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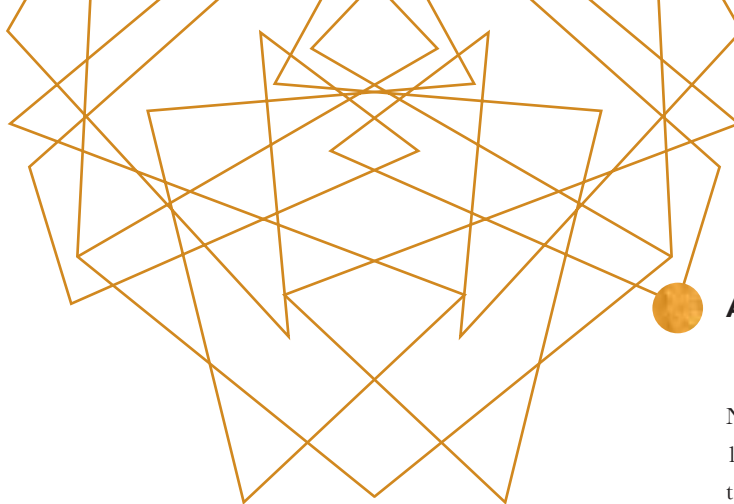
Saltic

SALT



ATTIC SALT
2018





 **ATTIC SALT**

Noun

18th Century: A translation of the Latin *Sal Atticum*. Graceful, piercing, Athenian wit.

Attic Salt is an interdisciplinary journal which accepts submissions in any genre, format, or medium - essays, original research, creative writing, videos, artwork, etc. - from the entire LMU undergraduate and graduate community—and now from the Honors programs of AJCU institutions nationwide.

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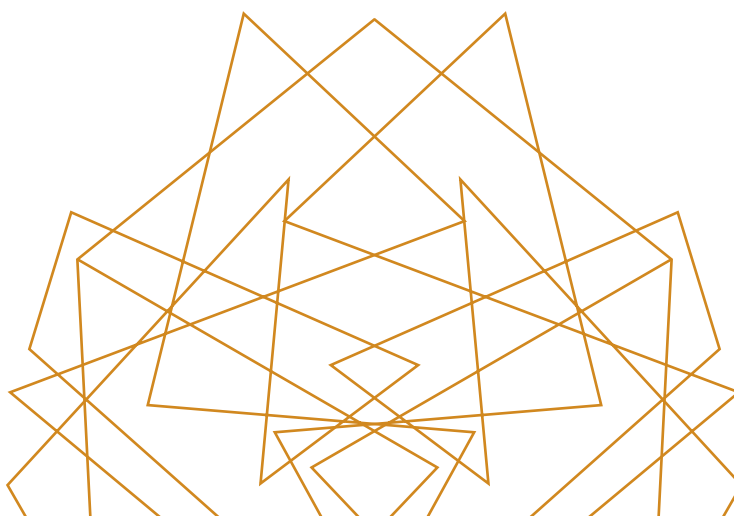
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Robin Szollosi and
Mikaela Ventura
(STAR-GRPH '18).

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STAFF

editors-in-chief:

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cameron bellamoroso

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jordan woods
mary alverson

publication design:

robin szollosi
mikaela ventura

faculty advisor:

dr. alexandra neel



EDITORS' LETTER

Dear Readers,

In the past year, *Attic Salt* has expanded in both size and scope. The editorial staff grew from five to nineteen students and the journal received more submissions than previous years. Most excitingly, *Attic Salt* now accepts and publishes pieces not just from the LMU community, but also from the Honors Programs of AJCU Institutions across the country.

This year, we feel that the included works echo the continued unrest felt throughout the country. While reflected directly in an essay about incarceration and a poem set in Folsom Prison, the restlessness also manifests in less noticeable ways: in the title of Charlotte Cheng's "Nervous Stars," and in the chaotic technicolor of Michael Mahammadie-Sabet's "Shatterface." However, a sense of cautious optimism also pervades the journal, as in Rebecca Davenport's essay on rewilding, or in Lorenzo Sisti's

"Urban Night," with its string lights twinkling above a man's head. Overall, we feel the 2018 edition of *Attic Salt* demonstrates the complex emotions of the past year, showcasing the struggles, the triumphs, and, most importantly, the prevailing hope.

It would be impossible to put together a journal such as this alone, and so we are honored to thank our incredible staff members, who have worked so hard over the past year reviewing and editing submissions. We would also like to thank Dr. Alexandra Neel, our wonderful faculty mentor. We would also like to thank Jordan Woods for continually running our beautiful website. Furthermore, we want to extend our gratitude to the University Honors Program of Loyola Marymount University, especially Dr. Vandana Thadani, Dr. John Dionisio, Dr. Daniel Speak, Dr. Sue Scheibler, and Sara Alongi

Bitong, for supporting *Attic Salt* every step of the way. Finally, we want to say a big thank you to both Robin Szollosi and Mikaela Ventura for designing the beautiful layout for this year's journal.

We hope you enjoy reading this year's journal as much as we enjoyed creating it.

Stay Salty,

Carrie Callaway and
Cameron Bellamoroso
Editors-in-Chief



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PAIGE PREVOST

Paige Prevost is a film production and English senior, graduating in May 2018. She loves podcasts, Los Angeles, strawberries, and people. She doesn't know what's coming next, but she knows that the rest of her life is going to be the best of her life.

THE WAY WE PLAN

Daydream, 1982

Watching television
Grainy film
It makes the skin colors pop
Everything looks crisp, like an apple ready to fall from its tree

Well, good boys let the maybe-not-really-forbidden fruit (was it actually an apple?) stay where it is
They let it shine, idealized
And plan their next 365s,

A woman
A wedding
White dresses
Smooth, brown tuxedos

Married
A set of twins
"So smart! Soooo cute."
(Cute is a better compliment than smart for a baby; it is.)
This twin is named Coffee
And her sister is Spring
Coffee has jet black hair
Spring has autumn streaks but in her namesake season, maybe it'll be a little blonde
Both shades will accent their skin tone nicely
Brighter than rocky road, but a queen nonetheless
And momma will be there to ooh and awe
And his wife will be so proud of them and him
And he will be of them
When will the smile ever leave his face?

Daydream, 2005

The girl not named Coffee
Sits in her arts class, practicing a watercolor of her cat, Delilah/Eddie
It really is a boy, but she got it when she was five and named it Delilah before she knew that

When she gets to the eyes, she needs to get the shine just right. Delightful. Not shifty. Not mischievous. Implication of roundness, not slits.

There goes her chin on her upturned hands as she pauses to think

Cats
Domestic
Cheetah
Wild
Africa
Decolonized/colonized
(But wait. Her mind doesn't yet think of that strain. That thing to decode. Maybe in a different poem.)
~~Decolonized/colonized~~

Africaaaa.
She's not interested.
Mainly because her papa lives there.
And has never lived where she has been.

She lifts the end of her face momentarily off her fleshy pillow and glances at her twin not named Spring across the room

Not-Spring with the dyed light blue/silver hair
She looks like winter. ●



ANGELA BRITTAIN

Angela grew up in Las Vegas. Her time at LMU has been spent studying English and Film. Angela currently works as a doggie lifestyle blogger but she has also been a filmmaker, a farmer, a photographer, a traveler, a tarot reader, a blue-haired barista, and a performance artist. She likes figs and writing author bios in the third person.

THROUGH THE LOOKING GLASS

That Anne Carson should title her opening essay in *Glass, Irony, and God* “The Glass Essay” without ever directly addressing the reason for her title implies the very essence of glass itself—something that may be there but not always seen. Glass is both reflective and transparent: born of fire and easily shattered. When Alice walked through the looking glass, she found herself a wonderland. Debbie Harry capitalized on the futility of love, equating her heart to one of glass and peaking on music charts all over the world. Conversely, Bob Dylan comments on female fragility in his song “Just Like a Woman” when he says “She aches just like a woman/but she breaks just like a little girl” (Dylan 1966). The hourglass figure is a mark of feminine beauty. Hillary Rodham Clinton used the metaphor of a glass ceiling during her 2016 campaign as a signifier of entrapment.

There is an obvious connection between women and glass present in our culture, whether or not we always see it, and whether or not that glass is ever shattered by the women who are trapped behind it. There is much to learn from the way Carson and her female contemporaries address this entrapment, the way women create interiors that often go unseen, and the social repercussions that come with this tradition.

For centuries, women have been kept on the inside: Rapunzel in her tower, Charlotte Perkins and her room full of yellow wallpaper. From the earliest days of hunter-gatherer culture, women were left to create a home from interior spaces. Female domesticity was fetishized by advertising moguls in 1950s America, and housewives consequently became a staple of nuclear families. Sophokles said “Silence is the *kosmos*

of women” (Carson 127), so women’s silence became the cultural standard in Ancient Greece, and the mind became the interior where women stored all their feelings. Carson knows this silence too well. One of the most striking quotes on female interiors in “The Glass Essay” reflects on her childhood: “it is the light of the stalled time after lunch when clocks tick and heart shuts and fathers leave to go back to work and mothers stand at the kitchen sink pondering something they never tell” (Carson 7). Emily Brontë, famous for her reclusiveness, also becomes a character in this essay. Carson quotes one of Brontë’s critics who asks “What was this cage, invisible to us, which she felt herself to be confined in?” (7). This idea that women have something kept inside, something they never tell, has been the subject of several female writers throughout the centuries. When

women dare to tread outside, to pass through the glass, so to speak, through literature, art, or political movement, there is an imminent threat to the patriarchal structures that have kept them locked up since the earliest days of domesticity.

In 2011, Russian feminist punk band PussyRiot formed in order to speak out against Vladimir Putin's overtly corrupt politics. What followed was a movement that ended in several arrests, beatings, public shaming, and international sensation. In an interview with *Vice*, band founder Nadya Tolokonnikova spoke on her time spent in a Russian prison, saying "Can you go through the most terrible experience but have the sense of being still meaningful [sic]. So if you can be meaningful, then it's not completely lost time for you" (Tolokonnikova, 2017). Meaningful undoubtedly: the arrests following their protest inspired a new generation of punk feminists around the world. PussyRiot was certainly successful in their attempts to break outside the walls of their

country, as they now travel around the world speaking on social justice issues through lectures, performance art, and interactive experiences. They are a modern example of women breaking through the glass to expose the interiors of corrupt politics, overthrowing the brunt of patriarchal fear-thinking while they do it.

The threat of female projection has long been the subject of male authors, as we see in "The Gender of Sound: "The censorship of such projections is a task of patriarchal cultures that (as we have seen) divides humanity into two species: those who can censor themselves and those who cannot" (130). Carson discusses the Greek virtue of *sophrosyne* (having a sound mind) as being one associated exclusively with men, specifically with men who had good self-control. Women became associated with *ololyga* when they spoke out, and so "the so-called 'natural' tendency of the female to shrieking, wailing, weeping, emotional display and oral disorder cannot help

but become a self-fulfilling prophecy" (128). Imagine Sophokles reacting to the feral, haunting voices of Björk or Alanis Morissette— certainly he would think them monstrous, but we wouldn't have it any other way, because they are cultural symbols of female fringe and strength. Carson acknowledges how "Greek myth, literature, and cult show traces of cultural anxiety about such female ejaculation" (132), and this anxiety still permeates our culture today, both in fictive works and real-life social engagement. Women were assigned an "otherness" for putting "the inside on the outside" (129) and yet, this is our essence.

Sigmund Freud wrote on the phenomena of male anxiety toward women in 1927 when he said "Probably no male human being is spared the terrifying shock of threatened castration at the sight of the female genitals" (Freud 354). The act of sex itself is a kind of dismemberment and ambiguity. The male member "disappears" into the vagina

and the lines between distinct bodies become blurred. Carson touches on bodily indistinctness when she describes her night of lovemaking with Law: "I was floating high up near the ceiling looking down on the two souls clasped there on the bed with their mortal boundaries visible around them like lines on a map" (Carson 12). That which follows sex ejaculation (hopefully?) and childbirth (sometimes) are all acts of abjection: the body rejects that which no longer belongs inside of it.

Abjection seems to be the root of fear attached to women, and yet it is our literal nature: we bleed for five days a month; we make tiny humans in our bellies and squeeze them out of a 2.1 centimeter hole; we cry; we sneeze; we poop. This idea of blurring boundaries between outside and inside is inherent in biological female function, and it has become the very thing that men feel women need to keep inside. Greek myths have long regarded females as abject, from Medusa with her serpentine hair to Lamia who ate children. A significant example of this mindset in

modern culture is *The Exorcist* (Warner Brothers, 1973) in which a young girl becomes possessed by the devil and several experts are called in to try and expel the evil spirit within her. Meanwhile, her body becomes more and more grotesque as the devil makes a home inside her. Barbara Creed writes on this film in an essay concerning female gender in horror films, saying "The foulness of woman is signified by her putrid, filthy body covered in urine, blood, excrement, and bile. Significantly, a pubescent girl about to menstruate played the woman who is possessed" (Creed 46). The tagline of this film was "The Devil Inside," aligning the biological function of the young girl directly with the devil.

The concept of female devilry is the main subject of contemporary artist Polly Nor, a London-based illustrator whose work features an array of women interacting with their demons in honorable acknowledgment. Her work specifically deals with women's identity in the internet age, often featuring electronic

devices such as smart phones, tablets, and laptops in the background. Her 2017 illustration "Thinking of You" features a young woman looking into a mirror (there's that glass again) and seeing a devil in the reflection. Her hands are placed on the mirror longingly, desperate for the connection that is prohibited by that thin sheet of glass. Several of her pieces include women looking either at themselves in a mirror, through a phone, or directly at their demons. The way Nor directs the gaze of her subjects implies that they are not ashamed but rather inviting and confrontational with their demons.

If all of these associations between females and glass are all arbitrary, there is at least one firm connection we can take away: the glass is a tool through which we can direct our gaze to understand women's writing, art, and poetry. Today, there are women who stand behind panes of glass in Amsterdam's red light district, putting their sexuality on a pedestal to attract clients. Whether this line of work is empowering or degrading is

up to the women who work in these brothels, and that is irrelevant here— what is significant about it is the way they are viewed through this pane of glass and suddenly transformed, displaying the sexual prowess that is the very root of men’s cultural anxiety

toward women, and proving that sex is power. Abjection, therefore, is both woman’s power and her plight. To take that which is on the inside and put it out into the world when the time is right is both the basic biological function of a woman’s body, and the deep-

rooted literary and artistic tradition of women. This is a dichotomy that we have lived with for centuries, and until we smash through all the panes of glass that are there though invisible, they will continue to permeate our lives. ●

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WINDOW SHOPPING BY

BRIAN GILMARTIN

Brian Gilmartin is a sophomore and history major.



JULIA CEGLENSKI

Julia Ceglenski is a senior at Saint Louis University finishing her study of Investigative Medical Sciences with two minors in Biology and Healthcare Ethics. She plans to attend medical school next year in order to fulfill her dream of becoming a primary care physician. She loves studying medicine, because she believes it to be the intersection of the humanities and the sciences—a reflection of her own personality. Her other interests include art museum exploration, traveling, and trying trendy foods.

SOMATIC SYMPTOM DISORDER: A MODERN-DAY WOMAN'S HYSTERIA?

Abstract

Since the birth of medicine from the ancient Greeks, women's health has been a consistent topic of interest by the men who have historically dominated the profession. Hippocrates himself was among the first to use the word *hysteria* to relate a woman's womb as the root cause for any and all feminine afflictions. While these unproven and superstitious approaches to women's health persisted for practically two millennia, in the 19th century, Jean-Marin Charcot's theories of hysteria propelled the medicalization of hysteria as a disease of the mind. These ideas were taken even further by Sigmund Freud who used the concept of hysteria to develop the concept of femininity as a failure, or lack of masculinity, that was treatable through motherhood.

This prominent shift in the viewpoint of hysteria from a medicalized feminine physiological problem

to an emotional internal condition certainly helped direct many women to seek treatment through psychiatric intervention rather than being condemned as a witch or harlot. But all too frequently, applying the label of hysteria acted as a catchall term exclusively applying to women and propagated the dismissal of real mental health conditions, such as schizophrenia and panic disorders, thus preventing their adequate treatment. Casting off concerned women's health care inquiries also risks causing increased opportunities for missed or false diagnoses.

As the progression of mental health research continued and was refined, many of symptoms associated with hysteria were better classified and more accurately approached as their proper root mental illnesses, but one seemingly unrelated classification remains open as an opportunity for the historic attitudes and themes of hysteria to affect patients today. Somatic

symptom disorder, under the broad category of somatoform disorders, is included in the DSM-5 and commonly applied to patients exhibiting medically unexplained symptoms for more than 6 months and having excessive worrying over these symptoms. The very existence of somatic symptom disorder presents a challenge to patient care since it is based on negative and eliminatory criteria and, in the opinion of many professionals, it can often be used as a labeling tool on patients who could more than likely be afflicted with simply not well understood diseases. The risks associated with the diagnosis of somatic symptom disorder greatly mimic those of hysteria and likely continue attitudes of casual dismissal by physicians, which are still likely to disproportionately affect women seeking medical treatment and counsel.

