It is, after all, the science of humanity. One of my college majors has been an interdisciplinary liberal arts and humanities course of study, in which I've been able to thoroughly explore the connection between the health sciences and the humanities. I've used humanities works, methods, and mindsets to consider many aspects of health and healthcare, such as death and dying, the practitioner's role as an advocate, the social determinants of health, and the healer-patient relationship. This kind of study interests me, gives me a sense of purpose on the long journey towards medical practice, and is something I feel strongly that I must continue in medical school.

In my home state of Texas, there are 14 medical schools, two of which, Baylor College of Medicine and the University of Texas Southwestern Medical Center, rank in the top thirty nationwide according to the *US News and World Report* ("The Best Medical Schools for Primary Care," 2020; "The Best Medical Schools for Research," 2020). This is remarkable considering that the number of medical schools in most states could be counted on only one hand. As such, one would expect most Texas students to be able to find a school that aligns well with their interests and preferences, regardless of what those interests are. I anticipated finding several choices of schools that recognized the value of the humanities and incorporated them into medical education in careful and evidence-based ways. What I encountered instead was the need to embark upon a long, difficult, and tedious search to uncover what kinds of humanities opportunities exist at each Texas medical school. Careful mining through school websites, direct questioning of students and faculty at interviews, and determined emailing to those I hoped would be most informed did reveal some information. However, the process was not as fruitful as I hoped, and I still found myself lacking a firm grasp of what is available and unable to meaningfully compare schools.

What I ultimately found was a heterogeneous mix of programs employing disparate methods, many of which appeared not to be well-developed or well-understood by most students and faculty. Having spent so much time in my undergraduate study cultivating an appreciation for the importance of the humanities to health, I was taken aback by the lack of consensus around how to most effectively tap into the valuable resource of medical humanities and equip students with all of the benefits it is known to offer. As a result, I have put together this work to explore medical humanities, its value to medical education and practice, common programs and curricular structures, and particular implementations at select schools in Texas. I seek to bring all

of this information into one central location that is easy to access and navigate, as I wish was available to me during my own admissions process and as I hope will be publicly accessible one day. I also use this information to draw conclusions and provide input about the state of medical humanities education in Texas medical schools from the perspective of an invested soon-to-be medical student.

The organization of this paper reflects my research chronology. I first explore and explain the definition, scope, historical context, and present state of medical humanities on the basis of scholarly literature. Then I detail the particular ways that medical humanities adds value to medical education and practice through the use of a variety of evidence and perspectives that have reached the level of scholarly publication. After thorough review of the relevant literature, I subsequently outline the programs and curricula in place at six leading Texas medical schools. The information I provide about those schools is based upon careful and thorough inspection of their websites and the results of interviews that I conducted with key medical humanities experts who are affiliated with the schools in meaningful ways. The discussions I was able to have with these experts were unique due to my position as a prospective medical student with a vested personal interest in medical humanities who had applied to the schools at which they work. It is from this perspective that I then provide my own conclusions, thoughts, and inputs upon which I have arrived at the end of this research process.

This paper is thus a uniquely woven blend of scholarly literature, the voices of several experts at several institutions, and my own voice as a student who will ultimately find herself utilizing the programs and curricula under study. It is my hope that the results of this distinctive and comprehensive approach will prove useful to other medical school applicants, to current medical school students, to educators and administrators at medical schools, and to anyone who

seeks to better understand the landscape of medical humanities education in Texas medical schools. I aim for the contents of this paper to be of help in deciding where to apply and attend, creating or improving programs and curricula, seeking collaboration between schools, advocating for the inclusion of medical humanities in medical education, and in a number of other ways. I especially believe that equipping medical school applicants with the knowledge contained in this paper is of the utmost importance. The more that applicants who value medical humanities are informed about the different offerings of schools in Texas, the more they are enabled to prioritize applying to and attending schools who excel in this area. The more that this occurs, the more these schools will hopefully wish to strengthen their medical humanities offerings in order to rise above other schools and appeal to these well-informed, selective students, therefore increasing the commitment to medical humanities in medical schools across the state.

Background

What Medical Humanities Is & What It Is Not

Medical humanities is defined by Felice Aull, founding editor of the Literature, Arts, and Medicine Database, as an interdisciplinary field of study including "humanities (literature, philosophy, ethics, history and religion), social science (anthropology, cultural studies, psychology, sociology), and the arts (literature, theater, film, multimedia and visual arts) and their application to healthcare education and practice" (Aull, n.d., para. 2). Each of these disciplines within medical humanities offers something uniquely valuable to medicine and healthcare. Good, humane medicine cannot be practiced without an understanding of what it means to be human, to suffer, to be sick, and to care for another. Socially- and culturally-

sensitive medicine cannot be practiced without an appreciation for the ways that societal and structural influences impact the human experience, the illness experience, and the healthcare experience. Kind and compassionate medicine cannot be practiced without robust and finely-tuned skills in empathy, reflection, analysis, and observation (Aull, n.d.). Medical humanities, as this paper will illustrate, offers a way to unlock these precious, complex, but nevertheless vital insights that healers, healthcare practitioners, and healthcare trainees must reckon with and grow to treasure.

The concept and field of medical humanities have existed for decades, with origins as early as the 1960s, and have gained traction in medical education since that time (Evans & Greaves, 2010). More recently though, the idea of "health humanities" has also come about for several reasons. To begin with, there are many healers and practitioners of healthcare who do not hold medical doctorate degrees but are nonetheless important and influential when it comes to human health. The term medical humanities does not represent interprofessional inclusion of nurses, dentists, pharmacists, physical and occupational therapists, mental health professionals, and the countless other professionals whose valuable contributions to health could benefit from the humanities (Jones et al., 2017). Moreover, medicine and medical intervention have been shown to make up only a small proportion of health determinants when compared to factors such as environment, race, class, education, occupation, diet, exercise, and more. (Goldberg et al., 2014). There are boundless aspects of *health* that are beyond the system of health*care*. Additionally, there are plenty of people whose *health* matters but who have been marginalized or excluded from the system of health*care*. A proposed shift from a field of medical humanities to a field of health humanities is meant to foster inclusivity and reflect the overall goal of bettering human health and well-being, rather than just medicine (Jones et al., 2017).

That being said, those advocating for the shift towards health humanities acknowledge that use of the term medical humanities remains appropriate when discussing academic work and education done within medical schools that highlight intersections between the traditional humanities disciplines and the truly medical (Jones et al., 2017). Most medical schools in Texas and the nation at large that offer programs or courses relating to the humanities refer to them under titles of "medical humanities". For these reasons, although I could foresee and would encourage a transition towards the term health humanities in these cases, this paper that primarily concerns medical schools will henceforth refer mostly to medical humanities. This should not, however, cloud the importance of the principles behind the idea of health humanities.

Another important element to consider when trying to define and conceptualize medical humanities is its disciplinary position. For many, the entire point of the field is that it is neither a subcategory within medicine nor a subcategory within the humanities, but rather a "novel interdisciplinary perspective" through which to view health and healthcare (Evans & Greaves, 2010). However, for others, especially academics and administrators, the idea that medical humanities does not and should not fit neatly into a discipline or department creates discomfort and skepticism (Evans & Greaves, 2010). These differing views about whether the nature of the field should be additive, as a new medical subdiscipline, or integrated, as a new mindset and approach, have contributed to the fragmentation in its educational application (Evans & Greaves, 2010). Although it is challenging to pinpoint the exact way that medical humanities fits into a larger disciplinary scheme, if one considers again the health humanities, this relationship becomes more clear. Health humanities, which promotes general human well-being, cannot function as a purely medical subdiscipline or a supplement to the health sciences. Instead, it encompasses a new approach to the health sciences that must be understood as complementary

to, simultaneous with, and integrated among them. For these reasons, this paper also refers to "medical humanities" as a singular entity, one comprehensive field, rather than speaking of "the medical humanities" as a collection of plural and separate disciplines.

Another commonly debated facet of medical humanities is its relationship to the field of biomedical ethics. There is much confusion and variety of thought surrounding whether the two are inextricably linked and whether either is a subdivision of the other. Many medical schools in Texas and the nation that offer programs or courses in either one title them in ways that reference both. For example, the University of Texas Medical School at Houston (McGovern) offers a certificate in "Medical Humanities and Ethics" (Erwin, 2014). The University of Texas School of Medicine at San Antonio (Long) has a "Center for Medical Humanities and Ethics" (Jones & Verghese, 2003). The Stanford University Medical School (Stanford) offers a scholarly concentration in "Biomedical Ethics & Medical Humanities" (Liu et al. 2018). The list goes on. However, while it is convenient to conflate the two and house them together, they have noteworthy and possibly even incompatible differences that warrant their separate consideration.

Namely, the processes and emphases of the two differ in nature, and they foster "distinctly different ways of analyzing information, viewing the world, confronting dilemmas, and teaching students" (Friedman, 2002, p. 321). Bioethics, as taught in medical training, focuses on rules, principles, and stringent processes for resolving challenging ambiguity (Friedman, 2002). Medical humanities, on the other hand, embraces ambiguity, celebrates nuance, centers the affective, and promotes complex analysis and reflection (Friedman, 2002). Because of this, medical humanities scholar Friedman (2002) argues that although both offer invaluable insights, skills, and perspectives to medical trainees, neither can replace or emulate what the other does, and the conflation of the two should be avoided.

These debates and points of contention that continue to unfold today can be traced back clearly to the historical context of how the medical humanities came to be. While questions of definition and scope continue, for the purpose of this study, Aull's inclusive definition of medical humanities offers a starting point from which it is possible to begin examining the field.

Historical Context

Medical humanities arose in large part as a call for reunification between the scientific and the human. In the first half of the 20th century, medicine and medical education were characterized by the use of scientifically-informed judgement as the primary mode of delivering care, while a more holistic view of patients as people was not often considered (Cook, 2010). At the same time, in a wider view, the worlds of science and humanities had become so disjointed, out of touch, and sometimes even oppositional that they came to be described in the intellectual sphere as two entirely distinct cultures (Snow, 1962).

A response to this only began to take form in the late 1950s, and the term "medical humanities" came about in the 1960s (Cook, 2010; Evans & Greaves, 2010). At that time, despite the call for broad education in medical humanities at large, academic and educational disciplinarity prevailed with the categories of medical history, medical ethics, and medical literature, of which the former two emerged most strongly (Cook, 2010). History and ethics rose to prominence in medical importance in the 1960s and 70s as events such as the Nuremberg Trials, the closing of the Tuskegee syphilis study, and the mandate for institutional review boards (IRBs) displayed the need for them (Cook, 2010). Literature became more present when the University of Texas Medical Branch at Galveston (UTMB) founded its Institute for the Medical Humanities in June of 1973. One of the first of its kind, the Institute pioneered work in literature and medicine along with narrative medicine, focused on the stories of practitioners and patients

(Cook, 2010; Hudson Jones & Carson, 2003). The Institute even sponsored a journal titled *Literature and Medicine*, which began publication in 1982 (Cook, 2010).

The birth of the journal *Medical Humanities* in 2000 also marks a particularly noteworthy moment in the history of the field. This journal came about due to a disquietude over the deficiencies in healthcare and healthcare training that healthcare professionals, academics, and invested laypeople shared (Evans & Greaves, 2010). The journal was crafted as an arm of the pre-existing *Journal of Medical Ethics*, since medical ethics was the recognized discipline under which medical humanities could house itself at the time (Evans & Greaves, 2010). The *Medical Humanities* journal provided both a flow of important academic papers advancing the credibility of the field and a space for the diverse set of interested parties to dialogue (Evans & Greaves, 2010).

However, despite these apparent advances and movement towards legitimacy as a field, medical humanities continued to struggle in both academics and education. Without an academic association under which to group, sufficient funding with which to conduct research, large-scale conferences at which to gather and share ideas, or graduate programs to produce new scholars, academics remained somewhat lost (Cook, 2010). Additionally, despite an increased acceptance of humanism in medical education in the 1980s, educators and administrators seeking to implement medical humanities came up against already packed curricula, students discontent to spend time on a subject that would not help them earn better exam scores, and an inability to afford faculty appointments in the field (Cook, 2010). These conditions varied from institution to institution, and despite effort over more than five decades, medical humanities education is still colored by a lack of coherence and consensus surrounding its content, objectives, methods, and implementation (Cook, 2010).

Present State

Whereas in 1972, only 11 programs taught human values in medicine, as of 2017, 60% of medical schools included humanities courses with some offering concentrations, certificates, or minors (Jones et al., 2017; Wershof Schwartz et al., 2009). Furthermore, while the first graduate program in medical humanities began at UTMB's Institute for the Medical Humanities in 1973, as of 2017, almost 50 undergraduate programs in the field existed, and graduate programs were increasing (Jones et al., 2017). However, these programs still vary from each other wildly, and the disparate heterogeneity makes them difficult to compare. This variety stems partially from historical roots and partially from the challenging nature of evaluating these programs. Measuring their effects in and of itself is challenging, and understanding how and why those effects were created is even more so (Wershof Schwartz et al., 2009). As such, no single best practice for medical humanities education can be identified (Wershof Schwartz et al., 2009).

Challenges of Evaluation

Many of the benefits of medical humanities education are inherently challenging or impossible to measure. Affective and personal qualities like empathy, self-care, and professionalism are hard to define, let alone quantify. Other outcomes are more cognitive, like complex thinking, perspective-taking, and understanding of the human condition, which prove no easier task. Longer-term effects such as impact on clinical practice and diagnosis are difficult to collect data on because medical training takes place over such a long time and across so many different stages and institutions. These effects are also extremely hard to pinpoint as being the result of any specific medical humanities instruction. Even when measurements of these outcomes can be collected, there are a great deal of circumstances that threaten the validity and

power of those data. Take for example, one of the most commonly gathered types of information in this realm, data collected among a group of medical students at a particular medical school who received particular medical humanities instruction. These data will be impacted by myriad confounding variables like gender, age, years of medical school, prior work and educational experience, and varying degrees of prior experience with humanities, each of which may independently influence what results they demonstrate (Wershof Schwartz et al., 2009).

Additionally, these data most likely would have come from students in a non-mandatory course, so there would be no way to determine the direction of causality of the results. For example, it could not be determined whether the course caused increased empathy or whether students with greater naturally empathetic tendencies were simply more likely to choose to engage with medical humanities and the course (Wershof Schwartz et al., 2009). These data also would have come from students who were all enrolled at the same educational institution, which likely holds its own biases as far as recruitment, admissions, and values communicated in education up to that point (Wershof Schwartz et al., 2009). This is especially notable for the clerkship phase of medical school, during which students are rotating through different clinical specialties within hospitals and clinics, under the supervision of an attending physician. Different students will rotate through different specialties at different times, in different orders, and under different attendings. The way that the doctors under whom different students rotate model humanism may influence students' humanistic outlooks and habits along with their interest and affinity for medical humanities, thus altering the assessment results of any humanities programs in which they may participate.

These barriers to collecting and analyzing meaningful evidence about medical humanities education make it challenging to unify the landscape of its implementation. However, the fact

that impact is difficult to measure should not lead to the conclusion that medical humanities lacks value. On the contrary, medical humanities holds rich, multi-faceted value in both medical education and practice.

Value of the Medical Humanities

Each of us has likely had an experience with a healthcare provider at some point or another, and each of us has probably come away from that experience with a sense of how we felt about it. Perhaps you were given good news or quality care and felt relief, gratitude, or joy. Perhaps you were given bad news or unsatisfactory care and felt disappointment, anger, or disbelief. Our ability to navigate these highly emotional, human experiences depends greatly on the partnership with which we walk through them. Your doctor is your partner and teammate in that experience, and the extent to which they are prepared to welcome, honor, and reciprocate your emotions and your humanity in the encounter plays an essential role in the feeling you have when you walk away from it. This partnership, the doctor-patient relationship, is at the heart of quality care. Not only do good doctors need to deliver effective treatment, but they also need to truly see people, hear them, and understand them, while helping patients to know and trust that they are doing so.

However, medical school education tends to emphasize the physiological role of a doctor to treat and cure diseases and pathologies, rather than the humanistic role of a healer to relieve the existential suffering of people. Medical school curricula must dedicate such extensive time and space to the explanation of disease that it is easy to lose track of the most crucial fact: diseases do not suffer; people do. Despite this fundamental truth, medical education often encourages students to respond to suffering with objective detachment as a means of protecting

themselves from emotional overwhelm and protecting the patient from subjective or emotionally-influenced treatment decisions, as physician-poet Coulehan (2009) explains. This approach to the doctor-patient relationship is termed “detached concern” (Coulehan, 2009). Medical humanities, Coulehan (2009) describes, brings forth the idea that healers should instead enter into truly caring relationships with patients as whole people, bringing their own personal beliefs and experiences of suffering to the table. This approach to the doctor-patient relationship is referred to as “compassionate solidarity” (Coulehan, 2009). Coulehan (2009) argues that regardless of the medical interventions utilized, bonds of compassionate solidarity between doctors and their patients are therapeutic in and of themselves. They also center the patient rather than the disease and enable physicians to better understand patients, thus making those healers better equipped to care for patients in all aspects (Coulehan, 2009).

There are crucial qualities and skills that doctors must develop to enact the compassionate solidarity approach well, such as empathy, observation, attunement, and perspective-taking. There are also underlying mindsets that prepare doctors well to hone these skills necessary for the doctor-patient relationship to thrive. As such, physicians must come to hold an understanding of the human condition, the ability to think complexly and deeply, and a knowledge of who a doctor is as a professional. Additionally, doctors must maintain a healthy inner- and outer-self in order to be fully present in the doctor-patient relationship. This means taking care of themselves internally and externally, being careful not to become overwhelmed by the high stress of the profession, and reflecting upon themselves and their work often. Medical humanities lends itself to the cultivation of each of these skills, mindsets, and practices in important and unique ways.

Relevance to Personal Qualities, Well-Being, and Burnout

Empathy

Empathy is defined in the Merriam Webster online dictionary as "the action of understanding, being aware of, being sensitive to, and vicariously experiencing the feelings, thoughts, and experience of another of either the past or present without having the feelings, thoughts, and experience fully communicated in an objectively explicit manner" ("Empathy"). Empathy is imperative to every aspect of the clinical encounter and the healer-patient relationship. A healthcare practitioner must be able to understand and feel the pains of their patients, grasp and honor the contexts from which they stem, and know and relate to the human individuals in whom they manifest. Without this ability, healthy and successful healer-patient relationships will struggle to flourish, and clinical care will fail to realize its potential. When physicians do exhibit empathy, healthcare interactions are better off in a plethora of ways; empathic physicians diagnose more accurately, and the patients of empathic physicians are more satisfied, more enabled, and more vocal about their symptoms and concerns (Neumann et al., 2011). They also receive more information, participate more, comply better, have reduced distress, and have increased quality of life (Neumann et al., 2011).

