

the Rutgers Journal of Bioethics

Volume VIII, Spring 2017

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— *Letter from the Editor*

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ABOUT

The Rutgers Journal of Bioethics is an undergraduate journal exploring the intersection of ethics, biology, society and public policy. It has been published each year since 2009. While the journal solicits articles from all persons wishing to participate in the open discussion on bioethics, it is started by students at Rutgers, the State University of New Jersey. The journal is published by Premier Graphics (500 Central Ave., Atlantic Highlands, NJ 07716) and funded through generous contributions from the Rutgers University Student Assembly Allocations Board. The journal welcomes all unsolicited original essays, book reviews, editorials and art. To submit, please e-mail a copy of your paper or a high resolution image of your work of art to <rubioethics.journ@gmail.com>. ©

2017 The Rutgers Journal of Bioethics. All copyrights to art or essays belong to their respective authors. All other copyrights belong to *The Rutgers Journal of Bioethics*. Please send all questions and comments to the above email address. Our sister organization, the Bioethics Society of Rutgers, the State University of New Jersey, meets every other Wednesday during the academic year at 9:00PM in Rm. 106, Scott Hall (43 College Ave., New Brunswick, NJ 08901). All are welcome to attend. Sometimes we have pizza. Meeting details are available at <<https://www.facebook.com/bioethics.ru>>. We would like to thank Dr. Eric Singer and Dr. Michael Solomon of Robert Wood Johnson University Hospital for their advice and support. ISSN 2475-6431.

Letter from the Editor

The year of 2017 ushers in a wave of political change, and the eighth annual issue of the *Rutgers Journal of Bioethics* reminds us that such political changes actively shape the realm of bioethics. This issue explores how such legal and political dynamics affect bioethical issues, such as using birth control, having abortions, receiving uterine transplantations, utilizing surrogacy, performing clinical trials, and undergoing medical professional trainings.

Of particular concern in the year of 2017 are minority rights and health, as these topics have continuously risen to the surface in light of recent political change. As such, we have selected articles that especially explore these themes--whether it be through the legal history of birth control court cases or through an analysis of the exploitation of the global South by the global North in conducting clinical trials. *The Rutgers Journal of Bioethics* realizes that it is more important than ever before to consider the intersectionality of human rights, health, and ethics.

Within these pages, you will find us attempt to answer critical questions like, "How do politics shape health outcomes for people of different socioeconomic backgrounds?" and "How do power and privilege play a role in health?" Now is the time, more than ever before, to grapple with such questions as we consider which legal and political changes we would like to accept and which ones we would like challenge. Evaluating the morality of political and legal changes through the lens of biology is more important in 2017, a year of dramatic legislative change, than it ever was.

We hope that this issue of the *Rutgers Journal of Bioethics* exposes you to the ways in which the political landscape of 2017 can shape health outcomes for millions around the country and around the world. We encourage you to approach this issue with an open mind and hope that it enables you to think critically about the effects of politics on global health. This publication was made possible by the help of our sister organization, the Rutgers Bioethics Society, which has worked tirelessly to organize its symposium on health disparities, during which this publication will be launched. We thank our publishers, our editors, and our layout team for their hard work in creating a diverse and insightful publication. We urge you, our readers, to consider the multiple perspectives on the issues discussed in this publication. We encourage you to use this publication as a starting point to increase awareness and promote discussion of these exceedingly important bioethical topics.

Vandana Apte
Editor-in-Chief, *The Rutgers Journal of Bioethics*

Letter from the Society

In our time at Rutgers, the Bioethics Society has served as an open forum for discussing the latest, pressing issues in public health, medicine, and various fields of biology. The Bioethics Society is a hub for students of all backgrounds and experiences to share their thoughts on these issues as well as possible solutions to problems we face. We value this diversity for the varied perspectives that each student brings and the lively debates that ensue. It is only through the discussion of multiple viewpoints that we are able to delve deeper into subjects and reach a greater understanding of such complex moral and social issues.

This year we have debated the ethics of saving endangered species, eggless babies, and the ethics of personhood, among many other topics. These discussions were particularly enriching, and they shed light on how multifaceted bioethical issues inherently are. Moreover, we collaborated with the National Community Pharmacists Association to discuss the ethics surrounding the legalization of medical and recreational marijuana. We were also delighted to have clinician and bioethicists Dr. Eric Singer from Rutgers Cancer Institute of New Jersey lead us in a challenging session on organ allocation.

Also, in launching our new social media campaign through the hashtag #RUBioethical, we set out to broaden the conversation on current controversial issues in bioethics. Our hope is by having and sharing discussions with students about key issues that lie at the crossroads of science, medicine, technology, law, and policy, we will be able to spread awareness of all these important topics. We had students voicing their opinions on issues ranging from reproductive rights, to mental health issues, to the ethical use of new genomic techniques, such as clustered regularly interspaced short palindromic repeats (CRISPR).

This year, our annual symposium features a theme surrounding disparities in health and healthcare. We hope to not only pose thought-provoking questions to the young minds across Rutgers, but also educate our student body about real national and global issues. With this journal, we hope add depth and critical analysis on these topics.

Finally, we want to acknowledge the executive boards of both the society and the journal for their hard work and dedication throughout the year to bring these important issues to the Rutgers community. It has been a great privilege and a joy to work alongside an eager group of diverse student thinkers. We humbly invite you all to take the time to appreciate the passionate efforts that brought this journal to you and to come join us in the conversation!

Alex Lin & Suraj Shukla,
Presidents, Bioethics Society of Rutgers University.



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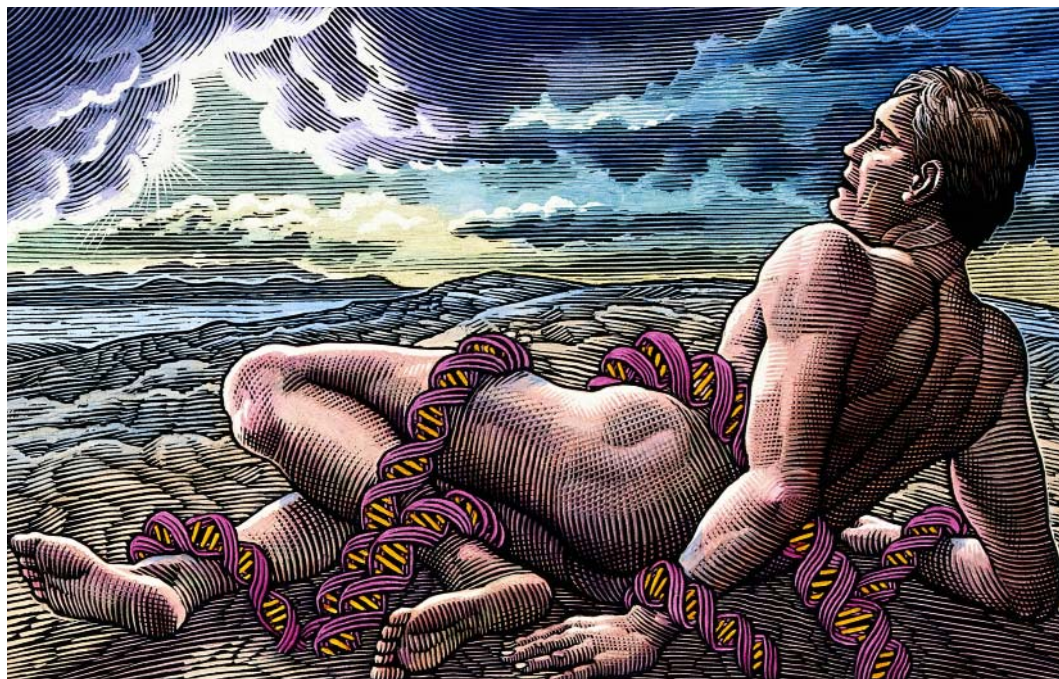
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Cardiopulmonary Resuscitation (CPR), Social Stigma, and Real Women

by Ashley Kunnath[†]

In 2015, a Canadian research team published an article in *Resuscitation* titled, “Does the sex of a simulated patient affect CPR?” The experiment asked 69 laypeople to conduct CPR with an automated external defibrillator (AED) on a patient simulator. The key variable was that some of the participants resuscitated Stan, and others Samantha. During the experiment, the AED instructed participants to “remove all clothing from the patient’s chest” before applying the shock pads (Kramer et al., 2015, p. 83). Data analysis revealed that rescuers were much more likely to bare Stan’s chest than Samantha’s. Broken down even further, the results showed that male rescuers were significantly less likely than female rescuers (13% vs 67%) to take both Samantha’s blouse and bra off (Kramer et al., 2015, p. 84). Interestingly, however, there was no difference in how men and women in the study removed Stan’s clothing.

The study suggests that rescuers—especially men—will go to great lengths to preserve a woman’s modesty. This conclusion is not surprising con-

sidering that publicly baring a woman’s breasts is highly contentious. If a woman walks around topless, people assume that she means something by it—a protest, an invitation, maybe a lapse in her sanity. In contrast, the average man’s naked torso is unremarkable in many contexts. A shirtless man can be as normal and uninteresting as your father sweating on the porch in the heat of July. This social double standard is aggravating most of the time, but it becomes downright dangerous when it carries over into the medical field.

The stigma around female nudity negatively affects the care delivered to women who have heart attacks. Research shows that bystanders are less likely (60% vs 70%) to start chest compressions when the patient is female (EMSWorld, 2016). This fact is discouraging since bystander CPR initiated within two minutes of a sudden cardiac arrest doubles the likelihood of survival (Hasselqvist-Ax et al., 2015). Delaying chest compressions until Emergency Medical Services (EMS) arrives could be potentially life-threatening for the patient. Furthermore, the av-

[†] **Ashley Kunnath** is a junior in the School of Arts and Sciences (SAS) at Rutgers University majoring in English and minoring in Biology. She currently works as an EMT and volunteers in the ER at Robert Wood Johnson Hospital in Hamilton. In the future, she aspires to become a doctor who employs a narrative medicine approach to treat patients holistically. She thinks that it is very important to be aware of the intersectional identities that patients have, and to consider the ethical implications that treatment has on each individual.

erage time that EMS spends before first rhythm capture with an AED and first chest compression is longer for female patients (Mumma & Umarov, 2016). Considering that brain cells begin to die after 3 or 4 minutes without oxygen, it is vital that rescuers work to deliver faster care—especially for women in cardiac arrest.

Perhaps one reason why people hesitate before resuscitating women is that they are unsure about the protocol. Should they remove her bra? Where should they place their hands for compressions? These doubts are natural since they are not properly addressed in CPR training classes. The solution is to create a standard practice that clearly outlines what to do for female cardiac arrest patients. Until an agency such as the American Heart Association or the National Safety Council provides official guidelines, the best practice is to remove all clothing—even bras—before starting compressions.

Some people may contend that keeping a woman's clothes on maintains her dignity and autonomy. Preserving patient's rights is a particular concern in emergency situations, which sometimes occur outside the home. Every emergency medical technician (EMT) will learn to dread the crowd of onlookers that gathers around patients in a public space. How can you explain to them that your training tells you to take an unconscious woman's bra off, and you are not a pervert for doing so? How can you persuade them all to turn around or avert their eyes as you invade her privacy? Notwithstanding these concerns, I stand by the logic that it is better to be em-

barrassed than dead. When a patient is trauma naked, health care providers can scan his or her body for any immediate threats such as lacerated arteries or occluded airways. In fact, the whole medical field operates on the assumption that people would prefer to be alive. Though this assumption is not a universal truth, first responders perform CPR on any person in cardiac arrest without a visible Do Not Resuscitate (DNR) order. Along the same lines, the standard response to any myocardial infarction should be to strip the patient, start compressions, and find an AED if possible.

Another argument is that it is “not necessary to remove a patient's clothing in order to do chest-compression-only CPR” (Sarver Heart Center, 2015). A thin layer of clothes will probably have little impact on the effectiveness of compressions. In fact, the time it takes to remove clothing may even be detrimental to the patient's outcome. Loss of time is loss of heart muscle. This argument is valid until one accounts for the fact that compression-only CPR has a 14% survival rate (Harvard Medical School, n.d.). It is much more recommended to perform CPR with an AED since survival climbs to 23%. With an AED, you must remove clothing to apply the defibrillator pads. It is not advised to just stick the pads around or under clothing, since any metal—such as a female patient's bra clasp or underwire—will conduct the electric current.

Although there are several reasons to remove all of a woman's clothes before CPR, it is important to establish a standard way of resuscitating females. Rescuers should not waste time think-

ing about the proper thing to do. One assumes that people in the medical field get some sort of training that prepares them to do CPR in a wide variety of situations: on women, on children, on trauma victims bleeding from every crease in their bodies. However, I am one of these trained professionals, licensed by the state of New Jersey to respond to any emergency. Over the course of my life, I have been certified or recertified for CPR three times. Yet, I have never been explicitly told how to perform CPR on an adult woman. None of my instructors have talked about how to remove a bra or where it's okay to place my hands to perform CPR effectively on women. I have even been provided with a female training mannequin.

The first time I saw a patient in cardiac arrest was during my emergency room (ER) hours at the end of my EMT course. She was an elderly woman who had spent half her lifetime in and out of the hospital's cardiology department. I watched from the corner of the room as the code team worked around her limp body. The situation aligned poorly with the androgynous mannequin training I had done before. From the start, her face was pale and her lips were blue--dead, I decided. Yet, the staff ripped open her gown, cut through her bra, and started to pound on her sternum. This person's body deviated in another important way from our dummy's plastic torso: two wrinkly, white breasts, knocked around irreverently as the team reached for the heart underneath them. In the heat of the moment, the woman's breasts became nothing more than anatomy, one part of the whole organism they were

trying to save.

This is the extent of any training I have received in female CPR. If I had come to the ER on a different day to complete my hours, I would have missed it--the obvious-but-shocking fact that CPR happens on real women, not dummies. Then perhaps I would have had to learn in the field, where both the stakes and the stress are a lot higher. Patient outcomes for CPR are already low; I would not want my lack of experience to be a factor that makes them even lower. There is a dire need for reform in the way CPR is taught to both the public and to professionals. Training videos and patient simulators need to be more representative of actual female patients to overcome social stigma.

REFERENCES

- EMS World. (2016, April 17). Study: Bystanders Less Likely to Intervene When Women Suffer SCA. Retrieved January 19, 2017, from <http://www.emsworld.com/news/12195757/study-bystanders-less-likely-to-intervene-when-women-suffer-sca>
- Harvard Medical School, Health Publications. (n.d.). CPR saves lives, but combined with AED Defibrillators it can save many more [Press release]. Retrieved from http://www.health.harvard.edu/press_releases/aed-cpr
- Hasselqvist-Ax, I., Riva, G., Herlitz, J., Rosenqvist, M., Hollenberg, J., Nordberg, P., . . . Svensson, L. (2015). Early Cardiopulmonary Resuscitation in Out-of-Hospital Cardiac Arrest. *New England Journal of Medicine*, 372(24), 2307-2315.
- Kramer, C. E., Wilkins, M. S., Davies, J. M., Caird, J. K., & Hallihan, G. M. (2015). Does the sex of a simulated patient affect CPR? *Resuscitation*, 86, 82-87.doi:10.1016



Typical human simulator used for CPR training classes. Rama, 2008 *CPR Training*. Wikipedia.

Mumma, B. E., & Umarov, T. (2016).
Sex differences in the prehospital
management of out-of-hospital
cardiac arrest. *Resuscitation*, 105,
161-164. doi:10.1016

Sarver Heart Center. (2015).
Frequently Asked Questions
about Chest-Compression-Only
CPR. Retrieved 13 December
2016, from <http://heart.arizona.edu/frequently-asked-questions>

Social Contracts and the Commodification of Life

by Adil Menon[†]

It is a commonly held belief that research ethics violations in the developing world primarily occur due to the lack of enforceable research guidelines in contrast with the rigorous standards researchers must meet to conduct research in more developed nations. This paper seeks to explore both the defensibility of this perception and the argument that simply universalizing research guidelines will serve as an effective solution to preventing exploitative research from occurring in the developing world. This narrative based on transplanting the guiding principles of American biomedical research, without parallel restructuring of social contracts to safeguard access to the products of research, is insufficient for preventing ethical violations in developing countries. This paper further argues that expanding research protocols abroad, in the absence of robust social contracts, not only fails to protect potential subjects, but also lays the groundwork for increased exploitation by giving unethical research the patina of respectability. Lastly, this paper explores how universalizing ethical guidelines facilitates creation of biocapital by lending the practice a veneer of ethical legitimacy.

† **Adil Menon** will graduate with his Masters in Bioethics from Harvard Medical School at the end of the 2016-2017 academic year. Prior to this he graduated from the University of Chicago with honors in the History, Philosophy, and Social Science of Science and Medicine (HIPS). His honors thesis work centered on addressing disparities in research participation between different ethnic groups. During his undergraduate career Adil served as an editor and author for the *Triple Helix* undergraduate research journal, mentored adolescents affected by sickle cell disease while serving as Program Coordinator for STRIVE, served as Global Health University coordinator for Globemed, and was a teaching assistant for “The Human Body in Health and Disease,” an introductory class in the biological sciences division. Adil’s academic credentials include authorship of “Joseph Goldberger: Epidemiology’s Unsung Hero” and “Is There a United Hippocratic School?” in the medical humanities journal *Hektoen International*, acknowledgements for editing work on the paper Global health from a cancer care perspective in the journal *Future Oncology*, and an

American Heart Association award for undergraduate research. Adil's specific interests within bioethics include the development of ethical and diverse clinical trials, and analyzing and offering potential solutions to address race based disparities in the clinical context.