History

The first recorded explanation of hysteria in

women was provided by the Egyptians in the second millennium B.C., and many of their aroma therapeutic methods were later adapted by the Greeks (Tasca 2012). Hippocrates, the revered, first physician, subscribed to many of the foundational statements of the Egyptians and even greatly expanded upon them throughout the 3rd century B.C. (Tasca, et. al, 2012). In his discussions of hysteria, he was careful to emphasize the difference between epilepsy and hysteria (Tasca, et. al, 2012). Epilepsy was the result of a brain disorder, while hysteria was caused by uncontrollable movements of the uterus or *hysterion* (Tasca, et. al, 2012). These abnormal movements of the uterus were caused by poisonous, stagnant humors that had never been expelled or were built up due to a woman's inadequate sex life (Tasca, et. al, 2012). Hippocrates asserts that cases of hysteria can only occur in women, because a woman's body is physiologically cold and wet and hence prone to toxification of the humors, unlike male bodies (Tasca, et. al, 2012). Because of this, uteruses, and by extension

women, are more prone to get sick, especially if deprived of sex and procreation (Tasca, et. al, 2012). Hippocrates even goes further stating that virgins, widows, single, and sterile women can expect to experience the uterus wandering around the body producing the physical symptoms commonly associated with hysteria, such as anxiety, sense of suffocation, and tremors (Tasca, et. al, 2012).

The antiquated treatments for hysteria did not change much throughout early civilizations. The Roman physician, Galen, favored using herbs, purges, repressing sexually exciting stimuli, and marriage as treatments for hysteria (Tasca, et. al, 2012). Soranus, a Greek physician from the 2nd century AD, took a novel opposing stance on the treatment of hysteric women by encouraging sexual abstinence and criticizing fumigations (Tasca, et. al, 2012).

Instead of further exploration or refutation, the theories concerning women's health and treatment set forth by Hippocrates and Galen were propagated across the globe throughout the

Middle Ages. With the rise of Christianity and the influence of clerical scholars, religion and political status quo became seemingly integrated while still being affected by societal norms. These societal norms also became incorporated into religious teachings as Christianity developed and evolved. The Church's struggle with heresy easily became associated with a political connotation in attempts to unify Europe (Tasca, et. al, 2012). Ecclesiastical breviaries became the manuals of multiple Inquisitions and most manifestations of mental illness were viewed as personal bonds with the Devil (Tasca, et. al, 2012). In the early church, exorcism was considered a cure for demonic possession, but in the late Middle Ages, it was reworked as a punishment. Hysteria became associated with the Devil and his sorcery leading to the classification of witches as exclusively female (Tasca, et. al, 2012). In these times, if a physician could not identify the presence of a disease, that meant the ailment was procured from the Devil (Tasca, et. al, 2012). Sin was found in mental illness, because

the Devil was understood as an expert of human nature and could intensely interfere with a more susceptible and naturally weaker individual—women (Tasca, et. al, 2012). While old writings and manuscripts can support this, evidence can even be found in linguistics. An alternative spelling of the Latin *femina* developed as *foemina* formed from *fe* and *minus* to illustrate “one who has less faith” and further assert the widespread and accepted notion concerning women and their mental health (Tasca, et. al, 2012).

A poignant shift in the understanding of the “disease of hysteria” came about in the mid-19th century through Jean Martin Charcot, the father of modern neurology, who pioneered a more systemic and scientific study of mental illnesses (Tasca, et. al, 2012). He argued that hysteria derives from a hereditary degeneration of the nervous system and is thereby associated with the brain and not the uterus, so it can affect both men women (Tasca, et. al, 2012). He often used hypnosis as an effective treatment. Pierre Janet was a student of Charcot and

expanded the use of hypnosis as a tool for investigation, scientific research, and therapy (Tasca, et. al, 2012). Janet further elaborated the new scientific definition of hysteria as a pathology in which dissociation appears autonomously for neurotic reasons and in such a way as to adversely disturb an individual's everyday life (Tasca, et. al, 2012).

By the early 20th century, Sigmund Freud reverses the paradigm by stating that hysteria is actually caused by a lack of libidinal evolution and that lack of conception is the result of this sexual failure not the cause (Tasca 2012). This viewpoint fits well into Freud's Oedipal Conflict theory concerning femininity developing as a failure or lack of masculinity (Tasca, et. al, 2012). Psychoanalysis deemed that hysterical symptoms were the expression of the impossibility of the fulfillment of the sexual drive because of reminiscence of the Oedipal Conflict and that hysterical “fits” are discharges of the urge or libidinal energy linked to sexual desire (Perez-Rincon 2011). While Freud originally

believed that both men and women could suffer from hysteria, after the development of his Oedipal Conflict theory, he believed that it is exclusively a female ailment (Perez-Rincon 2011). But Freud's theory is a vision of illness linked to the historically determined mode of the role of women, and he still believed it to be most easily treated through motherhood (Perez-Rincon 2011). By this point in time, early psychiatrists had noted that any function of the body could be affected by hysteria, making it a well-studied and high interest ailment in the budding field. But its association with women's physical health was clearly already well established historically, and although scientific mental health studies began to expand beyond hysteria in women, its biased attitudes and societal views of gender roles did not.

Upon review of original manuscripts of Greek texts concerning hysteria by recent lingual scholars, several discrepancies can be seen between late nineteenth century abridgments, English translations of the Greek documents, and the Greek

texts themselves (Micale 1989). Most notably is the notion that the original Greek documents contain “no coherent clinical syndrome in the modern sense but only the most casual enumeration of symptoms,” which included labored breathing, heart palpitations, dizziness, vomiting, loss of voice, and sweating (Micale 1989). The translators note that the only mentioning of emotional or mental states are a few phrases concerning “confusion” and “anxiety” (Micale 1989). Based on these recent insights, what can be seen as the typical motor and sensory somatizations of hysteria or as hysterical personality structure is almost a total fabrication (Micale 1989). This raises the important yet more sociological questions of why and how did the social construct of hysteria as a female illness come about? It is common knowledge that men have consistently dominated the occupation of professional health care. Could the presentation of medically unexplained symptoms cause an entire profession to blame a patient’s symptoms on their gender and the “natural”

mindset that comes with it? As physiological medical knowledge expanded, did the patriarchal domination of medicine turn to the more subjective and not yet well understood field of psychiatry and psychology to maintain their theories of hysteria and womanhood? These questions are, of course, unanswerable fully but are still worth exploring.

Gender Roles and Their Effect on Women’s Health

Many consider the usage of the term “hysteria” in relatively recent medical and psychiatric rhetoric and for millennia to be “a dramatic medical metaphor for everything men found mysterious or unmanageable” about women and that the sound “evidence” of the instability of the female mind and the social function of women was defined in relation to their reproductive capacity (Devereaux 2014). Upon the third publication of the Diagnostic and Statistical Manual of Mental Disorders (DSM-III) in 1980, hysteria was no longer included as an

identifiable and specific clinical disorder (Devereaux 2014). Its symptoms had been reclassified and redistributed throughout the broad categorical heading of Somatoform Disorders.

It would not have been inappropriate to celebrate the implicit demotion of the etymologically gendered term “hysteria” (Devereux 2014). Especially considering the recommended “cure through marriage and pregnancy and thus submission to the yoke of patriarchy” (Devereux 2014). Through its apparent historic psychological understanding born into complicity with a moral condemnation of its victims, hysteria’s involuntary and uncontrollable somatic symptoms were used by Second Wave feminists’ discourse as a cultural condition that embodied forms of oppression indexed by the patriarchy (Devereux 2014). Some feminists even saw feminism as “the demand for the right to be hysterical” (Devereux 2014). It is also important to note that the reclaiming of hysteria by Second Wave feminists is indicative of the social and cultural conditions experienced by women at the moment in

time in which their writings flourished (Devereux 2014). Both the restructuring of the DSM-III and the revamping of hysteria in feminist theory point to the notion that there is still an ongoing engagement to provide a better explanation for what archives confirm to be a well-documented history of women demonstrating somatic symptoms of unknown pathology (Devereux 2014).

Despite hysteria’s conflicting medical testimony, its reclassification as a mental disorder by early psychologists did not change its disproportionate gender diagnosis. The most distinguishing characteristic of hysteria is its epidemiology of only affecting women. A recent study conducted by the World Health Organization in 2009 aimed to survey cross-national associations between gender and mental disorders. Using a sample of almost 73,000 responses across 15 countries, lifetime prevalence of anxiety, mood, externalizing, and substance abuse disorders was assessed across varying age ranges organized into cohorts based on age: 18-34, 35-49, 50-64, and 65+. The

results indicated that in all cohorts and countries women had more anxiety and mood disorders than men, and men had more externalizing and substance abuse disorders than women. Gender differences were generally consistent across cohorts; however, significant narrowing was displayed in the younger cohorts for major depressive disorder and substance abuse disorders. The authors believe that this narrowing was significantly related to temporal and spatial variation in gender role traditionality, meaning younger generations are experiencing more gender equality. The study also cites many other epidemiological surveys that have consistently documented similar results showing support to the gender roles hypothesis. The evidence collected is consistent with the hypothesis’s assertion that decreasing gender differences in mental disorders have largely been found in countries in which the roles of women have improved in terms opportunities for employment, access to birth control, and other indicators of gender equality (Seedat, et. al, 2009).

The effects of hysteria and its

history have not gone unnoticed by mental health scholars. With the first publication of the DSM in 1952, professionals across disciplines raised concerns about its diagnostic criteria, the rhetoric used to describe such disorders, as well as the appropriateness of their inclusion. In a 1958 publication in the American Journal of Psychiatry, the inclusion of hysterical personality in the DSM was challenged on the grounds that too much of its scientific evidence was rooted in the psychoanalytical “one-sided libidinal theory of human functioning” that required excessive supplemental explanation (Chodoff & Lyons 1958). The authors of this publication conducted their own small study in which they used an altered, and potentially more refined, diagnostic criterion for hysterical personality syndrome to classify 17 patients believed to have pathological personality types. Two out of the 17 participants were women and of the six pathological personality types considered throughout the study, both women and one man was diagnosed with hysterical personality. The authors asserted that the

historical development of the concept of hysteria has made it inevitable that the traits characteristic of women rather than men would be described as such, especially with the majority of these diagnoses made by male psychiatrists. They stated, “Thus what has resulted in the case of hysterical personality is a picture of women in the words of men and what the description sounds like amounts to a caricature of femininity!” (Chodoff & Lyons 1958). However, despite the authors’ attempts to further define the diagnostic criteria of hysteria, both women were still classified as hysterics and interestingly, the one male also classified identified as homosexual. This points to a glaring interpretation of the historically accepted diagnosis of hysteria being entirely descriptive of the feminine or effeminate existence.

Despite the author’s attempts to expand their community’s understanding of hysteria, it appears that their efforts to redefine hysteria’s diagnostic criteria to be gender neutral were not met with success. But perhaps these initial challengers did not push the

boundaries enough? Because of reclassification efforts and the progression of world views of medicine, the symptoms characteristic of hysteria have shuffled. It is well documented that the occurrence of what seem to be hysterical somatic symptoms in patients subsequently develops into schizophrenic psychoses (Noble 1951). Could it not be possible that the opportunity still exists for the same mistakes of misdiagnoses and dismissal by medical providers to occur?

Somatic Symptom Disorder and the Confusion It Causes

Somatic symptom disorder is diagnosed, according to the DSM-V (published in 2013), by an individual expressing physical symptoms for at least six months that cannot be explained fully by a general medical condition and are not attributable to another mental disorder. Somatic symptom disorders are a group of syndromes that could neither be explained by a recognized medial disease or diagnostic tests nor clearly associated with depressive or anxiety diagnoses, so they

were combined to create a new category known as somatoform disorders (Mayou, et. al, 2005). These included conversion disorder, illness anxiety disorder, body dysmorphic disorder, pain disorder, and undifferentiated somatic symptom disorder (Mayou, et. al, 2005).

The addition of undifferentiated somatic symptom disorder was first made in the DSM-IV as an attempt to provide a diagnosis for the large number of patients who, although clearly ill, did not fall within the existing somatoform categories (Mayou, et. al, 2005). Somatic symptom disorder has been a topic of much debate throughout the psychiatric community. As presented earlier, hysteria was once considered to be part of the somatoform disorder categories but was also debated as being part of the personality disorders categories. Somatic symptom disorder is controversial since it has always been based on negative or eliminatory criteria—that is, in the absence of a clear medical explanation for the presenting physical complaints. Consequently,

any person suffering from a poorly understood illness can potentially fulfill the criteria for the diagnosis of somatic symptom disorder even if no psychiatric symptoms are exhibited in the conventional sense (Mayou, et. al, 2005).

With the anticipation of the most recent publication of the DSM-V, many proposals were received by the DSM task force calling for the abolishment of the somatoform disorders category. One such proposal stated the following:

The main implication of our proposals is the acceptance of etiological neutrality about those somatic symptoms that are not clearly associated with a general medical condition. We propose a pragmatic classification that is explicitly based on the branch of medicine most concerned with the management of the condition rather than on presumed etiology. We anticipate that this would help integrate psychiatry with other medical specialties and enhance the role of psychiatry in general medical care to the benefit of patients. (Mayou, et. al, 2005)

Compared to physical diagnoses, almost all mental health diagnoses rely on patient reports and observations. A key challenge for clinicians can be distinguishing physical diagnoses from mental health diagnoses, because physical

conditions can manifest as psychiatric ones, and vice versa (National Academies of the Sciences 2015). Patients with mental health symptoms are more vulnerable to diagnostic errors partly due to clinician biases, such as when patients with previous diagnoses of mental illness experience new physical symptoms but have them attributed to a psychological cause by medical professionals (National Academies of the Sciences 2015). According to the National Academy of Science, “Individuals with health problems that are difficult to diagnose or those who have chronic pain may also be more likely to receive psychiatric diagnoses erroneously” (National Academies of the Sciences 2015).

In a 2010 study published in the *Journal of Psychosomatic Research*, an experimental study was conducted which compared the diagnostic criteria for six different diseases that are functional medical syndromes not explained by more well-recognized illnesses with the criteria for bodily distress syndrome, another name for undifferentiated

somatic symptom disorder. The functional medical syndromes included in the comparison were fibromyalgia, chronic fatigue syndrome, hyperventilation syndrome, irritable bowel syndrome, noncardiac chest pain, pain syndrome, or any other somatoform disorder. The results showed an average 95% diagnostic agreement between the criteria of these illnesses and somatic symptom disorder (Schroder 2010).

Another comparison study published in the *Journal of the American Medical Association* aimed to study the shared clinical and demographic features of chronic fatigue syndrome, fibromyalgia, and multiple chemical sensitivities condition. All three of these conditions have high health care utilization and are not fully epidemiologically nor pathologically understood by the medical community. Based on their results, demographic and clinical factors and health locus of control do not clearly distinguish patients with any one of these conditions (Buchwald & Garrity 1994). Symptoms that can be considered typical of each disorder are prevalent in the

other two illnesses as well. As previously mentioned in the other study, both diseases of fibromyalgia and chronic fatigue syndrome could also be confused or misdiagnosed as somatic symptom disorder since they hold such a high diagnostic agreement with each other. The connection can easily be made that it is the patients who suffer from the evident misdiagnoses which could occur between disorders like these and many others. Failure of evidence of the presence of a medical condition or the lack of understanding of the complexity of other recognized medical conditions should not be reason enough to label patients experiencing physical symptoms as purely psychiatric cases.

Another similar study was determined to identify the correlates of different groups of people fulfilling criteria for somatic symptom disorder, presence of anxiety and/or depression, and musculoskeletal

disorders. Of a sample of 875 women and 793 men, the following eight disorder groups were identified: 1) somatic symptom disorder—75.5% women; 2) musculoskeletal disorder—53.5% women; 3) anxiety and/or depression—73.7% women; 4) somatic symptom disorder with anxiety and/or depression—73.7% women; 5) somatic symptom disorder with musculoskeletal disorder—72.7% women; 6) somatic symptom disorder with anxiety and/or depression and musculoskeletal disorder—76.5% women; 7) musculoskeletal disorder with anxiety and/or depression—66.3% women; 8) no disorders—43.3% women (Leiknes, et. al, 2010). While the data from this study was used to support the conclusion of the need for diagnostic revision of the somatoform category in the (at the time) upcoming DSM-V, it also reveals a disturbing reality

when looking at the gender makeup of each category. Women account for the clear majority in every category in which mental health disorders are coupled with physical musculoskeletal problems except for two notable exceptions. In Group 2 in which only participants with just musculoskeletal conditions are included, men and women are much more evenly distributed at 53% and 47% respectively. Group 8, in which no disorders are reported, is the only disorder group that men make up the majority.

