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Notes from the Editor

I am proud to present the spring 2015 issue of The Hilltop Review, containing scholarly articles that address the theme of “Changes in Culture and Technology,” creative work, art work, and, once again, the winners of the Graduate Humanities Conference.

Finding a theme for The Hilltop Review can be a challenge; any theme must be general enough that students from any field could contribute to it, but not so general as to not mean anything! When a member of my Editorial Board, Cameron J. Manche, suggested “Changes in Culture and Technology,” I knew we had found our theme for the spring 2015 issue. This theme describes the work that many of our graduate students do: investigating, analyzing, or even causing significant changes in a people’s culture, an industrial process, modes of thinking, or a scientific theory, just to name a few. In this issue topics range from the effects of social media on hiring and others’ perception of us to a late medieval abbot’s conversion efforts and from potable water production in a city in Iraq to an anthropological study of the interaction of the behavioral adaptation process and the creation of art in the ancestors of the Inuit of the Canadian Central Arctic. And, of course, much more.

I am also glad to announce that we are renewing the tradition of publishing the work of the winners of the Graduate Humanities Conference, co-sponsored by the Center for the Humanities and the Graduate Student Association, in this issue. The mission of the Center for the Humanities is to “recognize and support the humanities at Western Michigan University,” and one way in which they do that is by hosting an annual conference to showcase the work of humanities graduate students on campus; as a project of the Graduate Student Association, The Hilltop Review also showcases this work by publishing the winner and runner-up of the conference each year. This issue features the work of the 2013 and 2014 winners and runners-up: Suzanne Ehst, Eric Mendes, Kyle Byron, and Eric Denby. Congratulations to these students!

Congratulations also to the winners of our own Hilltop Review awards! Brett A. Stoll will receive $500 for First Place Paper with “The Effects of Humorous Facebook Posts on Messenger Credibility and Social Attractiveness”; Jennifer Marson will receive $300 for Second Place Paper with “The History of Punishment: What Works for State Crime?”; and Michael Sanders and MaryKate K. Bodnar will split the $150 prize for Third Place Paper with “Late Medieval Mediterranean Apocalypticism: Joachimist Ideas in Ramon Llull’s Crusade Treatises” and “Reproductive Genetics: Desired Genes, Gendered Ethics, and Eugenic Echoes” respectively. Justine McNulty will receive $250 for Best Creative Work for “Narrow River, and, last but not least, Robert Evory will receive $250 for Best Artwork for “Venice at Night.” His photograph is also featured on this issue’s cover. (All reviews and judging are double-blind; I do not take part in the judging process.)

A huge thank-you to all the graduate students who submitted their work to The Hilltop Review, and to the graduate students and faculty members who served as peer and faculty reviewers for each piece submitted. The double-blind reviewing process is a vital step in the publication process, and I greatly appreciate the effort and time of each of our reviewers. If you are interested in reviewing for The Hilltop, please contact me! The review process usually takes only 1-3 hours and it’s a great line on your CV.

What’s next? The Hilltop Review has always published fall and spring semester issues; there is a possibility that we could also start publishing a summer issue if there is enough interest and if we received enough submissions. If you are interested in a summer issue, keep your eyes open for a possible call for papers or for an email attempting to gauge interest. My preliminary thoughts are that The Hilltop could establish the tradition of a summer issue that deals with issues of teaching, which is, of course, an important issue for many of us as graduate students; many of us use the summer break to rework classes or plan curriculum for the fall. This is an appropriate time, then, to reflect on our experiences of teaching and our ideas for improving as teachers, and to feature those thoughts in The Hilltop Review. Again,
this would depend on interest and submission rates; if a summer issue does not seem possible this year, then definitely watch for a Call for Papers for the fall issue. The deadline for submissions for fall in any case will be September 30, 2015.

Please enjoy this issue of *The Hilltop Review*! I look forward to continuing to work with you all as graduate students and as authors for the next year.

Rebecca Staple
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Social networking sites (SNS) continue to rise in popularity, solidifying their ongoing presence and influence for the foreseeable future. Sites such as Twitter, YouTube, and Facebook provide outlets for user-created content with global connection and implications. Facebook is currently the number one ranked SNS in terms of active monthly users (Smith, 2013). According to Smith (2013), Facebook has over 1.15 billion active monthly users, who access the site at least once a month to manage personal profile content or view the profiles of others. Studies have shown that the primary motivations for using Facebook, as reported by its users, were for social surveillance and investigation, perpetual contact with others, and creating shared content (Joinson, 2008). As a primary motivation for use, reported social surveillance demonstrates user awareness of Facebook’s pivotal role in establishing and maintaining individual and group impressions. Users understand that they are creating shared content, and just as they use Facebook to monitor friends, so too do they realize their friends are using Facebook to monitor them.

Impressions can be managed a number of ways through Facebook, including photo sharing, writing public wall posts, or merely by assigning “likes” to certain artifacts. Facebook walls are the public message boards that each user has within his/her profile where the user and his/her friends may freely post messages for all those connected to the network to see. Facebook is not the only site to allow such online public sharing, and as a result of these abundant platforms, it is becoming increasingly difficult for individuals to strategically manage impressions online (Rui & Stefanone, 2013).

Interestingly, of the millions of Facebook messages that are posted daily, 20% enact some form of humor (Carr, Schrock, & Dauterman, 2012). This is a conscious choice of individuals to incorporate humor within one in five messages online as a part of their strategic impression management. This raises the question of why this choice is made. What perceived outcome exists when people choose a message that caters to the funny bones of the audience? What perception do users have of others when they choose to enact humor on Facebook? More importantly, are these perceptions accurate?

Past studies have looked at the effects humor has on credibility (Wrench & Booth-Butterfield, 2013) and social attractiveness of the messenger (Wanzer, Booth-Butterfield, & Booth-Butterfield, 1996) in face-to-face (FtF) communication. However, studies have not sought to draw connections between humor use online and its effect on credibility and attractiveness. This is a critical gap in the available research, because FtF interactions provide a very different medium for communication immediacy than computer-mediated communication (CMC) contexts. SNS may not generate the same findings as studies focused on FtF interactions because of the different ways humor might be interpreted from reading it online versus listening to oral delivery. Using impression management (Goffman, 1959) as a theoretical frame, the purpose of this study is to examine the influence that humor enactment on Facebook has on messenger credibility and social attractiveness. This paper will first present a discussion of the relevant literature on (a) social information processing (SIP) theory and impression management on SNS, (b) humor enactment, and (c) individual perceptions of
credibility and social attractiveness. Following a review of the literature is a discussion of the proposed hypotheses followed by the conducted experiment and corresponding results.

Impression Management & Social Information Processing

Erving Goffman initially developed the concept of impression management in his theory of the presentational self in 1959. According to Goffman, impression management includes the efforts of a person to effectively create and manage certain impressions in the minds of others (Goffman, 1959). An individual will enact certain behaviors or performances in order to achieve this goal. Impression management was the keystone of Goffman’s presentational self, because it provided the motivation for people to craft communication to achieve a particular impression objective. These concepts are commonly referred to as part of the dramaturgical approach, which cites the use of performances as a key part of impression management. These performances are enacted for a target audience in what Goffman calls the front-stage. Communication that occurs outside the perception of the target audience is known as the backstage.

Since its conceptualization, Goffman’s theory of impression management has been applied across a variety of contexts. These include healthcare settings (Lewin & Reeves, 2011), public relations (Johansson, 2007), within the family (Gillespie, 1980), and numerous others. Impression management is highly applicable across contexts because of its simplicity and generalizability. So too may it be applied to social networking sites such as Facebook. Contextually, Facebook provides a clear conceptualization of how an individual’s “performance” is structured. All of the content that a user intentionally posts to one’s Facebook account is a part of the front-stage. Offline, the user engages in backstage preparation for future online performances.

Building off Goffman’s definition, impression management on social networking sites describes the conscious behaviors that individuals enact to create certain impressions for online target audiences. However, reworking the definition to include online contexts does not adequately determine whether the outcomes of impression management on SNS will mirror face-to-face findings. In order to address this concern, Social Information Processing Theory (SIPT; Walther, 1992) provides additional understanding of how these two broad contexts are related. Social Information Processing Theory argues that, within a computer-mediated context and in the absence of nonverbal cues, individuals rely on other available social cues to shape perceptions of the message and its messenger (Walther, 1992). Additionally, despite this attention to other social cues, individuals tend to achieve similar degrees of relational certainty and impression formations within a CMC context as within FtF interactions. Walther even argues that CMC may in some instances provide for increased “hyperpersonal interaction” in which communicators more quickly and more effectively manage and form desired impressions through self-disclosure (Walther, 1996). This is thought to be a result of reduced inhibition caused by distance and varying degrees of anonymity between communicators. Therefore, it is reasonable to predict that interactions and humor use on Facebook will elicit similar results as observed in FtF contexts.

With the continued growth of SNS, such as Facebook with over 1.15 billion users and Twitter with over 240 million users worldwide (Smith, 2013), the importance of being able to manage individual and organizational impressions online becomes ever more apparent. Despite the increasing importance of understanding how people manage impressions online, there is limited research on self-presentation and impression management on sites such as Facebook. Recent studies have focused on issues of gender impressions (Rose et al., 2012) and comparisons of impression management across platforms such as Facebook and LinkedIn (van Dijck, 2013). For example, individuals will manage personal information differently on
Facebook, a site dominated by profiles centered on personal lives, than on LinkedIn, a site dedicated to professional networks and career connections (van Dijck, 2013).

**Humor Enactment**

Outside of SNS, humor has been studied to understand its ability to manage individual and organizational impressions. For example, Wrench and Booth-Butterfield (2003) examined the ways that physicians managed impressions of credibility with patients. Credibility is strongly associated with patient compliance and adherence to prescribed treatment plans. Findings demonstrate that physicians enact humor with patients in order to manage impressions of credibility. Physicians who enacted humor were more likely to be perceived as credible, and as a result, patients were more likely to adhere to prescribed treatments.

Hall and Pennington (2012, pp 254) link humor to impression management on Facebook when discussing humor orientation, the ability to produce humor, on social networking sites. They found that individuals were highly competent in creating humor that will be interpreted as such by audiences when they desire to manage an impression of humor. This highlights a crucial component of humor enactment in impression management, intentionality. A precise definition of humor is difficult to provide due to its highly interpretive nature (Wanzer, Frymier, & Irwin, 2010). Despite the subjectivity of humor, Hall and Pennington demonstrate through their research that individuals are able to successfully enact humor for a given audience on Facebook. Additionally, this highlights that 20% of all Facebook messages, the humor-oriented ones (Carr, Schrock, & Dauterman, 2012), are not created unintentionally, but as a deliberate impression management strategy.

Ultimately, people choose to enact humor to achieve certain goals. Those goals are for (a) identification with the target audience, (b) the clarification of ideas or opinions in memorable stories or phrases, (c) the enforcement of norms without appearing overly negative or critical, and (d) the differentiation of oneself from perceived opposition (Meyer, 2000). These goals are informed by certain psychological and sociological motivations of an individual (Lynch, 2002), such as impression management. Booth-Butterfield and Booth-Butterfield (1991) determined that individuals tend to have a particular orientation to which they ascribe regarding general humor use and appreciation, which affects the way that they use and interpret forms of humor. Those that rate themselves high in humor orientation tend to incorporate humor more often in communication, be rated as more humorous by others, and find humor more appropriate in most situations (Wanzer, Booth-Butterfield, & Booth-Butterfield, 1995). Additionally, the literature identifies four styles of humor enactment. These styles are (a) affiliative, (b) aggressive, (c) self-enhancing, and (d) self-defeating (Cann, Zapata, & Davis, 2009). Despite their distinctions and potential comparison for effectiveness, all four styles may be used to manage individual impressions. Variances may exist depending on the individual and his/her humor orientation. For example, self-enhancing humor may be used to manage impressions of individual superiority, and self-defeating may impress humility.

Overall, research has taken multiple views on discerning how to best classify and describe humor (Lynch, 2002). Additionally, literature has examined how humor effects credibility (Gruner, 1967; Mazer, Murphy, & Simonds, 2009) and attractiveness (Walther, Van Der Heide, Hamel, & Shulman, 2009) in varying contexts. The next section delves into further discussion of these variables.

**Credibility and Social Attractiveness**

Based upon prior research that has sought to draw connections between humor and credibility and attractiveness, the next logical step is to look at how these variables are influenced in a
social media context. Credibility is defined by McCroskey (1998) as the attitude of a receiver, which refers to the degree to which a source is seen as believable. For a Facebook messenger, there may be significant benefits for being perceived as a credible source. Those with increased credibility may be viewed as influential leaders in their particular networks. Additionally, as this image of an influential leader increases, the content of that leader’s page may be shared more, garner greater online traffic, and expand that individual’s network. Those with a larger network of friends tend to perceive a stronger support system and identify as having greater life satisfaction (Manago, Taylor, & Greenfield, 2012).

Although the link between humor and messenger credibility has not been studied in a SNS context, researchers have been examining the link elsewhere. For instance, Gruner (1967) examined the connection between humor and speaker credibility. Findings from Gruner’s study again indicate the subjectivity of humor and note that humor is effective in increasing the perceived credibility of the speaker only in instances where the intention of humor is understood and accepted. As discussed earlier, this is equally true in other examples such as healthcare (Wrench & Booth-Butterfield, 2003). The credibility of the physician is only increased if the humor used is understood and identified as appropriate to the situation.

Additional contexts of study include the classroom and other lecture opportunities. Teachers that include aspects of humor in their self-disclosure with the class are perceived to have increased credibility (Mazer, Murphy, & Simonds, 2009). Shalski, Tamborini, Glazer, and Smith (2009) also determined that the use of humor increased the level of speaker and instructor credibility in front of an audience. In addition, audience members were determined to have greater presence during the message. This prior research demonstrates a clear link between effective humor use and its ability to increase perceived credibility of a user. This is true not only in offline contexts but as well within the current and future application to online environments.

Where the literature diverges from this notion of humor leading to increased source credibility is in crises, and rightly so. Crises are instances of increased uncertainty. People are seeking information that will provide appropriate answers to the uncertainty, and therefore, audiences are less likely to deem humor as credible (Austin, Lui, & Jin, 2012). Instead, audiences seek sources that deliver clear and accurate information in a serious manner. Although this demonstrates a divergence in the literature, it may not be wholly applicable to individual Facebook profiles unless that individual uses humor that is overly crass or insensitive during a crisis that is highly salient within the social network.

In addition to humor being linked to credibility, the literature offers insights into perceptions associated with humor and attractiveness. According to McCroskey and McCain (1974), attractiveness occurs when we enjoy interacting with and want to spend time with someone. Linked to social networking sites such as Facebook, attractiveness is a perception established by the content created by the messenger. Humor has been positively related to attractiveness (Wanzer, Booth-Butterfield, & Booth-Butterfield, 1996) but not yet in the SNS context. The goal of humor enactment and managing impressions of attractiveness is similar to that of credibility in that people with more friends on Facebook identify as having stronger support systems and greater life satisfaction (Manago et al., 2012). By being perceived as more socially attractive, individuals attract more friend requests, thus expanding their social network in a cyclical fashion.