The process of experimentation by its very nature is idiosyncratic and consequently raises questions of the relative value of different types of lives--both animal and human. However, within the frameworks generated by modern pharmaceutical testing, these dynamics have developed to an unprecedented degree. Rather than encompassing mere imbalances in power, the nature of clinical testing has created distinct kinds of human lives with markedly different purposes and value. Considering this often-overlooked facet of the globalization of research, linking the exploitative nature of foreign medical trials solely to international variations in ethical guidelines is revealed to be very much an oversimplification. To truly elucidate the roots of ethical quandaries observed in trials conducted in the developing world, it is far more valuable to consider the consequences of the commodification of life and health and the lingering threads of colonialism which pervade pharmaceutical research.

The traditional narrative for explaining the distinctions between trials conducted in the developed world and those in the global South centers almost entirely on the need for stricter universal ethical guidelines. Trials in the United States adhere closely to the Nuremberg code, which emphasizes that participation in research must be voluntary and should never cause deliberate harm. This commitment to ethical research was further strengthened by 1974's National Research Act (Alfano, 2013). Under these two sets of guidelines, institutions wishing to do federally funded research need to set up an IRB charged with protecting the rights and welfare of human subjects of research and ensuring that research is conducted in accordance with accepted ethical standards (Alfano, 2013). Most bioethicists hypothesize that the shift towards the developing world as a research destination stems from a desire to escape these stringent conditions (Mitka, 2010). Intuitively, this account seems logical. In the United States and other developed nations, existing treatments, rather than placebos, are utilized as controls. The use of these treatments in the place of placebos raises the cost of the research, but this expense can be eschewed in foreign trials. In addition, researchers have far more robust legal obligation to balance risks and benefits in more affluent nations. This distinction between the U.S. and developing countries calls into question the researchers' commitment to beneficence and justice (Alfano, 2013). Additionally, the IRB system, as it operates abroad, is viewed as frighteningly vulnerable to ethical violations. Under current research guidelines, it is generally acceptable for a sponsor wanting a waiver to conduct a FDA approved trial in a foreign context to do little more than state that it

intends to use an IRB that complies with Good Clinical Practice (GCP). Furthermore, the Food and Drug Administration (FDA) pre-approval is not a prerequisite for foreign studies. Companies without pre-approval are still able to submit the results of these off-the-record studies for FDA consideration. Under this system, a company can simply bury a bad trial. If the study goes well, on the other hand, companies can introduce the data to the FDA with little more than a promise that GCP was followed (Alfano, 2013). Given this well-documented evidence of sub-standard regulation in the literature, it is understandable why people would immediately point to more standardized ethical guidelines as the solution to disparities between trials in western and developing nations.

Despite its intuitive appeal, the narrative of developing nations as the unregulated wild west for medical testing cannot be reconciled with reality. India offers ample empirical evidence for this contention. Rather than being a refuge from ethical oversight, India is, in fact, the only country in which the violation of good clinical practice represents a criminal, not civil, offense (Rajan, 2007). In addition, Indian research organizations place extreme emphasis on informed consent. Take for example Vimta Laboratories, based in Hyderabad. Vimta represents the gold-standard of Indian clinical research organizations. It is one of India's oldest institutions, the only one traded on the Bombay Stock Exchange, and has been audited twice by the FDA—passing both times with flying colors (Rajan, 2007). Integral to the organization's success are the great pains it takes to adhere to ethical guidelines. In the waiting room, a white board outlines all the risks that participants could accrue in a clinical trial. Additionally, all subjects who wish to participate must be literate males (Vimta only enrolls females if the trial sponsor specifies a need for female subjects). The company itself introduces its own specific guidelines, such as the fact that subjects weighing less than 55 kg's are immediately rejected due to the unacceptable risk of complications (Rajan, 2007). After considering the example of Vimta, it becomes apparent that the issues often observed in foreign medical trials are not primarily rooted in the absence of ethical guidelines.

As India proves, the lettering of research protocols can be transplanted and well established in developing countries; what is often ignored in the rush for universal standards is the fact that this transplantation is undermined by the absence of structural frameworks that give these guidelines value. In the United States, clinical trials carry with them an implicit social contract in which a small number of people assume the risk of testing potentially dangerous medication for the sake of larger social good that is potentially the byproduct of the development of new therapies. Admittedly, those recruited into Phase 1 trials tend to be of lower socioeconomic status, and the social contract will never be a purely liberal one. However,

a sentiment presuming that the therapy, if developed, will eventually be accessible to all, pervades the exercise. Furthermore, the issues of affordability and distributive justice raised by market-based access can, in principle, be addressed through liberal welfare-state mechanisms in western nations (Rajan, 2012). In the context of India, there is no guarantee that an experimental drug tested on a local population will necessarily be marketed there after approval—let alone be made available at an affordable cost. Indian populations are left without the implicit social contract of eventual therapeutic access; therefore, ethics in India and rest of the developing world are focused on legal concerns, such as acquiring informed consent, rather than on any meaningful patient protections. Consequently, research participation in the global South represents a form of high risk labor—not an investment in the social good (Rajan, 2012).

The discrepancies between trials conducted in developed and developing nations are also inextricably tied with the principle of biocapital. Biocapital closely mirrors Marx's views of capital, with the exception that health operates directly as an index of value, unmediated through the labor-power of the worker. In Foucauldian terms, "it is not labor but life itself which becomes the locus of value, with health becoming the index of life, rather than the facilitator of labor" (Foucault, 1971). Research participation plays a central role in the generation of surplus health and the perpetuation of systems of biocapital. As we have seen, biomedical markets in advanced liberal societies—especially the United States—depend on the generation of surplus health, which in turn, relies on the setting of risk thresholds. The knowledge of disease risk provided by diagnostic-testing capabilities, and calibrated through these thresholds, enables the marketing of drugs for diseases that are increasingly reframed as 'chronic' (Rajan, 2012). Much of the Phase 1 experimentation necessary to establish these baseline values, initially performed on marginal populations in the US, is now being increasingly exported to Third World sites such as India. This move stems, not from a desire to escape research protocols, but from the knowledge that experimental subjects outside the circuits of pastoral care and incapable of therapeutic consumption can be risked. These experimental subjects enable the existence of the neo-liberal consumer subjects for whom surplus health is generated (Rajan, 2007). This underscores the close relationship between surplus value and surplus health. Much like machinery increases surplus value through an increase in efficiency, clinical trials serve to bolster surplus health by demonstrating therapeutic efficacy. Vital to both these endeavors is the availability of populations to conduct high-risk labor (Rajan, 2007).

Intimately tied to concepts of biocapital are subtle threads of neo-colonialism. Looking back to our considerations, taxidermy, a cen-

tral aspect of the colonial exercise, places conquered lifeforms within a framework more readily understood by the conqueror. Virtually all Indian doctors speak English, and many have acquired postgraduate qualifications abroad, primarily in Britain or the United States (Rajan, 2007). Still more critical has been the compliance of India with common ethical guidelines. The partial ethics enshrined in 'good clinical practice', far from mitigating the structural violence of the biocapitalist enterprise, serves instead to facilitate it. Among the most powerful instruments through which this takes place are the informed consent form and liberal contract that it embodies. The informed consent document 'frees' experimental subjects from being coerced guinea pigs by providing them with autonomous agency (Rajan, 2012). By lending exploitative research the veneer of ethical legitimacy, the global harmonization of ethical standards, nominally proposed to protect vulnerable subjects, provides the conditions necessary for the creation of the 'merely risked' Third World subject (Rajan, 2007).

Neocolonialism also plays a central role in maintaining the biocapitalist framework by perpetuating issues such as lack of access. The history of Indian pharmaceutical patent law provides a powerful lens through which to examine these issues. The Indian Patent Act 1970 adopted process patents, which protect the methodology for creating a medication in place of product patents that ascribe ownership of the ultimate product. This shift has been lauded as allowing India to assume the 18th position in global pharmaceutical development. It should be noted that before the abandonment of the product patent model, Indian pharmaceuticals were among the most expensive; under a system of process patents, prices fell to among the cheapest globally (Bennet, 2014). Despite this empirical data, in 2005 Indian officials, eager to attract foreign investment, took a step into the past. Under provisions of the World Trade Organization (WTO), strong protections of intellectual property in the form of product patents were reintroduced into the Indian market (Chandraseka, 2014). While these provisions allow companies to protect their high prices in primary markets, they eliminate nations like India as markets, since product patents lead to the pricing of many patented therapeutics beyond what many Indian patients can afford. As our consideration of neocolonialism has elucidated, the harmonization of ethics goes hand-in-hand with the global harmonization of property regimes. These two parallel movements—the contractual codification of ethics and the exclusionary instruments of property—together provide global capital with the security to turn healthy Indian populations into experimental subjects, who are both merely risked and free to choose to be so (Rajan, 2012).

The ultimate consequence of all these factors is the emergence of a clear distinction between the kind of life encompassed by the American/

European beneficiary of modern pharmaceuticals and the citizens of the global South upon whom these therapeutics are tested. In the West, a patient has come to be valued by biomedicine only to the extent that she or he takes treatments and continues to take them. Healthy individuals, who do not currently take nor are likely to take medication, are, within the context of this economy, effectively valueless (Rajan, 2007). A normal life consequently comes to be defined as one that holds an aggregate potential of future illness. Thus, Health, as an abstracted category of value, is equated with future risk reduction, which must be practiced on an individual level (Rajan, 2012). Within this structure, therapeutic consumption is intended not to maintain healthiness, but to maintain an abstract and valorized Health to produce the future market on which the pharmaceutical industry speculates. This perspective is not without risk to its participants. In the modern era, Americans take more medications per capita than ever before, and each of these medications carries the potential of catastrophic and fatal side-effects and interactions. This therapeutic saturation also leads directly to biomedical rationalizations for the outsourcing of clinical trials, as it becomes increasingly difficult to test the effects of experimental drugs in populations that tend to be on many other drugs that interact with the medicines being tested (Rajan, 2012).

In response to the emergence of systems of biocapital, the pharmaceutical grammar has constructed new definitions of the “normal” human life and body. No longer is the default body healthy and drug-free, with pharmaceutical intervention necessary only in case of temporarily diseased states. Individuals are now viewed only as “treatment-eligible” or “trial-eligible” in the eyes of the pharmaceutical industry (Rajan, 2012). Every human, depending on their economic standing and geography, is either a potential consumer of drugs or an experimental subject. Within this worldview, any individual who does not participate in this economy, either by consuming treatments or by participating in trials, is a waste of potential value (Rajan, 2012).

Clearly, the answer to global inequalities in power and treatment within the pharmaceutical industry rests not on the standardization of ethics, but on a standardization of human lives. If we use systems of biocapital to view, and subsequently render, some people as mere subjects and others as mere consumers, life itself becomes a commodity and vulnerable to exploitation. Policy makers continue to overlook the commodification of life which pervades foreign pharmaceutical research in the status quo. Consequently, policies which bolster exploitative research are often proposed as solutions. The continued failure to see the dangers of universalizing ethical standards globally is epitomized in much of the rhetoric in defense of the transpacific partnership. Rather than establishing patient protections, organizations, in-

cluding Médecins Sans Frontières (MSF), reveal that this legislation would allow practices that extend copyrights, ensuring pharmaceutical corporations decades-long and easily renewable product patents (“Trans Pacific Partnership: A Letter to the President of the United States of America”, 2015). This legislation would also homogenize global pharmaceutical standards, the potential detriments of which we have already raised, and allow corporations to countermand the laws of participant nations, making citizens of the global South still more vulnerable (“Trans Pacific Partnership: A Letter to the President of the United States of America”, 2015). In the absence of meaningful interventions to increase accessibility to medication and break neocolonial chains, powerful nations and institutions will continue to utilize “vulnerable people in vulnerable countries as drug laboratories,” as they have for centuries (Alfano, 2013).

REFERENCES

- Alfano, S. (2013, September 20). Conducting Research with Human Subjects in International Settings: Ethical Considerations. *Yale Journal of Biology and Medicine*, 86(3). Retrieved December 1, 2016.
- Ayalew, K. (2012, December 12). FDA Perspective on International Clinical Trials . Lecture presented at FDA Perspective on International Clinical Trials in Food and Drug Administration, Silver Springs .
- Bennett, W. (2014). Indian Pharmaceutical Patent Law and the Effects of Novartis Ag v. Union of India. *Washington University Global Studies Law Review*, 13(3), 535-557.
- Chandraseka, K., & Rajan, A. S. (2014). Impact of World Trade Organization on the Indian Pharmaceutical Industry: An Assessment From Manufacturer's Perspective. *Proceedings of the 3rd International Conference on Management and Economics*, 91-96.
- Foucault, M. (1971). *The order of things: An archaeology of the human sciences*. New York, NY: Pantheon Books.
- Mitka, M. (2010). As Use of Foreign Drug Trials Grows, FDA Oversight May Not Be Keeping Up. *Jama*, 304(8), 843. doi:10.1001/jama.2010.1194
- Rajan, K. S. (2007). EXPERIMENTAL VALUES Indian Clinical Trials and Surplus Health. *New Left Review*, 45, 66-88. Retrieved December 1, 2016.
- Rajan, K. S. (2012). Pharmaceutical Crises and Questions of Value: Terrains and Logics of Global Therapeutic Politics. *South Atlantic Quarterly*, 111(2), 321-346. doi:10.1215/00382876-1548239
- Trans Pacific Partnership: A Letter to the President of the United States of America. (2015, April 02). Retrieved October 15, 2017, from <http://www.doctorswithoutborders.org/article/trans-pacific-partnership-letter-president-united-states-america>



Woman living in relative poverty from Devarakonda, India. Ron Hansen. Unsplash.

Wombs for Rent: The Exploitation of Surrogate Mothers

by Nisa Mohammed[†]

Gestational surrogacy is an assisted reproductive technology utilized by individuals suffering from certain medical conditions, e.g. a lack of a uterus or a uterine abnormality. Gestational surrogacy is practiced most often in developing countries, such as India, because of their laxer regulations, lower cost of surrogacy, and abundance of women willing to become surrogate mothers. This alternative method of reproduction is accessible by the economically and racially privileged women in the global North, where low-income women of color are recruited to become surrogate mothers. The issue with surrogacy is not the fertility of the intended parents, but the risk of the exploitation of surrogate mothers – many of whom are indigent, poorly-educated, and lack legal protection. This article introduces the philosophical approaches of Michel Foucault and John Rawls to address various methods of exploitation of India's surrogate mothers and draws attention to these women's rights.

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BACKGROUND

Assisted reproductive technologies (ARTs) are rapidly emerging alternative methods of reproduction through processes such as gestational surrogacy. Unlike traditional surrogacy, in which the surrogate mother is also the biological mother, gestational surrogacy is the process in which an embryo, created by in-vitro fertilization (IVF), is implanted into a surrogate mother who is not related to the embryo. Instead, the embryo is genetically related to the intended mother and is created using the father's sperm or a donor's sperm. ARTs allow couples suffering from medical conditions to fulfill their dream of raising a family. As Danielle Preiss and Pragati Shahi (2016) state in their article, "The Dwindling Options for Surrogacy Abroad," alternative reproductive methods are practiced openly in a limited number of countries due to ethical, religious, and legal challenges, and the laws governing their practice are "non-uniform throughout the globe" (p. 4). As a result, many intended mothers are "boxed out of reproductive rights from their own countries, and [are forced to] chase them through other countries" (Preiss et al., 2016, p. 6). Therefore, developing countries, such as India, serve as better locations for the practice of gestational surrogacy. Often overlooked is the fact that only "economically and racially privileged women in the global North" are able to afford using ARTs (Roberts, 2009, p. 784). Meanwhile, "low-income and poor women of color" in the patriarchal society of India are discouraged from raising large families, and yet, are the target for recruitment to become surrogate mothers (Roberts, 2009, p. 784). Although reproductive technologies facilitate conception through infertility management for women in the global North, the surrogate mothers in India, a majority of whom are illiterate, are at a risk of exploitation due to the lack of pre-informed choice and legal protection. In addition, Indian surrogate mothers are often pressured into surrogacy due to their vulnerable states. Rather than validating surrogacy as merely a medical situation, social change must be initiated to encourage the acceptance of surrogate mothers and bring attention to their exploitation regarding birth arrangements in the ART clinics of India.

THE ART OF EXPLOITATION

In a fair society, complications would easily be resolved and people would empathize with one another's standards of living. Those who live in a fair society would take action to strive for equality instead of taking advantage of another's misfortunes. Proposed by philosopher John Rawls, the 'veil of ignorance' is a method for overcoming bias when addressing decisions such as the allocation of resources. This method provides individuals with the moral capability of making decisions by eliminating any external influences. However, is this freedom applicable to those who become surrogate mothers in India? In Carole Pateman's book, *The Social Contract*, Pateman contests

Rawls' theory, asserting, "...patriarchal control prevails in the...contract for surrogate motherhood" (as cited in Saravanan, 2013, p. 2). Families living in developing countries such as India face many hardships caused by poverty, a lack of education, and lower social status. Because of their vulnerability, women in India are lured into becoming surrogate mothers, providing them the opportunity of earning the equivalent of ten years worth of their husbands' salaries. This large financial compensation can cause husbands to leave their jobs, only to coerce their wives to become surrogate mothers multiple times, regardless of the harm it causes to the women's bodies. Thus, allowing repeated surrogacy poses "...ethical challenges in the context of increasing the commercialization and commodification of [these] women and their reproductive capacities" (Tanderup, Reddy, Patel, & Nielson, 2015, p. 2). Moreover, women who become surrogate mothers often choose to do so explicitly due to external influences--the need for money to improve their impoverished state, the assurance of a better future for their own children, or by the encouragement by husbands and surrogate agents--that bias their judgment. As quoted by an anonymous former surrogate mother, "[t]his process is so distressing that I would not have done it even if someone paid me 10 times the remuneration, had I been well-off, but I am so desperate for money that I would do it even if I was paid just one third the amount" (Saravanan, 2013, p. 4). Although becoming a surrogate mother is not an easy or favorable task for most, these women continue to participate in these arrangements in order to earn financial compensation to better their lives.