This data could also support the notion that women are more likely to be diagnosed with mental health disorders in conjunction to displaying physical symptoms, but suffer the risk of having their mental state placed above their physiologic medical needs or of having their somatic symptoms ignored completely. ●

THIS IS AN EXCERPT OF THE ORIGINAL WORK. FULL WORK IS AVAILABLE ONLINE AT WWW.ATTICSAITLMU.COM

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● **ANGELA BRITTAIN**

MOM'S GETTING BIGGER

mom's getting bigger
I can see it every day
dad keeps feeding her
she can't help but swallow

mom's got a little red mouth that
erupts every now and then
and covers our family with
the ashes of her grievances

mom swells when the moon
is empty, maybe she feels
like her only friend
has gone away

when mom gets mad
she eats entire cities
first she ate New Orleans
then she ate Atlantic City

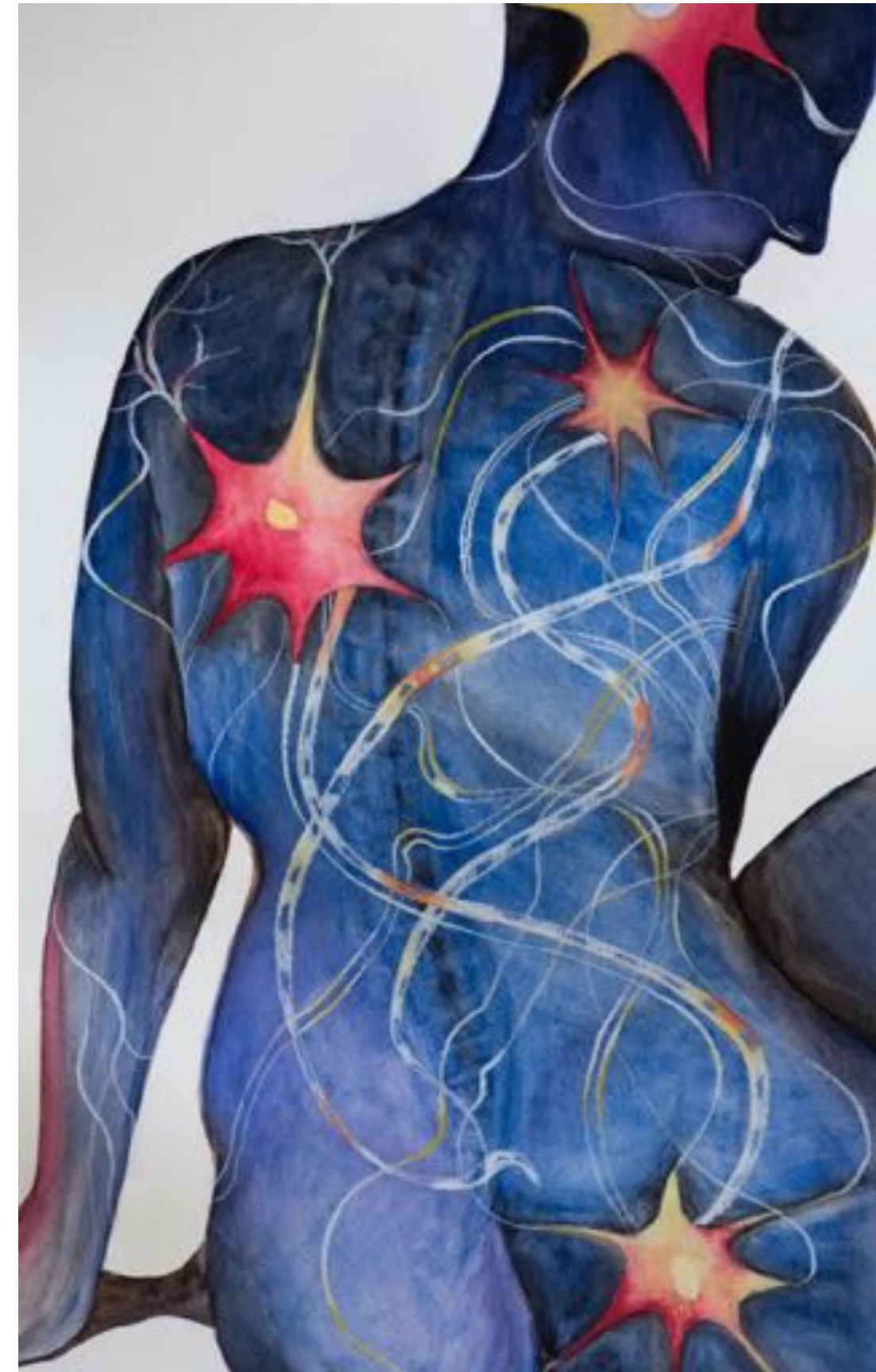
mom has a lot of creatures inside her
some of them live down real deep
some of them I know quite well
eventually we all get acquainted

dad unloads on mom she says
it's just how he was raised
and even when they fight
still her current draws him in

mom's getting bigger every day
soon she'll swallow him up ●

● **NERVOUS STARS** BY
CHARLOTTE CHENG

Charlotte became an artist at the age of four and since then has combined her passion for art with her interest in the sciences. Her artwork incorporates different parts of human anatomy with everyday objects and attempts to illustrate the universality that exists between science and art. She is a Political Science major and plans to pursue Pre-med.





REBECCA DAVENPORT

Rebecca Davenport is a freshman from Caldwell, New Jersey. She is studying Biology with a focus in Conservation. Her publication on “rewilding” highlights a radical conservation approach that may be implemented or considered as environmental crises worsen.

REWILDING: THE FUTURE OF CONSERVATION

Over 10,000 years ago, the Pleistocene epoch was considered the pinnacle of species exoticism. This “golden age” of biodiversity was short-lived, for humans soon infiltrated North American lands rich with large predators and dynamic ecosystems. Animals fell victim to hunting, habitat loss, and disease, establishing a historical pattern of human interference (Mushegian, 2008). Currently, a group of conservationists is calling for the reestablishment of keystone species and wide-ranging ecosystems to mimic the trophic interactions of the Pleistocene. This proposal, termed “rewilding,” is favorable because it supports large-scale, continental restoration as opposed to mere prevention of environmental destruction (Soule et al., 1998). Implementing this proactive approach will promote ecological resilience through keystone species, environmental connectivity,

and expansive nature reserves.

Michael Soule first established the concept of rewilding in the mid-1990s (“What is,” 2017). It was later adopted by E.O. Wilson, who developed the “Half-Earth” proposal. This calls for the allocation of 50 percent of the world’s land for conservation purposes. Ideally, expansive parks would work to connect and preserve habitats within each continent (“William Lynn,” 2017). Currently, only 10 percent of the Earth is protected on paper. The global extinction rate is anywhere from 100 to 1000 times the rate prior to human intervention. Wilson hopes that by shifting legal land protection to 50 percent, humans will experience a drastic shift in their ecological perspective and morals (E.O. Wilson, n.d.).

The practicality of this proposal relies on metropolitan areas. It is expected that 90 percent of people will reside in cities by 2100; this trend is

already visible today. As the “Half-Earth” plan depends on human concentration within these areas, Wilson stresses the “need for an urban vision, one where cities are ecological, sustainable and resilient” (“William Lynn,” 2017). It is essential that urban environments are not only considered alongside reserved landscapes and ecosystems, but also identified as the ecosystem itself.

Within North America, it is hoped that African and Asian species can satisfy the previous ecological role of animals from the Pleistocene epoch. “Rewilders” believe that past lineages could be returned to North America and promote positive evolution. Additionally, this effort could benefit endangered populations by moving the species away from their degraded habitats. For example, elephants could re-establish themselves in North America as a model

of past mastodons. Their behavior may mimic that of the mastodons as they disperse orange seeds across extensive landscapes (Marris, 2009). Through the guidance of Pleistocene models, modern trophic interactions of endangered species could be established in alternate ecosystems.

Rewilding does not reject conservation biology strategies but instead expands on goals of species protection. Those advocating "...for Pleistocene rewilding would restore, if they could, the age when nature lived wild and large, when mastodons, sloths and three-tonne wombats heaved their bulk around Earth, and predators were big, fast and ubiquitous" (Marris, 2009, p. 30). Future generations could live to see extraordinary mammals such as cheetahs, llamas, and lions roaming the American Southwest and reserves within the Great Plains.

Earth is currently experiencing the sixth great extinction event in history. Unfortunately, this occurrence is the only one due to

anthropogenic activity rather than an external disaster (Hiss, 2014). Rewilding stems from a desire to replenish top predators whose population declines are a result of human expansion. However, the conservation of individual species is no longer the only concern. Keystone species provide trophic interactions and habitat regulations that are vital to the protection of healthy ecosystems.

Often, these species are not particularly abundant or ecologically dominant. Their degree of influence on biodiversity tends to be disproportionate to their population size (Soule et al., 1998). Keystone species are resilient, responding to shocks with new adaptations that readily evolve. Large predators are responsible for controlling herbivore populations. If these predators are depleted, herbivores become overpopulated. This leads to the decimation of plant life and subsequent starvation of these abundant herbivores.

Predators are responsible for this "top-down" effect. In parts of the Arctic tundra,

plants experienced a 40 percent decline due to the lack of natural predators (Mushegian, 2008). A similar response is seen in North American deer populations. Every year, a "deer control program," otherwise known as organized hunting, is designed to maintain a certain concentration of deer in New Jersey's South Mountain Reservation. This process became necessary after their natural predators, such as wolves and mountain lions, were heavily hunted and driven out of fragmented habitats.

In addition to regulating flora and fauna, top carnivores and herbivores provide crucial resources to their ecological niches. Animals like beavers, sea otters, gopher tortoises, elephants, and cavity-dwelling birds are responsible for physically altering their habitats. Without keystone species, the heterogeneity of an ecosystem is lost. They are the central factor giving nature an essence of the "wild" (Soule et al., 1998). As rewilding attempts to piece together the necessary components

of a functioning ecosystem, keystone species must remain the primary focus.

Despite the evident benefits of a proactive approach to rewilding, critics challenge certain facets of the proposal. In an attempt to restore ecosystem dynamics of the Pleistocene, modern species could potentially harm established habitats. Extinct species' lineages may no longer advance ecosystems that have evolved and transformed over time. These substitutes may instead serve as invasive species, damaging the conservation effort (Marris, 2009). "Ecologically analogous species" could carry pathogens that further devastate the unexposed ecosystem.

Therefore, expansive research must investigate such dangers prior to the development of numerous rewilding reserves.

Critics further question the practicality of establishing exotic species in North American reserves. Due to the strict laws on animal trading and the difficulty of negotiating with foreign countries, stripping elephants and lions from their current

habitats may appear infeasible. In the event of success, conservation efforts in Africa and Asia would lose attention and resources. Additionally, critics are concerned with plans for rewilding reserves in close proximity to urban life. It is probable that dangerous animals could occasionally escape from fenced off regions. If such species were to reach urban areas, the consequences would be devastating (Mushegian, 2008). Therefore, the "Half-Earth" concept requires a drastic shift in human perspective where threatened species are considered alongside human development, not separate from civilization.

Rewilding projects have already begun in a few regions around the world. Oostvaardersplassen is a reserve located near the Dutch countryside. This 6,000 hectare area was established by Frans Vera, who wanted to rewild the land with its natural species (Marris, 2009). Konik horses currently serve to replace wild Tarpans, while Heck cattle act as substitutes for aurochs. Aurochs provided

ecological benefits to the reserve by "turning the earth with their massive hooves and, in their wallows, creating depressions that fill with water and become mini-ecosystems" (Marris, 2009, p. 31). Heck cattle also practice such movement, encouraging diverse vegetation, as seen by the open grassland, thorny shrubs, and dominating tree canopies throughout Oostvaardersplassen.

Another attempt to rewild a grassland ecosystem can be found in "Pleistocene Park," Siberia. The tundra biome in the Siberian region displays a clear environmental benefit from this project. As large mammals move around the park, the tundra soil becomes more frequently exposed to cold temperatures, preventing the permafrost from melting. Therefore, less carbon dioxide is emitted from the soil's carbon sink, reducing this region's contribution to global warming (Mushegian, 2008). If rewilding is successfully implemented in numerous countries, an increase in biodiversity will support robust ecosystems and environmental

efforts.

The next step for North American rewilding is to identify potential reserve locations for the first group of introduced species. E.O. Wilson imagines “Long Landscapes” running from north to south and east to west to allow for animal migration. This design would permit populations to respond to climate change effects by traveling along the connected corridors. Movement in various directions would allow the species to experience precipitation and temperature levels that match their natural climate (Hiss, 2014).

Wilson plans for species such as tortoises and llamas to be the first observed in the reserves. New additions will later include big cats, elephants, and other “exotic” animals. This slow

development will allow experts to carefully observe the predator-prey relationships within the regions before introducing additional species (Mushegian, 2008). Such professional analysis will ensure that the critics’ concerns about ecosystem dynamics are fully addressed.

Future investment in rewilding enterprises relies on the human regard for biodiversity and the natural world. Wilson is currently promoting non-anthropocentrism, or the intrinsic value of nature beyond its material, aesthetic, and spiritual services for humans. The rewilding proposal was established with the assumption that people would willingly preserve half of the earth beyond purely selfish intentions (“William Lynn,” 2017).

As much as civilization attempts to distinguish itself from the steady downhill trend in biodiversity, human populations have been interfering with natural processes for over 10,000 years. It is time to take responsibility for the destruction of spectacular lineages and address the diminishing state of modern ecosystems. In order to serve as gardeners of the world, a proactive conservation approach must exceed mere preventative measures. As Michael Soule (1998) once stated, “The greatest impediment to rewilding is an unwillingness to imagine it” (p.8). ●

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MIRROR BOX BY

KELLI NAGASAWA

Kelli Nagasawa is a junior Graphic Design major with a Business Administration minor. She’s from Newport Beach, California and loves photography and exploring Los Angeles. She hopes to follow her passion for both design and business and one day pursue a career in branding.



ALFREDO HERNANDEZ

Alfredo Y. Hernandez is a junior Political Science student who hopes for a career in academia. Born in Los Angeles, politics has been his life-long interest while political philosophy is a more recent passion. His dream is to either be as cool as John Rawls or to play in a Steely Dan cover band.

A POST-LIBERAL FRAMEWORK FOR THE JUST PUNISHMENT OF CRIME AND CRIMINALS IN THE UNITED STATES

Section 1: The Liberal Ideology and Prisons

According to Michelle Alexander, the American prison system as it exists today owes much to the presidency of William Jefferson Clinton, who himself was an adherent of John Rawls (Alexander, 56-57). Therefore, I find it fitting to start this paper with a discussion of Rawls’ theory of justice as fairness, as it will serve as the basis of the liberal argument *for* the punitive prison system. Before we can discuss how liberalism can address social injustice, we must first understand the theoretical juggernaut that is Rawls’ justice as fairness.

I. Rawls’ Theory of Justice as Fairness
Rawls’ theory of justice as fairness is unique because of its strong reliance on abstract theory and procedural methods. Rawls wanted to provide an alternative to consequentialism, and as such he looked to remove all morality-based calculations

from his definition of justice (Rawls, 19-21). To do so, he asks the reader to enter into a hypothetical state known as the “original position,” where any contingencies regarding the person’s being—class, race, occupation—are hidden by the “veil of ignorance” (Rawls, 11). Behind this veil, rational individuals are tasked to prescribe to fundamental axioms that are to guide the institutions of society; individuals can know “political affairs and the principles of economic theory; they know the basis of social organization and the laws of human psychology” to help guide them in generating their principles (Rawls, 119).² Given the person’s position behind the veil of ignorance, they cannot know where they will fit into society. Given these conditions, Rawls stipulates that any rational individual would arrive at two principles capable of justly organizing social institutions; these two principles are the

equality principle (EP) and the difference principle (DP) (Rawls, 10).

Ia. The Equality Principle and the Difference Principle

The EP and DP serve as the foundational basis of Rawls’ theory, and Rawls uses them as his attempt to combine positive and negative conceptions of liberty. Rawls argues that the EP is the first principle an individual would arrive at while in the original position because it outlines the basic rights that any person in society is obligated to possess (Rawls, 53). This includes the following assurances:

political liberty (the right to vote and to hold public office) and freedom of speech and assembly; liberty of conscious and freedom of thought; freedom of the person, which includes freedom from psychological oppression and physical assault and dismemberment...the right to hold personal property and freedom from arbitrary arrest and seizure as defined by the concept of the rule of law (Rawls, 53).

The goal of the EP is to

² Rawls does not limit the general information to only these things. He allows for any general information that pertains to general laws and theories, but nothing beyond that—his aim is to limit the knowledge of particulars in the original position (Rawls, 119).

establish the boundaries that institution cannot cross and thus ensures a basic level of citizenship to members of society. This is Rawls' attempt to ensure negative liberty, or as Dorothy Roberts defines it: "a guarantee of government neutrality" in situations dealing with "competing conceptions of value and human relationships" so that "each individual is free to choose her own moral understanding of justice" (Roberts, 294-95).³ An assertion of basic negative liberties would constitute a just society for libertarian theorists like Robert Nozick (Nozick, 150-51). Rawls, however, feels that more is required beyond fundamental protections and thus postulates the eventual acceptance of the DP by an individual in the original position.

The DP is secondary to the EP and is aimed at promoting liberty in the positive sense, by ensuring that inherent circumstances do not serve as limits to personal growth (Rawls, 53). In Rawls' words, the DP allows social and economic inequalities in

society if: "a) they are to be of the greatest benefit to the least-advantaged members of society, and b) offices and positions must be open to everyone under conditions of fair equality of opportunity" (Rawls, 53). Under this arrangement, at-birth advantages—such as race or class—will have no effect on one's success in hir⁴ future; regardless of where or to whom one is born, one should be able to live a life equally as fulfilling as that of someone born into a better household situation. To Rawls, all rational individuals are citizens and should therefore be treated as such. Furthermore, the DP is Rawls' attempt at preserving the worth of liberty, because Rawls worries that any theory that only focuses on negative liberty misses out on instances that negative liberty overlooks, such as equal opportunity. Hence why part b of the DP exists—society should be structured in a way so that any individual can feasibly see himself in a position of social power (Rawls, 53). The institutions implicit in this

assurance are many and could cover a paper on their own, but I will not be looking at those structures. Instead, this paper will focus on what Rawls and subsequent liberals believe serves as justified punishment for those that violate the laws of society (a society governed by the EP and DP).

II. Liberal Justification for Punishment

A complete theory of justice must detail how a society must deal with those that violate its rules; the solution is often punishment. As mentioned in section II of the introduction, I will be utilizing Nathan Hanna's definition of punishment because of its specificity in dealing with those who commit crimes in a liberal society. As such, I argue that prisons are the institutional embodiment of punishment in society, for those who break laws are processed and dealt with accordingly through and *only* by the prison system.

Liberalism is sympathetic to the concept of punishment and a prison system; in fact, punishment is seen as almost essential. This sympathy

comes from the notion that individuals in society are rational and that the societies themselves are set up with the most rational organization possible. Matt Matravers in "Political Neutrality and Punishment" (2013) stipulates that criminals are not only cognizant of their crimes but also choose to commit them only after careful consideration (Matravers, 221-22). Under his assumption, crime is only conducted when an individual believes they will gain an unjust advantage by committing the act; to Matravers, no one in a just, liberal society will commit a crime simply for the sake of committing a crime (Matravers, 222). Therefore, if a society does not punish those that commit crime, it risks implying that violations of individual or societal rights are permissible. Rawls articulates this concern by contending that punishments are necessary to protect the idea of "liberty itself" (Rawls, 212). Any individual willing to violate the social contract is of "bad character," and the restriction of hir individual liberty is necessary to protect the liberty of the whole (Rawls, 277).