Attractiveness has been studied in a variety of contexts, especially since its operationalization by McCroskey and McCain in 1974 (McCroskey, McCroskey, & Richmond, 2006). In a study conducted by Wanzer, Booth-Butterfield, and Booth-Butterfield (1996), researchers determined that individuals with higher humor orientations, individuals that enact humor more often and perceive humor as more appropriate in communication, are identified as more socially attractive. Of note, there is research that implies that social attraction is largely influenced by the messages that others post on a friend’s wall rather than
the friend’s wall itself. Walther, Van Der Heide, Hamel, and Shulman (2009) determined that other-generated comments in social media tend to take precedence over self-generated comments when individuals are forming impressions of attractiveness related to an individual’s page. Additionally, the type of communication enacted by friends had varying effects on the impressions of the user depending on whether the friend was male or female (Walther, Van Der Heide, Kim, Westerman, & Tong, 2008). This creates an interesting implication for study if other-generated content is more persuasive than self-generated when establishing impressions. Studies seeking to mitigate this factor should be mindful of what content is incorporated in the study. For example, researchers may need to control for other-generated content by not making it visible to participants. By doing so, researchers can more accurately assure that participants are basing their rating of credibility and attractiveness on the self-generated message.

Critique of the Literature

Overall, the literature provides substantial background in creating a framework focused on impression management and how humor may be used to manage impressions. Additionally, there is substantial evidence linking humor enactment in a variety of contexts related to credibility and social attractiveness. However, the literature is weak in providing a clear argument of how humor is incorporated on social networking sites. Further, there are some divergences in the literature that create ambiguity behind what effect humor has on credibility and attractiveness. The goal of this study is to address this gap in the literature.

Hypotheses

Based upon the research relevant to impression management, humor enactment, and perception of credibility and attractiveness, the following two hypotheses have been identified for this study.

H1: Humor enactment on Facebook results in an increased perception of messenger credibility.

H2: Humor enactment on Facebook results in an increased perception of messenger social attractiveness.

Although the majority of the literature does not focus on the variables being applied on social networking sites, the research provides significant evidence that in face-to-face interactions, these variables are positively related. Translated to Facebook, the expectation of results is similar.

Method

Participants

The convenience sample was composed of 283 undergraduate students enrolled in a large, Midwestern university. Of the participants, 74.91% (n = 212) were female, while 24.73% (n = 70) were male. Additionally, only one participant chose not to disclose sex. The majority (74.20%, n = 210) identified as Caucasian, followed by African-American (15.55%, n = 44), Other (4.95%, n = 14), Hispanic (3.89%, n = 11), Asian American (1.06%, n = 3), and Native American (.35%, n = 1). Participant ages ranged from 18 to 59 years, with a mean of 20.83 (SD = 3.22) and a median of 20 years. When asked questions regarding individual familiarity and exposure to Facebook, 93.99% (n = 266) reported having a Facebook profile. Of those individuals who reported having a Facebook profile, 96.24% (n = 256) have had one for over a year, and 76.32% (n = 203) reported spending over one hour per week using Facebook.
**Procedures**
In order to test the hypotheses proposed for this study, an experimental design consisting of four treatment groups (male control, male humorous, female control, and female humorous) was utilized. Conditions were separated into male and female profiles, because previous research has indicated that messenger sex has a significant effect on how humor is used and perceived (Zippin, 1996). Sex was manipulated by changing the profile photos. The name of the user, Taylor Johnson, remained the same.

At the discretion of the instructors of each class, students had the potential to earn class assignment credit as compensation for participation. In addition, alternative forms of extra credit were provided to students who chose not to participate in the study. Participants were provided with a secure link through which they could access the study. Prior to accessing the survey, individuals were directed to a web page where informed consent was obtained. Upon accessing the study portion of the website, participants were initially exposed to one of four mock Facebook profiles (see Appendix B). The four profiles were identical in every way with the exception of the manipulated conditions. Some participants viewed a profile containing five non-humorous message posts (e.g. “I just finally purchased the last of my books for the semester. The prices just keep going up.”), while others viewed a profile with five message posts that had been altered to incorporate humor (e.g. “I just finally purchased the last of my books for the semester. Will work for food”). Given the subjectivity of humor, a variety of messages were piloted prior to incorporation to ensure that a high percentage of participants would perceive them as intended. Pilot participants were asked to rate the pool of messages along a scale of 1 (Not Funny) to 100 (Very Funny).

**Instruments**
Following exposure, participants were asked to complete a questionnaire that measured the perceived credibility and attractiveness they would assign to the messenger. Lastly, participants were asked to respond to a brief demographic section.

**Source Credibility**
Credibility was measured using a modified version of Teven and McCroskey’s 18-measures of credibility (McCroskey & Teven, 1999) measuring for three distinct factors of credibility including competence, character, and caring. Participants responded to these measures using 7-point semantic differential scales. The alpha reliabilities for these measures have previously ranged from .80 and .94. For this study, the reliability coefficients of .74 for competence (M = 4.48, SD = .28), .82 for caring (M = 4.23, SD = .31), and .78 for character (M = 4.53, SD = .29) were obtained (see Appendix A for complete instrument).

**Social Attractiveness**
Social attractiveness was measured using a modified version of McCroskey’s measure of interpersonal attraction (McCroskey, McCroskey, & Richmond, 2006). The tool instructs participants to respond to questions related to social attractiveness (e.g., This person seems pleasant to be with.) along a 5-point Likert scale. The alpha reliability for the social attraction measure has previously ranged from .91 to .94. For this study, the reliability coefficient obtained for the social attractiveness measure was .92 (M = 4.64, SD = .26) (see Appendix A for the complete instrument measuring social attraction).

**Results**
A one-way K-group multivariate analysis of variance (MANOVA) was conducted to evaluate the relationship between the effects of the manipulated Facebook profile (male control, male humor, female control, or female humor) on the dependent variables of the competence, character, and caring dimensions of credibility and the social attraction variable. A
MANOVA was chosen because the dependent variables were related. Table 1 presents the correlations among the dependent variables. Levene’s test for equality of variance was not significant for the dependent variables social attractiveness, caring, competence, and character (respectively $F = .621, p = .602$, $F = 1.010, p = .389$, $F = .1.007, p = .390$, $F = .1.247, p = .293$), indicating that the assumption of homogeneity of variance was tenable. Significant differences were found among the four treatments (male control, female control, male humorous, female humorous) on the dependent measures, Wilks’s $\lambda = .86$, $F(12, 646) = 3.04$, $p < .05$. The multivariate $\eta^2$ based on Wilks’s lambda was small, .047. Table 2 details the item means and standard deviations on the dependent variables for the four treatments. As a follow up to the MANOVA, four ANOVAs were conducted. The ANOVAs were significant for social attraction [$F(3, 247) = 4.19$, $p < .01$, $\eta^2 = .05$] and caring [$F(3, 247) = 2.64$, $p < .05$, $\eta^2 = .03$]. The ANOVAs were not significant for competence [$F(3, 247) = 1.38$, $p > .05$, $\eta^2 = .02$], or character [$F(3, 247) = 1.29$, $p > .05$, $\eta^2 = .02$]. Despite the significance of these subscale dimensions, neither H1 nor H2 was supported.

Table 1

<table>
<thead>
<tr>
<th>Character</th>
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<th>Competence</th>
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<td>.64*</td>
<td>.62*</td>
</tr>
<tr>
<td>Character</td>
<td>-</td>
<td>.70*</td>
</tr>
<tr>
<td>Caring</td>
<td>-</td>
<td>-</td>
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Correlations Among the Dependent Variables.

*p<.01

Table 2

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<tr>
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<th>Female Control</th>
<th>Male Humor</th>
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<td>M (SD)</td>
<td>M (SD)</td>
<td>M (SD)</td>
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<td>24.52ne 4.59</td>
<td>25.76bc 5.89</td>
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<td>27.38 5.30</td>
</tr>
</tbody>
</table>

Means and Standard Deviations for the Four Conditions on the Dependent Variables.

Note: Means in a row that share a subscript letter are significantly different at $p<.05$ in the Fisher’s least significant difference test.

In a post hoc analysis, Fisher’s LSD was conducted to examine multiple comparisons between exposure type and the dependent variables of social attraction and caring. Tests indicated that the male control was reported as significantly more socially attractive than the female control and that the male humor condition was reported as significantly more socially attractive than either the female control or the female humor condition. Additionally, the male control was reported as more caring than the male humor and female control conditions. Despite the lack of significance found between exposure type and competence when tested in
the ANOVA, the multiple comparisons test indicates that the male control was reported as significantly more competent than the female control.

**Discussion**

The purpose of this study was to evaluate whether an individual incorporating humor within Facebook messages is perceived differently regarding credibility and attraction than an individual who does not incorporate humor. Predictions of findings were constructed based on prior literature related to humor and impression management. Actual results from the data analysis did not support the proposed hypotheses that humor would increase perceptions of source credibility and social attractiveness. Rather, there was no significance between the manipulated variable of humor and the dependent variables. This is not consistent with previous research, which has found a significant effect of humor incorporation on the two dependent variables. Biological sex was found to be a significant indicator of social attractiveness and a single dimension of credibility, caring.

Furthermore, results demonstrated that participants rated the male control (non-humorous) as more socially attractive than the female control and more caring than either the male humorous or female control conditions. Male humor was rated as more socially attractive than either of the female conditions. In no instances were either of the female conditions found to be significantly more credible or socially attractive than a male condition. This may be due to actual significance in how men and women are perceived online or a potential bias in the generated comments that favor the male messenger over the female. Future research should look further at the way attractiveness and source credibility, among other variables, are assigned to men and women online when sharing different message designs.

Of interest in the results is the finding that the male control was rated as more caring than the female control. Typically, relational dynamics such as caring and concern for others is considered a feminine trait that is associated more with women (Eagly & Johannesen-Schmidt, 2001). This may function as a result of perceived humor of males and females. Research has shown that both men and women tend to expect men to be more humor-oriented and in general rate men as being funnier than women, even going so far as to misattribute humorous comments constructed by a woman as having been constructed by a man (Mickes, Walker, Parris, Mankoff, & Christenfeld, 2012). As a result, the female condition may be viewed as acting differently than predicted, violating feminine expectations and the associated attributes.

The lack of significance between the humor condition and the dependent variables indicates that humor does not affect user perceptions of social attractiveness or credibility on Facebook. However, this finding contradicts findings from Wrench and Booth-Butterfield (2003) and Wanzer et al. (1996), which indicated that humor does in fact affect these perceived traits. This contradiction is especially evident in comparison to Walther’s Social Information Processing Theory (1992), which argues impression management across CMC often elicits similar results as in face-to-face interactions. Such unexpected results may stem from the commonality of humor on Facebook. Again, 20% of Facebook posts incorporate humor (Carr, Schrock, & Dauterman, 2012), perhaps negating its effect. It may stand to reason that if everyone is doing it, and doing it well, humor may lose its significant influence. Further research should be conducted to investigate the significance of humor in computer-mediated communication and, more specifically, social networking sites such as Facebook.
Limitations and Future Research

As in any social scientific experiment, this study is not without limitations. First, a preferred sample size of 400-450 may have increased observed effects and generalizability. Additionally, the mock Facebook profiles used were screenshots taken after manipulating the html code of an existing profile. Using screenshots may have decreased the ecological validity of the study, which may have benefitted from participants referencing “live” pages. However, it would be up to the researcher to determine how best to manage a live feed in which the messages are part of the manipulated condition. Ecological validity may also have been decreased by the lack of comments, “likes”, and other forms of interactions on the source’s Facebook page. These missing pieces may have exhibited a significant effect over the dependent variables. It stands to reason that a Facebook user with five comments that have received zero “likes” or comments may not be seen as socially attractive or credible. Further, more exhaustive pilot testing may have improved the execution of this study. Humorous messages could have been drafted with higher mean ratings of “funniness” and may have stressed greater significance for humor’s effect on the dependent variables as it appealed to broader audiences.

Future research would benefit from a modified replication of this study addressing the limitations and concerns listed above. Of particular interest is whether the heuristic cues on Facebook (e.g., likes, number of comments, additional postings) play a significant role in the overall perception of the Facebook user. In other words, would these small additions supersede the actual postings created by the user?

Conclusion

Overall, this study is one of the first to assess the role of humor on social networking sites such as Facebook. The findings demonstrate that humor does not significantly affect perceived source credibility and social attractiveness but that biological sex may. Future research should look for ways to adequately address the limitations of the current study and expound upon its premises. Humor proliferates a high degree of communication online and understanding its effects may help better explain how it is being used to manage impressions online on both a personal and practitioner level.

References


The Effects of Humorous Facebook Posts


Appendix A

Item 1
Teven and McCroskey’s 18-measures of credibility: Modified
Instructions: On the scales below, indicate your feelings about the individual whose Facebook page you have observed. Numbers 1 and 7 indicate a very strong feeling. Numbers 2 and 6 indicate a strong feeling. Numbers 3 and 5 indicate a fairly week feeling. Number 4 indicates you are undecided.

1. Intelligent 1 2 3 4 5 6 7 Unintelligent
2. Untrained 1 2 3 4 5 6 7 Trained
3. Cares about others 1 2 3 4 5 6 7 Doesn’t care about others
4. Honest 1 2 3 4 5 6 7 Dishonest
5. Has others’ interests at heart 1 2 3 4 5 6 7 Doesn’t have others’ interests at heart
6. Untrustworthy 1 2 3 4 5 6 7 Trustworthy
7. Inexpert 1 2 3 4 5 6 7 Expert
8. Self-centered 1 2 3 4 5 6 7 Not self-centered
9. Concerned with others 1 2 3 4 5 6 7 Not concerned with others
10. Honorable 1 2 3 4 5 6 7 Dishonorable
11. Informed 1 2 3 4 5 6 7 Uninformed
12. Moral 1 2 3 4 5 6 7 Immoral
13. Incompetent 1 2 3 4 5 6 7 Competent
14. Unethical 1 2 3 4 5 6 7 Ethical
15. Insensitive 1 2 3 4 5 6 7 Sensitive
16. Bright 1 2 3 4 5 6 7 Stupid
17. Phony 1 2 3 4 5 6 7 Genuine
18. Not understanding 1 2 3 4 5 6 7 Understanding

Item 2
McCroskey’s Measure of Social Attractiveness: Modified
Instructions: For the statements below, respond to each on a scale ranging from 1 to 7, 1 signifying “strongly agree”, 7 signifying “strongly disagree”, and 3 signifying “I cannot determine”.

1. I think he/she could be a friend of mine.
2. I would like to have a friendly chat with him/her.
3. It would be difficult to meet and talk with him/her.
4. We could never establish a personal friendship with each other.
5. He/She just wouldn’t fit into my circle of friends.
6. He/She would be pleasant to be with.
7. He/She seems sociable to me.
8. I would not like to spend time socializing with this person.
9. I could become close friends with him/her.
10. He/She seems easy to get along with.
11. He/She seems unpleasant to be around.
12. This person does not seem very friendly.
Appendix B

Figure 1: Male Control
Figure 2: Female Control
Figure 3: Male Humor
Figure 4: Female Humor
The History of Punishment: What Works for State Crime?