Furthermore, the recruitment process of surrogates is an additional factor that induces these women to make biased decisions. In India, the most common way for women to learn about surrogacy opportunities is word-of-mouth and through surrogacy agents--nurses, employees, and former surrogate mothers of ART clinics. According to Kalindi Vora's (2014) "Experimental Sociality and Gestational Surrogacy in the Indian ART Clinic," "[t]he clinic directors emphasized that women interested in becoming surrogates...were strictly self-referred" by former surrogate mothers, who earn additional payments for recruiting women into surrogacy (p. 66). Since former surrogate mothers from India who act as surrogate agents come from similar backgrounds as the women they are recruiting, this act of self-referral is elicited by a group of women with which they identify--the indigent and vulnerable. As a result, these innocent women are manipulated into becoming surrogate mothers in exchange for a large sum of money that they can later invest in newly constructed homes, education, and setting up small businesses. While these long-term goals are desirable, "...surrogacy agents [are] selective in giving information to surrogate mothers, such as failing to divulge the painful pre- and post-embryo transfer injections or the kind of medical interventions involved in the process" such as multifetal pregnancy

reduction, multiple embryo transplant, and the mode of delivery (Saravanan, 2013, p. 5). When deciding to become surrogate mothers, these women wear a 'veil of falsehood,' rather than a 'veil of ignorance,' causing them to begin this journey blindly. Deciding to become a surrogate mother is a bold and frightening act, and misinformation regarding the clinic's regulations and requirements is a betrayal to those who are risking their health in return for a financial payment from another individual.

Evidently, medical practitioners of the ART clinics hold the most power over surrogate agents, surrogate mothers, and intended parents. While the surrogate mother trusts medical practitioners with her body and final payment, intended parents trust medical practitioners with the pre- and postpartum health of the surrogate mother and fetus, the allocation of their payment, acquisition of birth certificates, and attending to other legal procedures and documents (Saravanan, 2013, p. 4). Often, intended parents will deposit their money directly to the clinic, and the medical practitioner assures that the money is properly transferred to the surrogate mother's account. This act of trust is vital in keeping ART clinics prosperous; however, if the surrogate mother is the prime target of betrayal, will anyone speak up for her, or will this mistreatment be shrugged off? If the surrogate mother has a stillbirth, she receives merely partial payment; if the surrogate has multiple pregnancies and the intended parents do not wish to keep all of the newborn infants, or if the infant is rejected due to a disability, the surrogate mother will receive no money at all even if she keeps the child (Overall, 2015, p. 355). Surely, this is not what these women intend to sign up for. Indeed, the surrogate mother would crucially need compensation since she, not the intended parents, would be taking the infant home. Most surrogate mothers in India are motivated to commit to this practice with the intention of earning a payment to help them afford necessities. However, adding another child into a surrogate mother's family would increase the family's costs of living. Furthermore, ART clinics in India house surrogate mothers to "control the variables of behaviors and exposures that are understood to potentially endanger the fetus or the surrogate's health while pregnant" (Vora, 2014, p. 73). Stillbirths occur even during healthy pregnancies, and if the ART clinics closely monitor surrogate mothers during their pregnancies, there is little chance that a stillbirth is the surrogate mother's fault. Yet, the surrogate mother is accused of negligent prenatal care, and as a result, it is her compensation that is unrightfully cut.

To add on, if the surrogate mother delivers twins, the clinics require that the intended parents pay double but do not pay the surrogate mother double. Medical practitioners often agree to implant more than one embryo into the uterus, improving the chances of a successful birth, to increase the number of client parents in their clinic. However, this method increases the

likelihood of twins or triplets – which has more inherent risks for both the surrogate and the infant, such as preeclampsia, twin-to-twin transfusion syndrome, placenta abruption, and premature births. During one case in an Indian ART clinic, the medical practitioner detected that of the embryos implanted, multiple embryos were conceived. In order to reduce the number of infants, selective abortion was performed; however, this unnecessary medical intervention resulted in a miscarriage of all of the infants (Saravanan, 2013, p. 6). As exemplified, going to such great lengths to perfect the pregnancy is likely to result in further complications, requiring additional medical costs. Therefore, it is only fair that the surrogate mother receives her rightful share of money to compensate for any unfortunate outcomes resulting from the process.

As previously discussed, surrogate mothers are exploited by a variety of groups, one of which are former surrogate mothers who deceive these women instead of thoroughly providing them with knowledge of the process that they themselves have previously experienced. Former surrogate mothers who become surrogate agents contribute to the redistribution of power – power which, according to philosopher Michel Foucault, can reorganize and invest itself elsewhere. In other words, “surrogate agents re-invest the power of their exploitative experience to exploit others,” and in return, are remunerated a financial sum equivalent to six months their salary for their continued service to the ART clinics (Saravanan, 2013, p. 1). Along with surrogate agents, employees of the ART clinics are also involved within this distribution of power. Gena Corea (1985), author of *The Mother Machine*, explains an early ideology that “...the powerful...should control the lives and reproduction of inferior people” (p. 17). Moreover, Corea (1985) defines inferiority by “...race, class and physical condition,” a hierarchy followed by India’s households, society, and ART clinics (p. 17). The balance of power and resources weigh against Indian surrogate mothers, whose wombs are marketed for reproductive purposes that are accessible to only affluent populations.

In contrast, in his book, *The History of Sexuality*, Foucault (1990) speculates that where there is power, there is “...a plurality of resistances...that are possible, necessary, improbable...[and] can only exist in the strategic field of power relations” (p. 96). If the ART clinics were to practice Foucault’s approach, surrogate mothers would be treated with respect and dignity, starting from the time of their recruitment. Because medical practitioners have the authority to resist both improbable and probable requests and practice resistance only when it is beneficial to their clinical results, they have power. Research by Albert Mulley, Chris Trimble, and Glyn Elwyn emphasizes the importance of unbiased doctors to accurately diagnose according to the preferences of the patient. Unbiased diagnoses would require resisting ask-

ing oneself, “What would I do in this situation?” since such questions “...can mislead because the patient may value risks, benefits, and side effects [of the treatment] differently” (Mulley et al., 2012, p. 2). Still, medical practitioners gloss over the risks and treatments involved to encourage women to become surrogate mothers without fearing for their health. These women lack the education to know when it is appropriate to resist procedures, and therefore, according to Foucault’s philosophy, ART clinics practice power through a hierarchy and do not provide their surrogate mothers the freedom of resistance. Thus, surrogate mothers lie lowest in this established hierarchy and are incapable of practicing power.

In addition to the ART clinics’ deceptive communication with their surrogates, the surrogate mothers’ lack of social power and incapability to resist contributes to a preference misdiagnosis. Such a misdiagnosis occurs when the patient is not educated about all available treatment options and regrets the chosen treatment after its completion. As a result of their illiteracy, surrogate mothers can be fully informed decision makers only if their doctors relay advice using rudimentary terminology, allowing the doctors to successfully make preference diagnoses (Mulley et al., 2012, p. 2). After completing the pregnancy, the surrogate mother has experienced all procedures and effects of surrogacy--some of which she learned prior to the embryo implantations and others which she discovered herself during the process. During Saravanan’s (2013) interviews, former surrogate mothers emphasized that they were dissatisfied with the remuneration, medical procedures, and their relationship with the intended parents. Had they been in a position to articulate their concerns, the surrogate mothers would have expressed their preferences during the process rather than feeling violated and disappointed afterward.

Regarding the circumstances of exploitation, Jeffrey Kirby (2014) asserts that “[i]t is unlikely...that the disadvantaged individual would voluntarily choose to enter into, and continue in, the transaction on the basis of his/her full knowledge and understanding of its anticipated burdens and benefits” (p. 4). As such, most surrogates of ART clinics are minimally informed decision makers who are stripped of knowledge, thus becoming victims of preference misdiagnosis and exploitation. Furthermore, since surrogate mothers do not receive a copy of their signed contract and “do not know the details of the ART Bill or their rights and duties under it, they are aware that they are being exploited...[but] given their socio-economic background, they may not even have the financial capacity to file a legal case” (Saravanan, 2013, p. 4). After the unnecessary procedures and deceit, surrogates are expected to hand over the infant after bonding and breastfeeding, yet are not provided any psychological counseling to cope with the process. Tanderup (2015) acknowledges, “[t] his perception of ‘renting’ the womb of the surrogate mother implies a loss of rights over one’s body and a relinquishing of control to the doctor. If the doc-

tor promises the surrogate that ‘nothing will go wrong with her,’ when signing the contract one must ask whether the surrogate’s consent can be called informed” (p. 5). Oftentimes, many patients are predisposed to a learned helplessness when it comes to confronting their physicians. Since physicians are educated in their specialty, patients tend to think that their physician always knows the best treatment option, when in reality, only patients can make the best judgement for themselves. Most women recruited into surrogacy in India lack the education to understand the policies of the procedure to which they are committing, causing medical practitioners to explain surrogacy to them in a very elementary manner. However, it is important for these women to be aware of the reality of this practice before committing to surrogacy, and lack of this knowledge is a critical part of what is likely to lead them into postpartum depression.

RECONCILIATION

Within the ART clinics of India, power is practiced top-down through a hierarchy consisting of the individuals who play a role in surrogacy. Foucault objects that power revolves around a hierarchy, and instead theorizes that it is distributed throughout the networks of relationships that constitute society. The practice of power should not repress or conceal as in a dictatorship, but instead should be a productive and positive force. When women are deciding to become surrogate mothers, their “opinions [of the decision] may be influenced by irrational hopes or fears, or by the accurate or inaccurate imaginings of what the future holds” (Mulley et al., 2012, p. 2). The poorly-educated demographic of surrogate mothers are not likely to question the medical practitioner or surrogate agent’s judgement, especially when the overview of the process is sugarcoated. This leads to more irrational hopes than fears and an inaccurate conception of how this procedure will benefit the surrogate mother’s future. In her article, Tanderup (2015) proposes that “[b]efore starting treatment, information should be given to the patient on the limitations and results of the proposed treatment, possible side-effects, the techniques involved, comparison with other available [options], the availability of counselling, the [physical and financial] cost of the treatment...and the need for the clinic to keep a register of the outcome of a treatment” (p.3). This obvious but neglected guideline would not only relieve surrogate mothers of deceit and vulnerability through the provision of a chance to make a fully informed decision, but would also eradicate the exploitation of their bodies and rights.

The issue of surrogacy is not fertility of the intended parents, but is the exploitation of the women who become surrogate mothers. Advances in medicine intend to heal biological wounds, but are underestimated as methods of social control and political rule. Surrogacy in India’s ART clinics has transitioned into “...an intentional shift in medicine and governmentality away

from a technique of caring for the body...to one of producing bodies as the instruments of service work and surrogates as entrepreneurs of the contracted use of those instruments” (Vora, 2014, p. 65). These women are an easy target to recruit as instruments of social work because of their impoverished state, illiteracy, and the lack of a legal agreement that establishes their rights as a surrogate mother. However, surrogate mothers’ lower social status should not be what encourages their exploitation – these women should have the same rights to resist and have knowledge as women living in developed countries. According to Foucault, knowledge is gained from power, thus signifying that it is crucial for surrogate mothers to declare their concerns before beginning this journey of exploitation. In the event of a miscarriage, abortion, postpartum illness, or any health risk that is a result of the process, the surrogate mother should be granted reparation. A surrogate mother should not consent to surrogacy because her husband coerces her to do so or because the medical practitioner and surrogacy agents ensure that she will not regret the procedures and outcomes of this path. Furthermore, the surrogate mother should not be a victim of social and economic prejudice due to the lack of regulation concerning surrogacy arrangements. Instead, the surrogate mother should be cognizant of any possible side effects of the treatment, should be reassured that she will be fully compensated, and should be protected under a legal agreement.

REFERENCES

- Corea, G. (1985). *The Mother Machine: Reproductive Technologies from Artificial Insemination to Artificial Wombs*. New York: Harper & Row
- Foucault, M. (1990). *The History of Sexuality*. New York: Vintage Books
- Kirby, J. (2014). Transnational Gestational Surrogacy: Does It Have To Be Exploitative?. *American Journal Of Bioethics*. 14(5), 24-32, doi: 10.1080/15265161.2014.892169.
- Mulley, A., Trimble C., & Elwyn G. (2012). Stop The Silent Misdiagnosis: Patients' Preferences Matter. *BMJ* 345:e6572, doi:10.1136/bmj.
- Overall, C. (2015). Reproductive 'Surrogacy' and Parental Licensing. *Bioethics*. 29:e12107, 353-361, doi: 10.1111/bioe.12107.
- Preiss, D., & Shahi, P. (2016, May 31). The Dwindling Options for Surrogacy Abroad. *The Atlantic*.
- Roberts, D. (2009). Race, Gender, and Genetic Technologies: A New Reproductive Dystopia?. *Signs*. 34:4, 783-804.
- Saravanan, S. (2013). An Ethnomethodological Approach To Examine Exploitation In The Context Of Capacity, Trust And Experience Of Commercial Surrogacy In India. *Philosophy, Ethics, and Humanities in Medicine*. 8:1, 10.
- Tanderup, M., Reddy, S., Patel, T., & Nielson, B. (2015). Reproductive Ethics In Commercial Surrogacy: Decision-Making In IVF Clinics In New Delhi, India. *Journal of Bioethical Inquiry*. 12:491, doi:10.1007/s11673-015-9642-8.
- Vora, K. (2014). Experimental Sociality And Gestational Surrogacy In The Indian ART Clinic. *Ethnos: Journal Of Anthropology*. 79:1, 63-83.



Bradley Hook, 2016.

The Excellence of $h+$: Virtue, Utility, and Human Enhancement

by Andrés Espinosa Elvira[†]

No longer the domain of science fiction, the constantly evolving ability to chemical, biological, and technological enhance human beings warrants intense ethical scrutiny before it becomes widespread. It is often assumed that a utilitarian perspective will encourage a proactionary over precautionary stance towards enhancing human beings, yet this will be found to be the result of exclusively short-term considerations; this paper will draw from utilitarian moral theory and consider the long-term implications of enhancement. First, an overview of present, and potential future, forms of human biomedical enhancement will be presented. Then, a list of potential dystopias resulting from widespread enhancement use and the implications of such dystopias will be discussed. The notion of excellence will be introduced via virtue ethics, arguing that virtue can be defined as character traits which best maximize utility, a moral framework which a laissez-faire enhancement market fails to satisfy. Together, a model of utility-justified virtue illustrates how laissez-faire enhancement fails to maximize utility, or create better people, thus urging a democratic limitation of their installation and use.

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An amputee war veteran lifts glasses, opens doors, and shakes hands like anyone else with two arms. The newest wonder drug reveals a woman's "true" personality and character. A couple uses the DNA of a third party donor to replace the genes for a genetic disorder in order to eliminate the disease in their offspring, and offspring's offspring. It may seem like science fiction, but all of these scenarios are becoming increasingly viable. The actual "science fiction" scenario is shockingly near; now that the technology is possible, it begs the question as to what boundaries, if any, it can or should be pushed. Human medical enhancement is rapidly becoming more than just a mere fantasy, and the implications of these technologies are yet to be determined.

Human enhancement is neither good nor evil in-and-of-itself, but is an amoral tool for benevolent or malignant use. There is, however, something distinct about the genetic, bionic, or pharmaceutical modification of the human body and mind which is dissimilar to other tools: it becomes a part of the human being, altering cognition and the body internally. Although human enhancement is a relatively new technology, it may be analyzed using existing moral theories, though their application may be novel. Due to the physically and cognitively internal nature of enhancement technology, analysis of the viability of human enhancement requires both a consequence-based utilitarian approach and character-based virtue account of the purpose of human capability and excellence. The result of this analysis will urge for the careful moderation, but not a complete moratorium, on enhancing human ability.

HUMAN ENHANCEMENT

Human enhancement takes many forms, available and theoretical, but all tend to begin as medical procedures used as therapeutic means of curing diseases and disorders. Saline implants are used to reconstruct the breasts of women who have undergone a mastectomy for breast cancer. Human growth hormone (HGH) may be used on a patient with achondroplasia to alter his or her height to the parameters indicated as the norm in healthy human beings. Laser surgery can correct the vision of a person with myopia or hyperopia. These procedures are used on people whose biologies set their capacities below the average in society, but there is nothing preventing their use on patients who are already healthy and have average physical and cognitive capability. Breast implants are placed in healthy women who simply desire larger breasts. HGH is used to make naturally short men and women taller (Hintz, 2004). Laser eye surgery centers promise visual acuity as a result of corrective measures (Thompson, 2016). These capabilities are well beyond the average and, more importantly, are not essential to survival or even to quotidian social activities. Therefore, they are enhancements, delineated from therapy by their lack of

necessity in an ordinary environment.

Enhancement is an unavoidable element of therapeutic advancement. As any therapy can be applied to enhance, the morality of enhancement must inevitably be addressed. Since moral progress always lags behind technological progress, there is no better time to do so than the present. For the sake of this paper, it will be assumed that the technology, or its development, is never intrinsically wrong, but situationally so. As such, the discussion will rest entirely on the current and possible future implications of human enhancement for society and the individuals who compose it.

UTILITY

Act utilitarianism is the consequentialist moral theory stating that good actions are those conducted by moral agents—human persons with freedom of action—that maximize the welfare of the greatest number of individuals possible, without partiality to such factors as culture, faith, sex, race, creed, or class. It is extremely useful when considering advancements in technology because oftentimes other theories, among them deontology (that there exist intrinsic duties and inviolable rules irrespective of consequences), and divine command theory (scripturally-derived principles which are valuable irrespective of consequences), are found lacking the elements necessary to evaluate entirely novel situations presented by advancements in technology and their subsequent social revolutions. While I will not assert that utilitarianism is the ultimate, irrefutable, functional moral theory, I will claim that it is the most well constructed and internally consistent moral framework currently available. Ideally, its beauty lies in an almost purely rational analysis of consequences, blind to partialities of culture, religion, or preferential bias. As such, utilitarianism provides the best ethical framework with which to consider novel situations of techno-social change.