Although most people recognize empathy as an important part of doctoring and a desirable quality in a physician, empathy is also commonly thought of as an innate personal quality that cannot be taught or learned. How do you teach someone to understand others, to feel what they feel, to see as they see? It may feel like an impossible task. Yet, there are other professions in which mastery of learned empathy is required to thrive. One such field is theatre. In order to convincingly play the role of another person, one must deeply understand that character's perspective. Additionally, to successfully play out a scenario alongside other actors

requires well-practiced empathic attunement to pick up on the subtle cues of other actors, such as tone of voice, body language, and emotional level (Dow et al., 2007). This closely mimics how a physician must recognize these cues in patients and swiftly judge how to empathically respond (Dow et al., 2007).

Actors carefully train in these abilities and become better at them with practice, which suggests that healthcare students can do so as well. In fact, healthcare students often use theatrical role-playing situations to learn how to interact with patients. One shining example of this is the objective structured clinical examination (OSCE) in the United States Medical Licensing Exam (USMLE), in which medical students are graded on their interactions with a series of several simulated patients played by actors (Dow et al., 2007). Research has shown that medical residents given a course in theatrical education show increased empathy in clinical encounters relative to both their own initial baselines and a control group who did not receive instruction (Dow et al., 2007). While this shows the value and utility of one particular humanities discipline in the development of empathy, there is also evidence that more broad-based medical humanities education promotes empathy in students, which a study by Graham et al. (2016) exemplifies.

One of the downfalls of medical education is that it has been shown to actually decrease students' levels of empathy despite the fact that it aims to cultivate empathic physicians (Neumann et al., 2011). This is in part due to the stress of medical education and in part due to the emphasis on detached concern. Medical humanities education has been investigated as a method of ameliorating this empathy decline (Graham et al., 2016). In a study published in *The American Journal of Medicine* in 2016, empathy scores were measured before and after a medical humanities elective using the Jefferson Scale of Empathy Student Version (JSE-S)

(Graham et al., 2016). Among students who did not take the elective, 71% showed JSE-S scores that decreased or stayed the same, while only 46% of students who took the elective showed unchanged or lowered scores (Graham et al., 2016). In another study published in the *Journal of General Internal Medicine* in 2018, Mangione et al. showed that increased exposure to the humanities correlated with an increase in empathy. As such, increased inclusion of quality medical humanities education in medical training is likely to lead to a more empathic field of physicians and therefore a happier and healthier population of patients.

Burnout

Another well-known flaw of both medical education and the medical profession itself are their generation of high rates of burnout. Burnout is a term describing a state of physical and emotional unwellness along with lack of purpose or motivation due to exhaustion and prolonged stress (Dyrbye et al., 2008; Mangione et al., 2018). Medical students are asked to learn extremely large volumes of information very quickly during the didactic portion of medical school and then constantly put up against challenging exams on that information. When they reach the clinical portion of school, they are asked to put in long hours of stressful work seeing patients over whom they have very little control. They are often lacking in adequate sleep, nutrition, exercise, and restorative free time.

Worldwide estimates of burnout prevalence among medical students are as high as 44.2%, and U.S. estimates are as high as 49.6% (Frajerman et al., 2019; Dyrbye et al., 2008). In a recent study at Oregon Health & Science University School of Medicine, it was shown that the physical and emotional well-being of medical students was highest at baseline, before classes even began, and lower at every point of medical school from there on out (McKerrow et al., 2020). The heightened levels of depression, anxiety, and burnout that medical students show as

soon as the first year of school can have consequences that are serious and irreversible (McKerrow et al., 2020).

Due in part to immense stress and the burnout it causes, medical trainees show increased cellular aging as indicated by a shortening of their telomeres, the protective caps on the ends of DNA that protect it from damage, at six times the normal rate (Ridout et al., 2019). Physicians are also more likely than any other type of professional to commit suicide, and prevalence of suicidal ideation among medical students has been shown to be greater than 10% (Agerbo, et al., 2007; Dyrbye et al., 2008). These facts are alarming but perhaps not all that surprising when one considers the intensity of medical training and practice.

However, medical humanities has been shown to help prevent and reduce burnout among medical students. Mangione et al. (2018) showed through a survey across five different medical schools that increased humanities exposure in students was positively correlated with prevention of burnout and negatively correlated with physical fatigue, emotional exhaustion, and cognitive weariness. This suggests that increased inclusion of quality medical humanities education in medical training is likely to increase the well-being of students while protecting them from the dangerous, life-altering, and life-threatening effects of burnout. The study does not explicitly attempt to explain how medical humanities education causes prevention or reduction of burnout. However, one can imagine that human-centered learning could renew students' senses of purpose and meaning, that the non-pressured and open environment of medical humanities education could relieve stress and combat exhaustion, and that the opportunity to express and receive vulnerability could promote psychological and emotional wellness.

Tolerance of Uncertainty & Ambiguity

Healthcare is a field in which every action is impacted by numerous variables and countless unknowns. Researchers like Hillen et al. (2017), who study tolerance of uncertainty, have discussed how it is often impossible for a healthcare provider to know whether a patient will develop a certain condition or symptom, the reasoning behind why a patient develops a condition, whether that condition will worsen or evolve, and how it will respond to treatments. As much as physicians try to give patients the best care that they can, it is often impossible to know whether they are giving patients the *best* care or the *right* care under the exactly right conditions (Hillen et al., 2017). When dealing with the well-being and lives of others, it can feel as though there should be no room for error and no place for uncertainty. Most patients want to know that the doctor caring for them feels confident that they are making the right choices, and most patients would feel uneasy to hear that their doctor was overwhelmed by the uncertainty of their choices. However, elimination of uncertainty is not an option in a field where so many of the important factors are simply out of physicians' hands.

As such, it is important to understand the effects that uncertainty has in medicine. Hillen et al. framed a model for studying uncertainty tolerance in 2017, in which they define it as "the set of negative and positive psychological responses—cognitive, emotional and behavioral—provoked by the conscious awareness of ignorance about particular aspects of the world." They also define the related term ambiguity as a "lack of reliable, credible or adequate information" (Hillen et al., 2017). Because the uncertainty that arises from ambiguity is an unchangeable and unavoidable fixture of medicine, if medical students do not learn to tolerate it, then they may easily become consumed by its influence, making themselves susceptible to "fear, worry and anxiety, perceptions of vulnerability, and avoidance of decision-making" (Hillen et al., 2017).

Hillen et al. (2017), call attention to the fact that differences in the ability of healthcare providers to tolerate uncertainty can thus impact their ability to foster a healthy doctor-patient relationship, communicate with patients, and include them in shared decision making. The researchers state that this, in turn, can impact both the quality of healthcare given and the resulting health outcomes (Hillen et al., 2017).

In addition to the impact of uncertainty on healthcare delivery, quality, and results, a systematic literature review published this year (2020) in the journal *Medical Education* by Hancock and Mattick shows an apparent association between the ability of medical students and doctors to tolerate ambiguity or uncertainty and their psychological well-being. Medical students and doctors who are less able to cope with the uncertainty and ambiguity inherent to the study and practice of medicine score more poorly on measures of elements of psychological well-being such as stress, burnout, depression, reduced quality of life, and psychiatric morbidity (Hancock & Mattick, 2020). Hancock's and Mattick's (2020) review is new and based upon studies that vary in the definitions, framings, and measurement-tools used in regards to uncertainty, ambiguity, and psychological well-being, so the strength and causality of the association cannot yet be determined. Nonetheless, the existence of a link between the two suggests the importance of ensuring that medical students are well-equipped to tolerate uncertainty and ambiguity in protection of their well-being.

It would therefore make sense for medical schools to include programs, activities, and courses in their curricula that help to cultivate tolerance of uncertainty and ambiguity, which Mangione et al. (2018) have shown to be the case of medical humanities. In their multi-institution survey study, they found that medical students' exposure to the humanities both significantly predicted and was strongly positively correlated with tolerance for ambiguity; it was

in fact the variable most significantly predicted by humanities exposure out of all 10 personal qualities explored in the study (Mangione et al., 2018). These results suggest that the integration of medical humanities into medical education is both desirable and important, as it can increase tolerance for ambiguity and therefore positively impact the well-being of students and the way that they will eventually care for patients. The study does not explicitly attempt to explain how medical humanities education contributes to tolerance of ambiguity, but one can imagine the link between this phenomenon and medical humanities' embracement of nuance, complexity, and uncertainty.

Self-Care & Reflective Practices

In order for medical students and medical professionals to cope with the potentially overwhelming uncertainty in their lives and careers, they may spend time considering and accepting it. To avoid burnout, they may maintain a sense of purpose and positivity in their work that drives them to continue pursuing it. Additionally, in order for students and professionals to receive patients as whole human individuals, they must nourish themselves as whole human individuals as well. This means that medical trainees and practitioners must cultivate good mindsets and habits of self-care and reflection. Well-maintained self-care allows students and physicians to walk through their journeys in medicine without losing pieces of themselves along the way. It promotes good work-life balance, wellness, and meaning-making, which are all critical to preventing burnout and supporting the best self. Well-developed reflective mindsets and habits allow doctors and trainees to nonjudgmentally investigate themselves and their work, becoming aware of how each impacts the other and noticing the strengths and weaknesses in both. This enhances the ability to appreciate and find motivation in the positive, joy-producing

aspects of medicine and the self while also building the ability to accept and improve upon the weaker or more challenging aspects.

Medical humanities education for medical students has been shown to promote these mindsets and skills. In 2018, a study by Liu et al. was published in *BMC Medical Education* investigating the pre- and post-graduation impact of the biomedical ethics and medical humanities (BEMH) scholarly concentration (SC) at Stanford University School of Medicine; as the first study of its kind, this work led to many new and important conclusions. One of these was the success of the BEMH SC at encouraging and developing self-care and reflective practices in medical students (Liu et al., 2018). Students interviewed as part of the study explained how the core curricular, extracurricular, and self-directed scholarly project pieces of the BEMH SC led them to cultivate these practices through several means (Liu et al., 2018). Some of these included the flexibility to explore their own personal interests, the requirement of specific activities such as reflective writing and narrative production, the general adaptation of humanistic perspectives like life balance and meaning-making, and the creation of a welcoming, nurturing, safe, and supportive home environment (Liu et al., 2018).

Furthermore, in enacting the compassionate solidarity approach to the doctor-patient relationship, a medical student or practitioner rejects the kind of detachment that removes their own past and present experiences of suffering from patient encounters. As such, it is important for the providing individual to self-reflect and build an understanding of the personal story that they carry into the room. One reason this has not been encouraged highly before is that setting detached distance between the patient's suffering and the healer's response to it has been thought to prevent doctors from becoming flooded by the overwhelming amount of suffering they witness every day (Coulehan, 2009). In knocking down the self-protective wall of detachment, it

seems that students or physicians may make themselves vulnerable to the dangers of depressive feelings and burnout (Coulehan, 2009). However, through self-care and reflective practices that create self-comfort and self-awareness, providers can come to accept, understand, and work through their own experiences, mindsets, emotions, and beliefs (Coulehan, 2009). Not only is this a much healthier strategy for prevention of burnout than emotional avoidance, but it also makes the healer even more able and likely to understand, connect with, and respond tenderly to the experiences of patients. This creates reciprocity in the doctor-patient relationship that can lead to mutual therapeutic healing of both the patient and provider.

When considering the value of self-care and reflective practices to the compassionate solidarity approach, it is important to note that many of the prominent figures explaining, writing about, and advocating for the approach are also asserting that medical humanities is the key to understanding and implementing it. Physician-poet Jack Coulehan's (2009) article on the subject says that "Reading and writing poetry, along with other imaginative writing, may help physicians and other health professionals grow in self-awareness and gain deeper understanding of suffering, empathy, compassion, solidarity, and symbolic healing" (p. 601). Rita Charon (2001), a medical humanities academic who helped pioneer narrative medicine, published an article in the *Journal of the American Medical Association* in which she argues that:

> Adopting methods such as close reading of literature and reflective writing allows narrative medicine to examine and illuminate four of medicine's central narrative situations… With narrative competence, physicians can reach and join their patients in illness, recognize their own personal journeys through medicine, acknowledge kinship with and duties toward other health care professionals, and inaugurate consequential discourse with the public about health care. (p. 1897)

These important, trail-blazing individuals explain that medical humanities leads to a richness of self-care and reflective practices that enable doctors to build the ability to manifest compassionate solidarity. Even more importantly though, they also assert that medical humanities is one of the most powerful tools a doctor can hold on the life-long journey towards the best caregiving. These experts make it clear that nearly no dimension of doctoring is left untouched by the profoundly positive influence of engaging with medical humanities.

Relevance to Learning

Complex & Deep Thinking

Medical education often emphasizes the passive and rote memorization of facts without substantial engagement of active, complex, and critical thinking. However, the practice of medicine requires critical analysis of complex situations and circumstances that are often ambiguous and nuanced. The ability to think critically is shown to relate to many aspects of medical practice, including how a practitioner or trainee gathers data, synthesizes information, and makes decisions (Krupat et al., 2011). Because medical humanities also often consists of nuanced and complex elements without clear right answers, or answers at all, it offers a unique opportunity to learn the thinking skills necessary to cope with and thrive in these types of scenarios.

Medical humanities offers up the idea that there are many ways of thinking, understanding, and knowing beyond just the logical and scientific approach (Chiavaroli, 2016). Chiavaroli (2016) argues that there are also personal, ethical, and social ways of thinking and knowing that incorporate experience, context, and intuition. They describe medicine and its practice as “rational but interpretive, partly predictable yet fundamentally uncertain, and logical but also intuitive” and argue that medical humanities offers a way to cultivate those multifaceted

ways of thinking. Similarly, Eichbaum (2014) argues that the base of medical knowledge has surpassed what any human brain can fully learn and that, as such, medical education must shift its strategy away from one primarily based upon memorization. Instead it should adopt a strategy in which medical humanities integrated with basic and clinical science to promote critical thinking and shape students into more "flexible thinkers and agile learners so they can adeptly deal with new knowledge, complexity, and uncertainty in a rapidly changing world" (Eichbaum, 2014).

Additionally, several types of specific medical humanities education and activities have been shown to enhance critical thinking skills. Liao and Wang (2016) investigated through an educational intervention how medical humanities literature study could promote skills of interpretation, critical thinking, and analysis. They found that medical humanities study of literature can strengthen critical thinking dispositions, especially through reflective writing, and especially in student groups with rich diversity (Liao & Wang, 2016). They measured this using a critical thinking disposition assessment (CTDA-R) that they and others previously developed specifically for medical professionals (Yuan et al., 2014). In 2019, Kim illustrated the ability of medical humanities education in literature and film to improve students' critical thinking dispositions, as measured with Yoon's Critical Thinking Disposition Instrument (YCTDI).

Professionalism & Professional Identity Formation

As medicine, its practice, and its environment shifted in the late 20th and early 21st centuries, there has been as increasing call for understanding, teaching, and exhibiting medical professionalism on the parts of medical regulators, physicians, educators, and researchers. (Meakin, 2007). This has been due in part to the vast number of new medical interventions, an aging population, the rise of chronic health conditions, limited financial resources, the societal

emphasis on individualism and autonomy, the accessibility of medical information through media and the internet, and some particularly prominent cases that have decreased public trust in health professionals (Meakin, 2007). Not long after medical education and practice raised the priority of professionalism, a national panel was configured to critically examine the goals, roles, and integrations of medical humanities and ethics in medical education (Doukas et al., 2012). The Project to Rebalance and Integrate Medical Education (PRIME) investigators panel consisted of experts from across the United States who taught in and contributed significantly to the fields of medical humanities and ethics, and among them was Dr. Howard Brody, the director at the time of the Institute for the Medical Humanities at UT Medical Branch in Galveston, Texas (Doukas et al., 2012).

In their first convening (PRIME I) in May 2010, the investigators determined that the primary goal of ethics and humanities in medical education is "to promote humanistic skills and professional conduct in physicians," and that education in ethics and medical humanities "is essential for professional development in medicine" (Doukas et al., 2012). They explain their reasoning for these conclusions in two ways. First, education in medical humanities and ethics help develop the knowledge and skills that medical professionalism requires (Doukas et al., 2012). The investigators found that activities like "visual observation, textual reading and interpretation, oral reasoning and writing," as accomplished through mediums including visual art, art history, creative literature, medical ethics, and history of medicine, promote the development of discernment, reasoning, and judgement that support professionalism in medicine (Doukas et al., 2012). Second, education in medical humanities and ethics help medical students develop the ability to critically analyze the profession of medicine, its goals, its relationships, its connection to society, and how flaws in these areas can be addressed and improved (Doukas et

al., 2012). Without the analytical decision-making, critical self-reflection, and critical thinking skills that medical humanities and ethics provide, the investigators do not think professionalism can be adequately taught or learned (Doukas et al., 2012).

In a second convening (PRIME II) in May 2011, the original expert investigators were joined by members of national accrediting and standard-setting organizations, including the American Association of Medical Colleges (AAMC), Accreditation Council for Graduate Medical Education (ACGME), and Liaison Committee on Medical Education (LCME) (Doukas et al., 2013). In discussing the future of medical humanities and ethics education within medical education, its possible challenges, and proactive responses, the group again agreed that "medical ethics and humanities pedagogy is fundamental for the development, implementation, assessment, and continuous improvement of professional formation" (Doukas et al., 2013). They emphasize that professionalism requires more than just the acquisition of knowledge and skills; it must include the development of professional attitudes, mindsets, and patient-centered values, which take students beyond *knowing* how to be professional towards actually *being* a professional (Doukas et al., 2013). They then argue that the explicit inclusion of medical humanities and ethics teaching longitudinally throughout all of medical education leads to increased ability in "observation, introspection, reflection, and critical thinking," shaping students into eventual healthcare professionals who are more caring, more sophisticated, more clinically responsive and insightful to patient suffering, and more selfless in their work towards alleviating that suffering (Doukas et al., 2013).