*Second Place Paper, Spring 2015*

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Graeme Newman (1985) perhaps said it best when he stated, “The only aspect of punishment that needs justification is its distribution” (p.4). Newman was referencing the long history of punishment utilized and implemented throughout recorded history, from “punishment” on man from the physical environment, perceived punishments from religious gods, to punishment imposed by society. Punishment imposed by societies has a long (and often times sordid) past from banishment and fines in ancient Greece, torturous physical punishment during the Inquisition, the implementation of the death penalty in 17th century England, rehabilitative practices utilized by Britain and the United States into the 20th century, and the extreme occurrence of incarceration currently implemented in the United States. These examples are but a brief glimpse into the history of punishment and suggest that punishment, in some form, has always existed.

**Justifications for Punishment**

The punishment of wrongdoings is typically categorized in the following four justifications: retribution, deterrence, rehabilitation and incapacitation (societal protection). There is also discussion and promotion of additional criminological tactics such as restorative justice and therapeutic jurisprudence as new and innovative responses to traditional punishment responses. This paper will outline the logical and historical practices of the above approaches to punishment. Additionally, a discussion of state crime will be provided as well as an analysis of which punishment response is most fitting in instances of state crime.

The question of what exactly determines punishment, or what punishment is, is generally agreed upon by the following technical definitions. Bean (1981) states that punishment, through the lens of a sanction that is imposed upon an individual for a criminal offense, is made up of five specific elements:

1) The sanction must be perceived as unpleasant to the victim
2) The sanction must only be for an actual or alleged offense.
3) The sanction must be of an offender, actual or supposed
4) The sanction must be handed out by personal agencies and the sanction must not be a natural cause/consequence of the criminal action.
5) The sanction must be carried out by the “state.” In other words, the authority/institution that the offense is committed against shall be the one to carry out the sanction. (p.5-6).

Newman (2008), when building on the definition provided by H. L. A. Hart, defines punishment as:

1) Punishment must involve pain or unpleasant consequences.
2) Punishment must be a sanction for an offense against a specific rule or law.
3) Punishment must be executed upon the specific offender who has allegedly or actually committed the crime.
4) It must be administered intentionally by someone other than the offender.
5) “It must be imposed and administered by an authority constituted by a legal system against which the offense is committed” (p.7-11).

What is located in the above definitions is a synthesis of the idea the punishment must be considered unpleasant for the offender, must be a direct action taken upon the offender for an actual or alleged crime, and it must be imposed and administered by an authority within in a legal system. While the above definitions of punishment may be somewhat agreed upon, the reasoning as to why offenders should be punished is littered with philosophical and criminological debate. The four traditional explanations provided include retribution, deterrence, rehabilitation and incapacitation.

Retribution

Retribution is often considered to be the oldest form of punishment, and is often viewed as society’s “revenge” for a moral wrongdoing by an individual. In other words, punishment is justified simply because it is deserved. If an individual commits a crime, they deserved to be punished. Kant and Hegel, two avid proponents of the retributive approach, each provided different justifications for this punishment response. Hegel believed that the state had the right to punish using retributive measures, as it was essentially more important and powerful than the individuals that made up the state, and demanded a sacrifice when crimes were committed against it (Newman, 1985). Foucault (1977), states “Besides its immediate victim, the crime attacks the sovereign: it attacks him personally, since the law represents the will of the sovereign; it attacks him physically, since the force of the law is the force of the prince” (p. 47). Kant, however, believed that retributive punishment was a necessity to restore the balance that the crime unhinged between the state (governing body), the people, and the criminal. For Kant, it was not about punishment being a debt owed to the state, but a debt owed to the people, and the state was simply an actor charged with protecting its people. Foucault (1977) suggests that this form of punishment was most utilized prior to the 18th century when torture and executions were public and common. The purpose of punishment was retributive and punishment was focused primarily on the physical body.

Retribution approaches also suggest that there are agreed upon rules within society, and those who violate those rules must be punished to uphold those values and rules. Banks (2013) states, “Once society has decided upon a set of legal rules, the retributivist sees those rules as representing and reflecting the moral order” (p. 109). Newman states that for the retributivist, “punishment restores an equilibrium that was upset by the crime” (p. 192). Durkheim suggested that punishing criminals who committed moral wrongdoings was a way in which society could further create and maintain moral awareness and he approved of such “mechanisms of punishment reinforcing the moral indignation, the collective sentiment, and thus the morality of society” (Newman, 2008, p. 274).

Retribution is further illuminated by its proposal that punishment should be in proportion to the crime. It is here that retributionists’ provide a separation from retribution and vengeance. Critiques of the retribution approach often suggest that it is simply glorified vengeance. However, Noziak (2001) suggest that whereas vengeance may happen to an innocent person, retribution is carried out by legitimate authorities who have identified an actual or presumed offender. Furthermore, legal retribution mechanisms outline strict procedural practice which implements limits on crime (Banks, 2013).

Perhaps the clearest justification for retribution practice comes from the lex talionis derived from biblical times (Banks, 2013), and the basic principle “that punishment should inflict the same on the offender as the offender has inflicted on his or her victim” (p. 110). Specific biblical passages that are used to support this claim include: “but if there is serious injury, you are to take life for life, eye for eye, tooth for tooth, hand for hand, foot for foot,
burn for burn, wound for wound, bruise for bruise (NIV; Exodus 21: 23-25).” In the book of Leviticus 24:17, Moses states “If anyone takes the life of a human being, he must be put to death” and in Deuteronomy 19:21 “Show no pity: life for life, eye for eye, tooth for tooth, hand for hand, foot for foot.” Retributionists often cite these passages as divine support for the idea of retribution style punishment and suggest it is morally justifiable. However, the biblical passages that promote reconciliation, forgiveness and rebuke retribution are often ignored (Ephesians 4:32; Hebrews 12:14; Luke 6: 27-42; Matthew 18:33).

The idea of censure is also principally important in the understanding of retribution. Andrew von Hirsch, a support of the “just deserts” model, suggests that “censure is simply holding someone accountable for his or her conduct and involves conveying the message to the perpetrator that he or she has willfully injured someone and faces the disapproval of society for that reason” (Banks, 2013, p. 110). H. Morris (1994) suggests that the main benefit of this type of punishment is the effect that it will have on the offender and suggests that punishment for their specific offense will reflect the communal values they have broken and they will eventually determine to act according to those values. Both Hirsch and Morris contend that there is a deterrent effect enveloped in retributive punishment.

Until the 1970s, the idea of retribution as a justification for punishment was considered to be vengeful. In the 1980s, a new form of retribution theory occurred and was known as “just deserts” (Banks, 2013). Just deserts model suggested that not only did a criminal need to be punished because his criminal act was wrong, but that this punishment needed to be proportional to the crime. It is here that modern day retributionists separated retributive punishment from vengeance. Punishment should be proportional to the crime, and should not be considered vengeful as there are limits to the punishment and procedural standards to be followed. Essentially, a scale of punishments is allocated and the most severe punishments are reserved for the most severe offenses, frequently accepted as tariff sentencing. Banks (2013) elaborates, “In this method of punishing, the offender’s potential to commit future offenses does not come into consideration, but his or her previous convictions are taken into account because most proponents of just deserts support reductions in sentence for first offenders” (p.113). When quoting Hudson (1996), Banks (2013) suggests that one of the fundamental issues with just deserts theory is doesn’t provide a clear outline of a “properly commensurate sentence.” Furthermore, the just deserts model of retribution fails to take into account any social issues, such as disadvantage or discrimination that may increase the likelihood of an individual committing a crime.

**Deterrence**

Deterrence theory is considered more of an early modern approach to crime in which punishment is viewed as a social disruption which society must control. This perspective maintains that people act rationally and are self-interested, thus deterrence works because the punishment is more painful than the crime is pleasurable. Beccaria and Bentham are often credited with the first analytical discussion of deterrence, clearly outlined in their utilitarian approach to punishment. At the crux of Beccaria’s argument is his insistency on the inhumane nature of the response to crime during the time of his writing (1760s) and that punishment needed to have a preventative, not a retributive, function. More specifically, for Utilitarian's such as Bentham and Beccaria, the only purpose of punishment was to prevent or deter future crime.

Whereas retribution theorists focus on past events, utilitarian's and deterrence theorists' focused on future issues. If the punishment does not prevent future crime, than it simply adds to the suffering of a society. Punishment is not so much about if an individual deserves to be punished, but if punishment will have a deterrent effect both on the individual and society as a whole. Regardless of the form of punishment, the primary focus is to deter individuals from
committing a criminal act in the future. We find evidence of this in the United States’ “get tough on crime” approach, specifically with the “3 strikes” drug rule.

**Rehabilitation**

Both retribution and deterrence are focused primarily with the crime and then the punishment. The rehabilitation reasoning for punishment approaches punishment from a different angle. The rehabilitative model is a modern strategy of responding to crime which is often linked to the emergence of the social sciences. This response to crime suggests that crimes are committed as a result of individual or social problems and the best response to crime is to eliminate such personal and social problems. The rehabilitative response looks specifically into the criminals social past, which is absent in both retributive and deterrence philosophies. The attempt to “rehabilitate” is often done by treatment that is specifically geared towards the offender.

Proponents of the rehabilitative model, in contrast to both retribution and deterrence, suggest that punishment should be specifically designed for the offender, not the offense (Banks, 2013). The notion of rehabilitation encompasses a deterrent effect, as it is suspected that with rehabilitation the offender will be less likely to commit crimes in the future. Rehabilitation models tend to include programs specifically designed towards the problems that an offender personally faces. For example, required drug treatment programs and high school and college completion courses as part of probation or offered during incarceration are examples of rehabilitative attempts.

Garland (2002) notes that the rehabilitative model was widely used in the United States until the 1970s, when it was determined that rehabilitation didn’t work in controlling or preventing crime. This was a result of a variety of factors and Martinson’s (1974) article (which may have been misinterpreted) suggested that no treatment program had been shown to reduce or prevent recidivism in offending.

**Incapacitation**

Incapacitation, or societal protection, is a modern response to crime that is often much easier to implement than rehabilitative models. Incapacitation is the notion that the primary goal of punishment is incapacitate the offender, which is done to protect society as a whole from any future offenses that a criminal may commit. Incapacitation often results in incarceration, which may include some levels of rehabilitation, but this is not the primary purpose. The primary purpose is to protect society from the potential danger that the criminal may impose. Foucault (1977) suggests that incapacitation was essentially all about the power that the state could exert over its citizens and reflected the change from punishment directly inflected upon the body, to punishment directed on the mind. Primarily, this power is reflected in the states’ ability to constantly monitor those who are incarcerated. However, he suggested that “imprisonment not as penalty, but as holding the person and their body for security” (p. 118). Furthermore, Foucault notes the use of the carceral as an attempt to not just monitor, but also as an avenue with which to “reform” prisoners.

There is support for incapacitation within the utilitarian theory, as the removal of the offender from society prevents the criminal from harming society (Banks, 2013). This justification for incapacitation as a form of punishment is criticized as it rests on the idea that a criminal *might* commit a future offense and the morality associated with that claim. Incapacitation not only considers the current crime committed, but the likelihood that future infractions may occur.

Incapacitation as means of justification for punishment runs rampant within the United States. According to the Bureau of Justice Statistics, in 2010 the United States housed
approximately 1,612,395 prisoners in both state and federal prisons, the highest rate in the world. Interestingly, the United States is not the most violent country in the world, but it incarcerates the most criminals. This is largely the result of moral panic, mandatory minimum sentencing, three-strike legislation, and the prosecution of victimless crime. However, the focus of incapacitation was not always utilized for societal protection as its main goals. Kifer et al (2003) notes:

During the Jacksonian era, prisons were designed to rehabilitate criminals through the use of solitary confinement, which it was hoped would induce penitence. These prisons never adequately achieved the goal of rehabilitation, however and the primary focus of prison soon turned to incapacitation. During the reformatory era, the primary goal of prisons again became rehabilitation. The goals of imprisonment changed yet again in the late 1960s and early 1970s, in response to intense criticism of the rehabilitation model. It its place, retributionists called for a “human incarceration” approach to imprisonment, or incapacitation. Today, incapacitation is the accepted and prevailing response to crime. (p.47-48).

It is important to note that retribution, deterrence, rehabilitation and incapacitation as justifications for punishment are not static terms, but can essentially be quite fluid. Criminal justice policies often reflect numerous justifications, incorporating factors such as deterrence and incapacitation within their applications.

Restorative Justice

While restorative justice is a relatively new technique as a response to crime, it is one of the oldest forms of criminal justice. Braithwaite (1998) offers that it was utilized in ancient Greek, Arab and Roman civilizations, and has deep seeded roots in a variety of religious traditions. Kurki (2000) describes restorative justice as being “based on values that promote repairing harm, healing, and rebuilding relations among victims, the offenders, and the communities” (p. 236). One of the major differences between traditional justifications of punishment (retribution, deterrence, rehabilitation, and incapacitation) and restorative justice is that the state or legal governing body does not always play a central part. Kurki (2000) further suggests:

Core restorative justice ideals imply that government should surrender its monopoly over responses to crime to those who are directly affected—the victim, the offender, and the community. Restorative justice considers crime to be an offense against an individual or community, not the state, and this is where it sharply divides from the current American criminal justice system of penalization. The goal is to restore the victim and the community and to rebuild fractured relationships in process that allows all three parties to participate (p. 236).

Banks (2013) further notes, “Rather than separating out the offender as a subject for rehabilitation, restorative justice sees social support and social control of offenders as the means to rehabilitation” (p. 118). Restorative justice is not a lenient option for offenders, and requires accountability of the offender and restitution to the victim. In the traditional American criminal justice system, reparations paid are not to the victim, but to the state, and it is almost always in the form of incarceration of the offender. Restorative justice provides numerous options for restitution, including monetary repayment, community service activity, or participation in treatment plans. In restorative justice practices, the crime committed is primarily viewed by how it has destroyed a relationship between members of a community,
and the desire is to address this broken relationship and attempt to repair it. Punitive justice however, is most concerned with penalizing, or punishing, the offender and this often results in a total separation of the offender from both the victim and community.

Restorative justice practices have been used as a response to a variety of crimes in the United States, primarily in diversion programs for “juveniles in minor, nonviolent, and nonsexual crimes (Kurki, 2000, p. 241),” and are often supported or create by faith based organizations. In fact, the first North American victim-offender mediation program in Ontario was established by the Mennonite Central Committee workers in 1974 and Kurki suggests that “religion and moral theory still provide strong backgrounds for restorative justice” (p. 240). Restorative Justice often takes shape as victim-offender mediation, peace circles, and other community initiatives that provide alternatives to the traditional incarceration model and places the control of penalization back in the hands of those affected by the crime. Since the 1970s, the United States has slowly implemented restitution and community service as part of select sentencing. Furthermore, with the victims’ movement of the 1990s, restorative justice apparatuses often provide a vehicle in which victims voices may be heard.

Garland (1990) and others suggest that the ideas and justifications for punishment as described above are not a static, moral understanding, but often a reflection of current cultural values that greatly influenced by social structures. It could be suggested, as evident in the United States with the reemergence of retribution practices, that moral explanations of punishment tend to be cyclical. Justifications for crime tend to evolve, change, and often times blend, largely as a result of the current political climate.