Under an act utilitarian criteria of moral behavior, the widespread installation and use of enhancements must somehow maximize utility on a social scale in the long-term. Today, enhancement would likely take place under a system of free market exchange. For human enhancement to be morally problematic, introducing it into the free market must adversely affect utility in a manner that is unlikely to be replicated in other free market enterprises. The commonly cited concern tends to be that the enabling of enhancements by the free market would inevitably lead to an escalation of the disparity between the wealthy and impoverished. The wealthy would easily be able to afford, for themselves and their children, enhancements, of whatever form, while the remainder of society would add biological disadvantage to their social grievances (Scully, 2006; Singer, 2009).

Such a situation could easily escalate. Normalization of enhancements, as they become increasingly affordable, could strain liberal choice. Even if prohibited by law, corporations would inevitably favor workers who

could maximize their productivity. Imagine entire buildings of office workers taking Ritalin to increase their focus and attention span. Healthy laborers may find that their peers, having amputated healthy limbs in favor of the latest bionic arms and legs, with several times the strength and durability of organic human limbs, are earning more than they are. The same would apply to other professions and trades. The epidemic of illegal anabolic steroid use in elite sports attests to the pressure on athletes to use whatever means necessary to ensure sustainable financial success. If human enhancement does become the norm, those who desire not to enhance themselves will find themselves subtly coerced into introducing alien chemicals, genes, and technologies into their bodies to sustain themselves in the workforce. Utilitarianism allows for the smallest possible population of moral agents to be expended to grant the most welfare-maximizing benefits to the majority. Is this such a case with regards to human enhancement?

Under the principle of utility, restraint of freedom is only ever justified by threats to another's freedom. Any act, even a self-harming one, cannot be infringed upon unless a nonconsensual threat is made to another individual. In a free market, people have the prerogative to spend their money, assuming that it is fairly and not criminally gained, as they will. If they desire to use it to enhance, then so be it. However, we must consider the long-term possibility of a potential future in which the wealthy are privileged with enhanced strength, stamina, durability, beauty, memory, attention-span, or possibly even intelligence. This widens the wealth-poverty disparity in a way that cannot be rectified. In this scenario, advancement would become impossible without enhancement, and being subtly coerced into using medical therapy when one is already healthy is different from being pressured into changing one's lifestyle or appearance: people react differently to foreign substances introduced into their bodies, and thus, every enhancement carries the warranted concern of malfunction. As a result, some people will understandably desire not to enhance, and as such, the coercion to enhance will not contribute to their happiness, though it may contribute exceedingly to the happiness of the employing minority.

Far too many variations of these dystopian scenarios exist. Unfortunately, they are likely to come to fruition through the unconstrained use of enhancements in society. The fundamental question comes from the perspective of a consequentialist system of utility: would such a dystopia still contribute to the best overall level of happiness of all parties possible? How enhancements are used is a decision left entirely to individuals, and their freedom to do so cannot be imposed upon unless it involves quantifiable harm against someone or something else. Some harms, however, are more difficult to define or foresee. Arguably, a society in which few benefit from enhancement or in which many are coerced into enhancing with the subtle

threat of poverty if refused, is not conducive to the maximization of utility. In order to fully understand why laissez-faire enhancement fails to maximize utility, it is necessary to consider an even more fundamental aspect of human behavior: the aspect of excellence and how it can be defined in utilitarian moral terms.

EXCELLENCE AND VIRTUE

Humanity can survive on a bare minimum of nourishment and shelter. In humanity's early years, it was necessary for every member of a small society to have full knowledge of all essential survival skills. Once society grows to a state of complexity in which all primary needs are satisfied, people become concerned with other endeavors which are less, if at all, imperative to survival. This progression seems to be evidence of some human compulsion, arising naturally in a given set of social and environmental circumstances, to strive for betterment. This has been a strong motivation for medical therapies which equalize the effect of physical and cognitive handicaps, yet there remain numerous ways to "better oneself" while healthy. One may apply effort to become physically stronger, sharpen particular skills, or improve cognitive capacity. Behaviors may also be acquired, cultivated, and improved. Someone whose natural reaction to spiders is to panic and flee can recondition themselves, usually with help, to maintain his or her composure; unfaithful spouses can choose not to cavort inappropriately with others; habitual liars can learn how to habitually tell the truth, etc. In this way, the cultivation of behavioral qualities can be considered a form of excellence, which leads to the question of exactly what behavioral qualities ought to be cultivated.

Virtue ethics is focused on, rather than the effects of one's actions, the type of moral agent one ought to strive to become. The classical, Aristotelian concept of virtue was defined as the behavior lying at the median between two attitudinal extremes; e.g. courage as the mean between rashness and cowardice (Aristotle, 2010). I propose a concept of virtue somewhat compatible with Aristotle and fully compatible with a utilitarian system of moral determination. Varying cultures and religious traditions dictate parameters of acceptable behavior, yet not all behaviors are of moral significance. If everyone were to consistently, mutually, and impartially express certain behaviors such as honesty, generosity, trustworthiness, loyalty, friendship, love, justice, mercy, etc., it would lead to a more just and equitable society. Its members would be overall healthy, free from violence and hatred, and fully able to pursue happiness. The type of person one ought to strive to become is a person acting in accordance with virtue, whose actions maximize the utility of all those around them.

VIRTUE, UTILITY, AND ENHANCEMENT

Neither virtue nor utility stand alone as complete theories, but both serve as a binary methodology and teleology. The fact that virtue is qualified by an ultimate system of utilitarian determination means that all genuine moral dilemmas are avoided, and there is only one answer to every moral question — even if moral agents are forced to choose between two mutually exclusive virtuous acts on any one occasion. The ends justify the means, yet the means vary considerably with each real-life situation. Given the historically consistent human propensity to opt for ease, as well as for using logic to justify almost anything, a methodology of virtue is necessary to balance the utilitarian goal of maximizing welfare with considerations of what forms of individual character produce it. All that is needed to accomplish this is a test of what behaviors most greatly facilitate mutually beneficial human interaction without discrimination and irrespective of cultural-specific demands. After all, morality may be objective, but it is executed by human agents, and human agents are inherently fallible at executing their own ideals.

What, then, occurs when something is introduced which changes the endeavor to excel? Excellence endeavors such as elite sport, academia, science, and other competitive or ambitious projects arise out of a desire to test oneself against others and improve oneself accordingly. In elite sport, when a healthy competitor enhances among unenhanced athletes, it gives the enhanced an unjust advantage over athletes who honor the *de jure* requirement that they compete using only their training and equipment. The solution is either to permit enhancement from the onset, or to have a separate “super league” in which athletes are free to enhance in any way they choose. Extended to all endeavors, solutions such as these enable those seeking to excel to compensate for their lack of natural ability (Sandel, 2009).

The assumption here is that the inequality in the physical and cognitive excellences between individuals, whether originating by nature or nurture, are inherently unfair and are therefore obstacles to a utopia of “perfect utility”. On the contrary, equality of opportunity does not depend on any supposition that all individuals enter the excellence arena with identical capacities “untainted” by inheritable or environmental influences beyond the competitor’s responsibility (Wikler, 2009). In fact, the recognition that “gifts” of ability are unequal avoids a new problem of expanding personal responsibility to include enhancement, which would make people blameworthy for refusing to become cyborgs, drug-users, or genetically enhanced in the name of winning—a shortsighted justification for a variant of the dystopian workforce for the athletics industry (Sandel, 2009). Enhancements are not created by students, athletes, or any other competitors of excellence; they are created by laboratories, pharmaceutical firms, and chemical factories. Those competing using enhancements are not comparing their abilities, but their enhance-

ments. This outcome renders the goal of excellence pointless in a world in which higher goals than mere survival are enabled by resource abundance. Thus the use of enhancements fails to positively influence the overall welfare of humanity and fails to justify any burdens on the majority who do not benefit from enhancement.

A virtuous person would recognize that the inequality of human ability simply implies that everyone excels by merely doing what they can with whatever they possess. A persevering individual will ignore the limitations of any handicap and push himself to the best of his ability, and a modest individual will remember that his astounding talent does not make him superior to other people. If anything short of perfect equality of ability is unjust, then there is no purpose to excelling in anything to begin with. Excellence is the drive to excel despite this; to overcome hardships and ignore discouragement; to cultivate traits of confidence, perseverance, and discernment to the ends of achieving a goal.

To understand the full extent of its detriment to utility on a communal scale, we must return to the social scenarios of enhanced elitism, subtle coercion, and the like. Descriptively, an enhanced elite is likely the result of free market enhancement, and subtle coercion could be a symptom of those whose utility cannot be maximized by the means which brings about the most utilitarian ends. If this were the case, then our utility-qualified virtue account of enhancement could justify a future which many might find undesirable or even repugnant.

Yet it is quite possible for people to recognize that there is a purpose to reciprocating the utilitarian consideration given to them by the free market and liberal society. In the short-term, people may have little concern for the consequences of enhancement as long as they are able to use it. However, because unconstrained enhancement use will result in a more unjust society, there must be restriction on its use. Enhancements are merely means to ends which can be achieved by excellence, an endeavor just described to be irreplaceable by biomedical modification. A society without enhancements is not deprived of necessities, and its members can still be happy and healthy even if they presume that they might be happier with enhancements. Since too few could benefit from a society of enhanced elite, or by a society composed exclusively of the enhanced, utility is better served by a society which democratically restricts or rejects enhancement distribution and use.

If the history of prohibition and abortion in the U.S. is any indication, one legal implication of this conclusion will be a new black market of enhancement. This is indicative of an even greater imperative than simple legal implementation:

the cultivation of virtue in the populace itself. It should be incumbent upon parents and reinforced by the compulsory educational system to inculcate virtuous behavior in children. This would lead society closer to the ideal by justifying virtue as a means to the end of utility. These virtues are meant to be culturally and religiously neutral and can guide people to realize that their lives and dreams may be fulfilled without demanding enhancement. Practicing virtuous behavior would lead to a society in which utility is maximized in the absence of an enhanced elite or coerced workforce in the name of free market practice.

THE VIRTUE ENHANCEMENT

Conceivably, enhancements can take any form and may augment any facet of human capability. That known, and given the assertion that virtues are a form of moral awareness, the goal to excel at virtuous qualities becomes moot should a “virtue enhancement” become possible. Such an enhancement would modify the endocrine and nervous systems to incline the individual towards behaviors conducive to maximizing utility. For example, oxytocin, a pituitary hormone, is known to enhance people’s ability to interpret the emotional states of others and therefore enhances empathetic ability. Experimentation with voles has revealed that manipulation of a single gene governing vasopressin increases their monogamous tendencies, which would benefit humans who wish to change their tendency towards infidelity (Fröding, 2013; Singer, 2009). If such advancements were possible, it calls into question the value of attempting to excel at moral behavior. From a utilitarian standpoint, such an enhancement ought to be welcome, as human beings are inherently fallible decision-makers with regards to discernment of information and judgment. If utility is maximized by the universal use of enhancement rather than by the painstaking process of virtue enculturation, then it is the better methodology. Best of all, virtue enhancement can do so while bypassing the problem of the inequality of human capacities and propensities. If excellence is not valuable in this case, then its value in all cases becomes questionable.

There are some problems with a “virtue enhancement” which can possibly extend to other forms of enhancement. Firstly, there is the possibility that the acquisition of virtue is an essential element of expressing virtue (Fröding, 2013). A moral agent may possess a character trait, but in the absence of understanding why it is beneficial to have that trait, which must be acquired through experience as much as by dictation, that trait may not be maintained over time or can be discarded under duress. Secondly, a virtue enhancement would have to be fully comprehensive to achieve the purpose of its utilitarian qualification. Honesty in the absence of tact leads to insensitivity. Courage without discernment leads to recklessness. Multiple virtues

exist because different situations warrant different behaviors to create the best possible outcome for each. Any one virtue practiced exclusively will fail to maximize utility in our ideal world. Thirdly, all enhancements face the problem of lacking physical durability due to circumstances beyond individual control (e.g. pharmaceuticals requiring replenishing doses, bionics and neurostimulation requiring power sources, etc.). Over time, the virtue-enhanced could lose the enhancement that made her good and could be left with whomever she was before enhancement--possibly with impairment to her moral habits.

But what, then, of those who excel? An individual may acquire primitive skills, or transfer his or her physical and cognitive ability to new endeavors. People who react adversely to the new situation can adapt—an ability which *Homo sapiens* are especially known for. Virtue practitioners can acquire and cultivate their most positive behavior qualities for the good of themselves and all those around them, while the virtue-enhanced gradually loses her ability to be virtuous in the absence of an infrastructure providing her with enhancement technology. Non-enhanced virtue is durable and sustainable against external circumstances, giving it far greater long-term practical value towards utilitarian goals than enhanced virtue. Thought-experiments such as this remind us that humanity did rather well at surviving and maintaining communities before the advent of biomedical enhancement and that technology did not make people moral nor ensure a happy life for everyone.

CONCLUSION

Under a framework of virtue as a utility-qualified behavioral characteristic, the widespread, unconstrained use of human enhancement will have inevitably negative repercussions. In the short-term, it undermines the very purpose of attempting to excel physically or cognitively in a world where excellence is a primary motivator beyond survival. In the long-term, enhancements will either erode the human freedom to refuse enhancement, open the door to an enhanced elite, or do all of these things together. None of these scenarios are acceptable according to the utilitarian framework, especially considering how enhancement is an unnecessary addition to the human body and mind. An enhancement is only ever justified so long as its use in a particular situation avoids a slippery slope towards these unacceptable scenarios. As easy as it is for people to embrace the hubris of perceived infallibility, it will do humanity well to balance biomedical innovation with reminders that no technology has ever been perfected and that attempts to control biology entirely tend not to end well.

REFERENCES

- Aristotle (2010). *Nicomachean Ethics*. In A. J. Dell'Olio & C. J. Simon (Eds.), *Introduction to Ethics* (pp. 259-284). Maryland: Rowman & Littlefield.
- Fröding, B. (2013). *Virtue Ethics and Human Enhancement*. Dordrecht: Springer.
- Hintz, R. L. (2004). Growth hormone: uses and abuses: It has anabolic effects, but its use in ageing and other conditions is not established. *BMJ: British Medical Journal*, 328(7445), pp. 907-908.
- Sandel, M. J. (2009). The Case Against Perfection: What's Wrong with Designer Babies, Bionic Athletes, and Genetic Engineering. In J. Savulescu & N. Bostrom (Eds.), *Human Enhancement* (pp. 71-89). Oxford: Oxford University Press.
- Singer, P. (2009). Parental Choice and Human Improvement. In J. Savulescu & N. Bostrom (Eds.), *Human Enhancement* (pp. 277-289). Oxford: Oxford University Press.
- Sully, J. L. (2006). Inheritable Genetic Modification and Disability: Normality and Identity. In J. E. J. Rasko, G. M. O'Sullivan, & R. A. Ankeny (Eds.), *The Ethics of Inheritable Genetic Modification* (pp. 175-192). Cambridge: Cambridge University Press.
- Thompson, V. (Rev.). (2016, August). Custom Wavefront LASIK: Personalized Vision Correction. Retrieved January 5, 2017, from http://www.allaboutvision.com/visionsurgery/custom_lasik.htm
- Wikler, D. (2009). Paternalism in the Age of Cognitive Enhancement: Do Civil Liberties Presuppose Roughly Equal Mental Ability? In J. Savulescu & N. Bostrom (Eds.), *Human Enhancement* (pp. 341-355). Oxford: Oxford University Press.



Bricknave, 2014, *Classic and Robotized*.



STAT News, 2016, *Intensive Care Unit*. Intensive Care Units (ICUs) care for patients who are seriously ill or injured, keeping them under constant observation.

The Need for Limited Judicial Review of Withdrawal of Life Sustaining Medical Treatment Deemed Non-Beneficial or Futile

by Jonathan T. Shoenholz[†]

Futility disputes occur with some frequency at the end of life and are typically characterized by a surrogate decision-maker insisting on a treatment that the healthcare team considers as neither one that offers a reasonable prospect of achieving the desired outcome nor one that offers an outcome affording the patient sufficient benefit. These disputes create significant distress for patients, caregivers, and healthcare providers and sometimes prove intractable. Texas passed a law, commonly referred to as TADA, that provides absolute immunity to physicians who withdraw life sustaining medical treatment, even over patient and surrogate objections, so long as certain procedures are followed, including review by a healthcare ethics committee (HEC). A court can examine the procedural steps but will not evaluate the merits of the futility determination. This paper explains that intramural HECs do not provide a structurally appropriate forum for unbiased resolution of disputes and also do not provide fair processes, transparency, or a reviewable record. Even multi-institutional HECs do not address all these shortcomings. Accordingly, HEC review is helpful, but is insufficient to justify absolute immunity. At the same time, courts should be reasonably deferential to the HEC and physician judgments, and healthcare providers must be able to fulfill their responsibilities in good conscience without fear of limitless liability and endless litigation. Accordingly, HEC determinations should be subject to limited, streamlined court review. This will add modestly to costs in given cases, but overall will improve HEC quality and accountability and will better ensure a proper balance between professional integrity and patient autonomy.