This appeal to innate moral constitution places Rawls and Matravers in a precarious situation: they have appealed to consequentialism to justify punishment. Jim Staihar offers an escape.

Under Staihar's view, crime undermines *trust* in society, so instead of satisfying a want for moral rectification, punishments fulfill "an obligation of restoration" aimed at regaining trust (Staihar, 1218-19). With Staihar's view, Matravers and Rawls' conceptions of punishment fall back in line with non-consequentialist ideals—the goal of punishment is now dually the deterrence/ retribution of crime and the way criminals re-earn their place into society. Moreover, the emphasis on the distribution of trust is in line with the procedural liberal framework. Now that we understand how punishment can coexist with the liberal framework, we must see how this view of punishment and Rawls' two principles of justice tackle the injustices of the American prison system outlined in the introduction of this paper.

III. American Liberalism's

Failure to Tackle the American Prison System

As mentioned in the introductory paragraph, incarcerated Americans face negative—removal of voting rights, inability to receive subsidized housing or federal loans—and positive—implicit rejection during the employment process and second-class status by those in society—violations of liberty (Alexander; 53, 94, 142-158). To be considered just, a theory of punishment must contend with both the positive and negative aspects of the prison system; liberalism, as espoused by Rawls, Staihar, and Matravers, falls short in both realms. Of the negative aspects of incarceration, there is only one overlap between the liberties guaranteed by the EP and the punishments that prisoners face: the right to vote (Rawls, 53). In some states, prisoners are either stripped of their right to vote while in prison, while on probation, or completely from that point onward. If Rawls' EP is to truly be applicable to every citizen, then voter disenfranchisement cannot stand; a prisoner must hold full control of their voting rights regardless of

³ A quick analogy to understand negative and positive liberty: Imagine a tall building one is tasked with reaching the top of. Negative liberty would be a stairway to the top; one can go up and down as they please but there is nothing beyond themselves that will help them get to the top. Furthermore, if they cannot walk, they cannot go up. Positive liberty is an elevator in addition to the stairs; it actively carries them to the top and permits those that cannot use stairs get there too. It equalizes the climb and ensures an equal chance for everyone to get to the top.

⁴ Hir/Hirs/Hirself are all gender neutral pronouns

their felony status. This is a definite victory for liberalism, as voter disenfranchisement has shown itself to be a tool of “radicalized social control” in the United States (Alexander, 58). Preserving their right to vote ensures that the voices of prisoners can never be silenced and, more importantly, can never be ignored by those in political positions.

However, one can see that there are still several egregious violations of negative liberty that the EP does *not* explicitly account for, such as the inability to receive any form of federal funding—be it for education, housing, or food. Given that reintroduced citizens often require some outside assistance to get back on their feet, the fact that liberalism allows for the possibility of governments to leave reintroduced citizens high and dry points to a definite failure of the system.⁵ Moreover, there are no obligations for institutions to aid released criminals because of the implicit acceptance of continued punishment in society. Individuals in

the original position may argue that they of rational constitution would never be a criminal, so there is no need to create social services geared at helping those who have fallen down the path of irrationality. Furthermore, they in the original position may even believe that it is necessary to make life difficult on released criminals in order to deter crime in general. As such, there never needs to be any positive assurances for criminals; criminals do not deserve the help provided by the DP because they have violated the contract that created the DP. I argue that this belief is impermissible given the consequences we see in the US.

Section 2: Critiquing Liberalism through Post-modernism

I. Positive Power and Its Usage

As mentioned in section III of the introduction, debates on punishments must answer two questions: 1) **why are societies justified in punishing** and 2) **to what extent can they punish?**

The first question is often overlooked by liberals—for example, Rawls writes at most five pages to justify the existence of punishment in his society—and they focus their efforts more on the second question (Rawls; 240, 270, 314-315, 575-77). I argue that liberalism has been too quick to brush off the first question and that a closer examination of the reasons behind punishment allows us to move away from the harsh practices occurring in our society without liberal objection. To begin such an examination, we require the critical methodology of Michel Foucault—crucial to his technique is an understanding of positive power. Positive power is the process through which benign institutions in society discipline and categorize for the institution’s use; the benefit of utilizing positive power as a lens of critique is that it allows us to critique any institution engaged in biopower—the bureaucratic management of human life (Foucault, 260). Once an individual can

recognize positive power, they can uncover its workings in society; they will be able to analyze any institution that deals with human life and critique it by its merits. Punishment and prison, with its control over 2.6 million individuals in the United States, is in the business of biopower (Alexander; 102-103, 184-185). Because liberalism has justified punishment and the prison system in modern society, Foucault’s understanding of positive power permits us to question the motivations behind punishment in society.

II. Punishment’s Roots in Natural Law: A Tool to Subjugate

In *A Theory of Justice*, Rawls aims to construct a theory devoid of moralistic arguments; however, his and other liberals’ insistence on punishment implicitly rely upon natural law (laws from God) to justify their theories. According to Rocio Lorca in her article “The Presumption of Punishment: A Critical Review of its Early Modern Origins,” the notions of punishment as a response to crime “sprang from the early modern idea

that individuals have a natural right to punish” (Lorca, 388). This is the same natural law that Europeans utilized as justification to punish the transgressions of indigenous populations during their conquests of the New World (Lorca, 389). This natural law then found its way into the theories of Hugo Grotius, John Locke, laying the foundation for future liberal thinkers to accept this man-made⁶ notion as fact (Lorca, 388-90). As Lorca points out, the ability to punish “confirm[s] the very existence of individual rights,” because both rights and punishment were both seen as fundamentally pre-political (Lorca, 389). However, if we apply the Foucauldian lens to punishment we see that it is both man-made and dependent on external conceptions of morality. Natural law is nothing more than an individual’s interpretation of what is deserved to him; if we presuppose that natural law is not God-given, then it can be tweaked, challenged, or removed altogether. More importantly, once natural law is no longer accepted as a fundamental premise,

the liberal justification for punishment stands on shaky grounds.

III. The Liberal Presupposition of Rationality: Rawls’ “Bad Character”

Beyond the usage of man-made “law” to justify their acts of punishment, liberals have turned to rationality to remove any sense of moral guilt from their acts of punishment. Rawls’ entire philosophical project carries its weight because it presupposes that any *rational* individuals will arrive at his societal arrangement (Rawls, 48-49). As Bonnie Honig points out in “Rawls on Politics and Punishment”: “Rawls is so sure of this assumption that he wagers that citizens governed by just institutions will ‘acquire a ‘corresponding sense of justice’ (*TJ*: 138)” (Honig, 110). Therefore, for Rawls at least, any deviation from this norm must arise from the individuals within society and not the institutions themselves. This becomes most apparent when Rawls claims that any person willing to violate the laws of society carries a “mark

⁵ Here are a few of the articles I looked at to base this claim: Denney, Andrew S., Richard Tewksbury, and Richard S. Jones. “Beyond Basic Needs: Social Support and Structure for Successful Offender Reentry.” *Journal of Qualitative Criminal Justice & Criminology*, Vol. 2, No. 1 (April 2014): 39-67.; Galan, Jemima. “Banning the Box, Building a Future: How Expansion of California’s Legislation Would Mend the Threaded Strands between Recidivism and Employment in Criminally Convicted Offenders.” *University of La Verne Law Review*, vol. 37, 01 Apr. 2016, p. 343.; Cook, Philip, et al. “An Experimental Evaluation of a Comprehensive Employment-Oriented Prisoner Re-Entry Program.” *Journal of Quantitative Criminology*, vol. 31, no. 3, Sept. 2015, pp. 355-382. Later in the paper, I will discuss Iris Marion Young’s five faces of oppression and how these negative liberty violations fall into them, but for now, I would like to continue with how liberalism handles the positive effects of incarceration.

⁶The usage of “man” is intentional. Not only is it a reference to the old-school usage of “man” to denote the neuter gender, but it also points to the reality that this notion of rational impartiality is a male creation.

of bad character” and must be dealt with for the sake of society itself (Rawls, 212). In other words, an irrational individual poses a threat to society and persons within society are explicitly obligated to punish them for the sake of the whole. Honig contends that this argument creates an inconsistency with the DP, and I am inclined to agree (Honig, 114). To Rawls, individuals who are unable to adhere to his sense of justice—be it because of a genetic/innate constitution—are to be labeled bad characters; meanwhile, individuals that are unable to garner income because of genetic/innate constitution are to be “the problem of all” (Honig, 115). Rawls realized that there was no way for him to justify punishment within his procedural method, so he reached outside of it to find an answer—claiming consequentialist justifications for his need to preserve the liberty of the whole (Honig, 114-116). If Rawls wishes to be consistent, then he must apply his procedure to both those capable of exercising rationality, and those he believes are not.

Additionally, we cannot

ignore the racial history behind the notion of rationality and impartiality when it comes to punishment. Charles Mills points out in his work, *The Racial Contract* (1997), that Europeans believed any space lacking Christian morality (which is heavily affiliated with Christian reason) was wild, and demonized in a way that “implies the need for Europeanization if moral redemption is to be possible” (Mills, 46). Given that these indigenous populations were not “rational,” Europeans were justified in treating them as subhuman and punishing them as they saw fit (Mills, 56). Rational, therefore, stood in for “white persons (and really only white males)” (Mills, 56). While Rawls’ distinction of bad character is not explicitly raced, it is difficult to separate the image Rawls paints and the history Mills elucidates. Rawls is using a lack of reason to justify punishing populations much in the same way that was done to indigenous populations around the world. The existence of this similarity in Rawls’ and liberalism’s theories cannot exist if we are to prevent such injustices from

reoccurring.

However, we cannot ignore the alternative justification for punishment based upon trust offered by Jim Staihar. Under this system, punishment is justified under trust—not reason—so liberals would not need to appeal to rational security because punishment exists for the purpose of procedural rectification. Yet, the usage of trust becomes problematic if extrapolated to our current, racially-tinged society. For Staihar, punishment is the mode through which trust is reestablished in society; but what if an individual was never trusted in the first place? Indeed, Michelle Alexander points to a survey conducted in 1995 which found that 95% of respondents envisioned a drug user or a criminal as “black” (Alexander, 106). In a system where minority groups are preemptively categorized as criminal, it is difficult to think society will ever truly trust them to begin with—let alone after committing a crime. Therefore, minorities are subject to be relegated to a trustless status, capable of being punished severely until those administering the

punishment deem fit. While Staihar’s approach is worth considering, the reality of modern day American society makes it a difficult alternative to accept.

IV. Addressing the Negative/Positive Aspects of Incarceration

Given the array of critiques regarding the presumption of natural law, rationality, and generalizability, any theory of punishment must not only justify its right to punish, but must also address the negative

and positive consequence of incarceration mentioned earlier in the essay. Liberalism failed to address both sets of consequences and to justify its actions under its framework. While post-modernists have shown themselves useful to challenge the problematic concepts that are considered fundamental under liberalism, they also fail to provide an adequate solution to the problem of punitive prisons. Foucault himself was wary of providing prescriptive

solutions, stating how any general solution “[leads] to the return of the most dangerous tradition” (Foucault, 46). Lorca and Honig themselves do not offer any solution to the problems posed by punitive systems. As such, I will attempt to create my solution to the problem of punitive prison systems by combining threads from liberalism, postmodernism, post-liberalism, and communicative ethics. ●

THIS IS AN EXCERPT OF THE ORIGINAL WORK. FULL WORK IS AVAILABLE ONLINE AT WWW.ATTICSALTLMU.COM

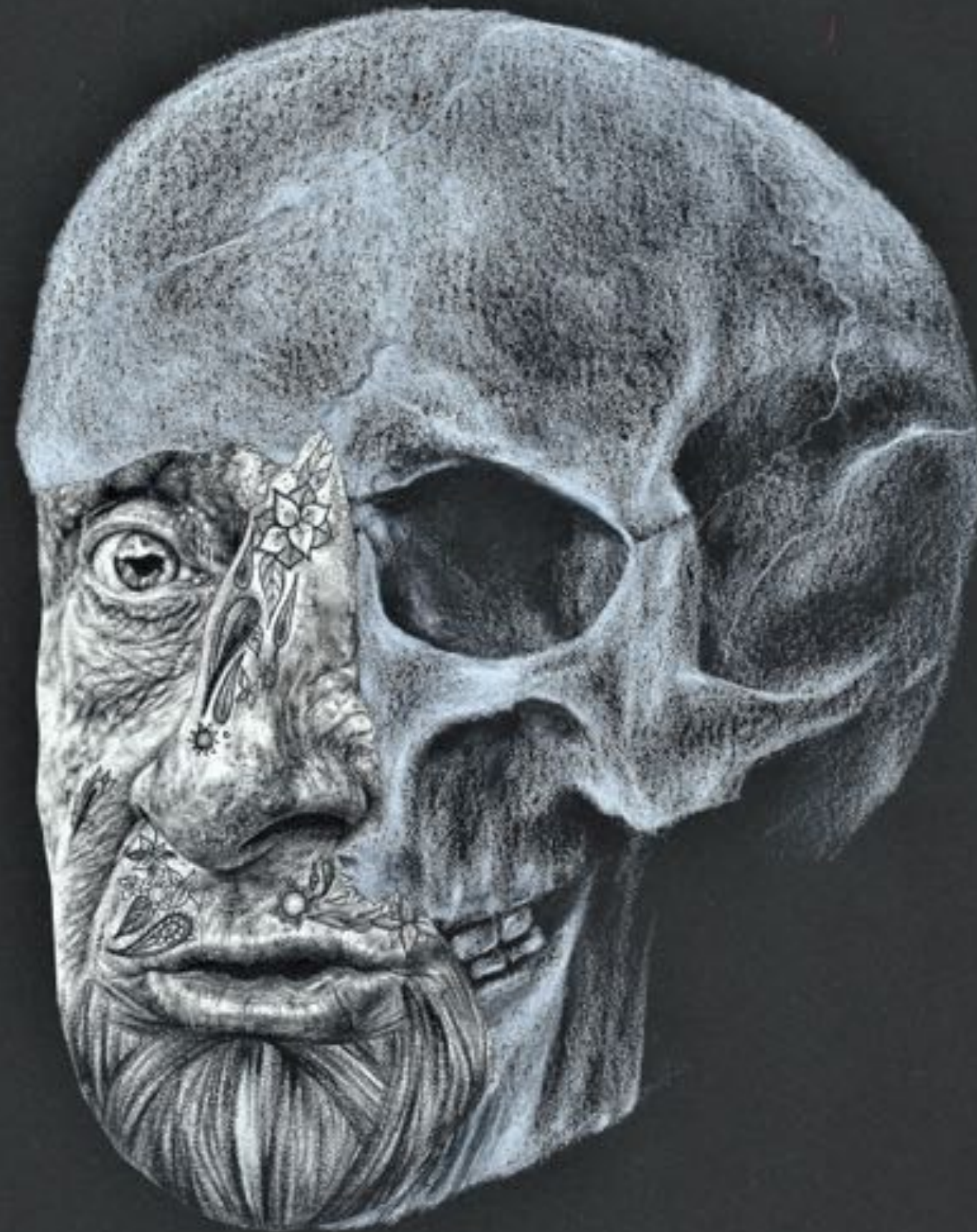
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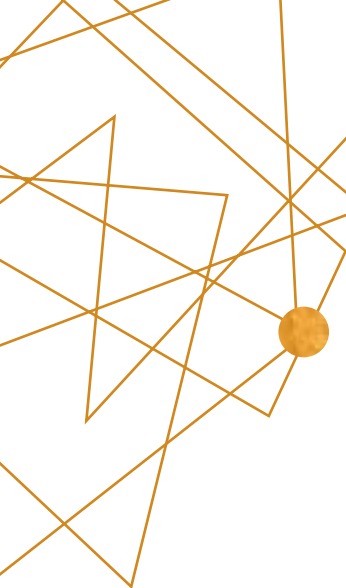
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IN WITH THE OLD BY
SOPHIA CATHERINE MAGGIO

Sophia Maggio is a sophomore Art and Psychology major with a research concentration, and a minor in Leadership Studies. She is a student at Gonzaga University in Spokane, WA, but her original home is in Everett, WA, just north of Seattle. She loves quirky art and quirky people, and in her free time, you can find her drawing, playing soccer, or listening to podcasts. While her future plans are not solidified, she hopes to combine her interests in art and psychology, potentially as a counselor and/or art therapist.





ELIZABETH MCCOY

Elizabeth McCoy is an English major and business minor. She loves her family, reading, and a good laugh. She is from the Seattle area, and is always ready to unfairly judge those who are unprepared for rain (or, God forbid, use an umbrella).

CO 5150

We met at Folsom Prison
with wires spiraling around us,
that silver steel and the gray concrete the only colors
looking in the tiny window from the outside.

When I first saw you, I knew —
with a boulder heaving itself on top of my chest —
by the line of your mouth, narrowing,
by your black eyes with an obsidian glitter
when they pierced mine

that you were my reaper.
My deliverance.

Before you got close enough I could smell the reek —
garlic, rotted onions,
a bitterness and salt at your measured movements —
from joy at the death you administered,
even a faint hint
of burning, from long ago,
still staining you. Somewhere.

It was all in your eyes as you looked at me,
an animal to study, to poke and prod
with needles you trained yourself to use
on the others before me, and you delighted
in the taste of fear sneaking
into my irises.

You looked at me but only saw the body
strapped to a table,
needles standing at attention,
ready to become your firing squad.