After both PRIME I and II and an open-invitation PRIME national conference, PRIME leaders published an additional paper which includes an update about national accreditation and standard-setting organizations like the LCME, which added requirements for medical schools. In

accordance with the LCME guidelines initiated, medical schools curricula must contain "behavioral and socioeconomic subjects," including "medical humanities [and] medical ethics" (Doukas et al., 2015). Additionally, LCME accreditation standards mandated that medical schools "must include instruction in medical ethics and human values and require its medical students to exhibit scrupulous ethical principles" (Doukas et al., 2015). Authors against stressed that the formal medical humanities and ethics curricula that instruct on professionalism and fulfill these guidelines should be integrated continuously and longitudinally throughout the preclinical and clinical portions of medical school in a way that builds progressively towards the learning objectives (Doukas et al., 2015).

Doukas et al. (2015) also address some structural challenges such as lack of adequate faculty in these areas, lack of departments to house them, and lack of their ability to participate in curricular governance. They argue that medical schools need a broad base of medical humanities and ethics faculty members with expert-level training in the fields, who have a seat at the table and voice of power when curriculum decisions are made (Doukas et al., 2015). Doukas et al. (2015) also state that meaningful inclusion of effective medical humanities and ethics curricula would be more likely to occur if the fields were given a center, institute, or department under which to group and organize. However, they say that in 2011, only 28 out of all 125 LCME-accredited medical schools (or less than one quarter) possessed a formal department or center in ethics, humanities, or both or had an associate dean position in either or both areas (Doukas et al., 2015).

In the same year that this discussion was occurring nationally, another paper was published detailing a similar one in Texas specifically (Holden et al., 2015). The University of Texas System (UTS) had recently undertaken an initiative called transformation in medical

education (TIME) to streamline medical education, and it created a taskforce specifically to investigate professional identity formation (Holden et al., 2015). Among its members were representatives from four of the medical schools included in the present study, and representing UT Southwestern in particular was Dr. John Sadler, who I interviewed for this study, along with Dr. Angela Mihalic, associate dean for student affairs (Holden et al., 2015).

In contrast to professionalism, which the taskforce found to focus on external behaviors, relationships, and situations, Holden et al. (2015) chose to emphasize professional identity formation (PIF) which they define as "the transformative journey through which one integrates the knowledge, skills, values, and behaviors of a competent, humanistic physician with one's own unique identity and core values." The Holden et al. (2015) taskforce identified 10 characteristics important to PIF, "adaptable, altruistic, curious, empathic, ethical, honest, reflective, responsible, self-aware, and trustworthy," several of which align with the characteristics that medical humanities promotes. They also identified six domains and 30 subdomains to PIF, which they display in a table (Holden et al., 2015).

Domain	Subdomains
Attitudes	• Humanism • Cultural competence • Service orientation
Personal characteristics	• Leadership • Interest and curiosity • Resilience and adaptability • Capacity for improvement • Discernment
Duties and responsibilities	• Confidentiality • Appropriate disclosure • Honoring commitments
Habits	• Self-directed learning • Critical thinking • Self-care • Empathic labor • Reflection • Self-awareness
Relationships	• Collegiality • Appropriate boundaries • Effective relationships • Effective communication • Patient-centered advocacy • Selection of role models
Perception and recognition	• Biostructure and function • Observational skills • Cultural sensitivity • Discernment • Emotional intelligence • Ethics competence • Narrative competence

Figure 1. Professional identity formation domains and subdomains in the TIME initiative professional identity framework (Holden et al, 2015).

From the discussion in this paper so far, it is clear that most of the specified subdomains stand to benefit from medical humanities education. Holden et al. (2015) also emphasize the usefulness of objective structured clinical exams (OSCEs, discussed in the empathy section of this paper) and critical self-reflective writing (like journaling) in both developing and assessing students' progress in the domains and subdomains. Ultimately Holden et al. (2015) conclude that PIF is "critical to the practice of exemplary medicine and the well-being of patients and

physicians," and that training future physicians in this area "demands greater attention to the complex dynamics found in the confluence of the scientific, cultural, humanistic, and social dimensions that constitute medical education, medical practice, and health care delivery."

Outside of national, state, or system-wide groups, several medical humanities scholars have written on the relationship between professionalism, PIF, and the medical humanities educational aspects that support them. Coulehan (2007) discusses the need for "narrative-based professionalism" over "rule-based professionalism," since professionalism is something that must be incorporated into one's own personal story and is influenced by the stories of others. He argues for the use of written and observational professional role models through short stories and film (Coulehan, 2007). Konkin and Suddards (2012) relate PIF to empathy, compassion, and taking responsibility, and they argue that story-telling about their experiences is integral to medical students' development of "a coherent physician story to live by."

Shapiro et al. (2015) discuss the importance of literary close-reading to develop observation, interpretation, and wariness of superficial assumptions, which all help to combat bias, judgmental attitudes, and preconceptions. They find literature to be an "essential element of medical education" whose close-reading can help students embrace nuance and complexity, utilize evidence, find peace with the possible nonexistence of right answers, develop critical thinking, and cultivate moral imagination (Shapiro et al., 2015). Boudreau and Fuks (2014) explain how medical humanities curricula should be longitudinal and integrated within medical education and centered around the idea of a unique professional identity of physicianship and its desired personal qualities and behaviors. If accomplished, this design allows medical humanities to contribute conceptual frameworks, models of health and illness, knowledge of persons and

personhood, understanding of society, and ideas about the physician-patient relationship upon which a physician's professional identity is built (Boudreau & Fuks, 2014).

Viewing all of this together, it appears that there is consensus surrounding this matter at the local, state, and national levels among individuals both within and beyond the field of medical humanities. Interested parties of diverse varieties seem to agree that professionalism and professional identity formation are crucial to the education, study, and practice of medicine and that medical humanities education is extremely valuable, if not vital, to their teaching, learning, and actualization.

Relevance to Clinical Diagnosis & Practice

In addition to strengthening important physician qualities, habits, and mindsets, medical humanities can play an important role in bettering the actual clinical portion of medical practice and diagnosis. Physicians who are more attuned, empathic, and reflective are more likely to understand and connect with their patients, therefore making patients more likely to share important information and physicians more likely to notice and consider that information. These factors can lead to more accurate diagnosis and treatment. Physicians who are motivated and personally well are likely less prone to careless mistakes. However, beyond these influences, medical humanities can play an even more direct role in improvement of diagnosis and care.

In 1982, an article by Stephen M. Sonnenberg was published in *Psychiatric Services* explaining how he had come to realize that post-traumatic stress disorder (PTSD) was a real and serious problem. At the time, PTSD was a greatly disputed diagnosis, and many healthcare professionals were skeptical of its existence. In this piece, Sonnenberg (1982) describes an encounter that he has had with an observer of the human condition. He says that this observer, who shares no cultural influence with the article's readers, describes PTSD in great detail

through a particular subject whose mother hastily remarries to his uncle after the death of his father (Sonnenberg, 1982). Description of the subject's symptoms and disease progression follows, and at the end of the piece, Sonnenberg (1982) reveals that the observer is Shakespeare, the subject is Hamlet, and the encounter was watching a performance of the play. This encounter with a work of humanities impacted Sonnenberg so profoundly that it convinced him of the existence, validity, and seriousness of PTSD, which he would go on to incorporate into his own practice.

In a later essay published in 2010 and presented at the International Conference on The Psychoanalytic Therapy of Severe Disturbance in 2008, Sonnenberg describes another similar situation. This time, he explains how his engagement with Sir Arthur Conan Doyle's writings on Sherlock Holmes led him to greater understanding of addiction and what it looks like in a high functioning addict (Sonnenberg, 2010). He even remarks that he had been treating individuals whom he could now identify as high functioning addicts despite previously being unaware of their addictions (Sonnenberg, 2010).

In 2011, Sonnenberg published an article in the *Austin-American Statesman* in which he offers up several examples of how the educational interaction between a student and a humanities work can create a better physician. For example, someone who has read the *Iliad* or *Odyssey* will be better equipped to recognize and treat PTSD (Sonnenberg, 2011). Someone who is familiar with Sherlock Holmes is more likely to understand the presentation of addiction in patients who are otherwise high functioning (Sonnenberg, 2011). Someone familiar with Picasso's reconstructions of "Las Meninas" would make a better eye doctor with a firmer grasp on visual experiences (Sonnenberg, 2011). These multiple examples illustrate that the humanities

do more than just increase desirable traits or behaviors in physicians; they can also lead to more accurate and precise clinical diagnosis, treatment, and overall care.

Texas Medical Schools

Understanding the context of medical humanities' historical background, present state, and many valuable contributions to medical education and practice, I set out to explore and document how Texas medical schools are implementing medical humanities and gaining the value that scholarly literature shows it to have. From my own experience researching and applying to medical schools, I knew that school websites alone would be insufficient to gather complete and detailed information about schools' medical humanities opportunities. As such, I attempted to contact key individuals with expertise in medical humanities who carry out meaningful work in the area at Texas medical schools. I was able to interview six experts from four schools, Dell Medical School, McGovern Medical School, Baylor College of Medicine, and University of Texas Southwestern Medical School. Although I was not able to speak with experts from University of Texas Medical Branch or Long School of Medicine, my knowledge of their medical humanities programs from my own application process and from the scholarly literature compelled me to include them regardless.

For each of these six medical schools, I set out to uncover as much as possible about their medical humanities programs and curricula, the purposes and goals that those programs and curricula aim to fulfill, any research or evaluation that has analyzed success in meeting those purposes and goals, and any relevant future directions or plans. I was not able to acquire information in every one of these areas for every school. However, through the meticulous mining of school websites and published literature along with the voices of experts on the ground

at these schools, I was able to create an extensive collection of information that depicts the schools' medical humanities environments in detail. This study was given an exempt determination by the institution review board at the University of Texas at Austin Office of Research Support and Compliance. Schools are listed in the order that most accurately reflects my research and interview chronology.

The University of Texas at Austin Dell Medical School

Dell Medical School (Dell) in Austin, Texas has been part of the University of Texas at Austin (UT) since its inauguration in 2016. It is near to graduating its first class of medical doctors in May of 2020. Uniquely, it is funded in part by property tax revenue from Travis County, in which Austin is located. Dell claims to be particularly focused on the healthcare landscape of the 21st century, with an emphasis on value-based care and community engagement ("Leading EDGE curriculum," n.d.). To learn about Dell Medical School, I interviewed Dr. Phillip J. Barrish, on 10 February, 2020. Barrish is the Tony Hilfer Professor of American and British Literature in UT's English department, as well as Associate Director for Health and Humanities at UT's Humanities Institute. Barrish is known at UT for his involvement in and advocacy for health humanities and narrative medicine. He also holds an appointment in Dell's Department of Medical Education, and he has been working to create a master's degree program in health humanities at UT in partnership with Dell. On 28 February 2020, I also interviewed Dr. Steve Steffensen, associate professor of neurology and population health at Dell who has been a "lifelong advocate for the arts and humanities," and has also worked with Barrish on the plans for the master's program ("Steve Steffensen, M.D.," n.d.).

Programs & Curricula

Because Dell is a new and small school that has not yet graduated its first class, Barrish finds that humanities has not been a top priority for the school's administration and that humanities engagement at Dell currently happens at the periphery of the curriculum in the form of enrichment electives. These are optional, ungraded, non-credit courses on particular topics that supplement the general medical curriculum. They are not required to graduate and span 12 total hours of instructional time with whichever students decide to participate. Barrish teaches an elective titled "Narrative Medicine: Close Reading Expressive Writing," in which meetings take place for two hours every other week, spread across 12 weeks. Other examples of enrichment electives pertaining to medical humanities that Barrish and Steffensen cite include "Medical Anthropology," "Medicinema," which deals with film, and "Humanities, Heart and the Art of Medicine," which holds 12 sessions each one hour in length with a different visitor, including, for instance, a musician, a poet, and Barrish, who performs a narrative medicine workshop.

Steffensen discusses a few other ways that medical humanities are more embedded within the general curriculum. One is through an activity called PILLARS: professionalism, inquiry, learning and leadership through active reasoning and synthesis, which is a required aspect of first-year curriculum that extends across the whole year ("Year 1: Essentials," n.d.). In PILLARS, Steffensen says small groups of first year students are presented with a patient case weekly on Tuesdays and group members divvy up aspects of the case to research on their own before reconvening on Thursdays or Fridays to discuss and teach the case to classmates. According to Steffensen, those PILLARS cases are in the process of being rewritten to include more humanistic and social aspects requiring students to address matters such as payment issues or food-access issues.

Another way that students are required to engage with medical humanities is when individual course instructors or course directors build it into their curricula. For example, Steffensen is the course director for neuroanatomy, and he tries to include humanities in his course extensively. He says that he brings historical artifacts into every class and that in the very first lecture of the course, he includes discussion about racism and literature. He also coordinates an introduction to gross anatomy, a subject that requires viewing the bodies of dissected cadavers. Because Dell has a highly condensed pre-clinical curriculum, neuroanatomy is moved to the beginning of the first year, and Steffensen recognized that it can be hard on students for their first experience with gross anatomy to be viewing the head rather than the chest, torso, or limbs, which other schools more commonly begin with. As such, Steffensen conducts an introduction that discusses death and dying and how to cope with it from a gross anatomy point of view. He has students watch a film called "Donated to Science," which follows the stories of patients who choose to donate their bodies while they are living, dying, being embalmed, arriving at the lab, being used for anatomy, and being celebrated by their loved ones and the students who learned from their bodies. Students then do reflection upon the film.

The other humanities experience that Barrish and Steffensen say is required of medical students at Dell is a program designed by Ray Williams, director of education and academic affairs at the Blanton Museum of Art on the UT campus. The experience is mandatory for all first-year medical students at Dell and involves two-hour sessions in the museum in which Williams and other museum educators have students engage with art in ways that are designed to improve important medical skills such as empathy, observation, collaboration, and self-care. Programs like this one were first enacted by other medical schools, including Yale and Columbia (Mojica Rey, 2017; Williams, 2019).

Plans for Master's Degree Program

Although Dell does not have a robust medical humanities program right now, Barrish and Steffensen have plans that could impact the availability of humanities education to medical students at Dell. Barrish has been working to propose, develop, and begin a master's degree program at UT titled "Humanities, Health, and Medicine." It is designed to be a free-standing 30 credit program (about 10 classes) that is doable in one year if a student works intensively but could also be stretched comfortably across one-and-a-half to two years.

One of the unique characteristics of Dell is that it compresses the didactic, pre-clerkship portion of medical school into one year, whereas other schools typically teach it across one-and-a-half or two years. Because of this, Dell is able to require that third-year medical students take a "growth year," involving nine months of open time to pursue a large research project or a dual degree. Barrish finds that students are encouraged to pursue another degree during this period, with programs existing for them to complete a Master of Education, Master of Public Health, Master of Business Administration, Master of Science in Healthcare Transformation, Master of Arts in Design in Health, or Master of Science in Biomedical Engineering ("Year 3: Growth," n.d.). The master's degree that Barrish is constructing would become another option for third-year Dell medical students to fulfill their growth year requirements while engaging the humanities and developing important clinical skills and perspectives. Because Dell is not in a position to create their own medical humanities unit or department within the medical school, Barrish has found the school very receptive to and interested in the opportunity for partnership in this dual degree option.

As Barrish describes the structure and requirements of the program, most courses needed for the degree will be graduate classes that already exist at UT across various departments with

the only novel class being a required “Introduction to the Health Humanities” course consisting of guest faculty introducing different disciplines in health humanities. Pulling existing courses from many disciplines gives students flexibility along with the opportunity to construct a coherent emphasis to their studies. Students could attain existing UT graduate certificates such as those in disability studies or health communication or they can specialize in whatever interests them, be it health and culture, health and visual arts, or other areas. About three to four courses should contribute to the student’s chosen strand, and about three courses may be entirely free electives. The program will culminate with students taking a research methods course and completing a departmental report, a master’s report, or a master’s thesis.

Purpose & Goals

Barrish’s current goal is to begin recruiting students in 2020 and to launch the program in the Fall 2021 semester, starting off with three to four students and growing in numbers over time. The educational goals of the program are detailed in the objectives that Barrish composed for his program proposal. Because the program is free-standing, and a student does not have to be pursuing a career as a healthcare practitioner to partake, some of the objectives relate to direct patient-care more than others, but most of them are clearly valuable to future healers.

Students who graduate from the program will be able to use the humanities to “deepen their understanding of the illness experience and thereby enhance empathy and human connections, as well as a tolerance for ambiguity” (P. Barrish, personal communication, February 10, 2020). They will also be able to facilitate events, workshops, or curricula that help providers, patients, and others grow in these ways as well. Students will understand “the social, historical, and cultural contexts in which health, illness, and health care occur” (P. Barrish, personal communication, February 10, 2020). They will grasp cultural competence, cultural humility,

structural competence, and the "power dynamics that pervade health care, including but not limited to dynamics of race, gender and sexuality, socio-economic and citizenship status, and ability and disability" (P. Barrish, personal communication, February 10, 2020). Graduates will have knowledge of the role of narrative, issues in bioethics, the theoretical frameworks of many disciplines, and research practices. Together, the program and these objectives will prepare students to "respond to an array of practical and intellectual challenges found in the worlds of health care, academia, government service, advocacy, and others" (P. Barrish, personal communication, February 10, 2020).

Research & Evaluation

When asked about how to measure the program's success in meeting these goals, Barrish said that evaluation is always a challenge in medical humanities due to the difficulty of isolating any one variable and in the humanities at large because they are not often suitable for quantitative models of assessment. What he plans to do initially to gauge the program's success and monitor its progress is to pay close attention to course instructor surveys for all classes. Additionally, Barrish plans to hold more targeted surveys and focus groups with students in the program. Eventually, the goal will be to do more longitudinal assessments with people three to five years past their graduation from the program, seeing what they learned in the degree and how it continues to impact them.

One potential method of assessment that Barrish proposes is providing patient vignettes and asking subsequent questions about what factors would be important to consider when caring for the patient described. Barrish hopes that students' answers to these questions will demonstrate increased understanding of the degree's contents, indicating that they have learned what educators wanted them to. Furthermore, an even more concrete way to demonstrate the

program's success comes in the form of medical school acceptances. Barrish suspects that the program's graduates will be accepted to medical school at higher rates than graduating seniors of UT's undergraduate program and at higher rates than the national average. If the program is able to demonstrate this pattern, then it may illustrate that the program successfully equips students with the tools, skills, and outlooks that medical schools desire and value, which hopefully also correspond to the tools, skills, and outlooks that make for a good healthcare provider. This would not necessarily speak to the success of the program for those free-standing students who are not pursuing careers as healthcare providers, but it would certainly be a helpful metric to signify that the program is operating as intended and having a demonstrable impact on its participants.