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A pediatric oncologist has been treating a boy afflicted with juvenile myelomonocytic leukemia for three years. Bone marrow transplantation brought temporary remission, but the child has relapsed. A second transplant was performed with similar results. The child's condition is beginning to rapidly deteriorate, and the parents are despondent. They are demanding that everything be done, including chemotherapy and radiation therapy. The oncologist is reluctant to comply because these therapies offer no proven benefit for the patient and will have significant side effects. Nonetheless, both interventions are initiated. Two weeks later, the patient has become dependent on artificial hydration and ventilation and displays no consciousness due to his conditions, the treatments, and high dosage pain medications. The case is taken to the hospital Healthcare Ethics Committee (HEC), an 11-member body comprised of four fully-privileged physicians, two nurses, a clinical psychologist, a medical resident, a chaplain, a lawyer, and an "outsider." Except for the outsider, who is a longtime patient of the hospital, all of the committee members receive a significant portion of their income from work at the hospital. All have attended an in-house seminar on end of life (EOL) decision-making, and the committee generally follows procedures set forth in a six-page hospital policy.

The pediatric oncologist presents the case and the parents are allowed to plead for more time and further treatment. The HEC Chair, a senior physician who has practiced with the oncologist for over three decades, leads deliberations, stating that the parents' situation is agonizing, but that the requested treatment is inappropriate. The resident, who is in the hospital's internal medicine program, states she trusts the treating oncologist's judgment implicitly, and reassures all that he would never do anything to harm a patient. The chaplain, who is a personal friend of the oncologist, reminds the HEC of other broadly similar cases in which overly-aggressive treatment caused staff members distress due to the patients' undue suffering. Another physician adds that she would never allow her child to undergo further "torture." Discussion ensues for another thirty minutes, with the HEC unanimously voting to approve withdrawal of treatment. The proceedings and decision are memorialized in a half-page summary, with the lawyer advising to include as little detail as necessary to avoid inadvertently exposing the facility to liability.

The hospital continues to try to help the family transfer the child, but these efforts prove unsuccessful, perhaps in part because the family has minimal health insurance and is of modest means. The family is advised that further treatment will be withdrawn consistent with state law. The parents seek a court order to require continued treatment on the basis that further treatment holds the prospect of benefitting their child. They are told the courts will not review the merits of the HEC decision, and treatment is withdrawn. The parents grieve their son, convinced that “one more round” might have helped and frustrated by a process that seemed stacked against them.

BACKGROUND

Serious discussions began in the 1980s over healthcare providers’ right to withhold requested treatment deemed medically futile (Burns & Truog, 2007, p. 1987). This was in part due to a belief that respect for autonomy had been given too much primacy, at the expense of patients, providers, and society at large (Schneiderman, Jecker, et al., 1990, p. 949; Gaylin & Jennings, p.189; Tomlinson, Michalski, et al., 2001, p. 762). Over time, the term “medical futility” has been criticized as unhelpful, and “non-beneficial treatment” and “potentially inappropriate treatment” have been offered as alternatives (Pope, 2012, p. 89; Bosslett, Pope, et al., 2015, p.1322). In this article, the terms futile, non-beneficial, and potentially inappropriate are interchangeably used. Although futility disputes can arise in various contexts, this article is primarily concerned with disputes arising out of withdrawal of life-sustaining medical treatment (LSMT) over the objections of the patient or the patient’s surrogate decision maker.

Despite much writing and discussion, the controversy over futile treatment has not gone away. On the contrary, in recent United States and European studies, intensivists prospectively or retrospectively reported providing treatment that they considered futile in 10 to 25 percent of their cases (Bosslett, Pope, et al., 2015, p. 1320; Huynh, Kleerup, et al., 2013, p. 1892). The outcomes for patients receiving treatment prospectively considered futile are uniformly poor, with the patients either not surviving to discharge or having a very diminished quality of life and terminating shortly after discharge (Huynh, Kleerup, et al., 2013, p. 1892). There is general agreement that provision of treatment considered futile is a major source of moral distress for medical caregivers (Burns & Truog, 2007, p. 1992; Kwiecinski, 2006, p. 323; Pope T., 2014, p. 363).

Early on, efforts were made to establish a workable, substantive definition of medical futility, as notably reflected in the work of University of California, San Diego physician, ethicist, and professor Dr. Lawrence J. Schneiderman and his colleagues. In 1999, however, the American Medi-

cal Association Council on Ethical and Judicial Affairs (CEJA) moved away from this approach, writing:

The Council finds great difficulty in assigning an absolute definition to the term futility since it is inherently a value-laden determination. Thus, the Council favors a fair process approach for determining, and subsequently withholding or withdrawing, what is felt to be futile care (p. 940).

In 2015, the American Thoracic Society (ATS) published a policy statement presenting the approved recommendations of a multi-professional society working group convened by ATS in order to better understand, prevent, and manage futility disputes (Bosslett, Pope, et al., 2015, p. 1320). The working group endorsed narrowing the definition of medical futility to “treatments that have no chance of achieving the intended physiologic goal” (Bosslett, Pope, et al., 2015, 1326). It recommended using the term “potentially inappropriate” to describe those treatments that “have at least some chance of accomplishing the effect sought by the patient” but which the treating clinicians view as not justified due to competing ethical considerations (Bosslett, Pope, et al., 2015, 1319). The working group also made several recommendations on the implementation of fair processes in disputes over treatment considered potentially inappropriate (Bosslett, Pope, et al., 2015).

The process-based approach is embraced by Texas through the Texas Advance Directive Act, or TADA (Pope, 2014, pp. 359-366). TADA, passed into law in 1999 and amended in 2015, does not define “futility” or “inappropriate treatment.” Instead, it allows a medical review committee or healthcare ethics committee (HEC) to review a physician’s determination that requested treatment is inappropriate, and then gives ten days during which transfer of care to another physician or healthcare facility can be attempted. If transfer attempts fail then the law only permits a court to grant an extension if it appears probable that transfer can be accomplished within another ten days. The court can review whether appropriate processes were followed but may not review the committee’s determination that the requested treatment is inappropriate. If the TADA processes are followed correctly then the facility and healthcare providers are afforded absolute civil and criminal immunity from liability with regard to the refusal of requested treatment (O’Callaghan, 2008, p. 292; Pope, 2014, p. 361).

Debate has ensued as to whether an “internal” HEC review, such as that set forth in TADA, provides adequate protection for the patient’s autonomy and justice interests. I conclude that intramural HEC review is structurally insufficient and that even recourse to multi-institutional “extramural” HECs does not afford sufficient process. Instead, recourse to a limited judicial review is necessary.

WHETHER JUDICIAL REVIEW OF NON-BENEFICIAL DETERMINATIONS IS NECESSARY

Problems with Intramural HEC Review

Several critics have questioned whether internal review of a decision to deny treatment on the basis of futility affords sufficient process and protection for patients (See., e.g., Truog, Georgia State, 2009, p. 1001; White & Pope, 2012, pp. 151-152; O'Callaghan, 2008; Kwiecinski, 2006, p. 317). Harvard physician, ethicist, and professor Dr. Robert Truog, for example, recognizes the competence and integrity of hospital ethics and medical review committees, but notes that they tend to be primarily composed of individuals from the same institution as the clinicians who made the disputed determination. The HEC members often know the treating clinicians well and frequently have overlapping financial interests (Truog, Chest, 2009, p. 969). Professor Thaddeus Pope has critiqued that "many HECs make decisions that suffer from risks of corruption, bias, carelessness, and arbitrariness" (Campbell, 2009, p. 258). He cites specific examples of "HEC corruption" and other authorities as support for his concerns about possible bias, carelessness, and arbitrariness (Pope, Cardozo, 2014, pp. 442-447; Pope, 2009, pp. 275-299). Pope further voices concern that there might be vast disparity in qualifications between HECs from one institution to another and notes the frequent absence of any formal bioethics training. He also points to the absence of any semblance of standardized structure and procedures (Pope, 2009, p. 292-299). Moreover, HECs do not consistently provide a clear report explaining their conclusions (Pope, 2009, p. 298).

Empowerment of multi-institutional HECs has been offered as an alternative to intramural committees, in part because of the decreased likelihood of bias and conflicts of interest (Pope, 2009, p. 302). Decisions to refuse requested treatment would be reviewed by a broader array of professionals to include those lacking financial or professional connections to the cases under review. Truog, however, while noting that multi-institutional committees offer advantages over intramural HECs, cautioned against using multi-institutional HECs to create a "shadow judicial system" that replaces traditional courts (Georgia State, 2009, p. 1002). Specifically with regard to the Texas law, Truog concludes, "[t]he most fundamental flaw with TADA is that it specifically excludes the involvement of the courts, ceding all of the authority to the hospital HEC or medical review committees" (Chest, 2009, p. 970). The question then remains as to what benefits are afforded by court review, as opposed to outside or multi-institutional HEC review, that might justify the additional burdens associated with the judicial process.

Advantages of Court Review

Several advantages have been offered in favor of judicial review of futility determination. These include that judicial review encourages intensive communication, sets precedent that enables subsequent extra-judicial resolution, and serves to draw public attention and deliberation to complex medical ethics issues (Pope & White, 2012, p. 152). Courts are entrusted to protect minority viewpoints and ensure fair and neutral dispute resolution (Truog, Chest, 2009, p. 970; Truog, Georgia State, 2009, p. 1002). Other merits advanced regarding judicial review include the judiciary's presumed competence for "detached but passionate investigation and decision;" the availability of public scrutiny, fostering credibility; the building of case precedent, leading to consistency; impartiality; and the opportunity it affords for both sides to fully present their arguments (Murphy, 1990, p. 338; see also Bosslett, Pope, et al., 2015, p.1326). Judges must air any potential conflicts of interest and recuse themselves when the conflict is too great (United States Courts, 2014, Canon 3(C)). Judges are of course subject to biases, mistakes, and even corruption, but the judicial system is at least structured to be neutral, deliberative, and transparent. This is not so with intramural HECs which, in virtually every futility dispute, are asked to review the decisions of their close peers, individuals with closely aligned financial interests, and, in some cases, their employers. HEC processes allow for extensive discussions in the absence of the patient, and even outside the HEC meeting, are subject to minimal and varying rules and do not uniformly afford public scrutiny. Critics of court involvement might counter that the costs of court litigation dwarf whatever benefits court review offers, but this should not be overstated. Protracted, complex litigation can be extraordinarily costly, but initial court filing fees are generally quite low (Public Citizen, retrieved 2017).

Dr. Douglas B. White and Professor Pope also argue that judicial review of HEC decisions will allow guidelines and standards to develop "within the shadow of the courts" (2012, p. 152). That is, as court opinions become available HECs will have clearer guidelines of what will pass muster, which will ultimately allow similar cases to be resolved outside of court (White & Pope, 2012, p. 152). This reasoning has support based on experience. The value of judicial review in improving the quality of agency action has been specifically argued in the immigration context (Benson, 2006/2007, pp. 63-64). Judicial review is also credited with improving the administration of Veterans' benefits. Two decades after the creation of a specialized review court, the quality of the Department of Veterans' Affairs benefits decisions has improved, with veterans being provided due process and the system as a whole benefiting from an established body of case law (Riley, 2010, p. 69). The decision-making process of HECs is akin to that of administrative agencies. This is especially so under laws like TADA, which essentially give HEC decisions force of law. Just

as administrative agencies are subject to court review, so should the decisions of HECs when those decisions result in legal immunity for one party while impacting the very right to life of the other. Opponents of court review will point to added processing time (Riley, 2010, p. 92), and may rightly argue that protracted and expensive resolution is completely untenable in the context of futility disputes. Therefore, a very limited, streamlined, substantive review process is needed.

Toward Limited Substantive Judicial and Quasi-Judicial Review

Patients whose lives hang in the balance should be afforded limited court review of the merits of the determination that continued life sustaining medical treatment (LSMT) is futile. Intramural HECs are poorly designed structures to serve as neutral forums, even if their members attempt in good faith to maintain neutrality. Multi-institutional HECs increase neutrality, but they do not consistently offer uniformly fair processes, transparency, and reliable records of proceedings. I propose that court review of the substance of the futility determination be allowed but limited in two ways so as to make protracted litigation an extremely rare occurrence. First, resolution through internal processes must be attempted to include mediation and HEC procedures. Mediation and well-explained HEC decisions will resolve many disputes (Pope & Waldman, 2007, pp. 189-195). For those that remain unresolved, I propose that the patient or surrogate be given ten days from the final HEC decision to file a petition for court review. The health care facility will need to provide the court a reasonably detailed report explaining why the treatment was considered non-beneficial. This should already have been provided to the patient, and, as has been argued in the roughly analogous context of arbitration, the absence of a clearly explained HEC decision should mean that the court will not assign deference to the HEC's decision (Lorang, 2011, p. 265).

The judicial review will extend appropriate deference to the expertise of the HEC for decisions that are well-explained and documented, and the court should only intercede when the HEC does not follow correct processes or when the futility determination is not reasonably supported even under deferential review. The refusal of other hospitals to accept transfer will be evidence that the requested treatment is non-beneficial but will not be conclusive. The court will be aided by the patient's submissions, qualified third party opinions, and, when absolutely necessary, court-appointed experts and special masters. When the HEC decision is strongly grounded and cogently documented, the matter should be resolved expeditiously by the court based solely on a paper review. If the matter is less clear-cut, then a hearing may be necessary and substantial time and expense may be added to the process. This is a societal price to pay, but a small one compared to the risk of highly infrequent unwarranted withdrawal of life-sustaining treatment. The properly de-identified decisions of the courts and the underlying HEC reports will

be public record and will serve as guides to other committees facing similar scenarios. This in turn will promote efficiency and consistency while reducing the appearance of arbitrariness. Ideally, a publicly-supported specialized review body would be created to supplement or replace traditional courts in this process, perhaps modeled on the Ontario Capacity and Consent Board. This “neutral expert board” has proven an important resource in bringing resolution to LSMT futility disputes while still allowing for traditional court review (Handelman & Parke, 2008; see also Bosslett, Pope, et al., 2015, p. 1326).

CONCLUSION

Since TADA’s implementation, several major consortium-based efforts to address futility dispute resolution have included access to legal processes as a last resort (Center for Practical Bioethics, 2006, p. 20, p. 78; The Health Care Ethics Committee of the Health Council of South Florida, 2000; Singer, Barker, et al., 2001, p.189). This by itself does not mean that court review of futility determinations is ethically required, but it does stand as evidence that a broad array of healthcare facilities and practitioners have recognized the need for court access in order to safeguard patient autonomy and prevent poorly-grounded futility determinations. Providers cannot practice under the threat of devastating liability, but they also should not be afforded absolute immunity for treatment withdrawal decisions that are only subject to intramural HEC review. A streamlined judicial review whether through a conventional court or a specialized tribunal will strike the proper balance between professional independence and patient autonomy.

Back to the scenario: the family, unwilling to accept the HEC’s determination, petitions a specialized court for review, paying a \$200 filing fee. An advocacy group adds an impassioned letter, which includes some marginally supported medical assertions. In response, the HEC produces a five-page report, carefully outlining the reasons for the futility determination, with reference to records, literature, and statements from the treating oncologist and a second staff specialist. They also point to several unsuccessful transfer attempts. Though sympathetic to the parents’ plight, the judge returns a decision six days later, authorizing withdrawal of treatment. No further appeal is allowed, and the healthcare providers and hospital are authorized to withdraw further life sustaining medical treatment and afforded absolute immunity. The court decision, including the HEC report and enclosures, are de-identified and become public record, providing guideposts to practitioners, HECs, and courts around the world. The family is still despondent, but take some solace in that the process was fair and that the medical issues and their requests were thoroughly and openly deliberated. Like the physicians, they did all they could, and at least they had their day in court.

REFERENCES

- Benson, L. (2006/2007). Making paper dolls: How restrictions on judicial review and the administrative process increase immigration cases in the federal courts. *New York Law School* , 51, 37-73.
- Bosslett, G., Pope T., et al. (2015). An Official ATS/AACN/ACCP/ESICM/SCCM Policy Statement: Responding to Requests for Potentially Inappropriate Treatments in Intensive Care Units. *Am J Respir Crit Care Med* Vol 191 (11), 1318–1330.
- Burns, J., & Truog, R. (2007). Futility: A concept in evolution. *Chest* , 132 (6), 1987-1993.
- Center for Practical Bioethics. (2006). Recommended Policy Guidelines Regarding Medical Futility.
- Council on Ethical and Judicial Affairs, American Medical Association. (1999). Medical futility in end-of-life care: Report of the council on ethical and judicial affairs. *Journal of the American Medical Association* , 281 (10), 937-941.
- Fine, R. (2009). Point: The Texas Advance Directives Act effectively and ethically resolves disputes about medical futility. *Chest*, 136 (4), 963-967.
- Fine, R. (2009). Rebuttal from Dr. Fine. *Chest*, 136 (4), 971-972.
- Gabbay, E., Calvo-Broce, J., Meyer, K. B., Trikalinos, T. A., Cohen, J., & Kent, D. M. (2010). The empirical basis for determinations of medical futility. *Journal of General Internal Medicine* , 25 (10), 1083-1089.
- Gaylin, W., & Jennings, B. (2003). *The Perversion of Autonomy: Coercion and Constraints in a Liberal Society*. Washington, DC: Georgetown University Press.
- Halvey, A. (2009). Medical futility, patient autonomy, and professional integrity: Finding the appropriate balance. *Health Matrix* , 261-290.
- Handelman, M., & Parke, B. (2008). The beneficial role of a judicial process when “everything” is too much? *Healthcare Quarterly* , 11 (4), 46-50.
- Hinshaw, D., Pawlik, T., Mosenthal, A., Civetta, J., & Hallenbe, J. (2003). When do we stop, and how do we do it? Medical futility and withdrawal of care. *Journal of the American College of Surgeons* , 196 (4), 621-651.
- Huynh, T., Kleerup, E., Wiley, J., Savitsky, T., Guise, D., Garber, B., et al. (2013). The frequency and cost of treatment perceived to be futile in critical care. *JAMA Internal Medicine* , 173 (20), 1887-1893.
- Jecker, N. (2011). Medical futility and the death of a child. *Bioethical Inquiry* , 8, 133-139.
- Kwiecinski, M. (2006). To be or not to be, should doctors decide? Ethical and legal aspects of medical futility policies. *Marquette Elder's Advisor* , 7 (2), 313-355.
- Lawrence, D. (2007). The four principles of biomedical ethics: A foundation for current bioethical debate. *Journal of Chiropractic Humanities* , 14, 34-40.
- Lorang, K. A. (2011). Mitigating arbitration's externalities: A call for tailored judicial review. *UCLA Law Review* , 218-268.
- Marco, C. A. (2000). Determination of “futility” in emergency medicine. *Annals of Emergency Medicine* , 35 (6), 604-612.
- Mayo, T. (2009). The Baby Doe rules and Texas's ‘futility law’ in the NICU. *Georgia State University Law Review* , 25 (4), 1003-1017.
- Murphy, C. A. (1990). Searching for proper judicial recognition of hospital ethics committees in decisions to forego medical treatment. *Golden Gate University Law Review* , 20 (2), 319-344.
- O'Callaghan, N. (2008). When Atlas shrugs: May the state wash its hands of those in need of life-sustaining treatment? *Health Matrix* , 18, 291-372.
- Pope, T. (2014). Dispute resolution mechanisms for intractable medical futility disputes. *New York Law School Law Review* , 58, 347-368.
- Pope, T. (2012) . Medical futility. In D. M. Hester, & T. Schonfeld (Eds.), *Guidance for Healthcare Ethics Committees* (pp. 88-97). New York City, NY: Cambridge University

Press.