What works for state crime?

The above theories of punishment are often utilized to justify punishment for what are considered traditional crimes. These crimes traditionally include murder, rape, larceny, and theft along with a variety of other types of crimes, both violent and not. These types of crimes are often committed by one, or a few, offenders. State crime, however, is often the result of many simultaneous offenses and offenders, all including a variety of social and individualistic reasons. Rothe (2009) states, “there is variation in accountability and responsibility under international laws for states versus individuals” (p. 157). In addition, state crime often results in a plethora of victims at varying levels. Because of the vast range of offenders usually participating in an instance of state crime, and the general complexity of state crime, it becomes difficult to identify only one theory as appropriate for addressing state crime. Research suggests, and I am inclined to agree, that because that complexity associated with state crime, all theories of punishment and their applications may be useful in understanding state crime.

Chambliss’s 1989 presidential address to the American Society of Criminology is arguably noted as the first time the discussion of state crime was discussed professionally on such a large scale. He suggested that state crimes be defined as “acts defined by law as criminal and committed by state officials in pursuit of their jobs as representatives of the state” (p. 184). The Schwendingers (1970) and Green and Ward (2000) suggested that state crime should not be defined simply by the legality of the act, but that the definition of state crime should include the violation of human rights. According to Kramer and Michalowski (2005) state crime is defined as “any action that violates public international law, international criminal law, or domestic law when these actions are committed by individuals acting in office or cover capacity as agents of the state pursuant to expressed or implied orders of the state, or resulting from state failure to exercise due diligence over the actions of its agents (p. 448).” Rothe (2006) defines state crime as “Any action that violates international public law, and/or a state’s own domestic law when these actions are committed by individuals actors.
acting on behalf or in the name of the state, even when such acts are motivated by their personal, economical, political, and ideological interests” (p.6). Most criminologists agree, to some extent, that violation of international law is inclusive to define state crime (Rothe and Friedrichs, 2006). Prominent examples of state crimes include crimes against humanity, genocide (also considered a crime of globalization), terrorism, torture and war crimes.

In the following sections the majority of discussion will be geared towards the state crimes of genocide, crimes against humanity, and war crimes. The majority of discussion will be based on the case study of the applications of restorative justice in Rwanda following the 1994 Rwandan genocide. While a variety of other nations have utilized restorative justice mechanisms following instances of state crime (i.e., Truth Commissions in South Africa and Sierra Leone), Gacaca courts in Rwanda are perhaps historically the largest attempts at restorative justice following state crime.

Noticeably absent are other types of state crime, most particularly state-corporate crimes. Michalowski and Kramer (2005) coined this term to refer to the harmful collaborations of state and corporations and suggest that “when economic and political powers pursue common interests, the potential for harm is magnified” (p.1). The case studies of state-corporate crime most frequently analyzed are those of the 1986 Challenger explosion which looks at the relationship between NASA and Morton Thiokol, the Ford Pinto and the relationship between Ford and the United States Government, and the fire at the Imperial Food Products chicken-processing plant in North Carolina, where the relationship between Imperial, the federal government, and state local officials was examined. The reason that state-corporate crime will not be discussed further is that “punishment” for these crimes has been all but non-existent.

As discussed above, selecting one model of theoretical support for punishment regarding state crime is incredibly complex. Cohen (1995) notes the particular difficulty with this, as often locations of state crimes are going through transitional periods. This transitional period includes attempting to rebuild their state after a mass atrocity has been carried out by governmental officials. The concept of “justice in transition” often encompasses aspects of retribution, incapacitation and restorative justice. Rothe (2006) further notes that punishment in the face of state crime is not simply about accountability but about transitional justice mechanisms which include both accountability practices and restorative aspects.

Following the atrocities and crimes of the Second World War, the Nuremberg trials were conducted from 1946-1948 to prosecute prominent military and political figures responsible for the Holocaust. Following the trials, human rights were introduced into international law via the Nuremberg Charter. The charter provided principles to determine what defined a war crime and was used to codify the legal principles that were established and used during the Nuremburg Trials. These principles clearly lay out “crimes against humanity” to include murder and extermination, and on December 9, 1948 the United Nations adopted the Convention on the Prevention and Punishment of Crimes of Genocide.

Additionally, The United Nations Declaration of Human Rights, the Convention Against Torture and Other Cruel, Inhuman or Degrading Treatment or Punishment all clearly state that those committing torture should be prosecuted for their crimes. In addition, there are more than 20 legally binding international treaties that deal with a person’s right to exist (Alveraz, 2010). The International Criminal Court (ICC), enacted in July 2002, is a permanent tribunal to address crimes against humanity including war crimes, crimes of aggression, and genocide. The Rome Statute of the ICC states that the ICC can only investigate and prosecute perpetrators of war crimes in states that are either unwilling or unable to do so themselves. The ICC has authority to “investigate and prosecute these types of crimes on a permanent and ongoing basis (p. 140).”

It is evident that there is a long list of international legal precedent that makes a variety of state crimes illegal. It is suggested that codified legal law could certainly act as a deterrent
and Rothe (2006) states “The UN, the World Court, and the new ICC are uniquely positioned to act as global dispute resolutions agents. While possessing a clear mandate, these organizations have no real authority or ability to use coercive force.” (p. 163). Rothe further notes that “the failure of international law to act as a deterrent is the result of the lack of effectual enforcement mechanisms. After all, states that hold vast economic, military and political power within the international arena have long ignored international law as a frame for their behaviors if it conflicted with their foreign policy interests” (p. 161). It is unknown if international legal institutions would have a deterrent effect, but part of the explanation for this unknown is that they lack enforcement. While legal laws exist to prevent occurrences of state crime, they are simply rarely enforced.

The ICC and the International Criminal Tribunals are often utilized as means of retribution for perpetrators of state crime. From a retributive standpoint, these tribunals deliver punishment and sanctions because the individuals broke international and national laws, and deserve to be punished. The International Criminal Tribunal for the former Yugoslavia (ICTY) was created under Chapter VII of the UN Charter in 1993 as a result of the violations of international humanitarian rights committed in Yugoslavia between 1991 and 1993. The International Criminal Tribunal for Rwanda was created to address genocidal acts committed between January 1994 and December 1994. The ICTY has charged approximately 171 criminals, and the ICTR has indicted 95 individuals which included a total of 30 perpetrators serving prison sentences (Rothe, 2009). The UN Security Council requested the closure of the ICTR by December 2014 and the responsibilities of the tribunal have been transferred to the UN International Residual Mechanism for Criminal Tribunals. The number of those indicted and convicted seems incredibly small compared to the vast number of individuals who were perpetrators of genocidal acts. However, funding for the criminal tribunals as well as lack of staff and resources slows down the process considerably. Additionally, it is typically that only top level offenders and perpetrators are tried at criminal tribunals. The remaining offenders are often dealt with domestically.

Domestically, state crime criminals are often tried at a variety of local courts or truth commissions. While these courts often achieve retributive ends, their roots are often based in themes of restorative justice. From a retributive standpoint, local courts are still charged with the objective of criminal sentencing. Perhaps the best example of a domestic court with a punitive function is the Gacaca courts located in Rwanda. Following the genocide in 1994, the new government was responsible for addressing the 100,000 people accused of genocide and war crimes which overwhelmed the limited judicial capacity. Only 14 public prosecutors and 39 criminal investigators were left and two thirds of the nation’s judges had been killed or fled the country. By the year 2000, over 120,000 genocidaires were in Rwandan prisons and it was more likely they would die before they ever appeared in court (Harrell, 2003).

Because of this, the government implemented Gacaca courts. Organic Law 40/2000 was established in 2000, and established 11,000 Gacaca jurisdictions, which include approximately 250,000 Rwandans who serve on Gacaca in some capacity. Gacaca was responsible for the trying and sentencing of all genocidal crimes with the exception of those responsible for the planning and organization of the genocide, which were referred to the ICTR. As of 2012, approximately 2 million genocides had been tried, with 65% being found quality. Guilty verdicts resulted in imprisonment and others participated in community service or some other form of reparation.

Truth Commissions are often utilized domestically to address state crimes. The first Truth Commission was enacted in Uganda in 1974 and as of 2002, there have been 19 Truth Commissions across the globe. The purpose of Truth Commissions is to create a report on human rights violations which includes testimony provided by human rights victims. However, some Truth Commissions also have the legislative power to grant amnesty to
offenders and recommend prosecution, as was the case with the South Africa Truth and Reconciliation Committee and the Sierra Leone Truth Commission. (Rothe, 2008).

It is evident that a both domestic and international apparatuses are in place to provide retributive functions following state crime and have had varying levels of success. Additionally, Truth Commissions, domestic courts such as Gacaca, and International Criminal Tribunals all participate in incapacitation. For those who commit the most heinous grievances against humanity and are known to have planned and executed mass killings, it is generally supported that for the safety of society, these perpetrators should be incarcerated. There are few people who believe that Ferdinand Nahimana, Jean Bosco Barayagwiza and General Ante Gotovina should be free. However, these apparatuses often have dual functions. The purpose of both Truth Commissions and the Gacaca courts in Rwanda was not only to appropriate responsibility, but to provide justice and reconciliation. It is here that we note the restorative justice applications of these apparatus.

Traditional criminal justice systems are offender-oriented, meaning that the focus of the criminal justice system is focused largely on punishment of the offender. Restorative justice is victim-orientated, and provides much broader terms and more complex analyses in establishing who the “victim” is. In many instances of state crime, it becomes difficult to determine who exactly is a victim and who is the offender, which makes selecting one form of traditional punishment difficult. State crimes such as genocide are often the result of mass hysteria, propaganda, and moral panic which often causes irrational acts of violence. Looking at offenders within the general population who may have fallen prey to mass hysteria propaganda and moral panic in the same lens with which organizers of state crime are viewed is often problematic. Furthermore, in instances of state crime, it becomes difficult to pigeon hole individuals to one category, either “victim” or “offender.” Often times multiple roles are occupied (Sullivan and Tifft, 2005).

Restorative justice practices are focused on not only addressing the harm caused by and endured by victims and offenders, but it focuses on the harm inflicted upon the community as well. Through the restorative justice process, the needs of all three components are addressed, by actively taking steps to repair the harm that resulted by involving all parties that are involved, and involving the community in restorative process.

Gacaca courts in Rwanda were charged not only with the punitive end of justice, but the primary role of Gacaca was to foster forgiveness and reconciliation among remaining Rwandans. In fact, Gacaca courts have been considered the largest attempts at implementing restorative justice that the world has seen. Following the slaughter of approximately 1 million people in 90 days, traditional incarceration was simply not an option. Imprisoning over 100,000 perpetrators of state crime in a country that just lost a large portion of its population was not feasible for economical as well as social reasons (i.e. loss of labor). It has been noted that restorative justice was most applicable in Rwanda because there was no other option. Perhaps that is true. However, victims were able to take an active role in the legal process and offenders were encouraged to take responsibility for their actions and make reparations. This partially puts justice in the hands of victims. Gacaca courts allowed those already in prison to be released to participate in Gacaca. If Gacaca determined their guilt and the offender provide information about his or her crime as well as experienced remorse, their prison sentence was often suspended and the duration of their time was to be spent in their communities provided community service. This example illustrates how restorative justice measures address the needs of victims, offenders and the community and focuses on repairing the harm to all three apparatuses.

Because restorative justice measures often encompass (to varying degrees) a variety of punishment responses, it is often an appropriate avenue in which to address the punishments of very complex state crimes. Restorative justice opens itself to rehabilitation of the offender, yet also allows for retribution and incapacitation, as is needed for those who organize and
perpetrate the most heinous of crimes. Uniquely, it allows victims voices to be heard, and for them to take an active role in the criminal justice process. Restorative justice apparatuses focus on justice, reconciliation, and reparation for the community, victim and offender. This dual triangular relationship essentially does not exist in other punishment models and often times makes restorative justice a logistical choice. However, the logistical end should not over shadow the potential therapeutic nature of this approach.

The punishment response to state crime is notoriously difficult due to the complexity of the crime and those involved. However, as mass atrocities and crimes against humanity continue, an appropriate response to this type of crime is needed. Truth and Reconciliation Committees, International Criminal Tribunals, and Gacaca courts in Rwanda provide examples of how restorative justice apparatuses operate and potentially address the needs of those who survive instances of state crime. Further research of these types of apparatuses is needed to further understand the appropriate punishment response.

References

Late Medieval Mediterranean Apocalypticism: Joachimist Ideas in Ramon Llull’s Crusade Treatises

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A volume centered on the theme “Changes in Culture and Technology” should contain an essay dedicated to the thirteenth century. James Joseph Walsh famously called the thirteenth the “greatest of centuries.” So many groups, institutions, and ideas developed during this time and profoundly changed the medieval world. The Franciscans, Dominicans, and other mendicants replaced the Benedictines, Cistercians, and other monks as the dominant religious orders. Monastic and cathedral schools gave way to universities as the preeminent institutions of learning. Modern states began taking shape, and national identities began their slow emergence. These thirteenth-century developments remain with us today and continue to shape the modern world.

Great adversities accompanied these changes. A disagreement over the meaning of the vow of poverty split the Franciscan Order into two parties, the Spirituals and Conventuals, shortly after the group’s founding. The Spiritual Franciscans were a minority of the Franciscan Order. Spiritual groups first appeared in Italy, then Provence (southern France), the Crown of Aragon, and Sicily. These groups believed the Franciscan vow of poverty meant having a poor possession (usus pauper) of goods. The majority of Franciscans, who became known as the Conventual Party, maintained that the Order fulfilled its vow of poverty by granting ownership of all its possessions to the papacy. Franciscans could use grand churches and other costly goods as long as they did not own them. The Spirituals contended, however, that the vow of poverty included not only the renunciation of ownership but also the renunciation of all goods, except the barest necessities. The Spirituals and Conventuals feuded throughout the latter half of the thirteenth century and into the fourteenth until the dissolution of the former group in 1317.

Violent struggles also occurred as modern states began forming in the thirteenth century. Present-day Spain began taking shape as the Christian kingdoms of the northern Iberian Peninsula, namely Portugal, Castile, and the Crown of Aragon, expanded southward into Muslim Spain (al-Andalus). Led by the royal dynasty known as the House of Barcelona, the Crown of Aragon in eastern Spain also expanded across the Mediterranean Sea into Sicily. Sicily had been ruled by Charles I from the House of Anjou, a French dynasty of counts who became kings of southern Italy in the mid-thirteenth century. The conquest of Sicily by the Crown of Aragon ignited a war between the Houses of Barcelona and Anjou known as the War of the Sicilian Vespers. This bloody conflict lasted twenty years (1282-1302) and heavily influenced southern European politics and religion.