As far as the elements of medical humanities already contained in the Dell curriculum, Steffensen says that evaluation is a challenge in this area as well. For one, he knows that any evaluation of the electives involves a huge selection-bias since the students who take the enrichment electives are the ones who already harbor an interest in medical humanities. In the electives, Steffensen says some basic evaluation occurs, but for the most part the directors of the MediCinema elective are doing the best job. They collect student feedback, although it is subjective, and they are trying to develop a more qualitative or quantitative way of telling whether those who have taken the elective succeed better in second-year clinical rotations than students who have not taken it. However, Steffenson notes that Dell's class size is very small and that only three classes of students have been through clinicals so far, so any data that comes out of a measure like this would be very limited in statistical power.

Future

Barrish noted that some peer schools like McGovern, UTMB, and Long have departments, programs, centers, or institutes dedicated to the medical humanities, while Dell

does not. He does not foresee Dell moving in that direction in the foreseeable future. Steffensen explains that what is primarily preventing Dell from adopting that approach is the financial reality of keeping the school afloat and the way that Dell's budget works, which does not allow for much planning or projection into the future. Instead of being a core element of the school, Steffensen sees that medical humanities is and will be dependent upon donors. That being said, Steffensen does say that his ideal scenario, if it were possible, would be to create a physical presence for medical humanities as a permanent fixture of the school and the curriculum through a joint center between Dell and UT's College of Liberal Arts. Ultimately Barrish, Steffensen, and others at UT, including the Humanities Institute, would like to found a Health Humanities Center that might be housed in the College of Liberal Arts but work closely with Dell and the campus's other health-professional schools.

The University of Texas Health Science Center at Houston McGovern Medical School

McGovern Medical School (McGovern) is part of the University of Texas Health Science Center at Houston (UTHealth), which was established in 1972 by the University of Texas System Board of Regents ("About UTHealth," n.d.). It is the seventh largest medical school in the United States ("About Us," n.d.), and it is situated in the heart of the Texas Medical Center (TMC) in Houston, the largest medical center in the world ("About TMC," n.d.). To learn about McGovern, on 6 February 2020 I interviewed Dr. Thomas R. Cole, who is the McGovern Chair in Medical Humanities and the Director of the McGovern Center for Humanities and Ethics at UTHealth. Cole is also a co-author of two groundbreaking texts in the field. The first is a 2015 textbook titled *Medical Humanities: An Introduction*, whose preface begins with the words "This volume represents the first textbook in medical humanities" (Cole, Carlin, & Carson, 2015, p.

ix). It was the first comprehensive resource on medical humanities that both students and teachers could turn to and rely upon to satiate their existing curiosity and supply guided instruction on how to further engage the expansive field. The second is the 2019 book *Teaching Health Humanities*, which is described on the Oxford University Press website as "the only contemporary resource focused specifically on the burgeoning field of health humanities pedagogy" ("Teaching Health Humanities," 2020). His work has helped to progress medical humanities both in Texas and beyond.

Programs & Curricula

McGovern offers a number of scholarly concentration (SC) programs to its medical students in which they can engage in dedicated learning and scholarship on a particular interdisciplinary health topic to supplement their general medical education. These SCs span all four years of medical school and earn students a special distinction on their transcript, in their Dean's letter for residency applications, at graduation, and through a spring banquet of recognition. Participation in a SC is entirely voluntary and in no way a requirement to earn the medical degree, but any student may apply to enter an SC to enhance their education and further their knowledge and experience in an area of interest to them. Cole reports that the medical humanities SC is the largest one at the school, accepting 30 students per class and housing 120 students at a time.

The classes, events, and activities that make up the medical humanities SC are, for the most part Cole says, open to any medical students who would like to attend them, but students intending to complete the SC have specific requirements they must meet regarding these elements. These requirements are varied in nature and balanced in volume. They consist of many different types of commitments from coursework to volunteering to reflective writing to a

research paper. However, Cole emphasizes that the program must strike a very delicate balance between requiring the serious attention of students and not becoming too burdensome on students who are already overwhelmed.

In the first two years, students must take an in-person summer seminar led by McGovern Center for Humanities and Ethics (Center) faculty. The experience is formed around reading and facilitated discussion on humanities and ethics topics. They must also take an "Introduction to Medical Humanities" course which exposes students to many of the disciplines within medical humanities "including history, literature, art history, media studies, philosophy, law, ethics, religion, theology, anthropology, psychology, sociology, and other arts and sciences" ("Introduction to Medical Humanities," n.d.). In addition, they must complete at least one Center-sponsored elective, which include topics such as "Art of Observation, History of Medicine, The Healer's Art, and more" ("Introduction to Medical Humanities," n.d.). Many of these electives are designed and led by faculty, but Cole also says that some are organized by medical students themselves with faculty sponsors for support.

In the third year, when students spend most of their time rotating through the different clinical specialties rather than studying medical theory, they are required to attend a writing workshop and to consistently journal about their experiences in those rotations. Cole believes that this journaling activity is an important part of both personal and professional growth. Students must write three journal entries per five rotations of their choosing for a total of 15 entries, and a faculty mentor will read the journaling and respond ("Medical Humanities Scholarly Concentration Requirements," n.d.; "Program Structure," n.d.). This provides students an open space to discuss and process the various complex situations and emotions that arise in hospitals and clinics when dealing with real, human patients. Cole remarks that by third year,

most students have encountered real suffering, but they have not always considered how that suffering impacted them. The things that they witness and the work that they do can be very emotionally overwhelming, and journaling while being mentored by faculty gives them an opportunity to work that through. Students benefit from having a channel to discuss what is going well in rotations, what is challenging or bothering them, and what is sticking with them in ways they may not have predicted.

In the fourth year, when students are past the majority, if not all, of their rotations, students attend a month-long, intensive capstone seminar course called "Humanistic Elements of Medicine" and then complete a final project related to medical humanities or ethics. Most students will complete a 12-page scholarly research paper in fulfillment of this project, but the option also exists to complete a professional level artistic project ("Scholarly Concentration in Medical Humanities and Ethics," 2019; "Medical Humanities Scholarly Concentration: Final Project," 2019). Students then present on these projects at the annual spring graduation banquet.

Further requirements include four hours of volunteer service by the end of year two and in year three plus attendance at five Center-organized events or activities in each of the later three years. Each year, two of those events must be dinner programs which build community, and the other three are of the students' choosing from among a wide variety of lectures, performances, book clubs, poetry or film nights, ethics grand rounds, and more ("Scholarly Concentration in Medical Humanities and Ethics," 2019). The complete program requirements can be visualized in the following graphic from the Center website ("Medical Humanities Scholarly Concentration Requirements," n.d.).

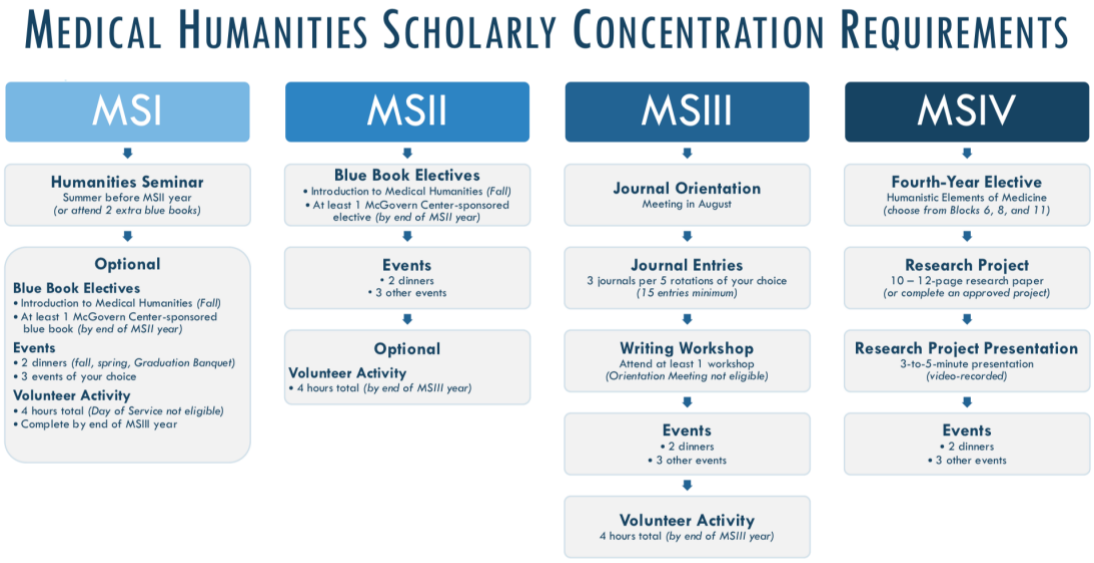

Figure 2. McGovern medical humanities scholarly concentration program requirements ("Medical Humanities Scholarly Concentration Requirements," n.d.).

Outside of the scholarly concentration, which students can elect to pursue and which can only accommodate thirty students per medical school class, there are some ways that medical humanities is embedded within the general medical school curriculum as well. Cole says that all medical students are required to take a mini-course in ethics and professionalism sometime in the first two years. This course is taught in small groups, led primarily by clinicians or basic scientists, and usually organized around ethical issues that arise in patient care at different stages of life. First and second year students also must take a longitudinal course called "Doctoring" that is "designed to teach the knowledge, skills, attitudes, and behaviors fundamental to the empathetic, competent, ethical, inter-professional, and humane physician" ("MS1 Curriculum Descriptions," n.d.). Within the Doctoring course, there are sessions addressing ethics, professionalism, and the responsibilities of students in these areas. These sessions are often taught by Center faculty and aim to help students transition from an undergraduate environment

into the role of a health professional student, a large adjustment accompanied by large responsibilities and expectations.

Moreover, Cole explains that all second-year students are required to participate in an experiential poverty simulator activity. In the activity, each student is assigned a character with a particular background and allotted an amount of money that they must decide how to spend based on the demands of their character. Faculty members play the roles of various people in the lives of the students' characters, such as the grocer, landlord, pawn shop owner, and community doctor. Cole says that he once played the community doctor, and despite a great deal of the students' characters having health concerns, only two to three students got to him because of insufficient money and time. Through the experience of acting out the daily life of a person experiencing poverty, students come to realize that there is simply not enough money for people in poverty to meet all of their immediate needs and still get the healthcare they require. Faculty and students debrief together on the experience of the activity and this vital but disheartening realization. This activity draws upon techniques, content, and views from several arms of medical humanities, including sociology, ethics, and theatre.

Purpose & Goals

On the McGovern website, there are overarching stated goals for all the SCs and posted goals of the medical humanities one specifically. The goals reaching over all of the SCs are broken into two categories, program goals and educational goals ("Scholarly Concentrations Program," n.d.). Program goals include complementing the general curriculum, providing mentorship to students, promoting interdisciplinarity, creating a structured longitudinal experience, and supporting student scholarship ("Scholarly Concentrations Program," n.d.). Educational goals for SC students include gaining expertise in a particular interdisciplinary area

of health, cultivating skills of critical and analytical thinking, communicating better through writing and speaking, becoming a more self-directed learner, and completing an independent scholarly project with a product ("Scholarly Concentrations Program," n.d.). Looking at these goals gives an idea of what value McGovern finds in implementing SC programs. It may also lead to the consideration of new SC programs at medical schools that are hoping to achieve similar goals and seeking a framework under which to do so.

The goals specifically for the medical humanities SC more closely address the potential and intended impact that the humanities can have on student experience, student learning, and students' eventual careers as physicians. The goals are as follows:

- To enhance the traditional medical curriculum, given medicine is both an art and a science;
- To explore medicine through the lenses of history, ethics, law, literature, religion and spirituality, social science, cultural studies, and the arts by providing students with insight into the human condition and a patient-centered approach to medical care;
- To enhance students' abilities to cultivate that most important instrument of healing—their individual selves;
- To assist students in becoming culturally competent, ethical, and compassionate caregivers ("Medical Humanities," n.d.).

These goals are in alignment with the benefits of medical humanities that research has identified, but they are also very broad. It would not be easy, if even possible, to take any one of these goals and evaluate how well it had been accomplished, even using qualitative methods. This does not mean that these goals are not achievable, not useful, or not beneficial to students; it just seems

that they encompass the emergent themes surrounding what a SC student should gain rather than the specific knowledge, skills, or mindsets they should acquire. This may be because these goals are meant to be taken in combination with the overarching SC goals or may intentionally leave room for flexibility to accommodate a wide range of students' interests within the broad scope of medical humanities.

When I asked Cole about the purpose of medical humanities to medical education and the goals that programs should have, he described that there are two types of considerations in this area: the content that students learn and the personal and professional growth and development of students. He asserts that both sides of this matter need to be successful to fulfill the mission of medical humanities programs. As an example, Cole is a historian with a focus on gerontology, so he teaches students about aging and the elderly. He enjoys this, but not as much as he enjoys engaging with students about emotions, ethics, spirituality and other things that serve the goal of the growth and development of the students as human beings. He finds the most joy in helping students understand themselves better and become more compassionate.

This is especially important, in an environment in which it is easy for students to lose track of their own humanity. Cole describes how first and second year medical students are pushed to limits that are almost inhumane as they are tasked with memorizing huge volumes of information to cram for their classes and the dreaded Step 1 exam that largely determines their strength as residency applicants. In this environment, students are extremely anxious, and Cole believes that they need to be given ways to engage their imagination through exposure to humanities like art and reflective writing, which offer opportunities for personal growth that are not available to them elsewhere in the medical curriculum.

Although humanities do not frequently appear in the curriculum at large, Cole argues that they are a crucial part of students' medical education because they are part of what is going to shape students into humane and compassionate physicians. He states that students *need* humanities. Although they do not always know that they need them, once they begin to get engaged with them, Cole says two thirds of students become more energized and show a noticeable difference in the way they are learning, thinking, and feeling. He succinctly but expertly summarized that "we bring humanities to students to enhance the humanity *of* students" (T. Cole, personal communication, February 6, 2020).

Research & Evaluation

A SC student at McGovern, Victoria Morris, is currently undertaking an evaluation of the SC program as her fourth-year research project in completion of the program requirements. She will be collecting information via interviews and online surveys mostly from program alumni, but also graduating seniors, about how much they learned in the program, what difference it has made for them, whether they received what they expected, and what they think is missing or could be modified and improved. Cole says that this student has completed the evaluative portion of the project and is now working on how to best deliver and subsequently publish her findings.

Up until this evaluation was recently performed, the main method of examining program success and satisfaction has been through student feedback on each particular course or unit. This kind of feedback speaks to matters like how well students enjoyed an elective, how impacted they were by third-year journaling, or how much they feel they got out of the "Introduction to Medical Humanities" or "Humanistic Elements of Medicine" courses. Cole finds this kind of feedback to be a "mixed blessing" because he sees the tendency for student evaluations to drive teaching as a double-edged sword (T. Cole, personal communication,

February 6, 2020). He values student input, especially in the case that something is seriously not working, and believes that data on student feedback should be collected and paid attention to. However, he also finds it troubling that sometimes student complaints or statements of dissatisfaction are given too much weight in shaping the curriculum. Sometimes, he says, the authority of a faculty member should be the determining factor in what is taught or how as opposed to one or two student complaints that come up.

Cole also believes there is merit to the idea that "people vote with their feet" (T. Cole, personal communication, February 6, 2020). That is to say that when students come into the SC and stay in it or continuously come to the Center's events, those students are showing that they enjoy and value what the program and Center are offering them. Enough students are interested in the program that it caps at thirty per class year, and most events are well-attended. In comparison, Cole draws attention to the fact that the percentage of students who attend the actual medical curriculum lectures during the preclinical phase is dropping radically. All lectures are streamed such that students can watch them from their computers anywhere at any time. Since the classes that these lectures are a part of are pass/fail but the Step 1 exam is currently not, many students feel that streaming the lecture videos on their own time at an increased speed and using the time saved in preparation for that exam is a better use of their time than trying to make their way to class every morning and spending hours in a lecture hall. However, even as students are becoming less inclined to come to campus and attend preclinical lectures on basic science and physiological topics, students still come to the medical humanities events because they find them genuinely engaging. Cole takes this as an indication that the program is succeeding and thriving.

Future

Although the results of Victoria Morris' evaluation are pending, it appears that McGovern is pleased overall with the framework of their medical humanities SC and curricula. However, there are ways that Cole can envision the state of medical humanities at McGovern being improved. He also identified several of the limiting factors that prevent those desires from being realized. One such limitation is that the McGovern campus is strictly a health science center and is not embedded within a larger university setting in the way that Dell is. This means that Center faculty cannot turn to colleagues in humanities departments and negotiate ways for them to teach courses in their areas of expertise to the health professional students. As such, it is challenging to arrange coursework and opportunities in more specialized areas of medical humanities such as literature and medicine, medicine and the arts, narrative medicine, or medical history. While it is sometimes possible to arrange these connections in other ways (for example the Center runs a history of medicine course with neighboring Baylor College of Medicine approximately once a year) Cole would ideally love to see the Center have a few more faculty members in specialized disciplines. In particular, he would like to have a faculty member with expertise in literature and narrative medicine and a part-time faculty member who was also an artist.

In addition to specialized faculty, Cole wishes there were a way for students and Center faculty alike to engage in increased scholarship and published research, which take a large amount of time. When he was writing his 2015 textbook to introduce students to the field of medical humanities, he had to take a six month leave to complete it. However, students, Center faculty, McGovern, and the field at large all stand to benefit from the production of that kind of scholarship.

Baylor College of Medicine

Baylor College of Medicine (Baylor), the first medical school of the Texas Medical Center (TMC) in Houston, is the leading private medical school in Texas. In addition to its position in the largest medical center in the world, as of the 2021 U.S. News and World Report ranking of medical schools, Baylor is the fourth best medical school in the U.S. for primary care and the 22nd best medical school in the U.S. for research ("The Best Medical Schools for Primary Care," 2020; "The Best Medical Schools for Research," 2020). To learn more about Baylor, on February 20, 2020 I interviewed Dr. James W. Lomax, and on March 13, 2020 I interviewed Dr. Amy McGuire. Lomax is a professor of psychiatry and behavioral sciences at Baylor whose professional interests include "humanism and professionalism in medical education," "finding renewal and meaning in medicine," and "the interface between religion, spirituality, and healing" (James W Lomax, M.D., n.d.). He also is involved with the Institute for Spirituality and Health at TMC. McGuire is the Leon Jaworski Professor of Biomedical Ethics, and the Director of the Center for Medical Ethics and Health Policy at Baylor. She also has a PhD in medical humanities.