Before you stalked away, to look over
other prey,
your cheeks pulled back your lips,
spread into the imitation
of a smile, hungry and lustful,
as you saw yourself, God — in control of who dies —
excited for the moment you moved your thumb
and could watch the sunset in my eyes.
Each sunset unique. ●



LUCIE BOLZAN

Lucie Bolzan is a Freshman English major. Bolzan is fully bilingual, as she lived in France until she was eight years old and has also studied at French schools for all her life. She feels that this has helped her in both her writing and her personal life, as she can view things through a multicultural lens. She has been interested in reading and writing since her freshman year of high school, when she read *Slaughterhouse Five* by Kurt Vonnegut, and she hopes to pursue a career in writing after she graduates. Bolzan also plays the piano and loves listening to music and watching movies.

THE PECULIAR PHENOMENON OF THE COLORLESS SKY

The sky turned black in the summer of 1998, when my fish died. Little Maurice ate too much food one hot, humid July afternoon, and the poor thing couldn't take it. Mom suggested I flush it down the toilet, but the thought of little Maurice's body ending up in the sewer system made me feel my own heart, and that was never a good sign. I put the small red dead thing in a plastic bag and walked it down to the park that had a pond to let his spirit rest with his family -- but then I remembered that I bought him at PetCo, not a pond, and for all I knew he didn't have a family. Even if he did, they probably wouldn't enjoy seeing his little body float at the surface; there was a real dead-ness about him. Suddenly I realized I had never in my life had a more illogical idea, so I put Maurice back in the plastic bag and lay down in the grass. I was uncomfortably

aware of death, and worse, my own stupidity. I walked home and flushed small red dead Maurice. I didn't see the color in anything for the rest of the summer, nor did I see any reason to.

Ms. Peterson's red bra peered through her silky blouse on the second day of school that September and I thought maybe God existed. I was conflicted as to whether I should stare or spend the rest of the class period trying to figure out why a woman with any common sense at all would wear a red bra with a white shirt. I weighed my options and decided to stare. She had long wavy hair, with one strand always falling slightly wrong. I dreamed of touching her beautiful brown hair just as much as I dreamed of fixing that strand. She was smart, Ms. Peterson, and I knew because once in awhile she would say something brilliant in passing, sending

a certain feeling down my spine. I couldn't name it, this feeling, but I'd recognize it if I ever felt it again. I wrote down all her brilliant phrases, these digressions she indulged in; they made me realize I liked words, how certain ones sounded just right with others. But Ms. P was just as crazy as she was smart. She tended to go off on tangents -- sometimes she would even play old Beatles' songs and make us take notes on what they meant. No, I had no idea what a walrus could possibly have to do with The Great Depression; but that was the day she wore the red bra, and somehow I obliged. The next day she spent the entire lesson talking about how stupid men were; I remembered the idea I had had to throw Maurice in the pond and agreed. I looked out the window and the leaves seemed greener.

"Don't listen to her," my mother said that night as she

blew a puff of cigarette smoke out of her pursed pink lips, “she’s a feminist.” I asked what that meant because it seemed to sound a lot like the word her boyfriend sometimes used to talk about me. “Not feminine, Eric, Jesus. *Feminist*. The feminists think little boys and little girls shouldn’t be raised all that different and stuff,” she put the cigarette out and stood up to pour me a glass of water, “I think that’s fine, but not all of us can stop to think about the perfect way to raise our kids. Some of us don’t wake up at noon and go to beach yoga.” I had a pop tart for dinner and wished my mom would at least try beach yoga.

She and I had our differences, mainly because she didn’t pay attention to me. I asked her constantly if I would ever get to meet my father, but she thought I understood that “he’s away for now” meant “he’s away for always.” It was just me, no brothers and sisters; that’s why I loved Maurice so much. Mother didn’t tend to like the clothes I wore, or the grades I got, or the way I liked to sit

and think and not play with a toy firetruck (what on earth is the point if you can’t actually fight the fire?). Anyway, I was moderately miserable both at school and at home until I met Jenny, and then I was just miserable at home.

It was mid-October when I first noticed her. I remember because I usually hated October the most out of all the months -- that was when it started to get cold. Ms. Peterson told us all to pick a partner we had never been partners with before, which was just about the worst thing you could hear on a Wednesday morning. I turned around to Agatha from the seat behind mine and we decided to be partners, though I hated how she looked and I really couldn’t stand the way she talked. We started a project on something about some war and she asked me what I was doing for lunch, to which I replied, “I’ll probably just sit wherever no one else sits,” a completely strange answer to a perfectly banal question. She told me her best friend was an eighth grader and we could

eat with her, and I thought I would rather die but of course I’d love to, I said. The friend, naturally, was Jenny.

That day the sky was lavender. Jenny had platinum blond hair that was much shorter than mine and she smelled like laundry detergent, her very own kind—somehow everybody always has their very own, specific, one-of-a-kind laundry detergent smell—but hers was better than everybody’s always was. She spent the whole lunch period talking about accidentally spilling her water all over some popular boy and how embarrassed she was and how her life might as well be over, which made me vaguely nauseous, but I preferred not caring. She was small for being two whole grades older than me, and her small brown eyes told a certain story that I, like any other sixth-grade boy, inevitably felt the need to be a part of. I probably never had a dumber idea than eating lunch with Agatha and Jenny every day from then on, but I got over the way Agatha looked and talked so I could be in

front of her friend for an hour a day.

It was Ms. Peterson’s intelligent words and my lunches with Jenny that made my weeks go by faster and allowed me to tune out the sound of my mother’s voice; but I could never completely turn it off. One Thursday I came home from school and flung myself onto the small, uncomfortable sofa, a much better alternative to standing up for even one more second. Mother stood over me and I could feel her shadow blocking the sun coming from the window; my arms and legs were warm but her shadow spilled onto my spine, like its darkness could fight the sunshine with ease. I suddenly felt vulnerable and turned around faster than I knew I could, now facing her angry, tired, exasperated self. “Your father’s in town,” she said with as little emotion as she could; but she was scarier when she was nothing than when she was mad. “Oh, and clean up your room.”

I ran the first sentence back to myself endlessly, trying to

process the familiar words that had just been put together to form the most unfamiliar sentence possible. “What town?” I asked half-jokingly, hoping that was what this was: a joke.

She gave me the meanest look I’d ever seen. “Are you dumb or are you just trying to be?” she asked, eerily calmly. Then I was told firmly to go take my shower, but I slammed the front door behind me instead and headed to the park that had a pond.

Jenny lay in the grass with me and we looked up at the red sky. “Why won’t you ever talk about yourself?” I asked, suffering the occasional humiliation I would always feel when I remembered how much I’d just talked about my problems. “I feel like I don’t know anything about you,” I added.

She rarely looked at my ten-year-old face when I asked her questions. She looked anywhere else. “If I told you all about my life,” she answered, “you would think I care about you!”

I giggled along with her instinctively, only briefly absorbing the words she had just spoken before being crushed by them. “What do you mean?” I asked calmly, hoping I had heard her wrong.

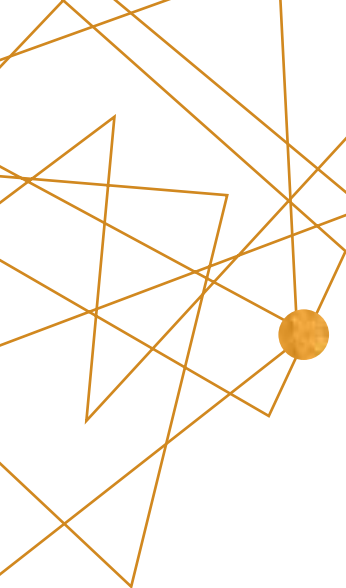
“Oh please, Eric, you know what I mean. I think it’s great and all that you can confide in me, but I wouldn’t ever talk about my problems with a *sixth* grader. I mean, then you would think I like you back, silly.”

My heart sank as I became far too aware of my age, which had somehow become representative of my character. For the first time I stopped talking, and Jenny remained silent as she had always been when I would usually fill the space. She mentioned something about seeing me next week, but I was miles away from her, sinking into the grass. I glanced over at the pond, pinker than I had remembered. I looked up and saw Maurice in the pitch black afternoon sky. ●



"COMMENTARY" BY
BRIAN GILMARTIN





ALFREDO HERNANDEZ

“SOMEBODY’S GOING TO EMERGENCY”¹: A JUSTIFICATION FOR SEEMINGLY INCONSISTENT DISOBEDIENCE

Jesuit universities face a moral dilemma: when their host country’s laws violate Catholic teachings, who are they justified in following? In recent years, this dilemma has manifested in President Obama’s HHS mandate requiring Jesuit institutions provide contraceptives in their staff healthcare. Another situation is President Trump’s revoking of DACA, implicitly expecting cooperation from schools across the county. To these two cases there are three solutions with seemingly equal force: comply with both, comply with neither, or comply with only one. I argue that a Jesuit institution’s identity as both a Catholic institution and a university permits it to have a double integrity-based objection to deportations because it stands to lose more of its identity if it does not. Furthermore, a Jesuit university does not have such claims regarding the HHS mandate as nothing innate to the identity of a university

makes it incompatible with providing contraceptives. In the first section of this paper, I will define formal and material cooperation to outline the tension Jesuit universities face when handling abortion and contraceptives. In the second section, I present Michael Walzer’s supreme emergency as a heuristic to understand the intuitive difference between the two cases, as it establishes a test for when normal ethics can justifiably be ignored. Additionally, I will also outline why Jesuit institutions can be justified in disobeying legislation regarding deportation but not contraceptives, utilizing Richard Dworkin’s civil disobedience framework to emphasize the need for non-persuasive action in one but not the other. In my third section, I will entertain two objections to my solution: the intersectionality and institutional arguments. **The Laws of God and the Laws of Man**

Formal and Material Cooperation with Evil, Outlining the Catholic Objection

Formal and material cooperation with evil demarcates the frontiers that a moral Catholic cannot cross. According to Michael Gorman in “Why Catholics Can’t Comply with the HHS Mandate,” formal cooperation with evil is when an “agent shares the primary agent’s intention” of performing evil (Gorman 1). An example of formal cooperation would be selling a gun to an individual knowing that they will use it for murder. In the moral calculus, what matters is the intention behind the action. What distinguishes formal cooperation from material cooperation is the fact that an individual’s action “do not intend to further the wrongdoing of other agents” (Kaveny 1). Imagine a paperboy who delivers a phonebook. Unbeknownst to him, the teenage daughter of the household uses that phonebook

¹ From “New York Minute” by Don Henley. This line has also served within the title for Episode 2.16 in *The West Wing*, “Somebody’s Going to Emergency, Somebody’s Going to Jail.”

to schedule an abortion. While the paperboy indeed had some hand in the eventual abortion, it appears extreme to assign him any moral blame. This is because he has a certain level of “remoteness” to the action; the eventual evil, while linked to his action, is so far down the line that it seems illogical to blame him (Kaveny 1). As such, material evil can be either proximate or remote, and moral blame increases as it approaches the evil. The reason why these concepts are important is because some Catholics claim that both providing contraceptives and deporting DACA students constitute formal cooperation with evil; therefore, they have a moral obligation to ignore both federal orders.

The response from Jesuit universities to President Trump’s September 5th executive order was largely negative, as many in the church saw that these deportations would unjustly return innocent students to places where they are “marked for death” (Garcia 1). In the eyes of many in the Church, to allow Immigration and Customs Enforcement (ICE) agents onto a Jesuit campus

and to release information regarding undocumented students would be an act of “formal cooperation with an intrinsic evil” (Garcia 1). In the contraceptive case, Jesuit universities must contend with a Department of Health and Human Services (HHS) mandate requiring universities offer comprehensive contraceptive coverage in their health insurance plans. Using contraceptives is also considered an evil under canonical law, and some Catholics argue that paying for them is a form of formal cooperation as well (Gorman 1, 3). Therefore, the Catholic institution is morally obligated not to provide contraceptives, disobeying the HHS mandate. Here the distinction between formal and material cooperation is difficult as the degrees of remoteness can be contested. For the purposes of this paper, I will assume that the Catholic finds paying for contraceptives to be formal cooperation, for it sets a higher bar. As such, cooperating with the HHS mandate stands to be seen as evil in the Catholic’s eyes as cooperating with the ICE officials.

To a strict Catholic, there is

no tension between disobeying in both cases; however, the act of disobedience becomes fuzzier when considering the role of a Jesuit university. While Jesuit universities are private institutions, a certain level of cooperation with the law is expected of them. I argue that a Jesuit university’s disobedience in the deportation case is justified, but not justified in the contraceptive case. While I recognize that the Catholic’s justifications are the same for both, I believe that the university identity complicates the Catholic’s response. I turn to Michael Walzer to understand this complication.

Supreme Emergency and the Loss of Identity

When justifying Britain’s bombing of German cities, Winston Churchill invoked the idea of a “supreme emergency” (Walzer 251). The justification of this idea was that Britain’s situation, where Nazi forces stood to take over the island and destroy democracy in Western Europe, permitted a violation of the conventions of war and allowed Britain to engage in targeted bombings of non-combatants (Walzer 255-6). Michael Walzer took this argument and outlined what

he believed to be a “supreme emergency”: a situation so dire that it “may well require those measures that the war convention bar[s]” (Walzer 251). The justification for a supreme emergency—the notion that the institution stands to lose something of intrinsic value if they do not combat this evil differently—are the aspects I wish to focus on (Walzer 252). While supreme emergency does not perfectly apply to the deportation/contraceptive cases, its significant resemblance motivates my argument.

*Do Jesuit Institutions Encounter a Supreme Emergency?*²

I argue that deportations create a supreme emergency for any Jesuit university. To see why it is a supreme emergency, it is necessary to deconstruct the idea of a Jesuit institution into its constituent parts.

A Jesuit institution is both a distant arm of the Catholic church and an institution of higher learning. Each identity is distinct and carries its own set of obligations, but there are a few instances of overlap. Cooperating with deportations violates both the Catholic and university

identities and is one instance of this overlap. As Rafael Garcia points out, complying with ICE agents and deporting students to their mother countries would substantially endanger their lives, if not put them at risk of death (Garcia 1). A Catholic, in good faith, cannot morally justify harming another human being simply to satisfy immigration law. The benefits do not justify the actions. Moreover, a university cannot justly cooperate with deportations as it would violate its obligation to its students. In having accepted a student, with full knowledge of their current immigration status, the university has accepted the responsibility of caring for said student. If a student were sexually assaulted, then the university would be expected to protect that student, ensure that the proper authorities are contacted, and provide them with the appropriate emotional counselling. Failing to do so, failing to protect the students, would violate their obligations to them because of the university’s acting in *loco parentis*. While cooperating with ICE would violate both of a Jesuit institution’s identities,

complying with HHS does not. Considering the view that providing contraceptives constitutes formal cooperation, cooperating with the HHS mandate would require a violation of the Catholic identity (Gorman 3). As with the deportations, a Catholic cannot morally justify hindering the creation of life or the harming of it (Garcia 1). There is not a similar violation when considering the university identity. Nothing intrinsic to the identity of a university is lost when it decides to provide contraceptives to its faculty and staff. Therefore, the university has no justification to disobey the HHS mandate without it stemming from the personal beliefs of members within it. (I will touch on how one can respond given certain objections later in the paper.) The fact that cooperation with deportations violates both identities is important when considering Dworkin’s framework for just civil disobedience.²

Dworkin’s Framework and a Double Integrity-Based Objection

Dworkin’s Integrity-based Objections

In his framework, Richard

² See Figure 1 in the Appendix to visualize the response alignment for deportations but not contraceptives.

Dworkin provides a guideline for how and when an individual can civilly disobey in a democracy.³ The reasons for civil disobedience fall into one of three categories: conscience, justice, and prudence. The closer on the spectrum an objection rests on personal questions of integrity, the more justified a person is in utilizing non-persuasive means to disobey it. By non-persuasive methods, Dworkin means that a person can employ coercive and/or obstructionist methods in response to the law, making it more costly to enforce (Dworkin 110). An integrity-based objection is an objection to the law because compliance itself would be an immoral action (Dworkin 107). An example of integrity-based civil disobedience is that of an abolitionist American in the 1850s who refuses to return an escaped slave. In this case, complying with the Fugitive Slave Act and returning the escaped slave would be violation of that person's identity (Dworkin 108). According to Dworkin, the person "suffers a final loss if he obey[s]"; in democratic society, the ability to pursue one's identity and to act in

³ See Figure 2 in the Appendix.

accordance with their own beliefs (if they do not endanger the whole) is of high moral value (Dworkin 108). Therefore, it becomes difficult to object to the abolitionist's disobedience, because we recognize their reasons for disobeying as personally legitimate and intrinsically valuable.

A justice-based objection is a disagreement with the manner in which a law is enforced, often with respect to a minority group within a democracy (Dworkin 107). An example of justice-based disobedience is that of Americans in the 1950s South who actively ignore segregated spaces. The act of sitting down at a restaurant is not itself inherently illegal; however, the combination of Jim Crow Laws and being a Black American during them makes it so. The injustice, therefore, stems from the unfairness of the law (Dworkin 107). The democratic government, in having violated their inherent obligation to their citizens in creating said law, must accept non-persuasive civil disobedience as an appropriate response to their decisions (Dworkin 105).

Prudence-based objections are disagreements with laws at the policy level; they are

outliers in the framework because they do not permit non-persuasive disobedience. Dworkin's reasoning is that democracy and rule-by-majority must be given a base level of respect; therefore, responses to disagreements in policy can only be persuasive (Dworkin 110). If someone disagrees with a marginal tax rate, not actually paying can be justified—the act of paying taxes is not itself inherently wrong nor is not paying ever justified (although, Robert Nozick and others would disagree). Democracy expects them to bring any grievances to their representative and pay until the law changes. If anything, there is nothing wrong in letting them speak their mind to change others. That is because speech and debate conform to the expectations of a democracy.