- Pope, T. (2009). Multi-institutional healthcare ethics committees: The procedurally fair internal dispute resolution mechanism. *Campbell Law Review* , 31 (2), 257-324.
- Pope, T. (2014) The growing power of healthcare ethics committees heightens due process concerns. *Cardozo Journal of Conflict Resolution* , 15, 425-447.
- Pope, T., & Waldman, E. (2007). Mediation at the end of life: Getting beyond the limits of the talking care. *Ohio State Journal on Dispute Resolution* , 23 (1), 143-195.
- Public Citizen. The costs of arbitration, retrieved 8 January, 2017, from <http://www.citizen.org/publications/publicationredirect.cfm?ID=7173>.
- Riley, R. E. (2010). Simplify, simplify, simplify- an analysis of two decades of judicial review in the veterans' benefits adjudication system. *West Virginia Law Review* , 113, 67-93.
- Schneiderman, L. J. (2011). Defining medical futility and improving medical care. *Bioethical Inquiry* , 8, 123-131.
- Schneiderman, L. J., Jecker, N., & Jonsen, A. (1990). Medical futility: Its meaning and ethical implications. *Annals of Internal Medicine* , 949-954.+
- Singer, P. A., Barker, G., Bowman, K., Harrison, C., Kernerman, P., Kopelow, J., et al. (2001). Hospital policy on appropriate use of life-sustaining treatment. *Critical Care Medicine* , 29 (1), 187-191.
- Smith, M. L. (2009). Medical inappropriateness review: Appropriately performed by a medical committee. *Health Matrix* , 18, 243-244.
- The Health Care Ethics Committee of the Health Council of South Florida. (2000). The Medical Futility Guidelines of South Florida.
- Tomlinson, T., Mchalski, J. A., Pentz, R., & Kuppelomaki, M. (2001). Futile care in oncology: When to stop trying. *The Lancet* , 2, 759-764.
- Truog, R. (2009). Counterpoint: The Texas Advance Directive Act is Ethically Flawed. *Chest*, 136 (4), 968-971.
- Truog, R. (2009). Medical Futility. *Georgia State University Law Review* , 25 (4), 985-1002.
- Truog, R. (2009). Rebuttal from Dr. Truog. *Chest* , 136 (4), 972-973.
- Truog, R., & White, D. (2013). Futile treatments in intensive care units. *JAMA Internal Medicine* , 173 (20), 1894-1895.
- White, D., & Pope, T. (2012). The courts, futility, and the ends of medicine. *Journal of the American Medical Association* , 307 (2), 151-152.



UC Irvine, 2011, *Pills*. Combined oral contraceptives, or birth control pills, are commonly used pharmaceuticals that prevent pregnancy.

Tangled Web to Conceive... or Not to Conceive: Brief History, Current Controversies, and Future Musings Regarding Contraception and Abortion and the Role of Bioethics

by Edmund Weisberg[†]

The rise to prominence of contraception and abortion in the political and cultural life of the United States coincided with the emergence of the field of bioethics. The U.S. Supreme Court ruling of 1973 in Roe v. Wade might have given the appearance of uttering the final word on the subject of abortion, but its opponents have worked assiduously to skirt the federal law. Thus, the lengthy militant fight over access to contraception and abortion has carved a salient niche in the discipline of bioethics. As bioethics undergoes its own largely expansive transformation—to include food ethics and the implications of climate change, but also a pivot, in some circles, toward medical ethics—shifts in the battle lines have also been drawn over reproductive freedoms. Will the evolution of bioethics ensure that reproductive issues continue to receive a discrete focus within the field?

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World War I, also called “the Great War,” became known popularly as “the war to end all wars” or “the war to end war,” as first suggested by British author H.G. Wells (Stepp, 2014). The expression

would eventually be used derisively, even by Wells himself. Skepticism rightly bore witness to the fact that the ferocious global conflict would not live up to its billing. As history shows, it did not come close. Just a shade over two decades later, World War II would erupt, taking several million more lives. Of course, there were copious deadly invasions and skirmishes throughout the world in the interim, which also paved the way toward the next global conflagration. The United States, in particular, has rarely known a time, before or since, when its military has been idle, with thousands if not millions of lives at risk. Members of the anti-abortion armies are not typically found on the frontlines of protests against multiple military misadventures that endanger and kill civilians and soldiers alike, but they have long waged battles on various domestic—and private—fronts with the stated purpose of fighting for life. Such individuals are not demonstrably involved, by and large, in striving to protect those threatened in military conflict, but, rather, and some might argue ironically, go to war to save what they deem to be the most vulnerable—the “lives” of the unborn, gestating in their mothers’ wombs.

Like those who may have put emotional or cognitive stock in the sobriquet for the first world war only to have their hopes dashed, even mocked, the legions of Americans who may have thought that the U.S. Supreme Court had, once and for all, settled issues related to contraception and abortion have had a slow, rude awakening over the last few decades. Indeed, today’s highly polarized political climate has contributed to a virulent outbreak of animosity over these long-festered issues. In the contemporary U.S., a nation that routinely characterizes societal challenges in militaristic terms (e.g., War on Drugs, War on Cancer, War on Terrorism, War on Christmas, but, alas, never War on War), a veritable Republican War on Women, as it has been dubbed by some (Milbank, 2012), appears to have emerged with unexpected vehemence. This seemingly interminable culture war that embroils contraception and abortion, while always involving individual women, is played out on multiple fronts that converge at the nexus of medicine, law, politics, media, personal conviction, autonomy, privacy, and bioethics. In fact, reproductive rights came to the fore in the U.S. at roughly the same time as the fledgling field of bioethics began to take root. In the last five decades, the ever-contentious arena of reproductive rights has served as one of the anchor topics in the evolving realm of bioethics. As technology continues its inexorable march, innovations are certain to continue to impact reproductive options. While it is likely that reproductive rights will remain important within bioethics, the dynamic changes poised to occur within both areas raise the question as to the nature of this association in the future.

LANDMARK EVENTS AND CASES PERTAINING TO REPRODUCTIVE RIGHTS

The 1960 approval by the U.S. Food and Drug Administration of the contraceptive pill (Enovid)—or simply the Pill—was considered a watershed event in the women's movement. This first foray into drugs with an effect not intended to heal a medical condition would give women unprecedented control over their fertility. The availability of birth control pills remains as important today as it was over a half century ago. Since that time, salutary effects and, thus, medical reasons have been identified to support the use of oral contraceptives. Polycystic ovary syndrome is one of the primary conditions for which oral contraceptives are indicated. Birth control pills are also known to reduce the risk of cancer, alleviate cramps, and improve the skin, specifically by diminishing acne (Berger, 2008).

In the early 1960s and in the wake of the assassination of an American president, the issuing of the Declaration of Helsinki by the World Health Organization and the Civil Rights Act of 1964, multiple liberation movements (i.e., civil rights, women's rights, gay rights, anti-war protests) were gaining momentum and exerting profound social and cultural changes. In 1965, the U.S. Supreme Court, in *Griswold v. Connecticut*, ratified the right of married couples to use contraception, superseding the Comstock Act of 1873. This was a welcomed ruling given that an estimated half million women were already using the pill by the time it was approved by the FDA for contraception in 1960 (the FDA granted approval of the pill in 1957 for use for menstrual disorders), and more than one million women in the U.S. are thought to have been using it for contraception at the time the *Griswold* decision was handed down (Marks, 2001). The 1972 Supreme Court ruling in *Eisenstadt v. Baird* affirmed the right of unmarried women and their partners to use the birth control pill.

While this 1972 judgment obviously had significant social implications, it was overshadowed the ensuing year by the Supreme Court's monumental 1973 *Roe v. Wade* decision, which used the constitutional precedent in *Griswold* to establish the constitutional right for women to terminate a pregnancy based on privacy rights. Writing for the 7-2 majority, Justice Blackmun developed a three-tiered or trimester framework for delineating state interests in protecting the health of a pregnant woman. During the first trimester of pregnancy, it was asserted that the state could not limit abortion access and could require only basic health practices. From the end of the first trimester to the point of fetal viability, the state could regulate abortion only to protect the health of the mother. After the point of fetal viability, during the final trimester of pregnancy, the state was said to have an interest in protecting "potential life," and could prohibit abortion as long as the procedure was still allowed when the mother's health or life was at risk (Masci, 2008). For several decades, the threshold for fetal viability was considered to be 28 weeks into the pregnancy. By the end of the 20th century, improvements in

neonatal care and technology lowered the time at which a premature baby could be born with a good chance of survival to 24 weeks of gestation. Notable improvements have not been achieved since then to lower this threshold (Salter, 2014). Nevertheless, several U.S. states have legally lowered the bar, so to speak, below the 24-week threshold (Williams, 2015; Khazan, 2015).

The first successful attempt by anti-abortion advocates at chipping away any of the rights established by *Roe v. Wade* at the federal level came in 1989 with *Webster v. Reproductive Health Services*. In a hotly contested 5-4 decision, the court upheld a Missouri statute prohibiting the use of public facilities for abortions and preventing abortions from being performed by public health workers unless the life of the mother was deemed to be at risk (Masci, 2008). The Missouri law also called for doctors to conduct fetal viability tests of mothers who were seeking abortions and were at least 20 weeks pregnant. The 1992 *Planned Parenthood of Southeastern Pennsylvania v. Casey* case posed a more significant threat to reproductive rights. In its highly contentious 5-4 decision, the Supreme Court upheld *Roe* while partially dismantling the trimester approach set forth by Blackmun. *Casey* allowed states to enact laws requiring pre-abortion counseling and waiting periods (usually at least 24 hours) between counseling and an abortion at any stage of a pregnancy, provided that no “undue burden” nor “substantial obstacle” was created to prevent a woman from obtaining an abortion. The ruling also permitted states to require minors to obtain parental consent before being granted the right to an abortion (Masci, 2008). In 2007, in *Gonzalez v. Carhart* and *Gonzalez v. Planned Parenthood Federation of America*, the Supreme Court upheld the Partial Birth Abortion Act of 2003, allowing states to enact restrictive abortion laws even when a mother’s life was at risk.

Although it can sometimes seem like white noise because many of us may feel inured to the debate, abortion has remained a steadily contentious issue for more than 40 years, and there are no signs to indicate that change is on the horizon. In fact, for the staunchest of warriors on either side, U.S. presidential elections confer their primary import by potentially influencing the direction of the Supreme Court, which sits incomplete at a 4-4 split because of the unprecedented Congressional refusal to rule on President Obama’s nominee, Merrick Garland. Conversely, many had good reason to believe that the concept of contraception has been a long settled, noncontroversial issue. Contraception was and remains well accepted and used among American women. Data reveal that within the demographic group considered least likely to be open to the use of contraception (Catholics, based on guidelines by the U.S. Conference of Catholic Bishops and the Vatican), 98 percent of sexually experienced women of child-bearing age who identify as Catholic have used some form of birth control (Jones, 2011). Further, contraception is said to be used by 99 percent of women during their reproduc-

tive years (Moreno, 2012). Social conservatives in the U.S. have responded by mounting a concerted attack on abortion and contraception with what amounts to a “whatever sticks” philosophy. By aiming for the most extreme elements of their restrictive agenda on reproductive rights, particularly at the state level, they hope for modest success while paving the way for significant rollbacks in the future or substantial change, state-by-state, that renders federal law moot. This manifests in state laws crafted by Americans United for Life (AUL) intended to push back legal fetal viability, as Arizona attempted in 2013, only to be struck down by the U.S. Supreme Court. It also presents itself in cases like 2014’s *Burwell v. Hobby Lobby*, in which the Court found closely held for-profit companies worthy of exemption from laws considered religiously objectionable to its owners. The case was brought by the owners of Hobby Lobby, who objected to a provision in 2010’s Patient Protection and Affordable Care Act (better known as Obama Care, which was modeled after former Massachusetts Governor Mitt Romney’s healthcare plan) requiring companies to provide coverage for drugs and devices related to abortion (Peterson, 2014).

OTHER RECENT ATTACKS ON REPRODUCTIVE FREEDOMS

The Susan G. Komen Fiasco

As the largest breast cancer charity in the U.S., the Susan G. Komen for the Cure (nee Breast Cancer Foundation) is well known for its fight against breast cancer. Until a few years ago, it had received solid nonpartisan support. After all, disease is nonpartisan. But the organization—whose CEO, Nancy Brinker, is a longtime Republican stalwart—was heavily influenced by Karen Handel, former senior vice president for public policy and unsuccessful candidate in 2010 for the Republican gubernatorial nomination in Georgia, which unintentionally exposed the organization’s politics to the population at large.

Karen Handel led the organization’s board to eschew its own subcommittee opinion on contributing funds to the Planned Parenthood Federation of America (PPFA). The action represented a stunning and woeful misreading of the public mood, public perceptions of the organization, and attitudes toward the work of Planned Parenthood. Specifically, in late January 2012, the foundation announced that it would end its grants to PPFA, funds that were being used for approximately 170,000 breast cancer screenings and 6,400 mammogram referrals for women, the majority of whom were lower-income minority individuals with limited or no other access to healthcare services (Jacobson, 2012). The backlash against Komen’s directional shift was swift and vociferous. Within 24 hours of the Komen announcement, Planned Parenthood raised \$400,000 from multiple donors, recouping nearly all of what Komen pledged to withhold (Baker, 2012). Within a week, millions of

signatures on petitions and other forms of public pressure led Handel to resign from Komen. And after a clumsy self-defense and inept apology, Komen reversed its decision, pledging to continue its funding of Planned Parenthood.

It was a colossal blunder and public relations nightmare for the foundation. Americans by and large did not appreciate seeing the support for women's health muddled by the acrimonious politics of the abortion debate. Fortunately, they saw the maneuver by the Komen board for exactly what it was. Highly-placed officials in Komen had decided that despite Planned Parenthood's varied good works for women's health, the fact that Planned Parenthood also conducted abortions tainted PPFA and justified withdrawing support. Resignations by several Komen officials and a pledge by a member of their medical advisory board to resign if the decision were not reversed occurred in the immediate wake of the doomed decree, providing more evidence that Komen was deeply torn by the organization's poorly thought-out action. Additional recent assaults on the reproductive rights of women, such as the 2015 movement and continuing attempts to destroy Planned Parenthood, are anything but poorly planned, however.

The Well Synchronized Legislative Assault Led by Conservative Lobbyists

In recent years, the behind-the-scenes lobbying activities of the American Legislative Exchange Council (ALEC) have come to light through exhaustive reporting and after Republican Tea Party gains in the 2010 mid-term elections changed the balance of power at the state and federal levels. Active for several years but well cloaked, ALEC is a national group funded primarily by billionaires Charles and David Koch, scions of Fred Koch, founder of the oil refinery business Koch Industries and one of the founders of the conservative John Birch Society. ALEC, noted for drafting state legislation and lobbying representatives, has been responsible for clandestinely promoting several anti-union measures in Wisconsin, Arizona, Florida, and numerous other states. The Koch brothers and ALEC have also been associated with former Republican presidential candidate Herman Cain in 2012 and Wisconsin representative Paul Ryan. They were believed to have been behind Scott Walker's aborted 2016 run for the Republican nomination and are thought to have funded efforts for the successful Republican retention of control of the U.S. Senate.

Americans United for Life (AUL) is neither as well known nor as infamous as ALEC, but it may be on the verge of greater notoriety. Within the last few years, exceedingly restrictive legislative proposals, for example, to ban abortions after 20 weeks of pregnancy or to require mandatory ultrasounds (in some cases, the highly invasive and uncomfortable transvaginal ultrasound) before abortions, have wended their way to state houses across the U.S. with regularity and apparent synchronicity. This is no accident. It is "blueprint legislation," courtesy of AUL (Seltzer, 2012). Even the Komen debacle has some

AUL fingerprints. AUL President Charmaine Yoest and her organization filed the report about Planned Parenthood that led to the U.S. House of Representatives Committee on Energy and Commerce investigation of PPFA. Komen leadership used the investigation to justify their (aborted) defunding effort (Kliff, 2012).