Programs & Curricula

Similar to the scholarly concentration system at McGovern discussed previously, Baylor offers a collection of pathways to medical students that focus on specific topics that may interest them. The pathways allow students to explore those areas of interest in a deeper and more customized way than would be possible in the general medical school curriculum. The primary medical humanities educational offering at Baylor is their medical ethics pathway, which was founded in 1992 and is offered by the Center for Medical Ethics and Health Policy (Center). Both McGuire and the pathway website say that the program was not only the first pathway to

come into existence at Baylor, but also the first ethics track to come out of any medical school in the United States, serving as a model for both other subsequent pathways at Baylor and for other ethics tracks among different U.S. medical schools ("Medical Ethics Pathway," n.d.). In 1996 the pathway was awarded the American Medical Student Association's Paul R. Wright Excellence in Medical Education Award for being the best medical ethics curriculum in a medical school ("Medical Ethics Pathway," n.d.).

The program consists of four courses, the first of which is a required medical ethics course that all first-year clinical students must take ("Medical Ethics Pathway," n.d.). This includes all medical and health professional students, such as those training for positions including physicians, nurses, physician assistants, genetic counselors, and orthotics and prosthetics specialists. McGuire says that this course equips students with the basics of medical ethics terminology and frameworks while focusing on issues such as consent, confidentiality, surrogacy, and the end of life. She emphasizes that students will then be asked to apply those frameworks to particular scenarios, learning how to confront challenging ethical situations, consider all the relevant variables, and craft a well-reasoned management plan. She notes that there are usually 220 students in this course each year.

Those students who wish to continue their education in ethics after the mandatory first-year course can continue along the pathway through a series of three electives taken across their next three years of school. The first of these electives, the second-year course, is a bioethics seminar which helps students understand bioethical debates and their dimensions in philosophy, history, religion, and law ("Medical Ethics Pathway," n.d.). The third-year course deals with clinical ethics as medical students are rotating through their clinical clerkships at that time. McGuire describes this course as involving students participating in hospital rounds to see what a

real clinical ethics consultation looks like. She finds it unique that in this experience, students are able to learn not as physicians in training who will sometimes be faced with ethical challenges along the way, but rather through shadowing trained ethicists who are called in specifically for their expertise in analyzing ethical dilemmas. Even though most students intend on eventually practicing medicine and not being clinical ethicists, McGuire finds that students recognize the value and importance of learning the skills of an ethicist such as how to effectively run a family meeting, elucidate goals of care, and manage conflict within family units.

In the fourth-year elective students complete independent study on a scholarly project in a clinical ethics topic. Faculty supervise these projects which are most often papers but may also be creative products like videos ("Medical Ethics Pathway," n.d.).. McGuire remarks that many of the papers produced by fourth-year pathway students end up being published. Completion of all four electives earns students a certificate in medical ethics at the pathway's graduation, which serves as a recognition of achievement, a venue to showcase four-year projects, and an opportunity for family and loved-ones to celebrate the students ("Medical Ethics Pathway," n.d.). According to McGuire, last year's (2019) graduation was the largest of the program's history, with about 22 students earing certificates. She informs that around 54 out of 180-190 medical students in a class (about 30%) usually begin the pathway; however, they are free at any point to decide not to finish it, which is not unusual since medical students have so many other competing obligations. The opposite however, does not apply; McGuire describes that the electives are prerequisite to each other with each building upon the last, and as such students cannot freely enter the three electives without being in the pathway and having taken the prior ones. A summary of the program's courses and requirements can be visualized in the following graphic from the pathway's website. Non-course requirements include activities such as

attending speaker events held by the Center ("Medical Ethics Pathway Requirements-at-a-Glance," n.d.).

Medical Ethics Pathway Requirements-at-a-Glance

Methods	Content/Courses	Year 1	Year 2	Year 3	Year 4	Credits
Preclinical Electives	Seminar Series in Bioethics (MEETH-417)					1.75
Clinical Experience/ Elective	Intro to Clinical Ethics (MEETH-418)					4.0
Research Elective/ Scholarly Activity	Research in Clinical Medical Ethics (MEETH-419)					4.0
	Final capstone paper which students are encouraged to prepare for publication					
	Poster preparation for Medical Ethics Pathway Poster Showcase and Graduation					
Non-credit Enrichment Activities	CCC (Clinical Case Conferences)					
	BTEP Journal Club (Big Topics in Ethics and Policy)					
	Biomedical Ethics Grand Rounds					
	Attend "The Conversation" program/speaker series sponsored by the Center for Medical Ethics & Health Policy					
	Apply for one of two $1500 travel scholarships to attend annual ASBH national conference					
	Poster preparation for MEP Poster Showcase and Graduation (cash awards given for top three projects)					

Figure 3. Baylor medical ethics pathway program requirements ("Medical Ethics Pathway Requirements-at-a-Glance," n.d.).

In addition to the medical ethics pathway, Baylor has also begun to offer a health policy pathway more recently, with its first iteration occurring in 2016 ("Education," n.d.). It is structured very similarly to the medical ethics pathway in that it consists of four courses, one in each year of medical school, beginning with an introductory course open to all medical students, continuing to a seminar for pathway students only, progressing to a course focused on applications, and culminating in a final research course and scholarly paper (https://www.bcm.edu/centers/medical-ethics-and-health-policy/health-policy/education). Insofar as one might consider law and advocacy to overlap with medical humanities, so too might one

consider this pathway to represent another way of studying medical humanities. Education on health policy is also likely to include considerations of ethical issues and the narratives of individual people affected by or holding stake in the policies in question. These dimensions warrant mention of the program in a discussion about medical humanities.

Apart from the two pathways, some optional electives in medical humanities areas are available to medical students. Both Lomax and McGuire mentioned that there is a narrative medicine elective taught by a Center faculty member with training in the area. McGuire also highlighted an elective on eugenics and medicine in the wake of the Holocaust. Lomax highlighted an elective called "The Healer's Art," which focuses in part on finding meaning in medicine and medical practice. As discussed previously based on correspondence with Thomas Cole of McGovern, that school and Baylor jointly offer a history of medicine elective annually. From the elective catalogue that is available on Baylor's website, though challenging to digitally locate, other medical humanities aligned elective topics include the following: compassion and the art of medicine, the physician in the movies, readings in HIV-AIDS, the physician as an advocate, human rights and medicine, art of the human body, end of life and palliative care, understanding victims of violence, poetry in medicine, psychiatry in literature, psychology in short stories, human sexuality, LGBT healthcare literacy, deconstructing race in medicine, and cultural diversity and sensitivity ("Elective Courses," n.d.).

While this is a wide array of courses and topics, most of these electives count for one half or one credit and consist of 12 or fewer sessions, with some having as few as five ("Elective Courses," n.d.). Furthermore, most of these electives are considered pre-clinical or non-clinical, so a maximum of four credits of this variety may be counted towards the 22 credits required for the medical degree ("Requirements and Criteria for Electives," n.d.; "Requirements for the

Degree Doctor of Medicine," n.d.). For these reasons, although an extensive and varied catalog of electives is available, it is possible that students may not be able to take full advantage of it, as most of them will likely only participate in a few of these courses. McGuire also pointed out that these electives seem to be the only place that the traditional humanities, like history and literature, appear in Baylor's curriculum. She also sees that there is not a great deal of support to teach them, and she would like to see increased commitment to these electives and to the humanities at large.

Purpose & Goals

In speaking about what medical humanities education should do at Baylor and in general, both McGuire and Lomax framed their ideas partly in terms of the challenges that it can prepare a student and eventual physician to face with greater confidence. Lomax spoke about the pressures of the clinical environment, such as compliance with complex systems of electronic medical records, and how they can make it easy to lose sight of what really matters, the patients. He thinks that medical humanities provides a valuable opportunity to shift the focus away from productivity and towards meaningful and personal conversation about healthcare providers' and students' experiences. To him, the most important thing that students can learn and that medical humanities can provide is the routine of frequently engaging in conversations about their experiences, the meaning those experiences hold, and the ways that they can maintain, nourish, and protect that meaning. Continually creating and holding space for what matters equips students to better manage the numerous distracting pressures in the healthcare world.

McGuire spoke about medicine as not only a science, but also an art that requires facing a lot of complex interpersonal, emotional, and ethical challenges. She sees ethics as providing students with a structured framework to work through those thorny challenges with patients and

families at the bedside. To her, if students are prepared to enter a clinical environment knowing how to handle ethical issues and when to call an ethics consult, which she considers essential competencies of becoming a physician, that would be the most basic success of their ethics education. What she would consider a tremendous success is if students' humanities and ethics education resulted in disruption of the alarming trends in student and physician burnout. In particular, she looks to the focus that humanities and ethics place on reflective practice as something that can help students manage their countless conflicting commitments, process distressing situations, maintain their positive intentions and ambitions, and avoid becoming jaded.

Research & Evaluation

McGuire calls attention to the fact that evaluating success in medical school most often occurs through tests of knowledge like the standardized Step examinations, and although those tests contain some questions related to ethics and humanism, she finds these questions ineffective and vastly oversimplified. While this sort of knowledge-based assessment works well enough for some aspects of medical education, McGuire says it is much more challenging and expensive to assess behaviors and their change over time. She indicates that two primary methods of evaluation have been considered for Baylor's programs.

The first method is through the use of standardized patients (SPs), who are trained to act out realistic patient encounters with medical students, so that students can accurately practice or demonstrate their skills and processes. The problem with this method that McGuire names is the large amount of time and resources that it requires. To get an SP to interact with each student requires extensive resources and to have students rotate through one or a few SPs takes extensive time. After an instructor watches the students' encounters with the SPs, they must assess the

students' performances and provide feedback to them, which takes additional time, energy, and personnel.

As an alternative, the second method under consideration utilizes reverse-SPs. This involves showing a standardized encounter to a student and having them talk through what went well, what were issues, what could have gone better, and how they would have handled things. This verbal explanation allows an instructor to understand how students are processing the encounter and thinking through the challenges that it presents. While this could be done through individual, real-time observation of standardized encounters, I can also imagine this being done using pre-recorded encounters, which saves resources, being done in small groups of students, which saves time, and possibly even being done digitally through videos and written student responses, which saves both. This method seems adaptable to a variety of circumstances and gives an idea of the students' thought processes, but it may not necessarily be indicative of how a student will perform in a clinical setting with a real patient, so which method is more appropriate would depend on the specific criteria that instructors aimed to evaluate.

McGuire acknowledges that there are more sophisticated methods for measuring the specific outcome variables of educational opportunities or activities and gives the example of assessing how burnout is affected by an activity that targets reflective practices. However, she contends that even with these tools it is still difficult to tell whether the practice in question is succeeding and impacting students in the ways it was intended to.

Future

McGuire observes that the medical ethics pathway program has been growing every year, which may suggest an increase in the success of the program or an increased interest in ethics among students entering medical school in recent years or possibly both. Regardless, it is an

indicator that lets McGuire know that the program is doing well. With regards to ethics, she is mostly satisfied with the program and thinks that it has found a good balance in providing interested students with the space and opportunity to learn more without infringing upon their other educational priorities and demands. As such, she is not currently thinking about any major changes to the program.

However, she has seen much less of a commitment to the traditional humanities at Baylor and would like to see that change in the future. However, she thinks the primary barrier to this occurring is the nature of medical training as already long and overloaded. With the way that McGuire currently finds medical education to be set up, there is simply an overabundance of things that students need to do in their four years of medical school, so even when humanities are a priority, they are only one among many competing priorities that tend to take precedence. Because of this, McGuire would like to see undergraduate institutions more widely introducing medical humanities concepts and courses to pre-medical students before they reach medical school. She does not desire undergraduate programs to replace the ones in medical schools, and she recognizes that much of the medical humanities content will not feel fully relevant to students until they are seeing patients in a hospital. As such, she would like to see life-long learning in medical humanities that spans across every phase of a physician's training and career, but she believes that the pre-medical stage is the one with the most space and time to explore the area in a way that is helpful. She thinks this would increase students' engagement with medical humanities once they arrived at medical school and would better position them to deepen their learning during that time having already covered the fundamentals.

The future that Lomax envisions also involves undergraduate institutions but in a slightly different way than McGuire described. He addresses how helpful it is for medical school faculty

to have colleagues in the humanities to help them with their efforts in medicine, mentioning his own relationships with colleagues in the departments of history and of religious studies at Rice, a nearby university with an undergraduate focus. He also points out that Baylor has a good relationship with the medical humanities program at Rice, which offers an undergraduate minor and has its own group of faculty. The opportunity to collaborate with programs that are entirely dedicated to these areas, where the humanities are all that they dedicate themselves to, is something Lomax finds extremely beneficial. Rather than focusing on what could take place at the pre-medical level to prepare students with medical humanities knowledge, he centered on how he would like to see Baylor collaborate more frequently and actively with these divisions at Rice in order to strengthen the presence of medical humanities in the medical school itself. McGuire also mentioned that the relationship between Rice and Baylor is still being explored, as the undergraduate minor is relatively new. The Center for Ethics and Health Policy has had conversations with Rice about the potential for collaborations in the future, but for now they remain separate.

Another thing Lomax points out is that it is much easier to put forth medical humanities initiatives when there is funding in place to support them, such as was the case with John McGovern's donation to create the Center for Humanities and Ethics at UTHealth. Were Baylor to secure such funding in the future, he thinks that would make a large difference in the degree and type of medical humanities progress the school could make. For now, however, a more concrete and prompt future endeavor that Lomax anticipates at Baylor involves narrative medicine becoming a required element of the clinical curriculum, beginning in July of this year (2020). Although he is not part of the team creating the curriculum and cannot speak to its contents or organization, he knows that it will become a part of every second- and third-year

medical students' clinical rotation experience. McGuire explained that the faculty member at the Center who specializes in narrative medicine usually focuses their teachings around the idea of storytelling—how people use stories to relate to each other, to better understand the situations of patients, and to better recognize patients' underlying goals and values in a way that can help inform clinical decision-making. It would be reasonable to suppose that the initiative Lomax describes will be taught similarly.

The University of Texas Southwestern Medical Center

The University of Texas Southwestern Medical Center (UTSW) is the leading public medical school in Texas, the largest medical school in Texas, and the only medical school in Dallas ("Fast Facts," 2018). As of the 2021 U.S. News and World Report ranking of medical schools, UTSW is the 26th best medical school in the U.S. for both research and primary care ("The Best Medical Schools for Primary Care," 2020; "The Best Medical Schools for Research," 2020). To learn more about UTSW, I corresponded over email with Dr. John Z. Sadler, who is a Professor of Psychiatry, the Daniel W. Foster, M.D. Professor of Medical Ethics, and the Director of the Program in Ethics in Science and Medicine at the school. He came to the school as a psychiatry resident in 1980 with aspirations in philosophy, and today he considers himself to be a "philosopher of psychiatry" (J. Sadler, personal communication, March 3, 2020). He has helped launch both a domestic professional organization and international network for philosophy and psychiatry, and he currently serves as the Editor-In-Chief of the *Philosophy, Psychiatry & Psychology* journal. In his own research, Sadler focus on the ways that values are involved in mental health care.

Programs & Curricula

The UTSW Program in Ethics and Science in Medicine (ethics program), founded in the 1990s, which not only oversees all ethics-related matters at the school, but also serves as a hub for ethics and medical humanities in North Texas at large ("Ethics Program Overview," n.d.). One of the responsibilities that the ethics program fulfills is educating medical students in bioethics, which Sadler says that the program has done in a variety of different ways over time, with iterations of several medical ethics courses. At present, Sadler and others involved in the ethics program have settled into a method of teaching that provides a longitudinal approach with integration into students' routine activities and environments. To achieve this, the ethics program reaches students through a learning community called "Colleges," in which every student is assigned in groups of six to a faculty mentor their very first day of medical school. Colleges mentors stay with their small groups across their four years, meeting with them weekly for two years and monthly from there on out ("Academic Colleges," n.d.). These meetings serve a variety of purposes, from learning physical exams to discussing professionalism and from practicing teamwork to, as Sadler indicated, learning medical ethics.

The ethics program designs and periodically updates the ethics curriculum used in Colleges, which is mostly centered around particular ethics cases. In the first year, there are seven ethics cases provided to students, which the ethics program website lists as covering "scholastic integrity, appearance, genethics, disclosure, end-of-life issues, sexual boundaries, and a liver transplant case" ("Ethics Courses in Academic Colleges," n.d.). In the third year, students write reflective essays about challenging professional or ethical cases that they came across in their clerkships with patients. They discuss these essays with second-year students who have not yet entered clerkships, providing an educational opportunity for both groups to engage with

matters of ethics, the third-years a reflective opportunity, and the second-years a preparative opportunity ("Ethics Courses in Academic Colleges," n.d.).

While the ethics activities of Colleges groups are mandatory for every student, they can be supplemented with enrichment electives as the students choose. Sadler described several medical humanities related electives that cover a variety of topics. An art and medicine elective called "Art of Observation" is offered by a dermatology faculty member and the curator of UTSW's own art collection in which students hone their skills of observation through closely viewing and studying visual art. A senior elective is offered by an internal medicine faculty member and a law professor from the nearby Southern Methodist University (SMU) called "Law, Lit, and Medicine," which is available to both SMU law students and fourth-year medical students at UTSW. They read literature of several types including poetry, short stories, and novels with ethical subjects and convene to discuss them. A volunteer faculty member with a PhD in library science offers a medical humanities specific elective, in which students engage with media such as videos and literature and discuss them together. Additional medical humanities electives are also available with less regularity because faculty's teaching availability varies and because students are able to create and lead their own electives with the support of a faculty sponsor but are subject to tight and unsteady schedules as well.