However, Dworkin's framework does not prevent the disobeyer from the ramifications of their disobedience; it simply outlines when they can disobey in good conscience. There is an implicit separation between what is legal and what is moral; the Fugitive Slave Act was law but that did not mean it was

moral. As such, someone can be justified in their disobedience yet still receive any legal consequences arising from it (Dworkin 115).

The Double Integrity-Based Objection

As I outlined earlier, complying with deportations would violate the identity of the Jesuit university both as a Catholic institution and as a university serving students. Much like in the escaped slave scenario, a Catholic would violate something of their personal identity in returning a student to a more dangerous home. Likewise, the university would violate its adopted identity as the student's protector if it willingly cooperated in their endangerment. As such, the Jesuit university experiences a double integrity-based objection to deportation: regardless of which identity is prioritized—be it Catholic or university, the Jesuit university has a good-faith objection to complying with what it sees as a formal cooperation with evil. This double integrity-based objection does not exist for the Jesuit university in the contraceptive case, however. While a Catholic may have an integrity or justice-

based objection to complying with the HHS mandate, a university can only ever have a policy-based objection to it. There is nothing within the essence of a university that makes it incompatible with contraceptives *a priori*, nor is there a justicebased objection outside of appeals to natural law. The course of action the Jesuit university takes regarding the HHS mandate therefore depends on which identity is prioritized. There is no longer the dominant strategy when responding to evil that permitted the double integrity-based objection to occur. In terms of supreme emergency, a Jesuit university stands to lose its total identity in complying with deportations. Therefore, it is justified in its non-persuasive noncompliance with the ICE agents, but not so with the HHS mandate.

Objections to the Double Integrity-Based Objection

There two main objections to my argument: the intersectionality argument and the institutional civil disobedience argument. The intersectionality argument stipulates that the identity of a Jesuit institution cannot be separated into its distinct

parts, what constitutes its identity is the intersection between the Catholic faith and an institution of higher learning. As such, the Jesuit university, because it is the intersection between faith and tertiary education, must disobey in both cases. While I recognize the force of the argument, I do not believe that the solution offered is the correct, logical conclusion. The intersectional identity of a Jesuit university does not necessarily point to a prioritization of one action over the other. In the case of the HHS mandate, there is a fluidity as to which justification for disobedience is utilized depending on which identity is invoked. Some can argue that Catholicism pulls more strongly on the Jesuit identity, but that would unfairly diminish what it means to be a university. Without a metric to determine which identity takes hold, and without a concrete direction in terms of Dworkian justification, the intersectional objection could only ever end in an ambiguous solution. Swallowing the pill of ambiguity is possible, but I find it unattractive when

confronted by the double integrity-based objection. Moreover, the institutional civil disobedience objection claims that Dworkin’s framework advances does not apply to institutions. If true, then the double integrity-based objection falls flat as it is justifying a practice with no merit. I admit that this paper was written with the assumption that Dworkin’s framework applies to an institution. However, I argue that institutions can civilly disobey, and I offer law enforcement as a counter example. One could imagine a situation where a law is passed which requires police officers to beat every third person they see. Objections to this law can come in two ways: personal or institutional. In the terms of the person, one would hope that an officer, who has sworn to protect those under their purview, would not follow through with a law that is so blatantly immoral and arbitrary. This falls under the standard individual, integrity-based Dworkian objection. Continuing to the next objection, the institutional objection comes

from the police department itself, which refuses to partake in an act that would fundamentally violate its telos. As an institution sworn to protect its citizens, thoughtlessly beating them would detract from what they have set out to do. Therefore, they are justified in non-persuasively disobeying due to integrity-based objections. With this precedent established as to the validity of Dworkin’s framework with respect to institutions, I argue that the double integrity-based objection holds.

Conclusion

In this paper, I argued that a Jesuit university’s identity as a Catholic institution and a university justifies ignoring Trump’s deportations but not the HHS mandate. In the first section, I outlined why Catholics object to both cases, as complying with either would violate canonical dogma. This consistency did not hold for a university, however, and thus created the tension a Jesuit university faces. In the second section, I used Michael Walzer’s “supreme emergency” as a heuristic to understand the

increased urgency in the deportation case as opposed to the HHS case. Moreover, I argued that both a Jesuit institution’s identity as a Catholic institution and as a university enables it to disobey the ICE agents at the integrity-based level, permitting nonpersuasive responses. I called this justification the double integrity-based objection, as the Jesuit institution is doubly permitted to disobey non-persuasively regardless of which of its identities is prioritized. In the final section, I entertained the intersectionality and institutional objections. I argued that the first results in an ambiguity which can be avoided by loosening one’s commitments to the unified identity. I argued further that institutions are capable of disobedience and demonstrated by the example of a police department ignoring orders to assault its citizens arbitrarily. Overall, I see the double-integrity-based solution as a solution to the Jesuit dilemma that does not rest solely on personal, policy objections. ●

APPENDIX

Figure 1: Appropriate Responses According to Identity

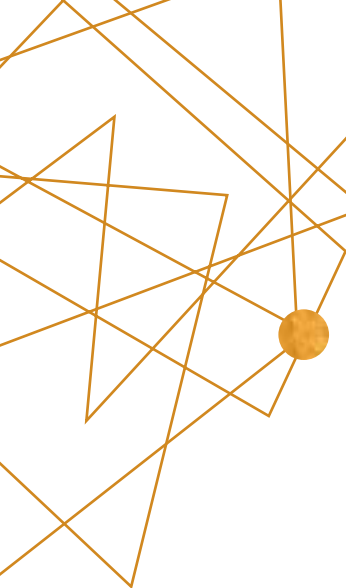
	DEPORTATION	CONTRACEPTIVES
Catholic	Disobey	Disobey
University	Disobey	Obey

Figure 2: Dworkin’s Framework for Civil Disobedience

VALUE	MEANS	ENDS
CONSCIENCE	Integrity-based	Non-persuasive
JUSTICE	Justice-based	Non-persuasive
PRUDENCE	Policy-based	Persuasive

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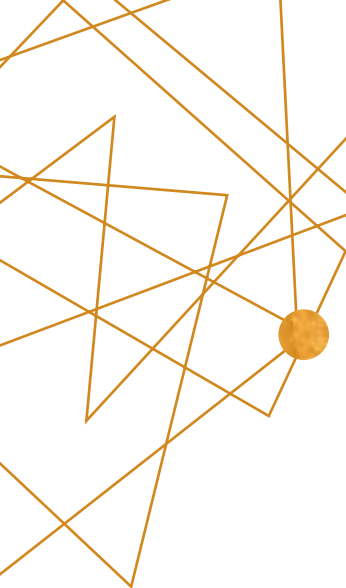
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THE BLISS BETWEEN BY
SUSANNE CARPENTER

Susanne Carpenter is a sophomore biology major and studio art minor planning to pursue a career in dentistry. Her interests include personal training, pressing flowers, drawing portraits, and visiting museums. Susanne's goals in life are to be fluent in Spanish, to travel to all seven continents, and to make a positive impact on the people around her.





DANIEL MCGRATH & STEPHEN BOARD

Daniel McGrath is a senior computer-engineering student and the former Vice President of LMU’s IEEE Student Branch. Outside of engineering and academia, Daniel is an avid outdoorsman and a member of LMU’s Sursum Corda service organization. He enjoys playing guitar, reading about philosophy and science, and trying new foods. A native of Silicon Valley, after graduation, Daniel hopes to take on a software engineering role at a technology company in the Bay Area.

Stephen Board is a senior electrical engineering student and the former Chair of LMU’s IEEE Student Branch. Stephen is a member of Tau Beta Pi and Alpha Sigma Nu. He is committed to lifelong learning and finds inspiration from Earth’s complex natural systems. Although Stephen is from Northern West Virginia, his preference for Yoga, meditation, and a plant-based diet began long before moving to Los Angeles. Immediately after graduation, Stephen plans to explore a career path in high speed data applications in Glendale, CA.

LIGHTS, CAMERA, IMAGING! PHYSARUM POLYCEPHALUM GROWTH MONITORING AND OPTICAL COHERENCE TOMOGRAPHY SYSTEM

Abstract—Biomedical imaging is a vital means of understanding living systems and health-related phenomena that is utilized by commercial, medical, and academic institutions across the greater scientific community. The process of acquiring biological imaging data was explored here through two methods. The first method is a scalable, automated time-lapse camera system that can be adapted for many applications. This system was lab-tested to periodically capture images of biological samples for the purpose of monitoring sample growth. The second method is an optical coherence tomography (OCT) system suitable for applications requiring up to μm resolution that challenges traditional ultrasonic cross sectional imaging of biological specimens. By comparing laser pulses reflected back from the sample medium with unobstructed reference pulses, properties of the sample medium such as height and density are determined.

Physarum polycephalum, an amoeba commonly referred to as slime mold, was selected as a sample medium for testing both systems. Slime mold is an appropriate choice as a sample medium due to its complex internal structure, cytoplasmic channels, and intricate growth patterns. The two systems serve not only as useful imaging tools, but also as a foundation for future engineering students at LMU. Moreover, these systems are malleable and will have room for improvement as new technologies become available.

Keywords—*imaging; slime mold; OCT; interferometry; optic*

I. Introduction

An interesting feature of slime mold is that, while creating networks between its food source by a chemical attraction known as chemotaxis, it builds a labyrinth revealing the apparent path of least resistance or maximum efficiency between itself and food sources [1], despite the fact that it lacks an actual brain. Amazing phenomena have been observed

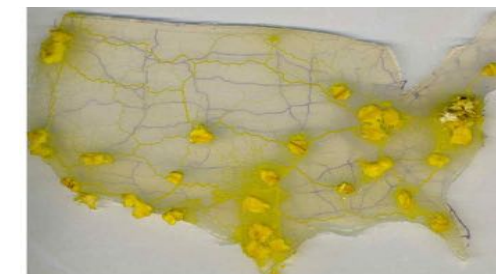


Figure 1: Example of Slime Mold Growth [4]

in which topographical maps were marked with oat flakes at the locations of major metropolitan areas, where after the slime mold created isomorphic networks to pre-existing roadways [2] and railways [3]. Essentially, Slime Mold has shown the ability to arrive at similar, if not more optimal, path-finding solutions as have human engineers.

The periodic photographic capture of the growth of slime mold is currently being practiced by hand at eight-hour intervals, excluding weekends when access to the incubator laboratories is blocked. This task of removing the Petri dish from an incubator is disruptive to the growth of the slime mold and can introduce contaminants to the test environment. This task intends

Biology Department Requirements (Customer Requirements):		
1) Take up to 2 photos per hour of Slime Mold in incubator environment		
2) Run continuous data collection for up to 7 days per Slime Mold sample		
3) Make procured data easily accessible for Biology Department		
Requirements Satisfied	Engineering Requirements	Justification
1, 2	System shall run continuously, autonomously	System cannot be constantly monitored due to limited laboratory availability
3	System shall be equipped with wired or wireless data link	System needs fail-proof data procurement options
1	System shall incorporate a custom lighting fixture to take flash photography	The incubator environment is very dark

Table 1: Customer to Engineering Requirement Justifications

to be automated *ad hoc* by nonintrusive means.

There are many products on the market that accomplish autonomous periodic photo capturing, however, the strict requirements of the incubation environment are not fully satisfied by such off-the-shelf products; namely, that slime mold is very sensitive to the environment, and needs to be in a dark and humid location in order to propagate and explore uninhibited. The available products on the market are also not scalable in a cost-effective sense to the many incubators required by LMU's Biology Department. Moreover, the option of a system that is designed in-house offers a rare opportunity for the Biology Department to harness the University's body of eager electrical engineering students. Prototyping and quick product iteration cycles will

result in a system that is much more robust and specifically adapted for the Biology Department's needs. Indeed, the interconnection of the Biology Department and the Electrical Engineering Department should be nourished for its latent potential in the field of Bioengineering.

Taking the observations of biological details to a finer level of detail of not only the Slime Mold, but also of any biological tissue sample, is made possible by way of Optical Coherence Tomography (OCT). The cost of such a system is largely mitigated due to laser equipment available at LMU including the two most important and most expensive system components: a femtosecond fiber laser (FFL) and terahertz spectrometer. By mathematically transforming the interference "fringes" that are plotted based on the time delay and power difference between a mirror-reflected reference pulse and a pulse reflected off of the sample medium, the exterior and interior structures as well as absorption properties of the

sample medium are revealed [5].

II. Objectives

A. Time Lapse Photography of Slime Mold Growth

First, a satisfactory implementation of a system that periodically photographs a growing sample, makes the photos accessible to members of the Biology Department, and informs the members of the successful operation of the system mid time-lapse shall be carried out. This system shall operate for up to 7 days taking at least 1 photo per hour. The customer-specified requirements are summarized in Table 1.

B. Optical Coherence Tomography

The OCT system shall be of minimal cost while maximizing the bandwidth of the FFL provided by the Electrical Engineering Department. The system shall satisfy at least 100µm of resolution and 1 cm range of z-axis movement between sample medium and laser output lens.

The design of the OCT system has been carried out with two key Biology Department requirements in mind. Firstly, components for the system, particularly

the lenses, have been chosen so as to produce as high resolution as possible for the imaging of various samples. Resolution is one of the key requirements for the system because it is directly related to the amount of information, data indicating the composition of the sample structure, which can be extracted from samples. Secondly, components that support an adjustable range of

distances between the sample medium and the output lens have been chosen. It is important for the system to support an adjustable range between laser output and sample medium so that the system can be calibrated to take measurements for samples of various heights.

III. Proposed Solutions

A. Time Lapse Photography of Slime Mold Growth

A camera system, the Slime Mold incubator camera system (SMICS), is currently in the prototyping stage. The elements of the system were chosen based on the decision table shown in Table 2.

Figure 2 shows a top-down functional decomposition. An 8-inch vertical height requirement was methodically determined using a Slime Mold "terrain plate", a 3D printed square surface with miniaturized terrain resembling that of the Los Angeles mountains or any other geographic area. The 8-inch height was optimal for the field of view when using the Raspberry Pi camera module, which was manually focused to capture the appropriate depth of field.

Next, the task of developing

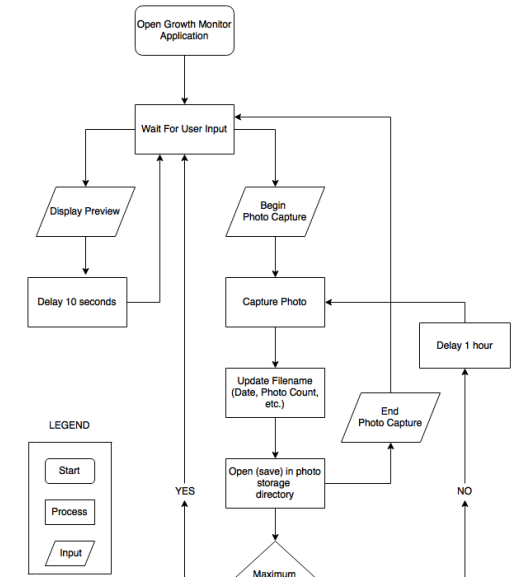


Figure 3: Primary SMICS GUI Algorithm

Project Parameter	Raspberry Pi 3B	Arduino Uno
Customer Needs	Thoroughly satisfies all requirements	Satisfies some requirements (lacks file system)
Critical Features	Built-in Wifi Camera Module Digital IO ports User Friendly	Wifi Module Module Digital IO Analog to Digital Converter
Risks	Overheating	More application specific (typically programmed to do one sequence only)
Shipment Time	Immediate	Two Weeks
Production Cost Standalone (Estimated from Amazon.com)	\$40 Raspberry Pi 3B \$25 Camera Total ~\$65	\$25 Arduino Uno \$5 Wifi Module \$25 Camera Total ~\$50
Notes and Recommendations	Delivers to Biology Department quickly. Requires attention to data storage, and transmission during product iterations.	May be cheaper, better acquisition of analog sensor data, well documented

Table 2: Project Alternative Trade-offs

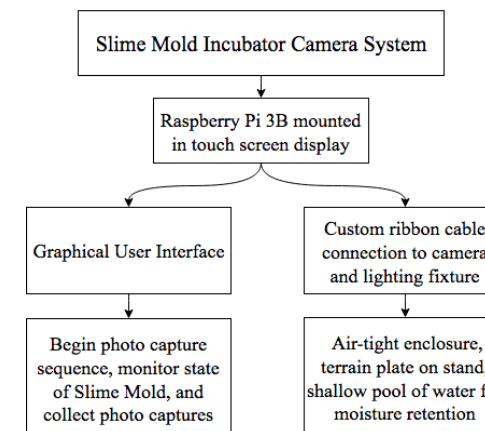


Figure 2: SMICS Functional Decomposition

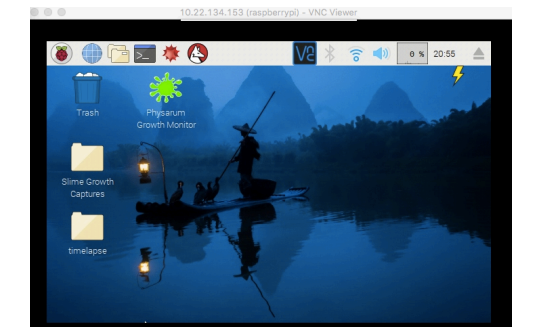


Figure 4: SMICS GUI Desktop Icon

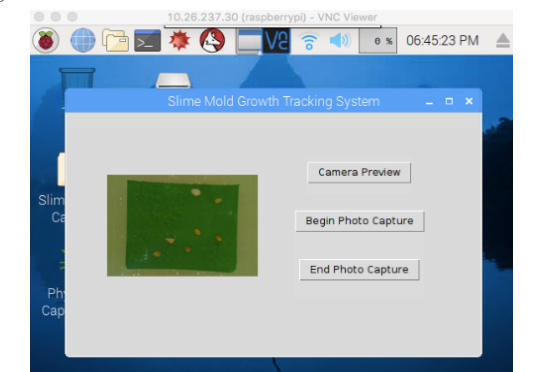


Figure 5: Graphical User Interface (GUI)

the Graphical User Interface (GUI) was undertaken. The primary GUI algorithm shown in Figure 3 was written to allow the user to interact with a Python script that controls the camera and data storage.