Recent years have seen the resolution of multiple AUL legislative attempts at the state level. In 2012, Oklahoma Republican Governor Mary Fallin signed the fetal heartbeat bill into law, requiring physicians to ask a woman seeking an abortion if she wants to hear the fetal heartbeat (Associated Press, 2012). Previous attempts in Ohio and North Dakota to enshrine fetal heartbeat bills failed. Several conservative opponents of the legislation feared that such laws would lead to a strengthening of *Roe v. Wade*.

In Virginia, legislation was approved requiring women to undergo a transabdominal ultrasound before an abortion, though the mandate requiring a transvaginal ultrasound was removed from the legislation at the urging of Gov. McDonnell, perhaps due to the national uproar (Talley, 2012). As it is, the law, since enacted in other southern states, adds an intrusive, likely unwelcome procedure for women in Virginia who are seeking an abortion. In response to the furor over the Virginia bill, Pennsylvania and Idaho officials tabled similar bills that they were contemplating. Georgia passed a ban on abortions after 20 weeks for any fetus other than those beset with anomalies judged to be incompatible with life after birth (Marty, 2012). This is just a sampling of the numerous legislative attempts from anti-abortion partisans throughout the U.S. in recent years. Despite all of the demagoguery and calls to restrictive legislative arms, it is important to note that most (88-90 percent) abortions occur during the first trimester (Yanow, 2012).

Nevertheless, the legislative assault has certainly had an impact, according to the Guttmacher Institute, which maintains an active overview of state abortion laws throughout the U.S. and notes that 75 percent of abortion patients are poor or low-income women, and 59 percent of women who get abortions are mothers (Guttmacher Institute, 2016). At the beginning of the millennium, almost one third of reproductive-age women in the U.S. lived in states antagonistic to abortion rights (with slightly more than one third living in supportive states and one third living in middling states). However, now more than half of such women live in states with laws restricting abortion rights (Seltzer, 2012). Both sides on the abortion and, now, contraception divide, are as actively engaged as ever. The ideological differences between the opponents are profound, regardless of the fact that the combatants rarely seem to be speaking the same language.

WAR OF WORDS, WAR FOR THE WOMB

Reproductive rights may represent one of the most patently ideological battles

in the myriad culture wars waged in modern times. One faction characterizes itself as “pro-life,” referring to the other side as “pro-abortion.” The other side—noting that no one of their ilk is enthusiastic about abortion itself but adamantly supports access to and freedom to choose such an option—identifies as “pro-choice” and refers to the opposition as “anti-choice.” What is “partial birth abortion” to the former faction is “late-term abortion” to the other. Defining when life begins is important to those who oppose abortion, as many seem to revere life from conception to shortly after birth. However, the notion of rendering such a definition barely registers for many who support the freedom to choose an abortion.

These profound linguistic differences represent vast gulfs between the conceptual frameworks of the two sides of this debate. The ideas espoused by the foes and how these ideas are framed are noteworthy because language drives the media representation and legislation surrounding these issues and has potentially far-reaching impact. George Lakoff, cognitive linguist based at the University of California, Berkeley, has argued that language changes brain circuitry and that Republicans have made a much more concerted effort to use moral arguments rather than factual ones to appeal to or activate the moral systems of their constituency, taking advantage of how the brain really works (Lakoff, 2012). Despite a strong majority of people supporting contraception and a plurality supporting freedom to choose (49 percent to 45 percent), the effective framing of the anti-choice movement renders it a formidable force able to sway large swaths of the population, as evidenced by the larger majority that finds abortion to be morally wrong (Lipka, 2016; Saad 2011).

For example, the name of the restrictive Arizona law enacted in 2012 and overruled less than two years later was the “Women’s Health and Safety Act.” The pro-choice movement would argue that the Arizona law would deliver neither health nor safety. It is the pro-choice progressive cadre that dubbed the onslaught of legislative and electoral salvos, the initial Komen pronouncement against PPFA, and right-wing media commentary as the “War on Women,” borrowing the militant language or frame of the conservatives. According to Lakoff, that is a recipe for failure. At the very least, like branding all Trump supporters as racists, xenophobes, and misogynists, such militant language is likely to provoke defensiveness and retrenchment among Republicans.

NEWER TECHNOLOGIES AND THEIR IMPLICATIONS

On the surface, the existence and availability of the relatively new “morning after” pill should facilitate and alleviate the discomfort associated with abortion. The convenience of the drug would seem to herald a new age of liberation for women akin to the 1960 FDA approval of the birth control pill. But

it is not as simple as popping a pill and blithely going about one's day. There are side effects and a follow-up visit to confirm that the medication worked as recommended.

The overturned Arizona legislation also addressed medical or pharmaceutical as opposed to surgical abortions. According to the Guttmacher Institute, between 17 and 20 percent of all abortions are non-surgical, with women taking the pills at home or in clinics (Yarrow, 2012). One of the newest methods of performing non-surgical abortions is known as a "web cam abortion," which allows a patient to talk to a doctor and receive a prescription over the internet. After speaking with the patient and reviewing her records over the internet, the doctor pushes a button and a drawer opens up in the patient's room providing access to abortion-inducing medication. Republicans, perhaps as a response to fear that non-surgical abortion could soon outpace surgical abortions, are taking the legislative offensive. Wisconsin, with a Republican governor and Republican majority in the state house, enacted a law imposing significant new hardships for those seeking non-surgical abortions. The Coercive and Web Cam Abortion Prevention Act stipulates that women make at least three visits to the doctor prior to a pharmaceutical abortion, requires doctors to ascertain if the patient is being forced to have an abortion, and bars women and doctors from using a web cam during the procedure (O'Brien, 2012). Planned Parenthood of Wisconsin responded in April 2012 by suspending non-surgical abortions based on the vagueness of the law (Herzog, 2012). They resumed in April 2013 when a temporary injunction reversed part of the law (Vielmettim, 2016).

The Supreme Court of 1973 would likely strike down the plethora of new state laws. Even the Roberts Court has found some states to be reaching beyond the Constitution. In June 2016, the Supreme Court ruled 5 to 3 that two provisions of a Texas anti-abortion law are unconstitutional; the provisions required abortion clinics (regardless of whether they offered only medical, non-surgical abortions) to be equipped like surgical centers and required doctors performing abortions at clinics to have admitting privileges at a hospital within 30 miles of the clinic (Mason Pieklo, 2016). Justice Stephen Breyer, writing for the majority, identified these measures as "substantial obstacles" to women intending to get abortions prior to fetal viability and represented "an undue burden on abortion access."

Conservative actions to pre-empt non-surgical abortion procedures from becoming standard evince cognizance that a lack of restrictions on pharmaceutical abortions could do much to further conceal the procedure from public awareness and scrutiny. This has helped to shift the targets of movement conservatives' ire from clinics, doctors, and patients to pharmacists. In most cases, it is poor or low-income, often minority, women who are disproportionately affected.

CONCLUSION

The entrance of contraception and abortion onto the main stage of American consciousness and public discourse—including debate as well as embittered recriminations and boundless partisan activism—coincided with what many consider to be the advent of the field of bioethics. While strongly linked, reproductive rights and bioethics are hardly attached inextricably. Certainly, the field of bioethics has grown and gained a foothold, with the area of reproductive rights and technologies as a major anchor. But, to borrow from Heraclitus, you cannot step into the same river twice—change is inevitable. Although predicting the future with anything approaching precision is a rare feat, considering some trends and movements within the field may help to point us in the right direction.

Despite the raft of restrictive legislation pushed in state houses in the U.S. in recent years, few significant changes to contraception accessibility seem likely. Nevertheless, social conservatives and their lobbyists will likely continue to try to restrict access to contraception and shift payment away from employers who claim conscientious objections.

On the abortion front, the momentum from surgical to pharmaceutical abortion will be important to monitor and analyze. The technology itself would seem to favor enhanced reproductive freedom and convenience. Exposure of the workings of Americans United for Life, like its corporate analog, the American Legislative Exchange Council, also seems to set the stage to energize the never-sleeping, gigantic pro-choice movement that was stirred, to say the least, by the manipulative actions of various leaders of the Susan G. Komen for the Cure and continuing attacks on Planned Parenthood. It is likely that the two diametrically opposed sides on the abortion divide will have to continue to adapt to the ramifications of technological innovation, particularly in the form of pharmaceutical abortion. The election of Donald Trump as President of the U.S. may embolden conservative lawmakers to renew efforts to seek the most restrictive anti-abortion and contraception legislation that they think can be enacted.

It is challenging to predict how the field of bioethics will continue to evolve. Will it break off into several subspecialties, such as “genethics, reproethics, nanoethics, and neuroethics” with little interdisciplinary collaboration (Maclin, 2010)? If so, certainly the access, availability, and legality of reproductive health services would fall under the rubric of “reproethics,” and would likely be ignored or relegated to fleeting consideration by the other subspecialties. As some academic departments narrow focus from bioethics to medical ethics, traditionally subsumed within the broader field, reproductive issues and ethics would clearly remain a core concern (Dawson, 2010). Forgoing any further fanciful speculation, whatever direction the field of bioethics takes, the most likely scenario in the short term will position reproductive ethics as a central bioethics issue.

REFERENCES

- Associated Press. (2012, April 28). Oklahoma governor signs “fetal heartbeat” bill into law. News on 6. Retrieved from <http://www.newson6.com/story/17880117/oklahoma-governor-signs-fetal-heartbeat-bill-into-law>.
- Baker, S. (2012, February 1). Planned Parenthood raises \$4000,000 in 24 hours. The Hill.
- Berger, L. (2008, August 2). Weighing the health benefits of birth control. The New York Times.
- Dawson, A. (2010). The future of bioethics: three dogmas and a cup of hemlock. *Bioethics*, 24(5), 218-225.
- Guttmacher Institute. (2016, November 1). An overview of abortion laws. Retrieved from <https://www.guttmacher.org/state-policy/explore/overview-abortion-laws>.
- Herzog, K. (2012, April 20). Wisconsin Planned Parenthood to halt abortion drugs: decision attributed to new law, becomes fodder in recall election. *Milwaukee Journal Sentinel*.
- Jacobson, J. (2012, February 1). The cancerous politics and ideology of the Susan G. Komen Foundation. RH Reality Check.
- Jones, R.K., & Dreweke, J. (2011). Countering conventional wisdom: New evidence on religion and contraceptive use, New York: Guttmacher Institute.
- Khazan, O. (2015, July 16). Planning the end of abortion. The Atlantic.
- Kliff, S. (2012, February 2). Meet the woman who got Komen to defund Planned Parenthood. The Washington Post.
- Lakoff, G. (2010, September 28). On environmental communication. The Huffington Post.
- Lipka, M. (2016, June 27). Five facts about abortion. Pew Research Center.
- Macklin, R. (2010). The death of bioethics (as we once knew it). *Bioethics*, 24(5), 211-217.
- Marks, LV. (2001). *Sexual Chemistry: A History of the Contraceptive Pill*. New Haven: Yale University Press.
- Marty, R. (2012, March 30). Georgia brings back 20 week ban with “compromise,” fistfights and protests ensue. RH Reality Check.
- Masci, D. (2008, September 19). The Pew Forum on Religion and Public Life. Retrieved from <http://www.pewforum.org/Abortion/A-History-of-Key-Abortion-Rulings-of-the-US-Supreme-Court.aspx>.
- Mason Pieklo, J. (2016, June 27). Supreme Court strikes Texas abortion restrictions. *Re-wire*.
- Milbank, D. (2012, April 18). Democrats battle back against Republican ‘war on women.’ The Washington Post.
- Moreno, J.D., & Kissling, F. (2012, March 21). Forty years later, we’re still fighting ‘Eisenstadt v. Baird.’ The Nation.
- O’Brien, B. (2012, April 21). Wisconsin’s Planned Parenthood suspends non-surgical abortions. Reuters.
- Peterson, A. (2014, July 3). Hobby Lobby: No justice for survivors of domestic violence. Common Dreams.
- Saad, L. (2011, May 23). Americans still split along “pro-choice,” “pro-life” lines: majorities believe abortion is morally wrong, legal access to it should be restricted. Gallup Politics.
- Salter, J. (2014, November 17). Premature babies: How 24 week-old babies are now able to survive. The Telegraph.
- Seltzer, S., & Kelley, L. (2012, April 10). Meet ALEC’s equally despicable anti-choice cousin – AUL: Think the anti-choicers in statehouses around the country are coming up with abortion bans all by themselves? Think again. Alternet.
- Stepp, E. (2014, Spring). History: a war to end all war. Vision.

- Talley, T. (2012, March 28). Oklahoma court strikes down ultrasound abortion law. Associated Press.
- Vielmetti, B. (2016, February 24). Appeals court overturns ruling to clarify abortion law. Milwaukee Journal Sentinel.
- Williams, J.P. (2015, September 14). States succeed in restricting abortions. US News & World Report.
- Yanow, S. (2012, April 19). Losing the right to abortion, week by week: restrictions on later-term abortions harm women. RH Reality Check.
- Yarrow, A. (2012, April 12). Governor Jan Brewer signs Arizona's extreme new abortion law. The Daily Beast.



Timothy K. Hamilton, 2007, *Love Worn*. From the artist: “*These are my mother’s hands. She’s 84 years old. These are the hands that washed me, held me, disciplined me, and comforted me. Her fingers are crooked because of arthritis. A very special touch.*”

You'll Be Comfortable After Surgery: The Ethical Imperative of Better Pre-operative Pain Management for Osteoarthritis

by Marshall B. Kapp[†]

Based on my own experience as a patient, this essay describes society's need to effectively address the failure of physicians to fulfill their ethical duty to alleviate the pain of patients suffering from osteoarthritis who are awaiting surgery. Physicians are generous with prescribing opioid medications for orthopedic patients postoperatively. However, patients' pre-operative pain often goes unrelieved, as physicians attempt to balance the obligation to act beneficently with their concern about harming the patient by enabling misuse or abuse of potentially life-threatening pharmacological agents.

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The topic of medical pain management in the United States has attracted enormous attention in clinical, public policy, and legal circles in recent years. There is consensus by this point in time about the physician's ethical responsibility, in light of medicine's fundamental goal to reduce suffering, to alleviate physical, cancer-related pain with sufficient palliative measures—including the prescription of opioid medications (Peppin, 2013). Conversely, there remains significant concern in the context of chronic, non-cancer pain. Striking an appropriate balance between the ethical duty to address undertreated pain, on one hand, and the risk of harm associated with abuse of pain medications, on the other, is the basis of this

controversy. The major considerations that should be explored are the controversies ethical dimensions and potential impact on the physician/patient relationship. (Esquibel & Borkan, 2014).

Despite the ethical attention devoted to patients with cancer and others with chronic non-cancer pain, I have learned from personal experience about the existence of another group of patients whose interest in appropriate pain management has been largely ignored (Kapp, 2016). A few years ago, I experienced sudden onset of acute pain in one of my knees. Walking, or rather hobbling, from one chair to another was an excruciating endeavor. I was able to obtain access to competent orthopedic care in my community, undergo clinically indicated tests, receive an accurate diagnosis of bone-on-bone osteoarthritis, attain a treatment plan (total knee replacement surgery), and acquire the recommended surgery. By the time this all took place, though, three months had passed. During that time without cartilage in my knee, I endured excruciating pain whenever I had to use my legs. I tried over-the-counter and prescribed weak analgesics recommended by my orthopedist — they provided no real relief. Being that the group practice I visited held a virtual monopoly in orthopedics in my geographic region, I was subject to their formal policy of refusing to prescribe narcotic medications for patients unless either of two conditions were met: either the patient had a confirmed bone fracture or the patient had undergone surgery and was in the immediate post-operative period. Because I fit into neither of those categories, I suffered substantial pain and its associated impairments in major life activities for three months before my surgery. Immediately after the surgery, which brought great symptom relief, my physician offered to write (nay, insisted on writing) a prescription for a generous amount of opioid narcotics even though I protested I did not need them then. One can only imagine how long a person without my sophisticated understanding of the health care system and my assertive personality would have had to wait for pain alleviation.

The problem of inadequate medical treatment of patient pain is generally longstanding and, in fact, even worse for members of particular racial and ethnic groups (Singhal, Tien, & Hsia, 2016). Acknowledgment of shortcomings and an ambitious attempt to address those deficiencies were led in the early 1990s by various governmental agencies and health professional organizations (Goldberg & Rich, 2014). In response to the public and professional attention that this problem attracted during that era, the policy and practice pendulum swung radically over the next two decades. Today, prescribed opioid misuse and abuse, resulting in high incidence of patient deaths, is a major public health dilemma in the United States (Goldberg & Rich, 2014). Reacting to the present challenge in a way that establishes an acceptable equilibrium to alleviate patient pain without facilitating a gateway

to abuse and misuse involves careful navigation of a complex array of ethical, legal, and practical issues (Barnes & Sklaver, 2013). The risk that legitimate opioid prescriptions may be diverted for illicit purposes makes the challenge even more difficult.

Much attention is focused on the tension between physicians' beneficence-driven obligation to do good by reducing patient pain and their nonmaleficence-driven duty to avoid inflicting harm on patients because that tension pervades primary care. Mild-to-moderate intensity acute pain represents one of the most frequent complaints encountered by primary care physicians and accounts for the reason behind nearly half of patient visits (McCarberg, 2011). Similarly, a number of commentators have analyzed the factors, including apprehension about the negative repercussions of strict legal regulation, that often inhibit physicians from providing salutary pain management in the Emergency Department (ED) (Marcus & Venkat, 2015; Venkat, Fromm, Isaacs, & Ibarra, 2013). I personally witnessed such inhibition in the ED in my own desperate quest for relief during my three-month travail between the onset of my osteoarthritis pain and surgical intervention.

Fear of regulatory, criminal, or civil liability and punishment, on both the federal and state levels, in retribution for the excessive prescription of opioids extends beyond the ER. This fear acts as the most prevalent reason that physicians across the board are resistant to treating patient claims of non-cancer pain aggressively (Dineen & DuBois, 2016; Fry-revere & Do, 2013). Avoidance behavior of this sort, sometimes of questionable ethical validity, is a commonly manifested form of defensive medicine (Dineen, 2016; DeVille, 1998).