Such violent and numerous changes often create a sense of impending doom. Society seems to enter a state of chaos as the status quo changes. Many people have tried to make sense of chaotic times through apocalypticism, beliefs about the world’s rapidly approaching end. Apocalyptic texts place chaotic times near the end of the world in broad, often divinely conceived, paradigms of history. Fitting into overarching models of history gives moments of discord a sense of meaning, significance, and order. In the thirteenth century many southern Europeans turned to the historical paradigms of Joachim of Fiore (c. 1135-1202). Originally a junior chancery official like his father, Joachim decided to enter the religious life after a pilgrimage to the Holy Land (modern-day Israel and Palestine) in 1167. He lived first as a

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hermit, then a priest, and finally, around 1171, a monk at the monastery of Corazzo in southern Italy. Joachim quickly became abbot of Corazzo and eventually founded his own monastery called San Giovanni in nearby Fiore. Joachim’s writings made him famous throughout southern Europe. These writings include eighteen treatises, two poems, and a few letters and sermons. Most of these texts describe Joachim’s two historical paradigms that predict the world’s end in the thirteenth century. After Joachim’s death few people became Joachites—strict followers of the abbot’s paradigms. Yet the writings of numerous thirteenth-century thinkers, especially among the Spiritual Franciscans, do show signs of Joachimist influence. They reflect several themes in the abbot’s thought, such as impending tribulation, new religious orders, and the end of history.

Antonio Oliver and Martin Aurell have suggested a Joachimist influence in the works of one of thirteenth-century Spain’s most famous authors, Ramon Llull. Born around 1232, Llull lived the life of a licentious troubadour in the Kingdom of Majorca, the part of the Crown of Aragon consisting of the Balearic Islands (Majorca, Minorca, Ibiza, and Formentera) and small regions (Roussillon and Perpignan) in southeastern France. In his early thirties Llull began having visions of Christ on the Cross. He abandoned his troubadour lifestyle and devoted his life to spreading Catholic Christianity among Muslims, Jews, Greek Orthodox Christians, and other peoples outside the Catholic Church. Llull decided converting non-Catholics was the “service . . . most pleasing to God,” because he believed humanity could only achieve its end or purpose through Catholic Christianity. Like many Catholic thinkers in the high medieval period (1000-1300), Llull maintained humans were “created so that God be loved, known, honoured, served and feared by man.” Humanity’s purpose, or what Llull usually calls humanity’s first intention (intentio prima), is thus to worship and understand God. In Llull’s view, Catholic Christianity offers the only way to achieve this first intention because only its doctrines, like the Trinity and Incarnation, explain divine nature. Llull argued other Christian and non-Christian faiths do not lead humanity to its purpose, so he endeavored to bring everyone into the Catholic fold.

Llull wrote 265 works containing numerous strategies for spreading Catholicism. Together these strategies form a conversion program organized around three broad themes—mission, philosophy, and crusade. Many strategies describe how to prepare missionaries to proclaim the Gospel in non-Christian lands. Even more strategies explain how the truth of Christian doctrine can be proven through Llull’s original Neoplatonic philosophy known as the Art (Ars). Several strategies concern ways to execute successful crusades. Llull wrote some of the best summaries of his conversion program in his Tractatus de modo convertendi infideles (1292), Liber de fine (1305), and Liber de acquisitione Terrae Sanctae (1309). Yet modern scholarship has paid most attention to the crusading aspects of these treatises. Llull admittely wrote the texts for audiences, described further below, who were organizing crusades, and these treatises do contain Llull’s most in-depth comments on crusading. Llull, however, used these works, especially his most extensive treatise De fine, as an opportunity to promote all aspects of his conversion program. Each treatise contains sections describing Llull’s missionary proposals and Art. Llull wrote these texts to garner support for not only his crusade proposals but also his entire conversion program.

Llull’s conversion program indeed needed support. Its author had failed to gain much attention for his program outside the Kingdom of Majorca until the last two decades of his life. In the Middle Ages and today, many of Llull’s ideas seem “extravagant and extreme,” contradictory, and downright confusing. Llull has consequently gained a reputation as a utopian “in the sense that his life and works represent an escape from reality.” More and more studies, though, are beginning to show Llull had an acute awareness of the political, intellectual, and religious circumstances of his times. Vicente Servera, for instance, has noted that Llull used utopian images as rhetorical devices. He portrayed exaggerated or idealized figures to show what the world should be like. Llull’s utopianism, according to
Servera, makes his writings an “art of seduction.” Llull carefully chose his words so that his texts "might appear like a military tactician’s address." His rhetoric motivates his intended audience to take specific actions by paying close attention to their likes and dislikes. Like Servera’s essay, this article further challenges the image of Llull as a utopian and tries to understand better the author’s rhetorical skill. It demonstrates Llull’s firm connection to his time by analyzing one of the most overlooked themes of De fine—apocalypticism. This article concludes Llull utilized Joachimist words and themes, for which his Mediterranean readers had a liking, as persuasive devices to promote his conversion program. It comes to this conclusion first by examining Joachim of Fiore’s ideas that shaped thirteenth-century apocalypticism. The article then identifies what political circumstances and individuals spread Joachimist ideas throughout the late medieval Mediterranean world. A review of the apocalyptic passages in Llull’s treatise follows, and finally Llull and Joachim’s apocalyptic beliefs are compared.

The apocalyptic ideas that Llull encountered in the late medieval Mediterranean world came from Joachim of Fiore’s historical paradigms. Joachim developed his paradigms from biblical exegesis. Apocalypticism usually results from scriptural interpretation, but Joachim read the Bible in a new way. He invented a new theory of exegesis called concordia (harmony), which he defined as:

"A similarity, equality, and proportion of the New and Old Testaments. I call it an equality of number but not of dignity, when, by means of some likeness, one person and another person, one order and another order, one war and another war, seem to gaze into each other’s faces. Abraham and Zachary, Sara and Elisabeth, Isaac and John the Baptist, Jacob and the man Christ Jesus, the twelve patriarchs and the same number of apostles, as well as all other similar cases . . ."

In other words, concordia is the recognition of repeating patterns in the Bible and history. Through concordia, for instance, Joachim equates Jacob and Jesus Christ. The former founded Judaism, while the latter founded Christianity. The two figures have many different characteristics. Joachim attributes to Christ a much higher “dignity,” or level of spiritual understanding, than Jacob. Yet they both have the same function in their respective ages as founders of new religions. Concordia is similar to allegorical exegesis, but Joachim carefully distinguishes concordia “as parallels between the two Testaments, not as allegorical interpretations.” Allegories seek to understand which New Testament figures and events the Old Testament foreshadowed. Concordia, in contrast, focuses on the functions of figures and events. It seeks to describe how people and events similarly shaped history rather than the symbolic meaning of historical figures and occurrences. E. Randolph Daniel considers the difference between these two methods of biblical exegesis so substantial that he regards concordia as Joachim’s greatest innovation.

Marjorie Reeves, in contrast, views Joachim’s two historical paradigms (diffinitiones) as his most original conceptions. Joachim’s first paradigm divides history into three ages (status):

Because there are three coeternal and coequal trinitarian persons, when we take into account that which exemplifies the likeness of these persons the first status is reckoned from Adam to Christ, the second from King Josiah to the present time, the third from Saint Benedict to the consummation of the age. When, however, we omit the initial tempora and concentrate on that phase which is crucial to each status, then the first status is reckoned from Abraham, Isaac, and Jacob, up to Zachary, the father of John, or even to John himself and to Christ Jesus. The second is reckoned from
this same time up to the present. The third is reckoned from the present time to the end.\textsuperscript{xxix}

Each age belongs to a member of the divine Trinity. The first is the Age of the Father. The second is primarily the Son’s but secondarily the Holy Spirit’s. The third is the Age of the Holy Spirit alone. Like a tree, each age has three phases—one when it grows, the most important one when it matures (\textit{clarificatio}) and bears fruit (\textit{fructificatio}), and a final one when it declines and decays. These ages overlap when all of their phases are taken into account. The first age, for example, ends with Christ (c. 7 BC–c. 33 AD), but the second begins beforehand with King Josiah (c. 648 BC–c. 609 BC). The \textit{status}, however, follow one another when only their middle and most significant phases are considered. The first age matures from the time of the Jewish patriarchs, Abraham, Isaac, and Jacob, to that of the Jewish priest and prophet Zachary, his son John the Baptist, or Jesus Christ. The second bears fruit afterward until Joachim’s time. The abbot of Fiore thus lived at the end of the second age’s maturation, and he predicted the flowering of the Holy Spirit’s Age would occur shortly afterward between 1200 and 1260. Joachim regarded this time as the most important part of his historical paradigm. He believed the third age would prepare humanity for eternity with God after history had ended on earth.\textsuperscript{xxx}

Joachim’s second historical paradigm explains how the Age of the Holy Spirit would bring about the end of history and prepare humanity for the rest of eternity. This paradigm consists of two eras (\textit{tempora}). The first era corresponds to the Old Testament and Jews, the second to the New Testament and Christians. The first era lasts from Adam to Christ, the second from Christ to the world’s end.\textsuperscript{xxxi} Each era includes seven periods defined by seven major wars or persecutions, and ends with a restful Sabbath period meant to spiritually prepare humanity for eternity with God. The Egyptians, Midianites, various unspecified nations, Assyrians, Chaldeans, Medes and Persians, and finally the Greeks persecuted the Jews during the first era.\textsuperscript{xxxi} The persecutions of the Christians during the second era came from six kings—Herod, Nero, Constantius, Muhammad, Mesemoth, and Saladin—and their three peoples—the Jews, Pagans, and Muslims. Herod leads the Jews, Nero and Constantius the pagans, and Muhammad, Mesemoth, and Saladin the Muslims. Joachim predicted the final persecution of the second era would happen under two Antichrists and their unknown followers during the thirteenth century.\textsuperscript{xxxiii} The abbot consequently became known as the “Prophet of Antichrist.”\textsuperscript{xxxiv}

Out of these persecutions, Joachim envisioned two religious orders emerging. One group would consist of monks; the other would contain hermits. Joachim referred to these orders collectively as the spiritual men (\textit{viri spiritualis}). These orders would develop under the persecutions of the second era, which would teach the spiritual men the “eternal gospel (\textit{doctrina spiritualis}).” This gospel refers to the spiritual knowledge necessary to bring about the “fullness (\textit{plenitudo})” or completion of history.\textsuperscript{xxv} Joachim, like many Christian thinkers, believed history would be completed after “the Jews and many pagan races [are] converted to the Lord.”\textsuperscript{xxvii} Here the term “pagan” signifies anyone adhering to a religion outside of Christianity.\textsuperscript{xxvii} Joachim also thought the end of history would not occur until the Greek Orthodox Church and heretical Christian sects reunited with the Roman Catholic Church. The Catholic Church, in other words, truly had to be \textit{universal} before eternity with God, the time after history, could begin.\textsuperscript{xxviii} The preaching of the spiritual men, endowed with the eternal gospel, would lead all non-Catholics into the Roman Church, according to Joachim’s second paradigm.

The spiritual men would also lead the Church itself. The end of history could not occur, according to Joachim, until the Catholic Church was reformed. The abbot wanted to further the Gregorian Reforms, attempts by the papacy to stop clerical abuses, and free the Church from the control of secular rulers. He additionally recognized monasticism needed reform as
well. Monastic orders like the Cistercians were criticized for their wealth and avarice, and general enthusiasm for the monk’s way of life began to decline in the late twelfth century. Joachim believed the leadership of the coming spiritual men would reinvigorate both monasticism and the overall Church. Purified by the struggles of the second era, the spiritual men would in turn purify the world by spreading what they had learned from their suffering.

Joachim predicted the spiritual men would appear during the sixth period of persecution in his second paradigm, the same time as the transition between the second and third status of his first paradigm. Joachim claims “the order of the married . . . seems to pertain to the Father . . . the order of preachers in the second time to the Son, and so the order of monks to whom the last great times are given pertains to the Holy Spirit.” The spiritual men, in other words, would dominate during the third status (the age of the Holy Spirit) just as prelates dominated the second status (the age of the Son) and laymen the first status (the age of the Father). Further analysis of Joachim’s paradigms is unnecessary for the purposes of this article. The main themes of Joachim’s apocalypticism have been reviewed. These ideas—the abbot’s theory of concordia, patterns of history based on the Divine Trinity, eras of persecutions, spiritual men, and sense of history’s imminent end—influenced apocalypticism from the thirteenth to the sixteenth centuries.

Joachim’s ideas became so influential due to several personalities and politico-military circumstances in Mediterranean Europe. Ramon Llull, as we shall see, had connections to many of the events and people that spread Joachimist influences in the late thirteenth and early fourteenth centuries. The first factor for the rise of Joachimist influence was the crusades. Apocalypticism has been a part of crusade literature since Pope Urban II launched the First Crusade at the Council of Clermont (1095). Guibert, the French abbot of Nogent-sous-Coucy, recorded Urban’s apocalypticism in his Deeds of God through the Franks:

Thus through you the name of Catholicism will be propagated, and it will defeat the perfidy of the Antichrist. . . . These times, dearest brothers, perhaps will now be fulfilled, when, with the aid of God, the power of the pagans will be pushed back by you . . . with the end of the world already near. . . . Nevertheless, first, according to the prophecies, it is necessary, before the coming of the Antichrist in those parts, either through you or through whomever God wills, that the empire of Christianity be renewed, so that the leader of all evil, who will have his throne there, may find some nourishment of faith against which he may fight. Consider, then, that Almighty providence may have destined you for the task of rescuing Jerusalem from such abasement.

Like Joachim, Urban believed the end of the world was near. The pope, according to Guibert, envisioned Antichrist rising in the eastern Mediterranean world to persecute Christians. Urban wanted crusaders to retake the Holy Land, among other reasons, so that a Christian force would be prepared to repel Antichrist. The end of the world continues to loom in later crusade texts, especially those written in the thirteenth century. After Jerusalem was lost in 1187, five major expeditions attempted to recover the city or at least secure the remaining crusader states in the Holy Land. Each crusade, except for Holy Roman Emperor Frederick II’s brief recovery of Jerusalem (1229–1244), ended in utter defeat. Writers used apocalypticism to motivate crusaders to action or console Christians after defeat. Llull could have simply included apocalypticism in his crusade treatises to keep with the traditions of previous crusade authors.

Yet Llull had other reasons to include apocalypticism, and more importantly a Joachimist-influenced apocalypticism, in his treatises. Joachimist ideas spread throughout Mediterranean Europe, particularly in the Crown of Aragon, due to the War of the Sicilian
Vespers and the controversial Spiritual Franciscan party. The war, as mentioned above, pitted the Spanish and French dynasties, known respectively as the House of Barcelona and House of Anjou, against one another for control of Sicily. The war began with the Sicilians’ rebellion against Charles I of Anjou’s government on Easter Monday, 1282. The war also took its name from this rebellion. The Sicilians’ revolted at Vespers, the evening prayer at sunset according to the canonical hours. King Peter III of Aragon took advantage of this political discontent to press his claim for the throne of Sicily. Peter’s wife Constance was the daughter of Manfred, the previous king of Sicily whom Charles of Anjou overthrew. In August 1282, Peter was elected king of Sicily thanks to his ties to the previous rulers of Sicily and the rebel Sicilians’ need for aid against Charles of Anjou’s forces. Peter also became a messianic figure to many writers like the Franciscan chronicler Salimbene de Adam. These writers also portrayed Charles of Anjou as Antichrist. Peter, who would be remembered as Peter the Great for his military victories, seemed divinely favored as he pushed Charles’ forces out of Sicily and repulsed a numerically superior army of French crusaders attacking the Crown of Aragon in 1285. The House of Barcelona embraced this messianic image of their kings by welcoming numerous apocalyptic thinkers into their lands during and after the War of the Sicilian Vespers (1282-1302).