Next, a desktop icon for the GUI represented by a Slime Mold cartoon was placed on the Raspberry Pi desktop. Figure 4 is a screen capture taken during a RealVNC session. RealVNC is a service that allows a user to remotely access the Raspberry Pi over the Internet.

After double-clicking the icon, the GUI shown in Figure 5 appears. This GUI allows the

Wavelength	Output	Power	Bandwidth	Comments
780 nm	Free space	~0 to 400mW	50 nm	More penetration May damage sample
1550 nm	Fiber	4 mW	100 nm	Better resolution

Table 3: Laser Comparison Table

user to preview the sample and begin a photo capture session. The GUI is programmed by default to take a photo once per hour for 7 days, per the Biology Department's customer requirements. A preview of the most recent capture is displayed to the left of the user controls.

B. Optical Coherence Tomography (OCT) System

In order to accomplish the goal of developing a robust, lasting, and useful OCT system

the team set out to research what parts, equipment, and resources were available. Table 3 below shows the characteristics of the laser available to students at LMU.

The team intended to use the wider bandwidth of the 1550 nm laser output in order to optimize the system's resolution. After researching industry standard OCT setups, a layout of optical components suitable for LMU was perused, the iterations for which are shown in Figures 6 – 10.

First the team proposed to use collimators and a beam splitting cube as shown in Figure 6. A collimator is a device that has one or more lenses, a cylindrical housing, and a fiber-optic patch cord adapter. It is used to couple light between fiber and free space.

After further consideration, the challenge of precisely positioning many free space objects (vertical and horizontal collimator, cube, and mirror) convinced the team to pursue a more fiber-oriented setup, resulting in the system shown in Figure 7. Next, a modular setup for a collimator stand and base was developed as shown in

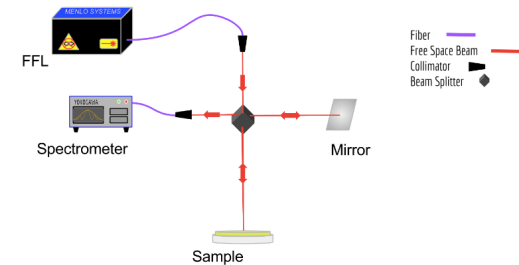


Figure 6: OCT System Iteration 1

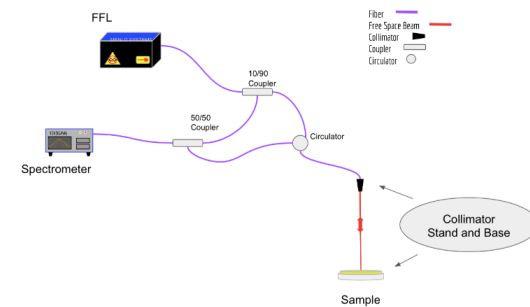


Figure 7: OCT System Iteration 2

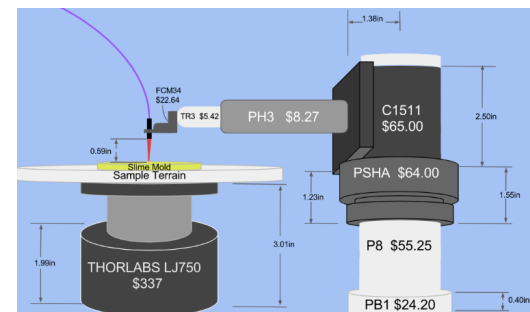


Figure 8: Collimator Stand and Base

Figure 8.

After thoroughly researching the cost of materials, the team decided to sacrifice bandwidth to enter the more common market of 780 nm components. Since the industry standard wavelength for optical imaging

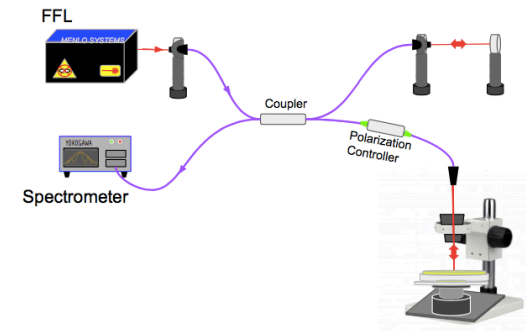


Figure 9: OCT System Iteration 3

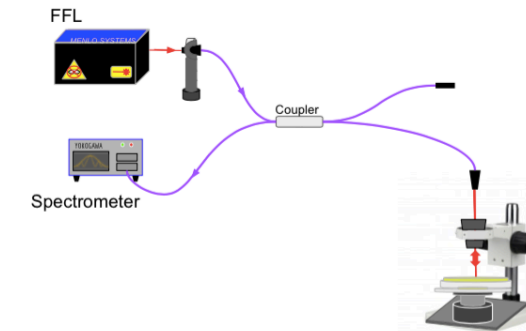


Figure 10: Most Recent OCT System Iteration

	Weights	1550 nm Beam Splitter Method	1550 nm Circulator Method	780 nm Single Coupler Method
Minimal Components	1	0	0	1
Low Cost	0.5	0	0	1
High Resolution	2	1	1	1
Bandwidth	1	1	1	0
Adjustable Power	0.5	0	0	1
Max Power	0.5	0	0	1
Availability of Components	1	0	0	1
TOTAL:		3	3	5.5

Table 4: OCT System Methodology Decision Matrix

systems is 780 nm, suppliers of optical imaging components provide many options for this wavelength, but only a limited number of imaging related components designed for 1550 nm with 100 nm bandwidth.

The 780 nm output of the FFL is free space as opposed to a direct fiber connection, thus requiring an additional mounted collimator to capture the light for the optomechanical components. Also, the polarization controller was discarded to reduce the cost of this preliminary implementation. In addition, the team learned that the mounted collimator and mirror in the upper-right corner of Figure 9 can be reduced to a single component called a Faraday mirror, which reflects back optical signals, while maintaining wave polarization, and requiring no free space alignment as the device is produced as an extension of the optical fiber. The simplified setup is shown in Figure 10.

The setup shown in Figure 10 is the team's latest iteration of the OCT system. For this solution, the mechanical components that mount the collimator holder, base, and stand are easily adaptable for any optical system. The central component, the coupler, has been carefully selected to have appropriate bandwidth at high power and single-mode optical fibers with FC/APC

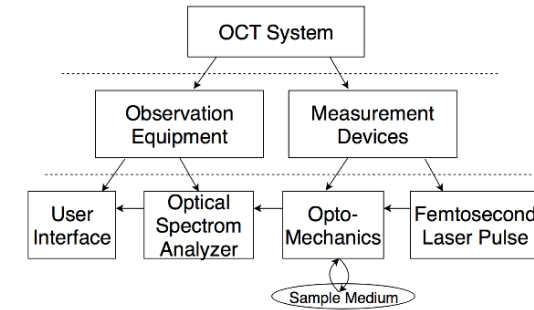


Figure 11: OCT System Top Down Functional Decomposition

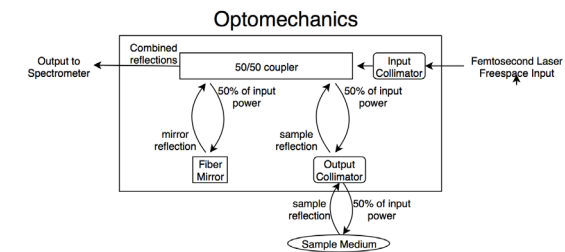


Figure 12: OCT System Optomechanical Decomposition

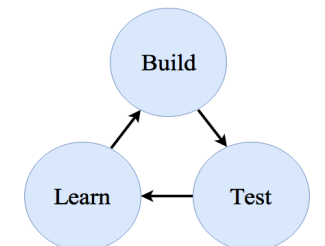


Figure 13: Lean Startup Methodology [6]

connectors.

The most recent iteration is very practical due to its low cost and simplicity. The decision matrix below shows the selection criteria that were taken into account in order to determine the most optimal OCT system. The score for each column is calculated as the sum of each point in the column times the corresponding weight.

Functional diagrams for

the OCT system are shown in Figures 11 and 12.

Despite the decrease in cost that was achieved by switching to 780 nm, the spectral width of the system also decreases from 100 nm to 50 nm. These changes alter the system's range and resolution, which are further examined in Appendix A. It is also notable that 780 nm light will be partially visible whereas 1550 nm light is not. This aspect of visibility is helpful for system alignment.

III. Development Plan

The development plan for SMICS as well as the OCT system is to follow the Lean Startup Method as illustrated in Figure 13.

IV. Engineering Ethics

a. The technological issues and implications for the systems are minimal but have been considered. Namely, the team recognizes SMICS' potential to be used for general surveillance purposes, which if used carelessly, could pose as a privacy concern.

b. It is also recognized that the OCT System has the ability to inflict harm with its laser output, which must be analyzed before testing is performed on live samples.

c. Only certified standard parts shall be used from suppliers with proven industry credibility so as to not sacrifice quality or degrade the standards of the university.

d. The team is seeking an original implementation as opposed to copying scholarly papers' solutions verbatim.

VI. General Considerations

A. ABET Program

The development of the two systems shall be carried out such that the methods used uphold and strengthen the ABET accreditation of the school by fulfilling all ABET student outcomes [7]:

1. The ability to apply knowledge of mathematics, science, and engineering.
 - a. As shown in Appendix A, keen knowledge of mathematics and engineering are used to analyze and develop the OCT system.
2. The ability to design and conduct experiments, as well as to analyze and interpret data.
 - a. SMICS will be iterated upon many times over with user feedback, allowing experimentation with system design as well as analysis of

data acquisitions.
3. The ability to design systems, components, or processes to meet desired needs within constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability, and sustainability.

- a. The designed systems meet needs of Biology Department personnel while remaining within the economic constraints of the department. Biological samples shall be treated in an ethical way, i.e. so as to preserve them from any harm. The health and safety of the SMICS and OCT system users shall be taken into close consideration. The OCT system shall be operated such that hazardous light does not cause retinal damage to the testers or any individuals present during the time of operation.
4. The ability to function on multi-disciplinary teams.
 - a. The team has learned to work both collaboratively and independently with the Electrical Engineering and Biology Department faculty, practicing leadership

and teamwork in an interdisciplinary manner.
5. The ability to identify, formulate, and solve engineering problems.

- a. The process of acquiring photo captures from SMICS and topographical data from the OCT System will require the validation of test theories and the solving of product iteration problems that go beyond electrical engineering concepts, specifically the calibration of the OCT system, which is primarily a mechanical engineering task.
6. An understanding of professional and ethical responsibility.
 - a. Please see section V
7. The ability to communicate effectively.
 - a. Reports, emails, and diagrams shall be shared between members of interdisciplinary teams and a high level of transparency shall be maintained.
8. The broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context.
 - a. The greater LMU

undergraduate program fosters the education of the whole person as one of its primary tenants. Non-engineering curriculum covers topics such as sociology, ethics, and global awareness.
9. A recognition of the need for, and an ability to engage in life-long learning.

- a. The systems are inherently life-long learning systems as their inputs are able to be applied to different circumstances for many bioengineering applications that may become present in life's long journey. The lessons learned in developing the two systems may lead to post graduate studies.

10. Knowledge of contemporary issues.

- a. The advancement of medicine is one of the foremost priorities of the scientific community, as it addresses the issue of the betterment of human health. The only way to provide solutions for health related issues is to develop better means for analyzing biological structures and systems.

11. An ability to use the techniques, skills, and modern engineering tools necessary for engineering practice.
 - a. The overall process of design, testing, and documentation is an invaluable tool for engineering students.
 - b. The equipment used throughout this proposed project is state of the art and provides the system developers with the means to learn what is on the cutting edge of optical technologies.
- #### B. LMU Values
- The development of the two systems shall also be carried out with LMU's Core Values in mind. Loyola Marymount University holds the following Core Values [8]:
1. Academic Excellence
 - a. The system developers abide by a high standard of scholastic excellence.
 2. Faith and Reason
 - a. The team is highly driven by the concept of logos, the quality of being well grounded in logic, as well as the Jesuit concept of magis, meaning "for the greater glory of God" as an inspirational theme.
 3. Commitment to Students

a. These systems carry profound opportunities to nurture the intellect of all LMU students and alumni.

4. Community

a. The collaborative nature of the implementation of both systems inspires and encourages a community of engineers interested in biomedical imaging within the campus.

5. Service to Others

a. The ultimate goal of the project is service to an amazing university including faculty, students, and staff for generations to come. Additionally, the project seeks to open the door to possible biomedical imaging applications that can be used to treat and diagnose diseases that are detectable with OCT.

C. Diversity

See Abet Program 8.a

D. Social Communities

See LMU Values 4.a

E. Multi Disciplinary

See Abet Program 4.a

F. IEEE Values

1. The system developers are familiar with and loyal to the ethical standards set forth by IEEE (Institute for Electrical and Electronics Engineers). The

active upholding of the IEEE code of ethics includes, but is not limited to, the denial of all forms of bribery in interactions with suppliers or potential customers, the constant awareness of the health, safety, and privacy of individuals who are in close proximity to the OCT system and SMICS, the consideration for intellectual property and possible conflicts of interest, the documentation of solutions for the purpose of public education and furthered public understanding of current technologies, and the commitment to equality and fair treatment of all parties involved with the development and use of the system regardless of race, gender, religion, age, or sexual orientation.

VII. End of Spring Demonstration

By mid-April, 2018, SMICS will have an adequate number of data acquisition cycles to present impressive and detailed information on the Slime Mold's growth patterns, and possibly reveal new information as to its preferred environments, where and when things go wrong or well during its growth, as well as geotechnical data for 'path of

least resistance' scenarios over various terrain plates. A demonstration of SMICS may be observable via a projected RealVNC connection during the final presentations or poster (convention style) presentations. Real time showcasing of the ease of user-interface will also be demonstrable to any and all audience members by this time.

Also by mid-April, the OCT system will have generated results that are presentable for a poster presentation. The data acquisition process of the OCT system will be available for display in the optics laboratory. Interference fringes captured for known control samples will confirm and reveal the range and resolution of the system.

VIII. CONCLUSION

In summation, the underlying methodology needed to implement the systems described herein have been thoroughly thought out, researched, and implemented to a preliminary extent. Thus, the remainder of the academic year will be devoted to two purposes. One is SMICS, which will undergo product iterations based on feedback regarding the user experience, image quality, system adaptability,

and the system's impact on the experiment. The second is the implementation of the OCT system in LMU's optics laboratory, first to the extent that a 1-dimensional data stream is obtained through a custom interface, and then to the exploration of how 2 and 3 dimensional data can be obtained within a limited budget (i.e. measuring heights of a sample over a 2D area to produce a 3D model). The development of the OCT system is the first step in providing the LMU Biology Department with a means of generating high accuracy cross sectional imaging data on demand at a relatively low cost,

enhancing the department's capacity to conduct meaningful experiments, placing it at an even higher standing among scientific institutions across the nation and world.

It is the sincere hope of the authors that future generations of engineering students at LMU will continue the work that has been initiated with the design and preliminary implementation of these systems. A photo capture system such as the one that has been developed, with self-regulating functionality for custom capture sequences based on pre-programmed or user-specified settings, is useful for many applications such as

security, surveillance, or any scenario in which periodic photographic data acquisition is convenient, preferred or required. Additionally, the OCT system has many applications in the field of imaging including but not limited to the analysis of micro-organisms, determination and treatment of squamous cell carcinomas, and other material characterizations such as layering and surface roughness. Future engineering students who desire to advance or utilize either of these technologies will be able to do so with a strong foundation of prior development. ●

THIS IS AN EXCERPT OF THE ORIGINAL WORK. FULL WORK IS AVAILABLE ONLINE AT WWW.ATTICSAULTLMU.COM

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URBAN NIGHT BY
LORENZO SISTI

Lorenzo is a Junior photo student from Rome, Italy. He loves to take photos, especially of people and street scenes. He is interested in documentary photography, and made his first book last year, with more to come. He thinks that photographing people is a way to understand the society and different cultures, by closely observing their behavior and getting to know them. Taking photographs of people has helped Sisti integrate and understand more about where he lives.





MATTHEW WILLIAMS

A young gay scholar, Matthew Williams is an English major and journalism minor specializing in the fiction of gay and bisexual men. Born in Seattle, he has written several pieces for *The Los Angeles Loyolan* and is also a manager at LMU's Intercultural Suite, where he works closely with LMU's LGBT, international, and racial/ethnic student populations. In his free time, Matthew also enjoys playing violin, swimming, and doing yoga. To read Matthew's work, please visit his website: matthew-williams.net.

COLD HEART: AN EXPLORATION OF AROMANTICISM IN *LUCY*

Starting at a young age, societal pressures lead people to believe they will inevitably find themselves in a monogamous romantic relationship that will be a central component to their lives. In fact, an article from *Psychology Today* written by psychotherapist Barton Goldsmith states that “romance needs to be a constant in your universe” (Goldsmith). Yet, this idea both ignores the realities of individuals who identify as aromantic¹ and contributes to creating an amatonormative society.² One such individual who fits this mold of an aromantic individual living in an amatonormative society is the protagonist of Jamaica Kincaid's novel *Lucy*. Though Lucy never explicitly makes a declaration of her romantic orientation, reading her character as aromantic is logical when compared to the experience of other aromantic individuals and provides insight into how she operates as such an individual within society.