When preoperative management of symptoms through physical therapy, strengthening exercises, and pain medications, such as acetaminophen and non-steroidal anti-inflammatories, has failed, usage of prescribed opioid derivatives has been endorsed by several professional associations, including the American Geriatrics Society. One set of authors asserts that "a number of patients presenting to their orthopaedic surgeon for total hip arthroplasty have previously been managed with opioid-derived medications" (Pivec, Issa, Naziri, Kapadia, Bonutti, & Mont, 2014). That claim notwithstanding, my personal anecdotal experience of dealing with my own preoperative interval of pain and conversing with many other people who lived through a similar medical adventure suggests that inadequate preoperative treatment of osteoarthritis-connected pain is widespread and poses ethical tensions that should be confronted. The best ethical and clinical approach is by no means clear, particularly if Pivec, Issa, Naziri et al. (2014) are correct in saying that opioid use prior to total hip arthroplasty leads to worse clinical outcomes.

One obvious strategy would be to reduce the kinds of multiple un-

necessary administrative inefficiencies I experienced in obtaining proper diagnosis and treatment of osteoarthritis (Kapp, 2016). This would significantly contract the duration of the preoperative period during which the pain persists. Beyond that, strategies that have been tested in other pain contexts, such as medication adherence contracts, pill counts, and random urine drug screenings, may or may not prove effective and advisable in the preoperative osteoarthritis context (Goldberg & Rich, 2014). Alternative strategies for treating osteoarthritis, such as acetaminophen, oral nonsteroidal anti-inflammatory drugs, topical preparations, intra-articular corticosteroid injections, bracing, and physical rehabilitation, are likely underused in this context (Young, Bothwell, & Walsh, 2016). Counseling has been suggested to help motivate patients to overcome their pain (Austine, Nair, & Mirza, 2016). These strategies should be negotiated in individual situations between physicians and patients and subjected to trial to determine their utility in light of the patient's underlying comorbidities. Moreover, Congress should fund the National Institutes of Health to sponsor more basic and clinical research to study new and approved approaches. One thing, however, is beyond dispute. Within an environment in which legitimate patient pain and the risk of abuse of powerful medical agents uncomfortably co-exist, there is an ethical imperative to assist the health care system to devise acceptable ways to balance the principles of beneficence and nonmaleficence.

REFERENCES

- American Geriatrics Society, Panel on the Pharmacological Management of Persistent Pain in Older Persons. (2009). Pharmacological management of persistent pain in older persons. *Pain Medicine*, 10, 1062-1083.
- Austine J, Nair S, & Mirza K. (2016). Perspective of orthopedists on pain management in osteoarthritis: A qualitative study. *Indian Journal of Palliative Care*, 22, 410-415.
- Barnes, M.C., & Sklaver, S.L. (2013). Active verification and vigilance: A method to avoid civil and criminal liability when prescribing controlled substances. *DePaul Journal of Health Care Law*, 15, 93-145.
- DeVille, K. (1998). Act first and look up the law afterward?: Medical malpractice and the ethics of defensive medicine. *Theoretical Medicine and Bioethics*, 19, 569-589.
- Dineen, K.K. (2016). Addressing prescription opioid abuse concerns in context: Synchronizing policy solutions to multiple complex health problems. *Law & Psychology Review*, 40 (1-80).
- Dineen, K.K., & DuBois, J.M. (2016). Between a rock and a hard place: Can physicians prescribe opioids to treat pain adequately while avoiding legal sanction? *American Journal of Law and Medicine*, 42, 7-52.
- Esquibel, A.Y., & Borkan, J. (2014). Doctors and patients in pain: Conflict and collaboration in opioid prescription in primary care. *Pain*, 155, 2575-2582.
- Fry-revere S., & Do, E.K. (2013). A chronic problem: Pain management of non-cancer pain in America. *Journal of Health Care Law and Policy*, 16, 193-213.
- Goldberg, D.S., & Rich, B. (2014). Pharmacovigilance and the plight of chronic pain patients: In pursuit of a realistic and responsible ethic of care. *Indiana Health Law Review*, 11, 83-122.
- Kapp, M.B. (2016). Front office staff as medical educators, risk creators, and risk managers. *Inter-*

- national Journal of Risk & Safety in Medicine, 28, 61-64.
- Marcus, B.S., & Venkat, A. (2015). Ethical pain management in the emergency department: The canary in the coal mine. *Pain Management*, 5, 251-260.
- McCarberg, B.H. (2011). Pain management in primary care: Strategies to mitigate opioid misuse, abuse, and diversion. *Postgraduate Medicine*, 123:119-130.
- Peppin, J. (2013). Preserving beneficence. *Pain Medicine*, 14, 619.
- Pivec R., Issa, K., Naziri, Q. et al. (2014). Opioid use prior to total hip arthroplasty leads to worse clinical outcomes. *International Orthopedics*, 38, 1159-1165.
- Singhal A., Tien Y-Y, & Hsia RY. (2016). Racial-ethnic disparities in opioid prescriptions at emergency department visits for conditions commonly associated with prescription drug abuse. *PLOS ONE*, 11, e0159224. doi:10.1371/journal.pone.0159224.
- Venkat, A., Fromm, C., Isaacs E et al. (2013). An ethical framework for the management of pain in the emergency department. *Academic Emergency Medicine*, 20, 716-723.
- Young SE, Bothwell JD, & Walsh RM (2016). Safely managing acute osteoarthritis in the emergency department: An evidence-based review. *Journal of Emergency Medicine*, 51, 648-657.



R. Stone Jr., 2016, *Yellow Triangle of Happiness*.

On The Ethics of Uterine Transplantation

by Sergio A. Salazar[†]

Absolute Uterine Factor Infertility (AUI) affects 9.5 million women in the United States. With recent advances in non-vital organ transplantation, uterine transplantation has become a reality. The needs of women to experience gestation and the desire of women and their partners to pass on their genetic material have made uterine transplantation a desirable alternative to adoption and surrogacy. Due to the psychological, medical, and societal considerations that are involved in uterine transplantation, the need for discussion of uterine transplantation is paramount.

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The belief that “one should save a life if possible” appears to be a normative truth. In our society the innate need to preserve life is protean. Whether this belief is a genetically-programmed behavior or an enculturated phenomenon for survival is debatable. What is certain is that within our social structure and culture, most of us respect not only the life of another human being, but also feel a moral obligation to save a life if it is within our capacity. These sentiments and the professional responsibilities of medicine paved the way for the invention and implementation of organ transplantation.

The first transplant was performed at the Peter Bent Brigham hospital on December 23, 1954 (Jonsen, 2012). Drs. Joseph Murray and John Merrill transplanted a kidney from one monozygotic twin to another (Jonsen, 2012). The patient lived 8 years, and due to the donor’s genetic similarity, had no issues with rejection. This momentous occasion was a great advance in medicine. A patient’s terminal demise was avoided-through medical innovation and human intervention. However, organ transplantation incited

some ethical uneasiness--especially after the first successful heart transplant, an unpaired organ, by Dr. Christiaan Barnard on December 3 1967.

There was a need to not only to be aware of the ethical demands of transplantation, but also, due to the time sensitive procurement requirement of organs for viability, there was a need for a legal definition of death that was more inclusive than the cessation of cardio-pulmonary function. The Harvard Report in 1968 redefined "irreversible coma as a new criterion for death" (Jonsen, 2012, p. 265). Subsequently, the President's Commission on the Study of Ethics in Medicine (1979-1982) "framed a uniform definition of death that included both the traditional cardiopulmonary and the brain criteria: An individual who has sustained either (1) irreversible cessation of circulatory and respiratory function, or (2) irreversible cessation of all functions of the entire brain, including the brainstem, is dead" (Jonsen, 2012, p. 265). This definition was adopted by all states. The new definition facilitated the ability to procure organs from patients that in the past were not considered dead due to the continuation of cardiopulmonary function artificially. The transplantation of organs not only incited the tension between the ethical principles of autonomy, beneficence, and nonmaleficence, but also placed justice at the forefront because there were not enough organs to meet clinical demands. The National Organ Transplantation Act was established in 1984 (Linden, 2009). The norms that characterize the American transplant ethos were established: no financial compensation could be given for organs or organ donors, and the organs must be donated voluntarily (Jonsen, 2012). Transplant medicine has made major achievements in the longevity of transplanted organs and improvement in surgical techniques that have decreased donor risk (Genden & Urken, 2003). The permissibility of transplantation medicine over the years and the innovative spirit has facilitated the transplantation of non-vital organs. Facial and laryngeal transplants have been performed successfully. With the transplantation of non-vital organs continuing, the need to improve functional status, forward self-image, and enhance the quality of life, has become a goal. Due to the capacity to transplant non-vital organs, it has been suggested that the terminology of "vital vs. non vital be changed to essential vs. nonessential" (Genden & Urken, 2003, p. 165).

This brings us to the transplantation of another non-vital organ, the uterus. The science of uterine transplantation begun in the 1960s but lost prominence due to invention of other assisted reproductive techniques (Woessner, Blake, & Arora, 2015). Resurgence of interest in uterine transplantation was facilitated by the work of El-Akouri et al in Sweden, which demonstrated the success of fertility in syngeneic uterine transplants in mice (Woessner et al., 2015). Since then, there have been successful uterine transplants leading to successful births (Woessner et al., 2015).

The ethics of uterine transplantation are complex. The uterus is not

only a non-vital organ, but it is also an organ that can promote the capacity of infertile women to, in addition to experiencing gestation, have genetically-related children. The stakeholders are multiple and include, the medical team/institution, the donor, the recipient, the child, society, and finally, the male gamete donor.

It is my aim to argue for why uterine transplantation should be a morally permissible solution to Absolute Uterine Factor Infertility (AUI). The procedure at this time continues to be experimental, but protocols are being instituted in major medical centers to forward the science with the expectation of making uterine transplantation a viable option for AUI in the future.

ABSOLUTE UTERINE FACTOR INFERTILITY

AUI in the United States is responsible for 9.5 million women of reproductive age not being able to procreate (Arora & Blake, 2014). The etiology of AUI can be congenital or acquired. Acquired causes can be obstetric or gynecological and can include postpartum hemorrhage, malplacentation, and multiple gynecological conditions (Lefkowitz, Edwards, & Balayla, 2012). Congenital etiologies include uterine hypoplasia, Mayer-Rokitansky-Kuster-Hauser syndrome, uterine malformations and Mullerian anomalies (Lefkowitz et al., 2012).

Although adoption and surrogacy are options, adoption does not satisfy the mother's need to have a genetically-related child, and surrogacy is not universally permitted (Arora & Blake, 2015). In addition, uterine transplantation gives the mother the ability to experience pregnancy. Although the mother does not feel contractions and fetal movement sensations, embryologic and physiologic changes occur, thereby satisfying a mother's need to experience the phenomenon of gestation.

ETHICAL CONSIDERATIONS

Medical Team / Institution

The ethical considerations, as they apply to an institution and its surgical personnel regarding experimental innovative surgical procedures, have been delineated by Moore (Lefkowitz et al., 2012). The criteria defining competency involve: laboratory background, field strength, and institutional stability (Lefkowitz et al., 2012, p. 442). I agree that the medical team and institution should be competent in their laboratory assessment and care of patients in need of uterine transplantation. In addition, institutional stability is a must as financial and physical resources would be required for the proper discharge and maintenance of required medical care. The need of the medical team and institution to be beneficent to medical science and to

society by forwarding the advancement of medical knowledge and expertise should be respected.

The Donor

The risks for the donor include physical and emotional realms. As far as the physical risks, the risk of bodily injury has been estimated to be similar to a routine hysterectomy, the exception being a more invasive procedure due to the need to procure intact vascular tissue to facilitate perfusion in the transplanted organ (Arora & Blake, 2015). As far as the emotional risk, the possibility of “not feeling whole,” possible sexual dysfunction with its emotional overlays, and attachment to the future child are all possible. I believe the emotional aspect of donating a uterus can be partially mitigated by intrafamilial donation (mother to daughter) due to the strong emotional and relational bond between donor and recipient.

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Recipient

The ethical considerations regarding the recipient are more complex. In addition to undergoing the risk of uterine transplantation (a ten hour operation), the recipient will have to undergo immunosuppression for the life of the implanted uterus (around 2-4 years). Although the risks of uterine transplantation include an increase in maternal morbidity and premature births, women who have become pregnant while taking immunosuppression for other organs have had successful pregnancies post-transplant (Catsanos, Rogers, & Lotz, 2013). Also, another consideration to take into account is the possibility of uterine rejection.

It is also possible that the recipient could feel that they were bearing someone else's children since they received someone else's uterus--a feeling that could lead to estrangement for the recipient (Catsanos et al., 2013). In addition, if intrafamilial donation is undertaken, the family dynamics might induce emotional stress. The possibility of the donor being involved in the rearing of the child might lead to a stronger feeling of maternal attachment than otherwise would be expected from a grandmother role. Lastly, the utilization of resources, medical and societal, to make uterine

transplantation a reality and a future viable option might be construed as contempt to distributive justice. The large economic commitment and the utilization of medical surgical expertise for uterine transplantation could lead to deficiencies in other areas due to the fixed number of resources.

Having delineated the possible negative consequences to the recipient, we need to consider the possible benefits. The desire to procreate is a biological truth, a fact that is manifested in the 7.4 billion humans in existence (Worldometers, 2016). The desire of a female of our species to “carry a child” is robust enough that an entire field of medicine, reproductive endocrinology, has come into existence. The desire is a construct of a biological intuition emerging into a cognitive need that carries with it significant emotional ramifications. It is this need that, in some individuals, can only be satisfied through the experience of gestation and the sharing of genetic material with their offspring. Uterine transplantation meets these needs. Uterine transplantation facilitates procreative liberty (autonomy). Uterine transplantation fulfills equal opportunity for all possible females to procreate. It forwards justice.

In addition to supporting procreative liberty and justice, the ability of a possible recipient to exert her right of autonomous decision and bodily self-determination to forward medical innovation and knowledge should be respected. As with the donor, if the recipient is competent and fully informed of the risks and benefits of uterine transplantation, it is our duty as a society to respect that decision.

The Child

Although there is some evidence, as noted above, that there is an increased chance of premature birth in the immunosuppressed host, and the potential consequences affecting the children that are products of uterine transplantation are uncertain, it is without doubt that the possibility of living is more beneficent than the alternative. Only medical knowledge and future experience will be able to shed more light on the risks and benefits so that more elucidated moral decisions can be undertaken.

Society

The benefits of uterine transplantation to society are the ability to have more members of society be able to pass on genetic traits and contribute to genetic diversity. In addition, uterine transplantation can contribute to population numbers to forward a working force and to forward the potentiality of each new individual member of society. Lastly, a uterine transplant would forward justice in society by creating the option for more individuals to procreate. Even though there are possible consequences to economic distributive justice, as mentioned above, the positive moral preponderance

outweighs the possible negatives consequences.

Male Gamete Donor

The lack of information in the literature regarding the male gamete donation for IVF after uterine transplantation makes it difficult to render an ethical analysis. It is my suspicion that patients undergoing a uterine transplant are in a stable relationship, whereby the donation of sperm is done voluntarily. The ability of a man to donate his spermatozoa to have a child with his partner is an exercise of his autonomous choice to be a father and his autonomous choice to satisfy his and his partner's emotional needs. In addition, by supplying spermatozoa for IVF and uterine transplantation, he is contributing to medical knowledge for the benefit of everyone in society.

CONCLUSION

In closing, there are numerous moral dilemmas encountered in uterine transplantation. Despite the negative ethical consequences of uterine transplantation, there are many benefits of the procedure that ultimately make uterine transplantation morally permissible. The benefits that uterine transplantation affords to all moral stakeholders promotes individual autonomy, fosters beneficence, and forwards justice. The future of uterine transplantation and its incorporation into mainstream treatment of infertility will be a direct result of skilled medical care that is balanced with correct ethical deliberation.

REFERENCES

- Arora, K. S., & Blake, V. (2014). Uterus transplantation: ethical and regulatory challenges. *Journal of Medical Ethics*, 40(6), 396-400. doi:10.1136/medethics-2013-101400
- Arora, K. S., & Blake, V. (2015). Uterus transplantation: the ethics of moving the womb. *Obstetrics and Gynecology*, 125(4), 971-974. doi:10.1097/aog.0000000000000707
- Catsanos, R., Rogers, W., & Lotz, M. (2013). The ethics of uterus transplantation. *Bioethics*, 27(2), 65-73. doi:10.1111/j.1467-8519.2011.01897.x
- Genden, E. M., & Urken, M. L. (2003). Laryngeal and tracheal transplantation: ethical limitations. *Mount Sinai Journal of Medicine*, 70(3), 163-165.
- Jonsen, A. R. (2012). The ethics of organ transplantation: a brief history. *Virtual Mentor*, 14(3), 264-268. doi:10.1001/virtualmentor.2012.14.3.mhst1-1203
- Lefkowitz, A., Edwards, M., & Balayla, J. (2012). The Montreal Criteria for the Ethical Feasibility of Uterine Transplantation. *Transplant International*, 25(4), 439-447. doi:10.1111/j.1432-2277.2012.01438.x
- Linden, P. K. (2009). History of solid organ transplantation and organ donation. *Critical Care Clinics*, 25(1), 165-184, ix. doi:10.1016/j.ccc.2008.12.001
- Woessner, J. R., Blake, V. K., & Arora, K. S. (2015). Ethical considerations in uterus transplantation. *Medicolegal and Bioethics*, 5, 81-88. doi:10.2147/mb.s64947
- Worldometers. World Population. Retrieved from www.worldometers.info/world-population

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