Apocalypticism, with a Joachimist flair, proliferated throughout the Crown of Aragon due to the influence and writings of thinkers such as Arnau de Vilanova. Born in Valencia a few years after Llull around 1238, Arnau studied at the universities of Montpellier and Naples. His studies allowed him to become a physician and envoy for popes, including Boniface VIII, Benedict XI, and Clement V, and kings, such as Robert of Anjou, James II of Aragon, and Frederick III of Sicily. Arnau exerted additional influence on the latter two kings as their theological advisor.

Arnau’s theology was filled with Joachimist beliefs. He indeed was one of the few thirteenth-century Joachites—strict followers of the abbot’s paradigms and thoughts—not just a writer somewhat influenced by Joachimist ideas. The titles of his works alone suggest he was a Joachite. His Introductio in librum Joachim de semine Scripturarum (Introduction to the Book by Joachim “On the Seed of the Scriptures”), for instance, is a commentary on an apocryphal work of Joachim. The abbot did not actually write this work, but Arnau thought he did. Arnau’s Expositio super Apocalypsim (Explanation of the Apocalypse) carries on Joachim’s Trinitarian division of history. In the Tractatus de tempore adventus Antichristi (Treatise on the time of the coming of the Antichrist), Arnau recalculated when Antichrist would arrive. Using exegetical methods just like Joachim, Arnau argued Antichrist would arrive in 1368 rather than the thirteenth century as Joachim had predicted. Arnau’s prominent positions at James II’s and Frederick III’s courts, although he and James ultimately had a dramatic falling out, demonstrate the House of Barcelona’s welcoming attitude toward apocalyptic thinkers.

Llull would have certainly encountered Arnau’s Joachimist ideas, because the two writers moved in similar circles. Like Arnau, Llull served James II of Aragon as an envoy. Llull clearly did not have as much influence over James as Arnau. The latter enjoyed an annual pension of 2000 solidi from the king, while Llull had to be present at court for a year, which he rarely was, to receive at most 1,460 solidi. A few years before his death (c.1316), Llull also visited the court of Arnau’s other major patron, Frederick III. It seems likely Llull and Arnau met on one or more occasions. Both made similar travels through the Crown of Aragon, France, and Italy. A letter between Llull’s Genoese friend Christian Spinola and James II suggests Llull was planning to meet Arnau in Marseille in 1308, but no evidence confirms the two actually met at that or any other time. Arnau and Llull did know, whether they ever met, about one another’s works. The two discussed similar themes, such as crusade, mission, and apocalypticism, in their writings. Arnau, in fact, called himself and Llull the
“two modern messengers of truth.”\textsuperscript{114} The Crown of Aragon’s most famous doctor, therefore, could be one of the sources for Joachimist ideas in Llull’s crusade treatises.

Arnau also influenced a group of Spiritual Franciscans in the Crown of Aragon with his Joachimist beliefs.\textsuperscript{115} The Spirituals were a minority within the Franciscan Order who believed poverty meant renouncing the ownership and use of all goods, except the barest necessities. This conviction in absolute poverty united the many groups of Spirituals, who otherwise held a great variety of beliefs.\textsuperscript{116} Many, but not all, Spirituals, for instance, held Joachimist beliefs. The two greatest Spiritual theologians, Pierre Jean Olivi and Angelo of Clareno, were Joachites. Llull probably met Olivi while studying at the University of Montpellier in 1289. Olivi was assigned as a lecturer at the university’s Franciscan school by Ramon Gaufredi, General of the Franciscan Order, that same year.\textsuperscript{117} Gaufredi was close to the Spirituals and Llull. In 1290, he sent a group of Spirituals, including Angelo of Clareno, on a mission to Cilician Armenia (southeast Turkey) to protect them from Conventual persecution.\textsuperscript{118} That same year Gaufredi wrote a letter allowing Llull to preach in the Franciscan convents of Italy.\textsuperscript{119} Pope Boniface VIII thought Angelo of Clareno’s group of Spirituals disputed his election as pope, so he condemned them and dismissed Gaufredi as General of the Franciscan Order.\textsuperscript{120}

Llull probably attended the last General Chapter meeting over which Gaufredi presided in 1295 at Assisi. Gaufredi, despite his dismissal, remained a staunch supporter of the Spirituals and defended Olivi’s works in 1309. Gaufredi’s protégé Bernard Délicieux also had close connections with the Spirituals and Llull. He admired Olivi and was an associate of Arnau de Vilanova. He met Llull in 1296 at Rome, where Llull gave him copies of his \textit{Taula general, Tree of Science}, and other works.\textsuperscript{121}

Joachimist influences in Llull’s crusade treatises could have come from Délicieux, Gaufredi, Olivi, or Arnau of Vilanova. Many members of the Majorcan court also held Joachimist beliefs. Llull grew up at court and served as seneschal to James II of Majorca before his religious conversion.\textsuperscript{122} James’ youngest son Philip became very close with Angelo of Clareno, and like his brothers James and Fernando, he entered the Franciscan Order.\textsuperscript{123} James II’s daughter Sancia surrounded herself with Spiritual advisers, such as Robert of Mileto and Andreas de Gagliano, in Naples. Her husband Robert of Anjou, King of Naples, likewise supported the Spirituals and even wrote in their defense to Pope John XXII, who dissolved the party in 1317.\textsuperscript{124} James II of Majorca’s family further demonstrates Joachimist ideas permeated the late medieval Mediterranean world. How many Joachimist ideas Llull learned from James’ family is debatable. Llull was rarely in Majorca during the last two decades of his life, and most of James’ family did not adopt Joachimist beliefs until after Llull’s crusade treatises had been written.\textsuperscript{125} Philip, for example, did not meet Angelo of Clareno until 1311, approximately two years after Llull’s last crusade treatise, \textit{De acquisitione}, was completed.\textsuperscript{126} It seems more likely that Llull learned Joachimist ideas from Arnau of Vilanova, Olivi, Gaufredi, or Délicieux. James II of Majorca’s family, nevertheless, proves the Spirituals were an extremely popular religious group in southern Europe. The Spirituals, in fact, became so popular that modern historians agree “one only really knows a Southern European of this time—the later thirteenth and early fourteenth centuries—if one knows his attitude to the controversy over the Spiritual Franciscans.”\textsuperscript{127}

Llull utilized the Joachimist ideas circulating around southern Europe, due to the Spirituals and War of the Sicilian Vespers, to promote his conversion program. He knew apocalyptic ideas resonated with the rulers of the Crown of Aragon, so he included several apocalyptic passages in the \textit{Liber de fine (The Book Concerning the End)}, the crusade treatise he presented to James II of Aragon.\textsuperscript{128} He ended the prologue of \textit{De fine}, for example, with an apocalyptic warning:
This book contains material through which they [the lord pope, his cardinals, and Christian princes] could with Jesus Christ’s grace restore the world to a good age and unite it in one universal flock. If they indeed wish to do this, well enough. But if not, I am excused as much as possible. And hence on the Day of Judgment, I will acquit myself before the highest judge by pointing my finger and saying, “Lord, Just Judge, personally behold those to whom I have spoken and written, since I am better able to compose texts. I have shown them by recovering Your one, most true grave, the city of Jerusalem, and the Holy Land, they could, if they desired, convert and return the unbelievers to the unity of our Catholic faith.”

This warning not only showcases Llull’s apocalypticism but also describes the purpose of *De fine*. The book is far more than a crusade treatise. It contains more than tactics for a military campaign, although most scholars have focused on those parts of the text. It provides diverse methods, namely evangelical missions, crusades, and Llull’s Art, to bring the entire world into the Roman Catholic faith. That is the text’s main purpose. *De fine*’s title suggests it is a book about apocalypticism, but its real “end” is to spread the Catholic faith throughout the world. Joachim’s historical paradigms have the exact same purpose. They show how history has prepared spiritual men to spread Catholicism to all peoples.

*De fine* and Joachim’s paradigms also have a similar sense of urgency due to their apocalypticism, the sense of history’s end, or God’s divine judgment rapidly approaching. John Tolan mistakes this urgency for desperation in *De fine*. Llull had found little support for his conversion program before writing *De fine*, and Tolan sees the treatise as “a bitter rumination over the failure of his ideas, and a last desperate plea that the Pope, cardinals, secular rulers, someone [Tolan’s emphasis] take heed of what he is saying.” Llull certainly wants to grab the attention of secular and church leaders in *De fine*. Yet he never seems desperate or disillusioned with himself in the text. He may seem angry as he describes himself at the Last Judgment pointing out (*cum digito demonstrando*) the rulers who did not heed his proposals. He may even seem threatening as he suggests their dreadful punishment:

> It is not permitted for me to know what kind of judgment there will be for those [who do not heed my proposals]. It only pertains to Him who has known everything throughout eternity. I nevertheless know and certainly expect . . . that God’s justice will be great. . . . Let he who has ears for hearing, hear what I have said. Let him fear the terror of the great judgment into his mind.

Here again Llull utilizes apocalypticism to oblige his readers to accept his conversion program. He makes yet another reference to the Last Judgment when God will severely punish the wicked—in Llull’s view, those who have ignored him. This use of apocalypticism does not constitute a desperate plea, as Tolan contends, but rather demonstrates Llull’s rhetorical skill. In the preceding passages Llull channels the widespread apocalyptic beliefs of the late medieval Mediterranean world into compelling arguments for his conversion program. He wants his readers to feel a desperate and urgent need to accept his proposals, but he does not feel desperate himself.

*De fine* gives no indication that Llull considered any of his proposals a failure. Llull indeed seems at peace with his efforts to spread Catholic Christianity. He maintains: “I excuse myself to God the Father, his most just Son, and the Holy Spirit . . . then to the most blessed Mary, mother of the Son of God incarnate, and to the entire court of heavenly citizens, since I cannot do more.” Llull, however, believes his readers can do more. The author claims that their failure to implement his plans is preventing the Holy Land’s recovery and the growth of the Catholic Church. He warns, moreover, that his readers’ failure is not unnoticed:
And Christ therefore will see who are his friends and who are not performing their duty. Their names will be written in his divine memory, righteousness, and power. And this writing will remain until the Day of Judgment. On that day they will be read, and thereafter ‘the door will be closed’ (Matt. 25:10). The good will rejoice when their names are read, but the evil will harbor resentment, grief, and anger at the sound of their names.

Llull considers himself Christ’s true friend. He has no reason to feel desperate or disillusioned. He has done his duty for the Roman Catholic Church through his writings and conversion program. Llull hopes his audience will do its duty and follow his advice. Otherwise the Majorcan mystic foresees a cruel, painful punishment awaiting them on Judgment Day.

These passages alone do not suggest a clear Joachimist influence in De fine. Their apocalypticism is too general. They suggest the end of the world is imminent, yet the world’s approaching end was a common trope, begun by Pope Urban II, in crusade literature. The Joachimist influence in De fine only becomes discernible when these passages are considered together with Llull’s frequent use of the word “status.” Llull peppers his first crusade treatise, the Tractatus de modo, and De fine with this term. It is the same term Joachim uses in his tripartite historical paradigm that divides history between the ages of the Father, Son, and Holy Spirit. Llull uses status in the abbot’s sense of “age” about half of the time he refers to it in his crusade treatises. He frequently laments the evil age (malus status) in which the world has entered. He grieves that in his time:

There are few Christians, and still there are many unbelievers, who daily attempt to destroy Christians, who capture and usurp lands by multiplying themselves, who blaspheme by vilely denying the most holy, true, and dignified Trinity of God and the Incarnation of our Lord Jesus Christ, and who to the disgrace of the heavenly court possess the Holy Land.

Llull believes the world has entered an evil age because to him Catholic Christianity seems like the numerically smallest and militarily weakest religion. He recognized that Catholic Christians were surrounded by peoples of other faiths during the thirteenth century. Muslims controlled the southern tip of Spain, much of Africa, and together with the Mongols, the Middle East. The Mongols, along with Orthodox Christians, also controlled Eastern Europe. Pagans ruled in several regions of Northern Europe. These peoples often raided and occupied Catholic territories. The Egyptians Mamluks, for example, conquered Acre, the last remaining Christian stronghold in the Holy Land, in 1291. Llull’s crusade treatises present a conversion program to recover the Holy Land and “move the world . . . to a good age.” Llull’s program intends to bring about this good age (bonum statum) by bringing all peoples into the Catholic faith. This plan may appear utopian today, but many medieval Catholics, as discussed above, assumed the entire world would be converted to their religion at the end of time. Joachim assumed as much in his two historical paradigms.

Llull and Joachim’s status indeed share several similarities. Both the Majorcan mystic and Calabrian abbot considered their present ages as times of trial and tribulation for the Catholic Church. Joachim believed he was living through the Church’s final persecutions between the age of the Son and Holy Spirit. Llull thought the Church was shrinking as non-Catholics encroached on Catholic lands. Both Joachim and Llull additionally maintained Islam was the cause of many Christian tribulations in their status. According to Joachim, Islam’s founder Muhammad, a North African leader named Mesemoth, and the Egyptian sultan Saladin led three of the Church’s seven persecutions. After the Holy Land’s loss in 1291, Llull feared Muslims would continue overtaking Christian lands unless they were
converted. \textsuperscript{1xxx} Both Joachim and Llull also expected Muslims and all other peoples outside the Catholic Church to convert during the world’s next age. Joachim foresaw spiritual men, purified by past persecutions, spreading the faith, while Llull envisioned his conversion program multiplying the Church’s followers. Pere Rossell, who taught Llull’s Art in Alcoy, Barcelona, and Cervera during the fourteenth century, recognized so many similarities between Llull and Joachim that he considered the former the Messiah of the abbot’s third age. \textsuperscript{1xxxi}

But Llull “only moderately [took] part in eschatological ideas.”\textsuperscript{1xxxi} He utilizes apocalyptic ideas in treatises like \textit{De fine}, but he only dedicates one entire text, the \textit{Llibre contra Anticrist} (c. 1274-76), out of his immense corpus to the subject of apocalypticism. Llull’s apocalypticism, moreover, does not have heavy Joachimist overtones. He never promotes Joachim’s historical paradigms. He disagrees with Joachim over important issues, such as the role of the crusades in history. Joachim initially supported the crusades, although he always maintained the spiritual men played a more important role in humanity’s salvation. He told Richard the Lionheart, king of England, that his crusade would recover Jerusalem and end the sixth persecution of Christianity under Saladin. Richard’s crusade failed, however, and this failure convinced Joachim that only the spiritual men could stop the persecutions of Christians. Crusading was futile in the abbot’s mind, and many of his Spiritual Franciscan followers, like Peter John Olivi and Angelo Clareno, likewise rejected the crusade.\textsuperscript{1xxvii} Llull, in contrast, “shun[ned] . . . the quietism and passivity” of Joachimist thought and vigorously advocated crusading, especially in his later years.\textsuperscript{1xxviii} He promoted violence against non-Catholics in his crusade treatises and several other works, including \textit{The Book of the Order of Chivalry} (1274-76), \textit{Blaquerna} (1276-83), \textit{Liber super Psalmum “Quicumque vult”} (1288), \textit{Disputatio Raimundi christiani et Homeri Saraceni} (1308), \textit{Liber disputationis Petri et Raimundi} (1311), \textit{Liber de locutione angelorum} (1312), and \textit{Liber de civitate mundi} (1314).\textsuperscript{1xxix}

Llull did not want his works to evince a strong Joachimist influence for fear of alienating papal support. Many popes favored the Conventuals in their feud with the Spirituals, even though the Spirituals were very popular, as explained above, among southern Europeans. Popes disliked the Spirituals because they feared the party rejected papal authority. Gerard of Borgo San Donnino’s \textit{Evangelium aeternum} (c. 1254-55), for instance, claimed that the Franciscans were Joachim’s spiritual men destined to lead the Church.\textsuperscript{1xxx}

Llull wanted widespread support for his conversion program, so he carefully chose his words in his crusade treatises to appeal to their intended audiences. Pope Nicholas IV, the first pope from the Franciscan Order, did not seem very hostile to the Spirituals.\textsuperscript{1xxxi} Llull thus allowed very subtle Joachimist influences in the \textit{Tractatus de modo}, which he presented to Nicholas, like the frequent use of the word “\textit{status}.” \textit{De acquisitione}, in contrast, barely contains any use of \textit{status}, since hostility to the Spirituals was growing under the pontificate of its intended audience, Clement V. The former Franciscan General Ramon Gaufredi, in fact, defended Olivi’s works from renewed scrutiny the same year as \textit{De acquisitione} was written (1309), and Clement’s successor, John XXII dissolved the party.\textsuperscript{1xxix} Llull realized Clement disliked Joachimist ideas, so \textit{De acquisitione} contains few apocalyptic elements.