While little academic study has been done in regard to aromanticism—especially in regard to Kincaid's text—one can look to examples within popular media to establish common characteristics of aromantics and to understand the ways in which they are harmed by amatonormativity. Through this reading, one is able to see how the amatonormative society in which Lucy lives is incredibly harmful to her as an aromantic individual who possesses a discordant, sex-positive orientation.

In establishing Lucy as aromantic, one must consider the moments where she rejects the societal pressures to embrace romantic love and relationships. One such scene occurs when Lucy interacts with a maid who is not fond of her. The maid decides she wishes to dance with Lucy because she believes Lucy cannot do so, and she chooses to play a song which features “three

girls singing in harmony and in a very artificial way about love and so on” (Kincaid 11). Upon hearing the song, Lucy expresses that she feels “the melodies of [the maid's] song were so shallow, and the words, to [her], were meaningless” (Kincaid 12). Lucy recognizes how “insincere and artificial” (Kincaid 11) the romantic love sung about by the three girls is, and she refuses to accept such a normative reality which conflicts with her own sense of identity. She rejects the idea of romantic love, especially the inauthentic variety espoused in the song, because it does not have meaning for her.

Furthermore, in response to the maid's song, Lucy decides to sing “a calypso about a girl who ran away to Port-of-Spain, Trinidad, and had a good time, with no regrets” (Kincaid 12). In addition to the content of this song choice further supporting Lucy's desire to be unencumbered by romantic bonds, her choice of a calypso

¹ One who does not desire or rarely desires romantic relationships

² A society which operates under the assumption that an exclusive, central, amorous, and monogamous relationship is the universally shared and expected goal of all humans

is particularly illuminating when placed in juxtaposition to openly aromantic Moses Sumney's song "Quarrel" from his album *Aromanticism*. Though both songs deal with a rejection of romantic love—Sumney somberly singing "Don't call it a lover's quarrel / We cannot be lovers / Cause I am the other" (Sumney) in a self-acknowledgement of his own aromantic identity—their styles are quite different. While Lucy's calypso is a bright musical form associated with the celebration of Carnival and general festivity, Sumney's piece is more reflective and slowly accelerates towards a final soaring piano solo. Despite these differences, both pieces target romantic love through a shared voice of satire. Sumney ironically sings about his aromanticism in a parodied romantic musical format, while Lucy chooses a calypsonian music genre commonly associated with a topical and witty form of satire in her critique of romantic love. Thus, Lucy's aromanticism is highlighted through her shared experience with the aromantic musician Sumney,

creating a dialogue between the two texts concerning the defining characteristics of aromanticism. However, musical expression is not the only means through which Lucy demonstrates her aromanticism. When Lucy is kissing Hugh, a boy introduced to her by her friend and employer Mariah, Lucy again expresses her aromantic feelings when she claims, "I enjoyed myself beyond anything I had known so far, it must have been because such a long time had passed since I had been touched in that way by anyone; it must have been because I was so far from home. I was not in love" (Kincaid 67). Though Lucy acknowledges that the physical experience is incredibly pleasurable and intense, she refuses to succumb to the idea her feelings must be a result of romantic love or that they should be defined as such. She recognizes the extraneous factors of longing for home and for physical intimacy rather than an internal sense of romantic longing or emotional attachment as the main contributors to the

pleasurableness of the situation. Even when Mariah attempts to attribute Lucy's good mood to being involved with Hugh, Lucy acknowledges that "what made sense to [Mariah] was that if you liked being with someone in that particular way, then you must be in love with him [but then Lucy reaffirms that she] was not in love with Hugh [and that] being in love would complicate [her] life" (Kincaid 70-71). Unlike Mariah, Lucy firmly separates physical and sexual intimacy from romantic and emotional attachment, citing the former as being the cause of her happiness rather than the latter. Furthermore, Lucy explains that "to latch on to this boy...was certainly not for [her]" (Kincaid 71), recognizing she does not feel the need to become dependent on or romantically infatuated with another simply because she desires them in a physical and sexual way.

In addition to expressing aromantic feelings in her interactions with Hugh, Lucy also demonstrates her aromantic orientation in the moments she shares with Paul, another man with whom she

has sex. At one point when Paul and Lucy meet each other for the first time, Lucy recalls how "across the room Paul's eyes, a sparkling blue light, were trained on [her, and then she observes that] this is usually the moment when people say they fall in love, but I did not fall in love. Being in such a state was not something I longed for" (Kincaid 99-100). Not only does Lucy reject the notion of falling in love in such a stereotypical fashion—two people catching each other's eyes from across the room for the first time—she also soundly declares she does not desire to become entrapped in such a romantic and normative construction. Later, when Paul brings Lucy a bouquet of small yellow roses and a half-naked photograph of her, Lucy remarks that this is "the moment he got the idea he possessed me in a certain way, and [this was] the moment I grew tired of him" (Kincaid 155). The moment Paul begins to believe Lucy belongs to him romantically, Lucy immediately moves to push him out of her life because she does not long for such a reality. She does not desire to be bound to any

one person, and she does not value romantic gestures or relationships because they are antithetical to her aromantic orientation. Even when she suspects Paul is having sex with her friend Peggy, she merely states, "I only hope they would not get angry and disrupt my life when they realized I did not care" (Kincaid 163). Because Lucy does not feel romantic love for Paul and is not concerned with romantic relationships, the prospect of him coupling with another woman is not particularly disturbing to her, even when that woman is a close friend. While Paul and Peggy may expect more of a reaction from Lucy, she would be unperturbed because her own sexual intimacy with Paul does not in any way mean she romantically loves him. She is unconcerned with adhering to the societal expectations of romantic relationships that suggest she should react in a scandalized fashion upon hearing of Paul's affair.

Having established Lucy as aromantic through her various relationships, one can then explore how this reading reveals the ways

amatonormativity affects her. Though many individual instances of an amatonormative society being hostile to Lucy occur throughout the novel, Kincaid presents an interesting overarching symbol of this hostility in titling one of her chapters "Cold Heart." In this chapter, Lucy writes a letter to her mother which Lucy describes as cold and matching her own heart (Kincaid 127). While a heart is often used as a symbol of romantic love, describing it as cold subverts the meaning of the symbol, suggesting a lack of amicability and feeling in an individual to whom the description is applied. Though a few definitions of the word cold exist, the following is one provided by the *Oxford English Dictionary*: "lacking affection or warmth of feeling; unemotional" ("cold, n2"). With this definition in mind, cold—as well as frigid—have often been used as derogatory terms to describe aromantic or asexual identities. In the case of Lucy, her heart is described as being cold because she does not express interest in romantic love; however, her inability to feel romantic love

is also extrapolated to mean she is unable to feel any form of love or emotional attachment. Furthermore, even when Lucy expresses non-romantic love, amatonormativity serves to devalue any relationship Lucy has out of a romantic context, as Stephanie Farnsworth points out in her article “The Face of Evil: The Terrible Way We Show Aromantic and Asexual Identities,” “Living with a lack of romantic attraction is often believed to be impossible” (Farnsworth). As a result, Lucy is left thinking, “I am alone in this world, and I shall always be this way—all alone in the world” (Kincaid 93). However, it is important to note the damage amatonormativity does to Lucy is complex and manifests in several ways throughout the novel that go beyond the association of her with a cold heart.

In particular, one of the most powerful examples of the damage amatonormativity inflicts upon Lucy occurs in the last passage of the novel. This scene occurs after Mariah gifts Lucy a red notebook purchased in Italy; it reads as follows:

At the top of the page I wrote my full name: Lucy Josephine Potter.

At the sight of it, many thoughts rushed through me, but I could write down only this: ‘I wish I could love someone so much that I would die from it.’ And then as I looked at this sentence a great wave of shame came over me and I wept and wept so much that the tears fell on the page and caused all the words to become one great big blur. (Kincaid 163-164)

Upon first glance at the passage, one may argue that it serves as evidence to contradict the idea of Lucy being aromantic. However, a careful examination reveals quite the contrary. When Lucy expresses a desire to “love someone so much that [she] would die from it” (Kincaid 164), she herself is subliminally acknowledging her aromantic orientation and inability to feel romantic love; that is, she longs for the ability to romantically love someone because she cannot do so in the first place. Though a trend certainly exists of eventually writing aromantic characters to conform to society’s expectations around sex and romance (Farnsworth), Kincaid does not do that with Lucy here. Instead, this scene reveals how amatonormativity is harmful to Lucy as an aromantic character rather than suggesting her pain arises from any personal

flaw. Lucy feels “a great wave of shame” (Kincaid 164) because she is unable to adhere to polarizing societal norms concerning romantic love.

Furthermore, the final passage of the novel reveals how Lucy is alienated from her own person because of the shame caused by amatonormativity, which is an experience shared by openly aromantic poet Niko Bouvier. Whereas Lucy’s disassociation from herself is revealed subtly through the way in which she writes and looks at her own name as if it was a foreign object (Kincaid 163-164), Bouvier is more direct in their approach, writing in their poem “An Aromantic’s Love Song to the Populace,” “For now you stand here, on the opposite shore of a / poem, / All the words spilled out of you. / You are still me and you still can’t write about this / In first person” (Bouvier 155-159). Through writing, both express an incredible amount of pain—Lucy in her disembodied experience of her own name, Bouvier in their inability to talk about their aromantic orientation in the first person—and they are unable to reconcile

the persons they are with the persons society allows and compels them to be.

While amatonormativity is harmful to Lucy on a personal level, it also serves to devalue the important relationships in her life that do not fall within a romantic structure. As the novel progresses, one is able to see that Lucy values her platonic friendships far more than her romantic relationships, with Lucy noting that “friendship is a simple thing, and yet complicated; friendship is on the surface, something natural, something taken for granted, and yet underneath one could find worlds” (Kincaid 159). One of the important friendships Lucy has in her life is with Mariah. Though Lucy is often quite critical of Mariah and others around her, she points out she “had grown to love Mariah so much” (Kincaid 73) that she could not point out Mariah’s hypocrisy in writing a book about environmental conservation when Mariah herself has played role in the exploitation of nature.

Yet, Mariah is never quite able to return nor comprehend this platonic love, as her

understanding of love is “that is if you liked being with someone in that particular way, [that is, having sex with them,] then you must be in love” (Kincaid 71). When Lucy eventually finishes her contracted employment period with Mariah, Mariah attempts to revert their relationship to the hierarchy of servant and master because she feels her friendship with Lucy was not successful. Lucy is not happy with this because she does not believe in allowing one to have control over her and feels Mariah does not truly understand the nature of the friendship the two shared (Kincaid 143-144). Here, Lucy’s experience parallels the one *Everyday Feminist* writer Michón Neal³ talks about in hir article “The Difference Between ‘Asexual’ and ‘Aromantic’ Matters – Here’s Why.” Both Neal and Lucy are treated as if they are cold and unloving, but what those around them fail to recognize is that the two do not “define relationships by hierarchy or escalation but by the ways [they grow] alongside [others], the ways [their] minds and emotions entwined yet never merged” (Neal). Lucy’s

platonic love for Mariah is undervalued because of societal expectations determining how love is supposed to be expressed. These expectations also prevent Mariah from being able to understand or maintain a platonic friendship with Lucy despite the love they share for one another.

Another important relationship for Lucy devalued by amatonormativity is the one she shares with her friend and roommate Peggy. When Lucy explains how Peggy found an apartment for them to live in together, she states:

We were then still best friends. We had nothing in common except that we felt at ease in each other’s company. From the moment we met we had recognized in each other the same restlessness, the same dissatisfaction with our surroundings, the same skin-doesn’t-fit-ness. That was as far as it went. (Kincaid 145)

Lucy’s platonic love for Peggy is as complex and even more so than the romantic love individuals can feel for another. Their love for each other is one which results from a recognition of a similar spirit in the other, and it does not rely on

³ Neal is genderqueer and uses the pronouns ze/hir/hirs.

shared interests or compatible personalities. However, this love is still threatened by amatonormativity, as, in her attempt to prepare Lucy for future careers, Peggy teaches Lucy how to “show the proper amount of respect, submission, eagerness to please, even though in [Lucy’s] heart [she] would not mean any of those things” (Kincaid 157). Even though Peggy tells Lucy she can demonstrate her true feelings after she secures a job, she is instructing Lucy to initially suppress these feelings and perform rituals of courtship which reflect a hierarchical system that “still value[s] romance over friendship and still buy[s] into harmful amatonormative ideals” (Neal). Lucy can never have the friendship with Peggy she desires because her love for her will always be subordinated to any romantic relationship; she inevitably will end up alone because she lives in a tiered system which places platonic friendships below romantic relationships.

Though amatonormativity is harmful to Lucy’s expressions of platonic love, societal vilification of sexual

activity outside of romantic relationships also disservices her as a discordantly sex-positive aromantic individual. While Lucy displays little interest in romantic love, she embraces her sexuality and the physical pleasure it brings. In her first interaction with Paul, Lucy expresses that “in any case, as I looked at this man whose eyes reminded me of my winning marble, the question of being in love was not one I wanted to settle then; what I wanted was to be alone in a room with him and naked” (Kincaid 100). Here, Kincaid uses Lucy’s aromanticism to celebrate rather than shame sexuality. Yet, when Lucy writes a letter to her mother after her father dies, Lucy explains, “I reminded her that my whole upbringing had been devoted to preventing me from becoming a slut; I then gave a brief description of my personal life, offering each detail as evidence that my upbringing had been a failure and that, in fact, life as a slut was quite enjoyable” (Kincaid 127-128). While Lucy reclaims the term slut as a means of empowerment and embraces her active sex life, her use of the word in the

context of failure suggests she still experiences a degree of shame in thinking about her promiscuity.

In addition, Lucy’s feeling of self-disgust seems to be exacerbated by her discordant sexual orientation and romantic orientation, as Emily Lund et al. point out in their article “Examining Concordant and Discordant Sexual and Romantic Attraction in American Adults: Implications for Counselors” that “conflicting sexual and romantic feelings may create confusion about one’s sexual orientation or sexual identity” (Lund et al.). Furthermore, Neal also points out that discordant aromantic individuals face further harm “born of sex-shaming, or the assumption that one is ‘easy’” (Neal). Thus, Lucy’s experience represents a common one faced by aromantic individuals who are not also asexual, resulting in a sense of shame interjected into the celebrated sexuality with which Lucy is endowed.

Though an aromantic reading of *Lucy* is worth pursuing because it has not been attempted before in an academic context,

such a reading is far more important for what it reveals about the damaging effects of amatonormativity on aromantics undergoing challenges such as the ones faced by Lucy. From shame resulting from the damnation of her overt sexuality to the devaluation of her non-romantic expressions of love, Lucy is harmed to an incredible degree by amatonormativity. Yet, perhaps the most disturbing reality revealed through an aromantic reading of *Lucy* is the one presented by Farnsworth in the following passage:

Aromantic identities have been slandered, erased and deliberately ridiculed throughout the centuries. No more clearly is this demonstrated than when it comes to depictions of these identities in literature and the

media. Any reference to them is sparse within the history of storytelling, but when they are mentioned they are so often coupled with the idea of being evil or dangerously subversive in some way. (Farnsworth)

Though *Lucy* is limited to the scope of its own text, it represents a larger societal erasure and disenfranchisement of aromantic identities within literature by an amatonormified audience. While Kincaid writes at a time before the major codification of terms associated with sexual and romantic identities, she presents a strong protagonist who, if not nominally aromantic, embodies the aromantic experience. However, while a consensus appears to arise concerning Lucy’s inability to experience romantic love, the majority of readers consider her feelings of

isolation and loneliness to be a result of personal flaws within her rather than a product of harmful amatonormative societal expectations. Not only is it impossible to consider she could possess an aromantic identity, but such an identity is cast as innately flawed, a characteristic from which to flee rather than embrace. This discourse disservices and erases Kincaid’s overwhelmingly positive portrayal of an aromantic individual who suffers from societal norms rather than personal characteristics. Even if Kincaid had no intention of creating a strong aromantic protagonist, *Lucy* serves as valuable text in an emerging aromantic literature for understanding the aromantic experience of living within an amatonormative society. ●

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PAIGE
PREVOST

ICE-SKATING WITH BROCKTON

The rink wasn't even real ice
It was plastic with cold sprayed on it,
and it was hard to glide on.

Brockton and I
tried to skate together,
but there wasn't a flow between us
and he had to let go of my hand
in order to move forward

I stuttered on my skates,
an exercise in remembering
how much easier it had been
as a girl scout, moving on the ice in Galveston,
and not even falling once,
imagining myself in the Olympics,
being congratulated by Kristi Yamaguchi
on my performance

Back then, when I took off my skates,
I had blisters on the sides of my feet
I didn't know I needed thick socks

This time,
I had no blisters when all the
unlacing was done

Brockton skated over to my bench
and leaned on the glass,
"Done already?"

Looking up,
my attention moved past him
to another scene

A couple,
both of them
down on their knees,
hands on each other's shoulders,
as if their balance required it,
lit by all of the white lights
decorating the trees

And another scene of shoulders:

Waiting in the car, fidgeting
with my seatbelt,
anticipating the moment that
Brockton would look at me
through the windshield with
a soft smile and I would then know
that his mother had agreed to meet me,
to let me walk into her house

Instead, his mother hid behind his father,
her hands on his shoulders
and told them both that today was not
a good day

I mean, she said it in Cantonese,
but ya know, I got the gist

No use thinking about it,
I returned my mind to skating

"Yeah, I'm done."

I glanced back at the
newly engaged couple
and knew just how right at home
they would look in a Cheerios commercial,
pouring their milk around a kitchen table. ●



SHATTERFACE BY

● michael
mahammadie-sabet

I am Michael, and within my artistry I
devote myself to bringing to life the different
colors, visions and emotions that are born in
my head. My work is highly inspired by my
surroundings and personal experiences, and I
create with oil and acrylic paint.