Purpose & Goals

Two aims are embedded within the overview of the ethics program: to "be the hub for bioethics" in North Texas and to "provide a broad and deep grasp of ethical and conceptual issues in medicine, science, and technology today" ("Ethics Program Overview," n.d.). The specific objectives of individual electives can be found online on UTSW's D2L page at the URL found in the references ("Frequently Asked Questions," n.d.). Additionally, Sadler shared with

me some of the purposes that he believes medical humanities education serves. Among the values that Sadler attributes to medical humanities education in medical schools are its ability to aid in: building empathy, cultivating critical and pragmatic thinking skills, processing the challenging moral and ethical pieces of medicine, exercising complex judgement in the face of ambiguity and uncertainty, immersing ourselves in the stories of others whose experiences are unlike our own, and maintaining resilience against the "dehumanizing" pressures of healthcare work while hopefully combating burnout, premature retirement, and physician suicide (J. Sadler, personal communication, March 3, 2020).

Future

In an ideal future without practical restraints, Sadler would like to see UTSW have a well-endowed center for medical humanities and ethics that is equipped with outstanding faculty and staff. He does not envision a center overtaking or replacing the existing programs at UTSW but rather would want to see it maintain connected relationships with the colleagues and programs already in place. However, Sadler finds that this is simply not a present priority on the minds of the school's administration due to the volume of other important but competing priorities that command their attention. This means that for the foreseeable future, the only change to be expected is the perpetual "incremental change and growth" that arises "as faculty interest and funding change and develop" over time (J. Sadler, personal communication, March 3, 2020).

The Joe & Theresa Lozano Long University of Texas School of Medicine at San Antonio

The University of Texas School of Medicine at San Antonio, also called the Long School of Medicine (Long), is a public UT System medical school in the South Texas region that makes

up part of UT Health San Antonio. I attempted to contact several individuals but was unable to interview or correspond with any experts from Long, so the following information is compiled based on synthesis of information from the school's websites and from scholarly literature that the school has published in academic journals.

Similar to McGovern, Long has a dedicated Center for Medical Humanities and Ethics (Center), which has existed formally since 2002 (Jones & Verghese, 2003). In 2003, Abraham Verghese and Therese Jones, the director and associate director of the Center at the time, published an article in *Academic Medicine* outlining the history of the center's creation, the curriculum in place at the time, and the lack of (but strong need to develop) good evaluative methodology. There is value in recognizing the historical intentions upon which the Center was based, but there has surely also been a great deal of change since its beginnings. Most medical schools have undergone immense curricular reform since that time to shorten their preclinical curriculums to let students see patients sooner and to keep up with the guidelines of accrediting bodies and needs of standardized exams like Step. No subsequent scholarly literature outlines the school's medical humanities curriculum with the same detail, and the information available on the school's websites today is less centralized. Presented here is the best possible centralization and interpretation of the school's publically available past and present information from the point of view of a knowledgeable prospective student.

Programs & Curricula

Long's Center for Medical Humanities and Ethics (Center) is the school's home for all things humanitarian and humanistic ("Center for Medical Humanities and Ethics," n.d.). One of the main educational offerings that the Center provides to medical students is the medical humanities distinction, Long's take on what is sometimes called a certificates, pathways, track,

or concentration. Within the distinction, students must select an area of focus from the Center's four key areas—arts and humanities, community service learning, global health, and medical ethics ("Humanities Distinction," n.d.). Whereas McGovern's and Baylor's versions of this have requirements specific to each year of medical school, it appears that Long's strategy includes a list of total requirements a distinction student must complete by graduation, with less of a structured timeline.

Core requirements include 40 hours of volunteer service with at least 20 pertaining to the student's chosen area, completion of at least three electives offered by the Center, and a total of 180 hours between those two items plus additional time spent engaging with medical humanities through extra volunteering, extra electives, or other humanities activities like "guest lectures, community events, journal clubs, conference participation, [and] global health trips" ("Humanities Distinction," n.d.). Other requirements include maintaining a minimum 3.25 grade point average, securing a faculty mentor who does work in the student's chosen area, and completing a capstone project in that area ("Humanities Distinction," n.d.). The capstone project requirements include a written project proposal, a month of dedicated work on the project, a formal presentation, and a final written report ("Humanities Distinction," n.d.). Students who fulfill all of these requirements along with all of the requirements for their medical degree will be granted an M.D. with Distinction in Medical Humanities ("Humanities Distinction," n.d.).

There are 13 electives listed on the Center website with details about their curricula. In the area of community service learning, there is an elective about homelessness and addiction, one about humanism in medicine, which requires 48 hours of volunteering at free student-run clinics, and one about leadership in interprofessional community service learning, which offers collaboration between medical, dental, and pharmacy students ("Community Service Learning,"

n.d.). In the area of global health, the Center offers five electives, including foundations in global health, leadership in global health, international medicine, preparing for global health work, and poverty, health, and disease ("Global Health," n.d.). In the area of ethics and professionalism, the Center offers a course in practical ethics for healers which focuses on the challenging ethical and professional issues that students will face when they finish medical school and transition into residency ("Ethics & Professionalism," n.d.). There is also an independent ethics elective in which students conduct an independent study into a particular issue of medical ethics and produce a 15- to 20-page research report ("Ethics & Professionalism," n.d.). In the area of literature and art, the Center offers three elective courses. The enrichment elective in art focuses on using visual art in the McNay Art Museum to improve observational skills. A course called "patient notes" uses music to improve active listening skills necessary for taking patient histories and auscultating the sounds of patients' bodies. The medicine through literature course involves close readings of essays and poems written by physicians and patients ("Literature & Arts," n.d.).

In the general medical school curriculum, the school's website describes a longitudinal module called "medicine, behavior, and society" (MBS) as part of the 20-month preclinical curriculum ("Preclinical Course Descriptions," n.d.). According to the website, this course covers "history, law, ethics, clinical, social and cultural contexts of medicine as well as human behavior, [and] development over the lifespan," including cognitive, social, and emotional aspects ("Preclinical Course Descriptions," n.d.). The course centers both matters systemic to healthcare and matters local to practitioners like the physician-patient relationship, and it emphasizes "communication skills, professionalism, research, and cultural competency" ("Preclinical Course Descriptions," n.d.). However, it is unclear how this course is organized, how frequently it occurs, who leads it, and what its instructional format is.

Purpose & Goals

When the Center was first materialized, its founding leaders outlined both fundamental principles they believed any humanities program should strive towards and core objectives of any curriculum the center should eventually develop (Jones & Verghese, 2003). Among the fundamental underlying principles they aimed for the Center to foster are the following:

- Preparing students to identify, analyze and resolve moral conflicts in patient care and medical research;
- a more traditional and more encompassing definition of the humanities that incorporates rather than separates ethics and the fine arts;
- a more balanced and integrated approach towards affective and cognitive domains;
- a more open and pluralistic environment to include and engage students, faculty, and the community. (Jones & Verghese, 2003)

Among the core curricular objectives they determined are the following:

- To provide students with an understanding of the principles of biomedical ethics and the methods of ethical analysis
- To promote critical thinking and reflective practices
- To foster cultural sensitivity and self-awareness
- To enhance communication and listening skills
- To model professional virtues and behaviors. (Jones & Verghese, 2003)

These curricular objectives are in line with what research shows to be the values of medical humanities, as previously discussed, and seem to be in line with what the school's website currently shows to be the present curricular offerings. It is much more challenging to determine

how well the fundamental principles have been adhered to since they are more abstract, more subjective, and more relative.

Today, the stated mission of the Center can be found on its website in more broad terms. It claims that the primary goal of the center is "to teach ethics and professionalism to medical students and health professionals, while nurturing empathy and humanitarian values," and states that the Center is "preparing tomorrow's healers to act with compassion and justice" ("Center for Medical Humanities and Ethics," n.d.). While these guiding statements give a broad overview of the Center's vision and guiding ideas, the website also includes more specific ways in which it aims to fulfill this mission by

- Preparing students to identify, analyze and resolve moral conflicts in patient care and medical research;
- Deepening the attentiveness to patients that will persist throughout students' careers through exposure to excellent clinical role modeling, arts and letters; and
- Providing a distinguished interdisciplinary community service learning program that serves as a bridge between ethics education and the development of empathy and humanitarian values. ("About Us," n.d.)

However, it is unclear from the website how research or evaluation is conducted to analyze the Center's success in meeting these goals.

The University of Texas Medical Branch at Galveston

The University of Texas Medical Branch (UTMB) in Galveston, an island city off the Texas coast, is the oldest medical school in Texas, opening in 1891 ("About UTMB Health," n.d.). It was one of the earliest implementers of medical humanities, with its Institute for the

Medical Humanities (Institute) opening in June of 1973 as only the second medical humanities program in the United States (Hudson Jones & Carson, 2003). The Institute was instrumental to bringing forth the study of narrative and literature in medicine at a time when the field mostly consisted of medical ethics and history, even sponsoring a journal on the subject in 1982 (Cook, 2010). In 2003, Hudson Jones and Carson of the Institute published an article in *Academic Medicine* describing the origins and development of the Institute and its work, especially in the school of medicine, outlining a curricular breakdown of medical humanities education in each year of medical school, and detailing information about how the Institute's performance was evaluated and what its goals were for the future.

As was the case with Long School of Medicine, there is value in understanding the original aims of the Institute and its historical trajectory, but it does not provide a full picture of what medical humanities looks like at UTMB. The article itself describes massive change to medical humanities course offerings when the school underwent extensive curricular reform in 1998, and it can almost certainly be assumed that further large changes have occurred since then (Hudson Jones & Carson, 2003). There is not a contemporary analogue to the piece that includes such a detailed layout of the Institute's present state, and although I attempted to contact several individuals, I was unable to interview or correspond with any experts from UTMB. As such, the following information is compiled based on synthesis of information from the school's websites and from the historical context of scholarly literature, like that of Hudson Jones and Carson (2003).

Programs & Curricula

The three main medical humanities educational offerings of the Institute are the graduate program, which grants MA and PhD degrees in medical humanities, the certificate program for

pre- or non-health professional students, and the medical humanities track within the school of medicine for M.D. students, much like the other pathway, concentration, and distinction programs discussed thus far ("Our Programs, n.d.). Each caters to a different audience and has different requirements and levels of necessary commitment.

The medical humanities track gives any interested medical student an opportunity to learn about medical humanities more deeply through course and activity requirements spread across their four years of medical school, rewarding them with a designation on their transcript indicating that they have become a "scholar in medical humanities" ("School of Medicine Medical Humanities Track," n.d.). Within the first two years of medical school, track students must take an introduction to medical humanities course. Within the third and fourth years, students must take at least two electives or selectives offered by the Institute, at least one basic science and humanities selective offered by the Institute, and at least one other elective or selective that focuses on providing care to a population that is typically underserved ("School of Medicine Medical Humanities Track," n.d.). During their time in the track, students must also complete and publicly present a scholarly research project under the supervision of an Institute faculty member and attend at least two thirds of the meetings of the medical humanities student journal club, which likely focuses on reflective practices ("School of Medicine Medical Humanities Track," n.d.).

The basic science and humanities selectives offered by the Institute include Freud and psychoanalysis, medical humanities- student research, ethical decisions in clinical medicine, and student research: ethics case library ("SOM Electives and Selectives Brochure," n.d.). The other electives and selectives that the Institute offers include law and ethics in clinical practice, trust and power in the doctor-patient relationship, post-Freudian psychoanalysis, and medical

humanities in literature: physician stories ("SOM Electives and Selectives Brochure," n.d.). These electives and selectives appear to be open to non-track medical students as well.

The certificate program is mainly intended for recent graduates from undergraduate institutions who either are taking a gap year prior to entering health professional school or are envisioning a future in medical humanities as their eventual career, but it is also open to anyone interested in learning more about medical humanities ("Medical Humanities Certificate Program," n.d.). It consists of 11 credit hours, five required and six elective, with the two required courses being open only to certificate students ("Medical Humanities Certificate Program," n.d.). While this program is not for medical students specifically, it likely reaches several pre-medical students who go on to medical school at UTMB and other Texas medical schools, so it is important to the education of medical students in that way.

Another program impactful to both medical and non-medical students is the Institute's medical humanities graduate program, which has arrangements to suit both types of people. Non-medical students can pursue a standalone MA or PhD, but there are also combined MD-MA and MD-PhD options available to medical students that run concurrent to their medical schooling ("Graduate Program," n.d.). This program through the Institute is the only one in the entire nation to offer an MD-PhD in medical humanities and is one of the only places offering graduate degrees in medical humanities to non-health professions students ("PhD Programs," n.d.). The requirements for the MD-MA and MD-PhD are overlapping. They both require four core courses—ethics of scientific research, humanism and the humanities, humanism and the medical humanities, integrated clinical ethics consultation ("Graduate Program," n.d.). The MA then requires 15 elective credit hours while the PhD requires 39 ("Graduate Program," n.d.). MA students must complete a research project leading to a master's thesis, and PhD students must do

one that leads to a dissertation followed by presentation and defense in addition to completing written and oral qualifying examinations ("Graduate Program," n.d.). Graduate students have the option to specialize in a number of areas such as "health care ethics, health law and policy, literature and narrative studies in health care, religion and health, [and] social medicine," and the Institute holds faculty to advise and support students in all of these spheres ("Graduate Program," n.d.).

Both the stand-alone and the MD-combined graduate programs offered by the Institute are unique and influential. Several key individuals in the field of medical humanities are graduates from these programs, and a notable quantity of the individuals cited and interviewed for the contents of this thesis are holders of graduate degrees from the Institute at UTMB or are ex-faculty. The importance of UTMB as a home for medical humanities innovation and scholarship both historically and presently in the state and the nation at large cannot be understated. However, several challenges have prevented the school and the Institute from reaching their full potential today.

In conversation with many of the individuals I interviewed from other schools, several of them mentioned that it would be challenging for me to reach someone to interview from UTMB because they have fallen on hard times. My interviewees noted the devastating damage that UTMB suffered due to Hurricane Ike in September of 2008 and more recently Hurricane Harvey in August 2017. These disasters wreaked havoc on the school in ways that it is still recovering from today, and their effects disrupted the school's position among the top medicals schools in Texas and among the most prominent medical humanities centers in the country. It also seems to my interviewees that the Institute has struggled with the loss of recent directors and faculty who

have retired, resigned, or otherwise aged out. Hopefully the school and the Institute are able to adjust in the near future and continue their extremely important and impactful work in the field.

Purpose & Goals

When the Institute had its fifth anniversary, a self-study report was done which included the original goals for its creation. Though this study was not published, Hudson Jones and Carson quote it in their 2003 article on the Institute. The three original aims of the Institute were to:

- allow qualified scholars and professionals to utilize humanities disciplines in conducting systematic inquiry into problems faced by . . . medical and health care professionals and scientists,
- allow these scholars to teach future scientists and professionals in ways which [would] enable them to appreciate and wish to learn and cultivate human skills cherished within the traditions of a liberal education, and
- permit these scholars-teachers to develop a model for preparing other individuals who wish[ed] lifelong careers in the humanities as applied to medicine. (Hudson Jones & Carson, 2003)

What is noticeably different about these goals as compared to the ones stated by other medical schools is the emphasis on scholarship in the medical humanities. Whereas the other programs discussed have been primarily trying to create more humanistic physicians, this is only one among three goals of the Institute. Its other two goals focus on gathering, enabling, and creating professional medical humanities scholars, who need not also be healthcare professionals. This is one of the reasons that the Institute was so successful in furthering medical humanities as a field in and of itself.

The current mission statement continues to affirm these original intentions but with a much wider scope than only the Institute or only UTMB. The Institute upholds a commitment to "moral inquiry, research, teaching, and professional service in medicine and health care," with faculty who conduct "research on ethical … legal … philosophical, historical, visual, literary, and religious dimensions of medicine and health care," setting the stage for the Institute faculty "in medical and graduate teaching, clinical ethics consultation, and health policy analysis locally and in state, national, and international academic and public forums" ("About the Institute," n.d.). This vision reflects the impact that the Institute has had and aims to continue having on the entire field of medical humanities on every level from local to global.

The Institute also has program-specific goals for graduate students. The expectations for PhD students are that they

- Acquire a general knowledge of the humanist tradition;
- Become acquainted with the methods and literature of the humanities as these relate to medicine;
- Develop competence in one or more humanities disciplines and apply this competence to the investigation of a particular problem;
- Transform this investigation into a dissertation that represents significant and original research; and
- Demonstrate an ability to teach and work with a variety of persons in the humanities and the health sciences and professions. ("Graduate Program," n.d.).

These objectives are straightforward, specific, and focused on actionable results rather than hypothetical attitudes or mindsets that students will hopefully pick up. This is not to say that the program does not value the perspectives that other schools have included in their objectives like

cultural competency, compassionate care, or tolerance of ambiguity, but rather highlights their commitment to the production of scholarship and decided non-reliance on clinical practice.

A more specific goal is stated for those students who are pursuing the MD-PhD dual degree and who are therefore much more likely to take part firsthand in the clinical care of patients. This program's goal is to "train MD-PhD students in the areas of medical humanities and medical ethics so that, combined with their experiences and training as physicians, they will become leaders and scholars in furthering these critical areas of medicine" ("PhD Programs," n.d.). This calls upon the combination of these students' humanities and clinical educations, but even this objective centers the role of these students as scholars-in-training. It of course makes sense that an academic program leading to an advanced doctoral degree would center scholarship, and it is not entirely reasonable to compare the mission of this type of program to those of other medical schools with a primarily clinical emphasis, but the distinction is noteworthy nonetheless.

Research & Evaluation

While there is not information on the Institute website about how it undergoes research or evaluation to measure success in meeting these goals, this is a topic discussed by Hudson Jones and Carson (2003). It is entirely likely that the situation described at that time is not identical to the one present today, but it is also likely that some aspects of the historical approach still exist. The first tool that Hudson Jones and Carson (2003) mention is student evaluation and feedback, which was more straightforward prior to 1998 when the Institute's efforts within the school of medicine 's general curriculum became more engulfed in the school's longitudinal practice of medicine (POM) class, which is similar to the Colleges approach at UTSW (Hudson Jones &

Carson, 2003). The POM class continues to be used today, so it is likely that this type of evaluation is still challenging to collect and interpret.

The second method that Hudson Jones and Carson (2003) describe is that of a "comprehensive academic review" which every medical school department and graduate program were subject to on a rotational basis. The process includes Institute faculty creating an "extensive self-study report" and external evaluators visiting the Institute and its courses and activities before preparing their own report (Hudson Jones & Carson 2003). At the time of writing, the Institute had undergone that process four times and all resulting reports had been given to the dean of medicine. While I cannot say with certainty whether this review process is still in place at UTMB today, neither can I think of any reason that it would have been retired. The results of these evaluations are not mentioned in Hudson Jones' and Carson's (2003) article.