Llull chose to include apocalyptic and subtle Joachimist ideas in his second crusade treatise, \textit{De fine}, because he presented it to James II of Aragon, a member of the House of Barcelona. The War of the Sicilian Vespers and Spiritual Franciscans had made this dynasty very receptive to Joachimist ideas, and James was no exception. He indeed patronized Arnau of Villanova, as mentioned above, for much of the doctor’s life. Llull, who was also patronized by James, would have known about the House of Barcelona’s regard for Joachimist ideas, so he includes some in \textit{De fine}. Yet these ideas, namely the world’s present evil age and future good \textit{status}, remain subtle. Llull ultimately wanted \textit{De fine}, like his other

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treatises, to reach the papacy. James probably presented *De fine* to Clement V shortly before the pope’s coronation in 1305.\(^{xc}\)

Llull’s crusade treatises, the *Tractatus de modo*, *De fine*, and *De acquisitione*, prove their author was not a Joachite. Yet Joachimist influences surrounded Llull in the late medieval Mediterranean world. Unlike a utopian disconnected from his time, Llull paid close attention to these influences. He utilized the Joachimist ideas permeating Europe as persuasive devices to promote his conversion program. A skilled writer, Llull carefully placed in his crusade treatises apocalyptic words and images least likely to offend the papacy and most likely to attract the support of Catholic princes. Medieval Europe was drastically changing in the thirteenth century, and Llull wanted to ensure it was entering his idea of a good age.

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\(vi\) Bernard McGinn, *Visions of the End: Apocalyptic Traditions in the Middle Ages* (New York: Columbia University Press, 1979), 3-4, 30-31. Many historians find the terms “apocalypticism” and “eschatology” synonymous, but McGinn sees a subtle difference between the two. Eschatology is the field of theology that concerns issues associated with the end of humanity, such as death, the final judgment, heaven, and hell. Apocalypticism is the belief in the world’s imminent end. The difference between apocalypticism and eschatology lies in urgency and emphasis rather than content. Apocalyptic and eschatological texts often discuss the same issues, but the latter discusses those issues for their own sake. The former discusses them to give significance to a certain time. Eschatological texts, in other words, give readers the impression the end of humanity will occur at some time, whereas apocalyptic texts show it will happen very soon. McGinn’s distinction, though in need of examples of purely eschatological texts, emphasizes the political and historical aspects of apocalypticism. This article highlights similar features of apocalyptic texts, so the term apocalypticism will be used in it instead of eschatology.

\(vii\) Bernard McGinn, *The Calabrian Abbot: Joachim of Fiore in the History of Western Thought* (New York: Macmillan Publishing, 1985), 18-19. In the Middle Ages chanceries issued and preserved charters, grants, and other documents for secular and religious officials, such as monarchs, bishops, and the pope.


xii Ramon Lull, Vita coaetanea, edited and translated as Ramon Llull: A Contemporary Life by Anthony Bonner (Barcelona: Tamesis, 2010), 33.


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Joachim of Fiore, The Book of Concordance, 120.


Joachim of Fiore, The Book of Concordance, 133.


Daniel, “Joachim of Fiore,” 84.


Reeves, “The Originality and Influence of Joachim,” 298.


Joachim of Fiore, The Book of Figures, 139-40; Daniel, “Apocalyptic Conversion,” 137.

John V. Tolan, Saracens: Islam in the Medieval European Imagination (New York: Columbia University Press, 2002), 12-19. St. Isidore classified religions outside the Catholic Church as either pagan, heretical, or Jewish. Many Catholic authors, including Joachim, utilized this system until the late Middle Ages. Here Joachim only mentions Jews and pagans, but he also mentions heretics, unorthodox Christian sects, in other works.


Guibert of Nogent, Gesta Dei per Francos, translated as The Deeds of God through the Franks by Robert Levine (Woodbridge: Boydell Press, 1997), 44.

Tolan, Saracens, 194-213. Pope Innocent III, for instance, used apocalyptic themes in his encyclical Quia major to promote the Fifth Crusade. The Dominican friar William of Tripoli made an apocalyptic prediction about Islam after the defeat of Louis IX’s
Tunisian crusade. He claimed all Muslims soon would be converted, exiled, or destroyed in his *Notitia de Machometo*, so Christians should not worry about failed crusades.


The Canonical Hours are the times for the daily public prayer known as the Divine Office in the Christian Church.

Pope Martin IV called for the crusade as retribution for Peter’s conquest of Sicily. The kingdom of Sicily was a vassal state of the papacy, which had granted the kingdom to the French House of Anjou.

Arnau’s calculations sparked a debate among theologians at the universities of Paris and Oxford over the orthodoxy of calculating the end times. The Dominican Order, moreover, began an inquisitorial trial to determine if Arnau was a heretic. The trial lasted from 1301 until 1305 when he was cleared. Arnau defended himself in a variety of epistles and tracts, such as the *Apologia de versutiis atque perversitatibus pseudotheologorum et religiosorum* ("Apology on the Astuteness and Perversities of Pseudo-Theologians and Pseudo Religious Men"). These writings were not about apocalypticism, yet Arnau nevertheless used apocalyptic themes in them. He, for instance, had a penchant for calling his detractors supporters of Antichrist.

Debate surrounds the terms “Spiritual” and “Spiritual tradition” because they cover such a wide variety of groups. The utility of classifying these diverse groups under the same terms has been questioned but not resolved. This article does not focus on the differences between individual groups, so it retains the umbrella terms.
Hillgarth, *Ramon Lull and Lullism*, Chronological Table and pp. 53-54; Daniel, *The Franciscan Concept*, 82.

Angelo of Clareno, *A Letter of Defense to the Pope Concerning the False Accusations and Calumnies Made by the Franciscans*, in *Apocalyptic Spirituality*, ed. McGinn, 162; Antonio Oliver, “El Beato Ramón Llull,” 13.55-56. Many names have been attached to Angelo’s group, including the Fratacelli and Poor Hermits.


Hillgarth, *Ramon Lull and Lullism*, 53-55; Anthony Bonner, “Ramon Llull and the Dominicans,” *Catalan Review* 4, no. 1-2 (1990): 387-88; Oliver, “El Beato Ramón Llull,” 13.55; Hillgarth, *Diplomatari lullià*, 27.60-61. These books, which many churchmen considered heretical, were used as evidence against Délicieux’s orthodoxy when he was arrested in 1319 for poisoning Pope Benedict XI.

Hillgarth, *Ramon Lull and Lullism*, 53.

Hillgarth, *Ramon Lull and Lullism*, Chronological Table.

Musto, “Queen Sancia of Naples,” 196.

Hillgarth, *Ramon Lull and Lullism*, 53.

Hillgarth, *Ramon Lull and Lullism*, 64-65.

Llull, *De fine*, 251: “In quo libro continetura materia, per quam possent, mediante si vellent gratia Iesu Christi, ad bonum statum reducere universum et ad unum ouile catholicum adunire. Si enim hoc velint facere, bene quidem; autem, excusatus sum iuxta posse. Et hinc in die iudicii me excusabo coram summo iudice, sic dicendo et etiam cum digito demonstrando: Domine, iudex iuste. Ecce illos personaliter, quibus dixi, et per scripta, ut melius potui, demonstravi modum, per quem, si voluissent, potuissent convertere infideles, et reducere ad nostrae fidei catholicae unitatem, recuperando vestram verissimam sepulturam una cum civitate Ierusal, et Terram sanctam.” The term “unbelievers (infideles)” is used as an umbrella term here, similar to Joachim’s use of the word “pagans” above. Unbelievers, however, refers to a much larger group of people. The term includes anyone who does not believe in the Roman Catholic faith, while pagans signify anyone in a religion besides Christianity or Judaism. The term “unbelievers” was offensive in the Middle Ages and remains so today. It is retained in this article for the accuracy of the translations. Raimon Panikkar Alemany, “Intercultural and Intrareligious Dialogue According to Ramon Llull,” *Catalònia* 43 (October 1995), 32-35; Kent Eaton, “A Voice of Reason Amidst Christian and Islamic Jihad,” *Fides et Historia* 37 (2005): 25-33; Albrecht Classen, “Early Outreaches from Medieval Christendom to the Muslim East: Wolfram von Eschenbach, Ramon Llull and Nicholas of Cusa Explore Options to Communicate with Representatives of Arabic Islam; Tolerance Already in the Middle Ages?,” *Studia Neophilologica* 84 (2012): 151-65. Llull’s use of the term also demonstrates he was not as tolerant as modern scholarship has suggested.

Aziz S. Atiya, *The Crusade in the Later Middle Ages*, 2nd ed. (New York: Kraus Reprint, 1970); Sylvia Schein, *Fideles Crucis: The Papacy, the West, and the Recovery of the...

ll xxi Tolan, Saracens, 268.

llxxii Llull, De fine, 251-52: “Tunc super ipsos iudicium quale erit, non est licitum mihi scire; solum illi pertinet, qui scivit omnia ab aeterno. Tamen bene scio et firmiter recognosco . . . quod Dei iustitia in iudicio erit magna. . . . qui habet aures audiendi, audiat hoc, quod dixi, et feruenter in terrore magni iudicii suum imprimat intellectum.”

llxxiii Llull, De fine, 250: “Excuso me Deo Patri et etiam iustissimo suo Nato et sancto Spiritui . . . deinde beatissimae Virgini, genitrici Dei filii incarnati, et toti curiae ciium supernorum. Quoniam in isto negotio facere plus non possum.”

llxxiv Llull, De fine, 273: “Et ideo videbit Christus, sui amici qui sunt, et qui non sunt ad istud officium pertractandum. Nam nomina eorum in divina memoria erunt scripta et in sua iustitia, et etiam potestate, Et scriptura usque in diem iudicii haec durabit. In qua die bonis cum gaudio lecta erit, et malis cum rancore, tristitia et dolore; et ianua clausa erit (Matt. 25:10) postea in aeternum.”

llxxv Llull, Tractatus, 336, 345, 348, 351; De fine, 250-51, 258, 283, 289.

llxxvi Daniel, “Joachim of Fiore,” 73. Status means “state” or “condition” the other half of the times Llull uses it.

llxxvii Llull, De fine, 250: “pauci sunt christiani, et tamen multi sunt infideles, qui conantur cotidie, ut ipsos destruat christianos, et multiplicando se eorum terras capiunt et usurpant, sanctissimam Dei uram et dignissimam trinitatem ac Domini nostri Iesu Christi incarnationem beatissimam blasphemant, uiliter abnegando, et ad dedecus caelestis curiae possident Terram sanctam.”


llxxix Llull, Tractatus de modo, 351: “mundum . . . ad bonum statum converti.”


llxxli Llull, Tractatus, 348.


llxxliii Aurell, “Eschatologie, spiritualité et politique,” 199: “ne participe que modérément de ses idées eschatologiques.”


llxxlv Servera, “Utopie et histoire,” 202: “s’écarte . . . de quiétisme et de passivité.”


llxxviii Reeves, “Pattern and Purpose,” 93; Daniel, “Apocalyptic Conversion,” 129; Lawrence, The Friars, 56.

llxxvii Schein, Fideles Crucis, 87.

llxxix Hillgarth, Ramon Lull and Lullism, 53; Musto, “Queen Sancia of Naples,” 196.

xc Hillgarth, Ramon Lull and Lullism, 65.
Reproductive Genetics: Desired Genes, Gendered Ethics, and Eugenic Echoes

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Introduction

Science fiction works feature laboratories filled with made-to-order test tube babies, suggesting a technocratic and utopic reproductive future. World history evidences multiple movements through which the majority, the elite, and the powerful tirelessly attempted to eradicate undesirable traits by limiting reproductive options for peoples whom they believed contaminated the hereditary pool. Humans want the best outcomes for future generations; we value reproductive success, whatever we imagine that to mean in a particular historical moment. Eugenics encompasses “all prospective studies and purposes to improve, cure and create a race that would be exempt of various diseases and disabilities” (Güvercin & Arda, 2008, p. 20). As noble as creating a healthy human race may seem, efforts to do so continually bring side effects of discriminatory and violent policies for various groups of people that fall under the moments’ definitions of “unfit” or “dangerous” reproductive candidates.

Mathematician Francis Galton formally introduced the concept of eugenics in 1883, defining it as “the study of the social control mechanisms that can better or worsen the mental and physical states of the upcoming future generations” (Güvercin & Arda, 2008, p. 21). Eugenic policies and sentiments have seen much iteration. Some “positive” policies sought to increase the presence of desired genes in the population, and some “negative” policies worked to contain and eradicate traits deemed undesirable. Eugenics has earned its negative reputation and gloomy connotations, but scholars now face old ethical eugenic questions with new, complex reproductive technologies.

Present knowledge of genetics and biomedical assisted reproduction make fertile ground for a new type of eugenics: reproductive genetics. Proponents of reproductive genetics aim to separate these techniques from the problematic and negative connotations associated with historical eugenic policies by claiming them as part of the liberal eugenic movement. This camp claims “that people should be able to choose genetic enhancements for their offspring, should these become safely available” (Fenton, 2006, p. 35). Not all scholars will agree with my nestling of reproductive genetics into the eugenic framework, but the eugenic echoes present in reproductive genetics discourse are too powerful to dismiss. In-vitro fertilization (IVF), the market for sperm and eggs, and prenatal genetic testing allow conscious decision-making regarding the potential genetic make-up of children. Decisions are made in a gendered and politicized environment, shaping our understandings of genes, eggs, and sperm around stereotypes and ideal social norms. In choosing “desirable” characteristics, whatever they may be, the characteristics avoided are classified as “undesirable.” It is not necessarily wrong or immoral to engage in this decision-making, but to avoid the eugenics of our past, we must acknowledge that reproductive genetics processes engage with ideas of gendered bodies, (im)morality, and medical authority. Elizabeth Ettore defines reproductive genetics as “utilization of DNA based technologies in the medical management and supervision of the reproductive process” (Ettorre, 2000, p. 403). Because the range of DNA based technologies is great, there are many genic reproductive techniques available in the United States, but the
discussion here is limited to in-vitro fertilization (IVF), the market for sperm and eggs, and prenatal genetic testing.