Discussion

A unique aspect of value that this thesis presents is its synthesis of information from the points of view of published medical humanities scholars, medical humanities experts working within the Texas medical education setting, and myself, a future Texas medical student with personal and educational interests in medical humanities. Because of my position as a prospective student, the information I was able to glean from my interviews with experts also takes a unique form. The conversations I had with these experts about their schools, programs, and curricula had the characteristics of a formal interview in support of a scholarly endeavor, but also held the tones of a discussion between individuals mutually invested in the growth and success of Texas medical students, Texas medical schools, the field of medical humanities, and humanistic medicine at large. In addition, these conversations also encompassed the spirit of an

informative exchange between knowledgeable school affiliates and an invested soon-to-be student with a direct personal stake in the matter. This combination of factors is distinctive and fundamentally beneficial to the overall goals of the project, which include aspects in alignment with each of these types of encounters. Although much of the value of this project lies in its centralization of information that was previously diffuse and challenging to locate or access, some of it also comes from the perspective that I am able to provide.

It is through the lens of an invested student that I look to draw conclusions and provide input about the information I have gathered. Ultimately, regardless of how scholars, educators, administrators, and program directors may view this information, it is students like myself who become the users of these programs and curricula. In so doing, students like me rely on these programs and curricula for valuable education that has the potential to mold and improve our medical training and medical practice in ways that last a lifetime for us and all the patients we treat. Through the research process, I have come to hold a great deal of knowledge about medical humanities, but I am by no means an expert myself. However, presenting my own thoughts and deductions here allows everyone, from other applicants to educators to scholars, to get a sense of the reflections and takeaways that a hopeful student-user has found from the contents of these pages.

The voices of the experts I interviewed will continue to be present in this section but through a more interpretive lens than the informative one of the previous section. In addition to the six experts included in the previous section, on 27 March, 2020 I was able to speak more generally with an additional qualified individual about medical humanities education in Texas at large as opposed to at any particular medical school. Dr. Elizabeth Heitman is currently a professor in the ethics division of the department of psychiatry at UTSW, where she has been

since 2016. She is also one of the seven faculty members of UTSW's Program in Ethics in Science and Medicine ("Ethics Program Faculty," n.d.). Her work focuses on research ethics and education in ethical research conduct ("Elizabeth Heitman, PhD," n.d.). Before working at UTSW, she was engaged in research and education at the Vanderbilt University Medical Center's Center for Biomedical Ethics and Society and at the University of Texas School of Public Health in Houston ("Elizabeth Heitman, PhD," n.d.).

The categories of discussion that I have chosen to include reflect the areas that I originally intended to elucidate through this research, the areas that puzzled or attracted me along the way, and the areas that emerged as themes in multiple interviews. My thoughts on several of these matters are not fully resolved, and I am certain they will continue to evolve throughout the entirety of my educational and medical career. However, my present conclusions show the results of this survey of the literature and expert opinions.

Texas Medical Schools' Medical Humanities Landscape

In my investigation of the medical humanities programs and curricula at six Texas medical schools, I found that each school holds at least a few faculty with expertise in the field and that each school has at least one programmatic or curricular offering in the area. Five of the six schools (McGovern, Baylor, UTSW, Long, and UTMB) have at least one official program in place to consider medical humanities and ethics, and although Dell does not have a program in place yet, there are concrete plans in place to develop one in the near future. Three out of the six schools (McGovern, Long, and UTMB) have centers or institutes dedicated to medical humanities, and another (Baylor) has a center dedicated to ethics and policy.

All four schools that have established centers or institutes also offer some version of a scholarly concentration, in which students can engage in medical humanities and/or ethics

learning as a supplement to their general medical school curriculum, fulfill a set of requirements over their four years, and earn a distinction in the field of study. This distinction usually confers a certificate and is marked on the students' transcripts and in various places on their residency applications. These programs appear under several different names including scholarly concentrations, distinctions, certificates, pathways, and tracks, but they all represent a similar approach to medical humanities education.

The other types of common programmatic and curricular structures seen among these six schools are an elective-based approach and an integrated-longitudinal approach. Elective-based approaches are characterized by offering optional no- or low-credit courses in a variety of subjects that students can take to enrich or supplement general medical education in the areas that interest them. The curricula and instructional methods used in these electives vary tremendously between courses, but they are for the most part more relaxed than rigorous, intended not to detract from students' other educational priorities, particularly their scientific and clinical obligations. Which electives are available at any given time also varies greatly, as it depends on the availability, interest, and willingness of faculty members to teach them. All six of the schools included in this study participate in an elective-based approach to medical humanities education.

Integrated-longitudinal approaches are characterized by the inclusion of medical humanities lectures, discussions, activities, or other learning modalities within an educational environment or tool that students engage routinely. A common implementation of this approach is the integration of medical humanities sessions or activities within a longitudinal first-year or pre-clinical course that generally serves to teach students clinical exams, bedside manner, professionalism, and/or social contexts of medicine. I found four of the six schools included in

this study (McGovern, UTSW, Long, and UTMB) to utilize an integrated-longitudinal approach in this way. I also found another (Dell) to utilize this type of approach through problem-based learning (PBL), or what some schools call case-based learning (CBL). This is a longitudinal preclinical learning activity that many schools use, in which small groups of medical students discuss realistic patient cases. Heitman also has authored a paper which discusses this occurring at McGovern in 2001.

The least common approach involved offering the opportunity to pursue advanced degrees in medical humanities such as a master's or PhD degree. Only one of the six studied schools (UTMB) has this opportunity available currently, as the UTMB Institute for the Medical Humanities offers both types of degrees to medical students and non-medical students. However, another school (Dell) has a concrete plan to implement a master's degree program soon.

A summary of which of the six studied schools utilize which of these types of approaches can be visualized in the following table. Also included is whether each school has a dedicated medical humanities center or institute.

Figure 4. **Summary of Medical Humanities Educational Offerings and Approaches at Six Texas Medical Schools**

	Dell	McGovern	Baylor	UTSW	Long	UTMB
Center or Institute		Center for Humanities and Ethics	Center for Medical Ethics & Health Policy		Center for Medical Humanities & Ethics	Institute for the Medical Humanities
Scholarly Concentration		Medical Humanities Scholarly Concentration	Medical Ethics Pathway & Health Policy Pathway		Medical Humanities Distinction	Medical Humanities Track
Electives	Enrichment Electives	Electives	Low-Credit Electives	Enrichment Electives	Electives	Electives & Selectives
Integrated-Longitudinal	PILLARS	Doctoring		Colleges	Medicine, Behavior, & Society	Practice of Medicine
Advanced Degree(s)	Plan for MA & MD-MA					Certificate, MA, PhD, MD-MA, MD-PhD

The information in the chart alone appears promising; out of 30 of the available cells, only nine are left unfilled, meaning that about 70% of the main opportunities for these schools to include medical humanities are undertaken. I do believe this is hopeful, and I am pleased that many schools offer a variety of ways to engage medical humanities, but there is of course much more to understand about these opportunities than simply where they exist and in what form. The information that I have gathered here describes programs and curricula in as much detail as possible and gives a good picture of what opportunities are currently available and what they look like. Based on that information, I feel comfortable saying that medical school applicants in Texas have a variety of options to choose from when considering schools that offer education in

medical humanities. Those applicants could look at this information in detail to decide which school best satisfies what they are looking for. I also find that most medical students at the studied schools should be able to find at least one way to access education in medical humanities.

However, I was not able to acquire evaluative data or results for any of the schools, not even those that experts and literature indicate as having evaluative methods in place. Additionally, the literature reflects that the different types of structural approaches medical schools may take to medical humanities education is not where the variety stops. In addition to the way that a program or curriculum is structured, according to a study done in the Department of Humanities in Medicine at Texas A&M University, there are several different educational philosophies used in medical humanities that may color the education students receive (Self, 1993). Without these kinds of information, it is not possible for me to draw conclusions about the efficacy of the opportunities available in terms of their ability to meet their self-proclaimed goals or their ability to provide the many types of value that medical humanities education is known to offer. For this reason, I do not feel adequately equipped to judge whether Texas medical schools truly comprise a robust medical humanities landscape.

Potential Problems, Critiques, & Their Explanations

What I can provide, however, are some potential critiques of the medical humanities educational approaches I have found these schools to utilize. My conversation with Heitman, in particular, raised several possible problems to an integrated-longitudinal approach, an elective-based approach, and a scholarly concentration approach. While I cannot say with certainty which of the six schools may fall short in which, if any, of these ways, I do find it likely that these issues emerge in several of the medical humanities offerings discussed within this paper.

Regarding an integrated-longitudinal approach, the main problems Heitman sees are spacing and memory. One would hope that this approach keeps students regularly engaged with medical humanities in a variety of ways and contexts over a long period of time, having certain advantages over something shorter and more contained like an elective. However, when integrating medical humanities and ethics across a longitudinal module or course that also teaches other topics, Heitman says it is common for the instruction in this area to become spaced out with a great deal of time between each engagement. She finds that when medical humanities and ethics learning is sporadic like this, students often come to a session on the topic having forgotten what they learned last time or having forgotten that they learned anything on the matter at all.

Heitman finds this is increasingly likely to happen the more conversational these sessions feel for two reasons. First, without didactic instruction, it is more challenging for students to feel as though learning has taken place, and lasting memory is less likely to be formed. Heitman knows that medical students are constantly having to intake and prioritize large amounts of information, so she realizes that the contents of what feels like a conversation are not nearly as likely to make the cut as the contents of what feels like a formal lecture. Additionally, Heitman has seen that if medical humanities and ethics sessions feel informal, students are more likely to miss them in favor of commitments that feel more pressing like clinical obligations. For these reasons, Heitman believes that integrated medical humanities and ethics approaches need to consist of didactics early on covering the basics followed by continued, frequent discussion and application of that knowledge as students progress through medical school.

Regarding an elective-based approach, Heitman's concerns include limited scope, lack of expertise, and lack of incentive. One thing in particular that worries her is the opportunity for

medical students to create and instruct their own electives as long as a faculty sponsor signs off on them. She has seen this lead to an array of varied results, some of which may not meet an appropriate standard of rigor, accuracy, or value. This creates a false sense of expertise that Heitman finds potentially dangerous on the parts of students who compose and instruct these electives along with students who take them. She also finds that these types of electives do not endure for much time because the students who conduct them get busy and move on without leaving any lasting imprint of what they have done.

Heitman also expresses concern about the way medical humanities and ethics electives are organized by students or by faculty. Too often she finds that these courses conform to the style of what she calls "the salad bar class," in which course content involves small snippets of several ideas, in no particular order, mixed to the liking of whomever is designing the course (E. Heitman, personal communication, March 27, 2020). She says this often comes in the form a class designed around a rotating speaker series where an "expert of the day" talks about whatever they choose for most of the class time before a short amount of question and answer or class discussion (E. Heitman, personal communication, March 27, 2020). The problem with this approach, as Heitman sees it, is that is easily misses the mark on providing consistency and creates the impression that there are not theories or frameworks for understanding the course content. For this approach to work, Heitman believes it is essential to craft a very careful integration of themes across the content presented by visitors and for instructors to intentionally highlight these themes rather than leaving students to integrate all the information on their own.

However, one possible explanation for the prevalence of this type of class and its common lack of cohesion is simply that faculty instructors are not incentivized well enough to justify expending a greater amount of effort and energy on their classes. In an article that

Heitman published in *Medical Humanities Review* in 2001, she discusses how the faculty at academic health centers are not assessed, rewarded, or compensated based on their teaching of medical students. The paper describes her tumultuous journey navigating academia as a teacher and scholar of ethics and humanities within the UT Houston Health Science Center (UT Houston), an environment like other health science centers in which research is valued above teaching (Heitman, 2001). Her career journey in this setting is confined by the strict disciplinarity of a health science center and by an inability of others to understand her position as multi- and interdisciplinary (Heitman, 2001).

Heitman (2001) explains that the administration at UT Houston viewed ethics as merely a requirement to satisfy in order to fulfill licensing or research mandates. They treated it as a service she should provide to further the school's research mission rather than as an integrated part of the school's core values (Heitman, 2001). As such, any time new requirements arose from external organizations, people like Heitman (2001) were expected, nearly demanded, to teach in a way that satisfied them. However, teaching was not factored into the pay that faculty received because they were expected to earn their pay through scientific research and billing for patient care (Heitman, 2001). Additionally, in consideration for tenure, research was the primary concern of review committees, and teaching was hardly considered (Heitman, 2001). The resulting paradox is that administration constantly busied people like Heitman (2001) with the demand to teach in fulfillment of requirements but never wanted to pay them to do it and later challenged their career advancements on the basis of teaching too much and researching too little.

In relevance to her critique of the elective-based approach, this can explain in part why it is so challenging to offer high quality medical humanities and ethics education, especially non-

essential education like elective courses. In my communication with Heitman, we marveled at the degree to which the problems she experienced in the 1990s remain relatively unchanged today. Faculty are given disincentive to teach medical humanities and ethics courses, and in many instances, they even see those courses as a liability to their continued careers (Heitman, 2001). This also especially likely in Texas where Heitman points out that many medical schools (including all of the ones in this study except Dell) are part of academic health science centers, independent from any general university and therefore heavily focused on science above all other things. Only faculty who are extremely dedicated or already tenured have much reason to design and instruct medical humanities electives, and therefore they are often scarce and of imperfect quality.

Finally, regarding a scholarly concentration approach, the same challenge applies that there are often insufficient instructors due to lack of pay unless, Heitman says, a school is fortunate enough to have an endowed institute or center for which a donor has extended the money. This explains why, out of the six studied schools, the only four that offer a scholarly concentration are the ones that also possess a center or institute. However, even when there is sufficient funding and support, Heitman still sees a potential problem with this approach, and that is the presumption of expertise among students who complete the concentration. From Heitman's point of view, students are rewarded with a certificate of little meaning for doing a small amount of extra work and then believe that they are highly knowledgeable in medical humanities and ethics. As exhibited in my research, one of the core requirements of most scholarly concentrations is the completion of particular electives, but if those electives are not done well enough to confer expertise, then students will likely overestimate their qualification. This does a disservice to students who falsely believe they have mastery and can be dangerous if

these students profess their limited knowledge as expertise, especially since few of them do anything to sustain their knowledge after medical school. This can be particularly troubling in ethics, where the statements and actions of self-proclaimed experts can have substantial impact.

Relationship Between Ethics, Bioethics, & Medical Humanities

Throughout the entirety of this research process, grasping how to accurately frame the relationship between bioethics and medical humanities proved challenging. From the scholarly literature, a prominent voice that emerged on the matter was that of Friedman (2002), a medical humanities scholar and educator who argues that the two fields utilize and promote fundamentally different ways of thinking. He asserts that bioethics relies on rules and detailed stepwise processes to eliminate uncertainty and ambiguity while medical humanities encourages complex reflection upon the nuances of uncertain and ambiguous subjects (Friedman, 2002). As such, he finds conflation of the two to be unfortunate and inappropriate (Friedman, 2002). After reading his argument, I wondered why so many programs include them together if they are as incompatible as they appeared to him. Several of the experts who I interviewed had their own explanations for and ways of thinking about this dilemma, and each one's perspective was in some way different from the others'.

Both Barrish and Cole explained that there is historical context for the integration and separation of these two spheres. They discussed that, for a great deal of time, medical humanities had no professional organization of its own, but was instead housed under the American Society for Bioethics and Humanities. Under this organization, many members with a focus on humanities felt that they were being dominated by bioethics in an environment that merely tolerated the humanities. As such, Barrish and Cole relate that those members broke away from

the organization and formed the Health Humanities Consortium in 2015 to ease their tension with bioethics and create a home of their own.

Both Cole's and Barrish's views on the matter seem to reflect their knowledge of this tension. Cole describes bioethics as a method of problem solving that usually relies on guiding principles, and Barrish says that many people find bioethics to be "reductive and abstract" as well as apolitical, focusing on particular philosophical and religious matters while missing other important issues (P. Barrish, personal communication, February 10, 2020). Cole ultimately says that he believes bioethics is a key component of the medical humanities, but that the two are not identical and that most programs claiming to cover both contain a large amount of ethics with very little humanities. Barrish avoids thinking of bioethics as a subunit under medical humanities but thinks that they both have their own important place. He also notes that one of the reasons bioethics continues to be so attractive, even among people who might find medical humanities to be a richer and more stimulating field, is that it results in better job prospects. There are job positions for ethicists who round and consult in hospitals, and there are a lot of graduate education programs to qualify one for those positions. However, Barrish points out that a career in medical humanities is almost strictly confined to teaching, education, and the academy, and there are few programs to prepare for that route. This could be a potential explanation for bioethics seeming to find an advantage over medical humanities even in the educational and professional settings they are meant to share.

Whereas Cole considers bioethics an important component piece of medical humanities and Barrish views them as each valuable but mostly separate, McGuire sees things differently. Her vision of the relationship between the two is that of an overlapping Venn diagram with some areas shared and some areas remaining distinct. While the humanities encompass elements like

literature, history, and narrative, she finds bioethics to be rooted much more in philosophy and theology. For these reasons, she finds bioethics and medical humanities to be different disciplines with different methods and training strategies. However, she stresses that each can inform the other and that the two overlap in their common goal of engaging the softer aspects of medicine.

Sadler offers yet another perspective, one which questions the usefulness of the debate altogether. To him, conflict between the roles of bioethics and the humanities is similar to "oppressed minorities criticizing each other," which only serves to prevent either from thriving and to keep both of them in marginalized positions relative to other aspects of medical education (J. Sadler, personal communication, March 3, 2020). Although ethics utilizes humanities in a more applied way than the study of arts and humanities in and of themselves, he sees each as being potential pathways to engaging and appreciating the other, and he finds both perspectives crucial.

Truthfully, I cannot I say I find reason to disagree with any of these perspectives, and I think Sadler is correct that care must be taken in discussions such as these to avoid perpetuating tensions that only diminish the vitality of both fields. What all of these views seem to have in common is an acknowledgement that the two fields are linked in some ways and divergent in others. Something Barrish mentioned to me that I find useful in considering the matter is that one can draw a distinction between *bioethics* in its narrow, technical construction and the concept of *ethics* more broadly as it concerns morality, decency, and compassion. There is no doubt that broad ethics and medical humanities are related and mutually beneficial, with each contributing valuably to the other. To consider, study, and practice good ethics requires knowledge and use of

religious studies, history, narrative, and other aspects of the humanities. Likewise, consideration, study, and utilization of medical humanities is often in the service of ethical goals.

The history and nature of medical humanities as both interdisciplinary and transdisciplinary also leads me to wonder whether the search for a satisfying answer to this question is contradictory to the vision of the field in the first place. However, because medical humanities does have so much to do with education and does so often take place in the academy, I still think the distinctions between bioethics and medical humanities are important to discuss as they relate to the teaching of each of them. In the educational setting, I find that both pieces are invaluable to the training of medical professionals, and that if housing the two under the same roof, department, or program leads to increased opportunities for recognition and resources within an institution, then that is not something to be avoided. However, I also feel that departments and programs that claim to work, study, and educate in both disciplines must be sensitive to the differences between them and give attention to their unique needs, goals, and purposes without treating them as one and the same. Overlap and mutualism acknowledged, the two may reasonably be grouped, but not necessarily fused, and caution should be paid to avoid treating them as one homogenous or identical entity.

Health Humanities

Another challenging concept that arose over the course of my research was one that on the surface seems to regard terminology, but more deeply is a matter of diversity and inclusion. The literature-based portion of my research brought me to a 2017 article in *Academic Medicine* by Jones et al. that argued for a shift from medical humanities towards “health humanities” in both language and substance. Jones et al. (2017) discuss that there are plentiful types of healthcare providers beyond medical doctors who could benefit from and contribute to the field

that we now call medical humanities. As such, they find that calling the field by a name that only encompasses medicine alienates the majority of these providers. Jones also explains in both that article and another on which she is a co-author that so much of what determines overall human health falls outside of the realm of medicine, including socioeconomic, cultural, and identity-based factors (Jones et al., 2017; Goldberg et al., 2014). To Jones et al. (2017), calling the field health humanities rather than medical humanities centers it around the promotion of well-being and whole health while being inclusive to anyone who has been marginalized or excluded by traditional medical care.

The experts that I interviewed hold similar points of view. Both Barrish and Cole emphasize the importance of health humanities including non-M.D. healthcare workers and including the voices of those who have been overlooked by medicine. Barrish uses the example of people with disabilities who have had poor experiences with a medical system that often views them as having "defects" that medicine must "correct." Cole speaks of health humanities as using the lenses of disability, race, and queer studies to view medicine carefully and critically as a discipline that holds power and does not always use it appropriately. Both of them see health humanities as encapsulating all aspects of health, rather than only the environment of medicine, thus broadening the scope to include social justice. Additionally, both scholars view medical humanities as a discipline focused heavily on medical education and training, while health humanities expands beyond the learning environment.

For the same reason, I decided to use the term medical humanities in the majority of this thesis, since it is first and foremost focused on medical education. Jones et al. (2017) also found continued use of the term appropriate to refer to the academic and educational work that takes place in strictly medical settings. My opinion on that matter has not changed drastically. I still

believe medical humanities is the appropriate term for medical school education that bridges elements of physicianship to the humanities. From what I have learned about the programs and curricula available in Texas medical schools, it does not appear that they have sufficient time and space to expand their medical humanities offerings to encompass the much broader scope of health humanities. I feel that to begin calling the existing programs and curricula by the name of health humanities without implementing change to align them with health humanities' indispensable frames of view would dilute the meaning and importance of those perspectives and that work.

It seems to me that the ideal way to conceptualize medical humanities and health humanities is by viewing the former as a subdivision under the latter. Medical education still implements medical humanities imperfectly and may not be equipped to broaden towards health humanities in the foreseeable future. However, I have no doubt that the overall field extending beyond medical education and into other types of education, research, scholarship, and public health should adopt the breadth and perspectives of health humanities and refer to itself accordingly.

Role of Undergraduate Education

While medical schools may not have the curricular flexibility to implement health humanities and may instead continue to focus their efforts on medical humanities alone, another educational environment in which health humanities may flourish is that of undergraduate institutions. With the openness of curricular timelines, the ability to draw upon faculty from a variety of disciplines, and the participation of larger student bodies with vast and varied interests, undergraduate colleges and universities are uniquely situated to implement heath humanities programs and curricula. Doing so would allow pre-health professional students to meaningfully

engage with health humanities when they have more time, space, and energy to do so and perhaps when they are more impressionable than during professional school. If undergraduate schools can reach pre-medical students, in particular, at this critical time when they are considering their careers in medicine, then perhaps more of them would come to see physicianship as a rewarding, humanistic calling rather than a demanding, outcome-oriented job. I feel that this and the other aspects of health humanities could lead to a more compassionate, empathic, person-oriented cohort of medical students and eventually of the physician workforce.

Additionally, it is likely that undergraduate health humanities would attract students interested in other aspects of health like public policy, public health, healthcare administration, communications, nutrition, and more. This could greatly expand the impact of health humanities instruction on the health world at large. It would also expose pre-medical students to interprofessional ideas while they are exploring and forming their own ideas about healthcare, equipping them to better understand its many dimensions beyond the role of a doctor, hopefully leading them to become more conscientious physicians.

Health humanities education in undergraduate schools also supplies a solution to a commonly-faced problem among pre-medical students who are eager to gain medical experience for their medical school applications and for assurance of their desire to pursue the field. Heitman points out that the main method students utilize in acquiring this experience is clinical shadowing, which she argues is not in fact the students' experience at all, but is rather an observation of someone else's health experience which belongs to them alone. As an alternative, she suggests that reading literature and engaging works of humanities about health and illness allow students to access and absorb a large array of experiences from the points of view of those who lived them in a non-invasive way that avoids co-opting their narratives.

Furthermore, if medical students are able to internalize the views of health humanities in its broad scope prior to reaching medical school, then they will be much better prepared to understand and integrate the medical humanities instruction they receive there. In the same way that students learn broadly in undergraduate science and then focus their learning on clinical science in medical school, health humanities could serve to provide students with fundamentals, frameworks, and breadth before transitioning to the more specialized medical humanities in medical schools. There they can draw upon the base-knowledge they acquired in undergraduate school to concentrate more deeply on the specific knowledge and skills offered by medical humanities that are important to a medical career.

However, if undergraduate implementation of health humanities leads medical schools to become complacent in their medical humanities endeavors, then this value is lost. Like McGuire expressed when explaining her visions for undergraduate health humanities, we cannot allow undergraduate programs to replace the ones in medical schools. Undergraduate experience in health humanities can only increase medical humanities interest and learning in medical schools if medical schools continue to provide those opportunities. In some ways, the replacement of medical school programs with undergraduate ones could possibly even worsen the education of students who intend to become physicians. If their humanities learning stops before they ever have the opportunity to see and care for patients in a clinical setting, it is not clear that students will form the necessary connections between these experiences, and the value of the learning to their medical education and practice will likely be diminished.

If the relationship between broad undergraduate health humanities and more focused medical school medical humanities is to work, both types of institutions need to uphold their ends of the arrangement. However, it is also important for them each to understand their distinct

roles and not to extend beyond what they can reasonably provide. If medical humanities is aligned towards the specific needs and circumstances of medical trainees and providers, then most undergraduate institutions are not equipped to provide education in that way because most undergraduate instructors will not have had experience or training in medicine and medical issues. For example, Heitman cautions against having philosophers at undergraduate institutions teach medical ethics under the label of medical humanities if those professors have only theorized about medicine without any formal training or experience with the matter. She also finds that type of instruction more likely to focus on exciting, sensational cases of medical ethics, which are challenging to learn from without an existing understanding of basic frameworks.

This kind of learning misses the key purpose of including health humanities education in undergraduate schools as a way to master the basics. Even more, in this instance of straying more towards medical humanities, this kind of learning also gets it wrong, as most medical professionals will not find themselves in such complicated, dramatic cases. As such, it is important to maintain balance between the undergraduate and medical school spheres, and undergraduate schools must take care not to intrude upon roles more suited to medical education.

Recommendations

Based on the information that I gathered throughout this process, I have developed my own recommendations as to what I as a student would most like to see offered by schools I would consider attending. Knowing well now what types of options exist, their formats, and their advantages and disadvantages, especially as told by experts with experience constructing and teaching these opportunities, I have attempted to consider each of these facets. Another important factor that I have tried to take into account is the dearth of curricular space that medical schools feel they can spare to include these opportunities. It seems to me that this is one

of the most important barriers preventing schools from implementing medical humanities because it can challenge even those schools that have the financial resources and administrative support to do so. My ideas of what schools will or will not be able to carve out the time and space for are partially speculative, but given that so many of the schools in this study are currently utilizing more than one type of medical humanities education approach, I believe that my suggestions are actionable under hospitable circumstances.

I believe that schools intending to offer robust education in medical humanities should ideally include opportunities from each of the integrated-longitudinal approach, the elective-based approach, and the scholarly concentration approach. Because medical students are busy and their levels of interest in the subject will vary, I think a tiered strategy is important. It ensures that all students receive some level of mandatory exposure and provides options for interested students to pursue further learning as their availability and level of desire allow, all without overwhelming students with lesser availability or interest. Each tier contributes to this schema in a different way.

The integrated-longitudinal approach supplies the mandatory component which should ensure that no student leaves medical school without at least a basic understanding of medical humanities, ethics, and humanistic care as they relate to the study and practice of medicine. To accomplish this, Heitman stresses the importance of including the topics early and often. I suggest their prompt inclusion in semi-interactive, yet didactic formats within first-year or preclinical modules like Practice of Medicine (POM) at UTMB, Doctoring at McGovern, or Colleges at UTSW. These sessions should serve to introduce students to the frameworks of these subjects in ways they can later recall and rely upon as their further educational and career experiences call for. Sessions like these should continue to be interspersed throughout the

modules at regular intervals such that students recognize the topics as a recurring and important piece of their education and can anticipate their occurrences, enabling them to show up with the correct frame of mind.

However, it is unlikely that these sessions would be able to occur at the frequency with which I believe students should engage these topics. To provide more frequent exposure that also offers a greater level of student participation, I recommend the inclusion of the topics within what medical schools generally call problem- or case-based learning (PBL/CBL), similarly to what Dell is trying to do with PILLARS. This would involve presenting small groups of students with actual patient cases that involve matters of ethics and humanism, asking them to research and consider aspects of the cases including both the clinical and humanistic, and then having them present on these matters to their classmates. This would allow students to apply what they had learned in didactic sessions to realistic examples involving the lives of (theoretical) people. If possible, some humanistic elements should be included in each case so that students get practice with them every time they work on a PBL/CBL activity. Both of these measures should help with memory retention and content solidification.

The elective-based approach supplies the opportunity for students to access further medical humanities education in a customizable way that they can tailor to their individual interests and needs. With electives, instructors are able to provide education in the field through a variety of different topics, modalities, and educational philosophies. Offering students a variety of medical humanities related electives allows them to sustain and further their knowledge in the aspects of the field in which they have the strongest desire to learn. I also suspect that students may be more likely to remember and incorporate information from courses which they chose to take for themselves based upon their personal curiosity or anticipation of enjoyment. The

electives offered can, and probably should, fill a spectrum from relaxed and undemanding to formal and intensive, but I believe attention should be paid at any level of that spectrum to the quality, utility, and rigor of the courses.

The scholarly concentration approach enables students like myself, who have intense interest, to deepen their medical humanities education in a way that is more structured, more thorough, and more continually progressive than either of the other two approaches can offer. While scholarly concentrations must be manageable for students to complete without detracting from their other academics and obligations, a balance should be found that requires students to put forth a reasonable but substantial amount of effort and time. This approach even more than the others requires caution not to give the illusion of creating expertise where it is not warranted, and students should not be able to acquire a certificate through a concentration that requires only negligible work. Students who want to learn more about medical humanities with the minimal amount of encroachment upon their other commitments should utilize electives rather than concentrations. Concentrations should be for students who are willing to make a commitment to deepening their study of medical humanities through time and dedicated scholarship. This approach is the one of my recommendations that may be the most challenging for some schools to enact, as it is extremely difficult to create and maintain scholarly concentration programs in the absence of an endowed center or institute to design, instruct, and manage them. However, I strongly believe that any school with the ability to offer this opportunity should do so.

I expect the combination of these three approaches to provide medical humanities education suitable for every type of medical student. I believe that implementation of the suggestions I have described has the potential to minimize the prevalence of the issues that

Heitman and I discussed while maximizing the robustness of medical humanities education in careful balance with the other educational goals of medical students and schools.

Conclusions, Limitations & Future Directions

My research was successful in gathering, centralizing, and explaining a great deal of information about the medical humanities educational opportunities at the six medical schools included in the study. Described in as much detail as possible are the programs and curricula each school offers, their purposes and goals, their research and evaluation, and their directions and plans for the future. All of this information about medical humanities in Texas medical schools, which typically is challenging to access, appears in this single document, presented among its historical and disciplinary context, a review of its relevant literature, the voices of field experts, and a discussion from my own perspective. The presentation of each of these elements is colored by my lens as a prospective medical student who wished for this type of information during the application process and who will eventually become a user of the curricula and programs described.

I have found six out of six schools to utilize an elective-based approach to medical humanities education, five out of six schools to utilize an integrated-longitudinal approach, four out of six schools to possess medical humanities centers or institutes and offer a scholarly concentration approach, and one school to offer an advanced degree approach with a second planning to soon. These results are summarized in *Figure 4*. As such, I find it reasonable to say that medical school applicants in Texas have a variety of options to choose from when considering schools that offer education in medical humanities and that most medical students at the studied schools should be able to find at least one way to access education in medical

humanities. To improve the state of medical humanities education in Texas medical schools I suggest that schools attempt to implement opportunities in the area from each of an integrated-longitudinal approach, an elective-based approach, and a scholarly concentration approach. Each of these strategies come with their own potential challenges and problems that must be proactively considered and avoided, and I have described how to go about doing so.

While I was able to collect extensive information about what the medical humanities programs and curricula at the six studied schools entail, I was not able to obtain evaluative data, analysis, or results for any of the schools. This limits my ability to report on the success of these educational opportunities with regards to their stated purposes and goals and also with regards to the many types of value that the literature attributes to medical humanities education. In the absence of analytical information, the descriptive information that I have detailed can only tell applicants, students, educators, and administrators so much.

Additionally, I was not able to include the perspectives of current medical students who are using or have used the educational offerings discussed. I do not doubt that the voices, experiences, and opinions of those students would add immense value to the description and discussion of programs and curricula. As much as I believe my perspective is valuable as someone who views these opportunities with a hopeful but critical eye in considering how I would fit into them myself and how they would add value to my own education, I am not yet a medical student and have not yet fully experienced the environment of medical school. Both perspectives are invaluable and should hold a place at the table in this conversation, but I have only been able to provide one of them here.

Furthermore, while I believe the six schools included in this study are a useful sample in examining the Texas medical schools' medical humanities landscape, they represent only six out

of the 14 medical schools in the state. The sample of six that I have discussed includes Texas' leading private medical school and all of the UT System medical schools except the UT Rio Grande Valley School of Medicine, which currently holds only preliminary accreditation ("Accreditation," n.d.). Schools from the Texas A&M System, the Texas Tech System, and other private or non-UT System public schools were not included in my investigation but would be a valuable addition to create a more complete picture of medical humanities education across Texas medical schools.

Finally, my research and writing have been fit to the constraints of an undergraduate thesis in terms of scope, depth, resources, and my own expertise. It is possible that a higher-level investigation would be able to yield more robust results and conclusion.

In response to these limitations, there are several future directions for further research in this area that I would recommend. The primary one involves focusing specifically on existing evaluation and research that have analyzed how well schools, programs, and curricula are meeting their own goals and other criteria. A project with the means to search diligently for this type of data from several schools and create a set of standardized criteria to synthesize and compare them would complement and build upon the information presented in this paper. Dividing up the results of that data in accordance with programmatic and curricular types and approaches could provide meaningful insights into which ones tend to find more success.

Additionally, a more in depth historical and causative analysis examining why and how different schools have come to offer particular types of opportunities could be useful in understanding the environmental elements that promote or hinder the flourishing of medical humanities in medical schools. Looking further into the financial, academic, administrative, and other factors impacting the development of medical humanities programs and curricula would

likely prove valuable in that way. Similar investigations could be conducted through an advocacy lens drawing conclusions about how students, educators, and administrators can more effectively advocate for increased and improved medical humanities offerings.

Finally, carrying out studies similar to this one that collect information about the medical schools in other parts of the country and world would enable comparison, thus providing a measuring tool of sorts to see how well particular areas are doing in terms of their medical humanities landscapes. This information would also benefit students who apply to both in- and out-of-state medical schools along with anyone seeking collaboration with a wider network.

Epigraph

The practice of medicine is an art, not a trade; a calling, not a business; a calling in which your heart will be exercised equally with your head.

–Francis W. Peabody, *The Care of the Patient, 1927*

Time, sympathy and understanding must be lavishly dispensed, but the reward is to be found in that personal bond which forms the greatest satisfaction of the practice of medicine. One of the essential qualities of the clinician is interest in humanity, for the secret of the care of the patient is in caring for the patient.

–Sir William Osler

The practitioner deals with facts of two categories. Chemistry, physics, biology enable him to apprehend one set; he needs a different apperceptive and appreciative apparatus to deal with other, more subtle elements. Specific preparation is in this direction much more difficult; one must rely for the requisite insight and sympathy on a varied and enlarging cultural experience. Such enlargement of the physician's horizon is otherwise important, for scientific progress has greatly modified his ethical responsibility… The physician's function is fast becoming social and preventive, rather than individual and curative. Upon him society relies to ascertain, and through measures essentially educational to enforce, the conditions that prevent disease and make positively for physical and moral well-being. It goes without saying that this type of doctor is first of all an educated man.

–Abraham Flexner, *The Flexner Report, 1910*

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Author Biography

Molly Schlamp is a senior Biochemistry, B.S.A. and Plan II Honors, B.A. double major in the Health Science Scholars honors program. Before college, she was a student of the Carroll Medical Academy at Carroll Senior High School in Southlake, TX. In her time at the University of Texas, she learned the value of a broad education including both the humanities and the sciences through pursuing a degree in each sphere and through an array of non-academic experiences. She spent her time outside of school volunteering, working as a teacher, tutor, and instructor, researching youth homelessness with non-profit organization LifeWorks, and competing nationally with the UT Austin Texas Taekwondo team. Molly is excited to be attending medical school at UT Southwestern in Dallas next year, where she and her thesis advisor, Dr. Stephen M. Sonnenberg, are hoping to advocate for and help create increased opportunities in medical humanities!