IVF and Genetic Choice

The degree to which a reproductive genetic process is eugenic depends upon the opportunity for decision-making that it offers. IVF is often the first reproductive technology that comes to mind when considering assisted reproductive options. In-vitro fertilization means eggs are fertilized with sperm in a lab and then placed in the uterus. Some IVF procedures involve eggs and sperm from the couples who wish to be parents themselves; they don’t shop around for eggs or sperm. But even this scenario is evaluative because IVF involves the fertilization of multiple eggs and the transfer of the one most likely to thrive to the uterus (Franklin, 1997, p. 200). It is easiest to understand IVF as eugenic when the egg and or sperm are selected for their potential success and desired genes; but even without this step, the fertilized egg is normatively evaluated, and some fertilized eggs will be discarded.

IVF does not necessarily carry with it the negative tropes of eugenics, but we too often classify it as unchallenged progressive medicine, offering expanded reproductive options. Sarah Franklin’s “The embodiment of progress” discusses the social meanings and conceptualizations of IVF and resulting pregnancy. Franklin situates IVF as a response to failed conception and an avenue of new hope for couples struggling to conceive, which it absolutely is. Franklin simultaneously problematizes our notions of successful and failed conception. IVF gives couples renewed hope because they can try again if it fails, but the process can make feelings of failure more profound with each failed attempt (Franklin, 1997, p. 213). This technology has changed the very way we consider conception, something previously taken for granted as a “fact of life” that either happens or does not happen (Franklin, 1997, p. 199). We use the same term, “conception,” whether the egg is fertilized in a lab dish or in-utero, via artificial insemination or during intercourse, but each type of conception carries its own connotations.

IVF is often discussed as “giving nature a helping hand.” The process is both ordinary and extraordinary because it still involves an egg joining a sperm to make a baby, but with technological “help.” These paradoxical attitudes are also attached to resulting children, “Much as the comments of would-be parents and the professionals that assist them in the context of IVF emphasize the normalness and naturalness of assisted conception, they also affirm that there is ‘something special’ about the children born from this technique” (Franklin, 1997, p. 200). Not only does IVF change the way children are conceived and add an evaluative step to that conception, but it also shapes the way resulting children are viewed by the parents and others. So even if we consider it all “conception resulting in a baby,” we should be careful to understand that these words do not label homogeneous experiences.

Prenatal Testing and Gendered Experience

The variety of experience is sharply articulated between men’s and women’s encounters with reproductive genetics. Reproduction is necessarily gendered because it involves sperm from a male and an egg from a female, while women are the only physical child bearers. This is especially salient during prenatal diagnostic tests to determine genetic risks of the growing fetus. Ettorre discusses the ramifications of available prenatal diagnostic technology in “Reproductive genetics, gender and the body: ‘Please doctor, may I have a normal baby?’” The possibility of discovering disabilities before birth puts pressure on mothers regarding the decision to a) learn about the (dis)ability of their unborn child and b) whether or not to bring that child into the world. Ettorre explains that the pressure on women is greatest because medical authority confronts them most directly. Their bodies are most closely equated with
“body as machine” discourse because they are literally building the baby in the womb (Ettorre, 2000, p. 406). Women serve as the very locus of production, and the pressure to produce a healthy baby is intensified when the technology allows monitoring and thus detection of disability, which is viewed as deviance.

The capacity for in-utero testing forces us to conceptualize the responsibility of having children; women bearing children where this technology is available are affected whether or not they employ it. Barbara Katz Rothman challenges us to remember that “to choose, to choose not to choose, to have, to have not, to bear, to bear not, is to bear responsibility” (Rothman, 1996, p. 53). Regardless of the mother’s moral persuasion or her situation, the stakes are instantly higher because she already took on “the burden of another person’s life” (p. 53). Rothman is a mother, a woman, and an expert in the field of prenatal testing, but also a woman who has never been in the position of deciding whether or not to undergo prenatal testing (p. 52). Yet she boldly states her indecisive judgment on prenatal testing. “Isn’t the fact that I don’t know, that someone reasonably smart, moderately thoughtful, a woman, a mother, terrifically knowledgeable about this—if I don’t know what I would do, doesn’t that tell you something?” (Rothman, 1996, p. 54). This tells us that a decision to have the testing done is one fraught with responsibility and controversy. First of all, the procedure is somewhat invasive and carries risks. Her hesitancy also communicates that the availability of the test is a pressure to women; it is another responsibility they must decide to take on or to cast off, all on the behalf of their unborn child.

Genes and Morality

The stakes of prenatal testing are high because of what a mother or a medical professional can do with the resulting information. Ettorre argues that a new morality of healthy bodies emerges when disabled bodies can be detected and aborted before birth (Ettorre, 2000, p.404). True, detection of disability before birth has the potential to discourage knowingly bringing disabled babies to term. Some argue that it is a burden to society to bring disabled and thus costly bodies into society (Ricci, 2009, p. 16), but prenatal diagnosis and the morality of a healthy body cannot override or transcend the moral debates surrounding abortion either. Though reproductive professionals or other sources of social power may try to evaluate bodies and genes normatively, “problems arise as attempts are made to make hard and fast distinctions between good and bad genes” (p.406). The good and bad in genetic material are not as black and white as they are in real machines; the analogy can be pernicious.

Though good genes and bad genes are problematic categories, we are persuaded to conceptualize potential heredity this way because as a whole, genomics and genetic science has privilege in American culture. In “Feminism confronts the genome,” Ettorre et al. expand on the critical and reflective qualities of feminist theory as they apply to the ideology of genetics, which is itself already critical in the sense that it engages with embodiment, bodily autonomy, etc (p.134). “What individuals actually face when they confront the genome has been mediated by biomedicine: they confront geneticized illness, and they confront issues of procreation” (Ettorre et al., 2006, p. 139). The very nature of procreation is entangled with genetics because we understand the genome too well to separate reproduction and health from that realm.

As impactful as reproductive genetic technologies and process are, the way we speak about them is even more powerful, for better or worse. Our reproductive knowledge, assisted by technology or not, is discussed in gendered and thus politicized terms. In “The egg and the sperm: How science has constructed a romance based on stereotypical male-female roles,” Emily Martin deconstructs the stereotypical gender roles that inform how scientists study and discuss eggs and sperm. Martin finds that the stereotypes used communicate that “female biological processes are less worthy than male, and that women are less worthy than men”
The language used to discuss sperm is active and powerful, while passive language is used when discussing the role of the egg (Martin, 1996, p. 31). The suggested autonomy of sperm as compared with dependent eggs permeates the scientific literature about reproduction, meaning these stereotypical connotations with male and female gender characteristics are normalized in scientific and educational literature.

The Market for Genetic Material

Many reproductive genetic techniques start with the acquisition of eggs, sperm, or both. The market for reproductive materials is gendered because our very understanding of those materials is permeated by gendered language, creating very different experiences for men and women involved. Rene Almeling explains the forces at work in the market for eggs and sperm through three theoretical frameworks: 1) feminist discourse of sex and gender, 2) economic market factors of supply and demand, and 3) the medicalization of assisted reproduction. The market for eggs and sperm is distinct from other bodily commodities because these particular materials and the bodies that produce them are gendered, carrying cultural connotations and structural expectations associated with those respective genders (Almeling, 2007, p. 323). In the end, Almeling finds that more altruistic language is used to recruit egg donors and conceptualize eggs as compared to sperm donors and sperm (p. 326). While searching for donors, “both egg agencies and sperm banks place advertisements listing biological requirements (e.g., age), but egg agencies emphasize the ability to help while sperm banks portray donation as a job, an early distinction shaped by gendered stereotypes of parenthood that is maintained throughout” (Almeling, 2007, p. 336). Egg donors are paid far more than sperm donors because egg donation is far more invasive and eggs are less available than sperm. Despite this market valuation, women encounter advertising that urges them to consider the other in need of her precious eggs; the focus is on the assistive action as opposed to the compensation. This language is poised to appeal to women’s supposed nurturing nature and motherly instincts.

Changing Discourse

Though the commercialization of eggs and sperm has depended upon standard and longstanding sex stereotypes, reproductive genetic technology has simultaneously created new dialogues, forging completely new categories of identity. Novas and Rose defend genetic testing and genetic knowledge in “Genetic risk and the birth of the somatic individual” by problematizing the arguments against these technologies and results. Novas and Rose claim that genetic medicine and biotechnology have changed notions of personhood. The category of identity in focus here is the “person at genetic risk,” created with a) the understanding that many illnesses “have a genetic basis,” b) scientists’ claimed capability to “characterize the genetic sequences or markers” of the disease, and c) medicine’s claim that diagnostic tests can identify individuals at risk before the onset of symptoms (Novas & Rose, 2000, p. 486). Each of these conditions evidences that “life is now imagined, investigated, explained, and intervened upon at a molecular level” (p.487). The very context for understanding human life has been radically changed with the rise of genetic knowledge. Normalizing the molecular level of understanding in science and life further evidences the privileging of genetic science and thus the perceived immorality of choosing not to engage with it through prenatal testing.

Proponents of liberal eugenics urge the public to reconsider their very understanding of human nature to accommodate the molecular understanding of dynamic human biology. Elizabeth Fenton engages with the critics of liberal eugenics and successfully illuminates the shortcomings in arguments that rely on the concept of “human nature.” In “Liberal eugenics & human nature: Against Habermas,” Fenton cautions against the insistence that human
nature is intrinsically valuable and in need of protection because that position assumes “there are aspects of being human that are or that ought to be unchangeable” (Fenton, 2006, p. 36). Regardless of whether we find this argument persuasive about eugenic decision-making, it does require the problematization of a static human nature.

Scientific Authority and Ethics

Reproductive genetics and assisted procreation cultivate ethical dilemmas because they are somewhat uncharted territory, forcing humans to evaluate how they perceive scientific knowledge. Ricci articulates this well in “Assisted procreation and its relationship to genetics and eugenics.” Genetics lies uneasily between the realms of “science in its traditional sense (abstract, theoretical knowledge that does not directly influence everyday life, and is thus neutral) and technology or the application of scientific assumption, which is subject to judgments of an ethical nature” (Ricci, 2009, p. 7). Even if we have moved past conceptualizing science or any other kind of knowledge as “neutral,” information is at least most accessible and open to interpretation in its abstract sense before interpretation by scientists. The problem lies with the scientific community presenting potential future findings with the authority of tried and true science.

Too often with reproductive genetics “an invented scientific story reveals itself as anticipation of the technical reality, and this…forgets the objective difficulties of realization due to limitations imposed by our current knowledge” (Ricci, 2009, p.23). The public, eager to believe in expanded reproductive control, may be too easily caught up in romantic and abstract hopes about the capability of genetics to help make a better human population (i.e. eugenics). Ricci wisely recommends that we listen to those with disabilities (p. 22) and scientists themselves, not those pushing the development of diagnostic technology (p.23), when conceptualizing ethics for reproductive genetics.

In considering ethical procedures for reproductive genetics, medical discourse should be truthful, but the public’s interest and intellect should not be discounted either. As discussed earlier, society is conditioned to digest genetic knowledge. Genetic discourse and counseling could potentially help patients express their own agency, instead of limit their autonomy in interactions with medical personnel and technology. People actively think about their own bodies and wellness; they do not passively consume media portrayals of genetic debates (Bates, 2005, p. 424). The men and women interested in reproductive genetics are actively evaluating the information available to them, so it needs to be accessible and clear. The public often gets lost or misled because of distorted medical rhetoric that is twisted and used for political purposes (Bouffard et al., 2009, p. 387), but not because they are ignorant or lazy consumers of information. The language has the power to “sell” unrealistic expectations, like the “perfect child,” which is exceptionally problematic because it is undefined and unattainable (p. 387). Making reproductive decisions in a time of reproductive genetics implies the negotiation of many inputs from others regarding bodies, health, and procreation.

Regulation

The most controversial of these inputs is nation-state regulation. So far the discussion of reproductive genetic technology has implied a large degree of personal freedom and choice. But reproductive genetic decisions are not made in a vacuum, free from political and public policy. The FDA regulates sperm donation, requiring STD testing and medical documentation whether the donation takes place anonymously through an agency or privately and directly (St. Charles, 2013, p. 142). The only instance when the FDA is not involved is when sperm is transferred through intercourse.
Leigh-Anne St. Charles questions the constitutionality of this regulation based on the plethora of “contraception and abortion cases that declare reproduction a fundamental right under the theory of substantive due process” (p.143). It is ironic that only those participants who actually come in sexual contact are allowed to skip the STD testing while those who may never come in contact must undergo such tests frequently (St. Charles, 2013, p. 143). However, we must remember reproductive genetics often draws a wide range of families to the reproductive process, and they have unique needs.

If the government chooses to regulate reproductive genetic procedures, individuals most affected by those policies will likely be disenfranchised as they already experience underrepresentation in political arenas. More heterosexual couples are in the market for eggs while singles and lesbian couples make up a larger proportion of sperm buyers (Almeling, 2007, p. 325). This demographic difference communicates a potential power differential because the majority of voters are heterosexual couples while homosexual couples are not only the minority, but already face adversity fighting for reproductive options. Stakeholders in reproductive genetics have different needs. If those needs are not equally considered in legislative policy, ethics and regulation will once again echo historical eugenics in which the elite and powerful decide reproductive options for others.

**Conclusion and Recommendations**

We must include new voices in the discussion of ethical reproductive genetics to ensure no population is spoken for, but instead self represented. Is Reproductive Genetics a form of eugenics? Yes. Does it have the potential to cause the same issues as historical eugenics? Yes. But this is a risk because of the unequal powers at work, unequal access to decision-making about which genes to value, and unequal representation in the moral debate. Ethical standards need to regulate reproductive genetics, but this version of ethics must be multi-vocal and develop out of thorough social analysis.

**References**


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Legal and Ethical Considerations for Social Media Hiring Practices in the Workplace

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In the modern world, social networking sites and specific social media avenues have allowed people to interact in ways not seen in previous generations. Students have the ability to work on group projects and share information in real time through synchronous mediums, whether that is a file uploaded for everyone to see or instant messaging systems to discuss key points. Faculty and staff at a university are able to disseminate information about upcoming events, deadlines, or opportunities for their colleagues and followers to participate in. The entire university community can communicate with one another, without ever needing a physical presence.

Social media can be defined as technology that facilitates shared information, user created matter, and collaboration (Elefant, 2011). Examples of social media can include Facebook, Twitter, LinkedIn, Myspace, YouTube, and Wikipedia among other sites that facilitate interactions on a virtual basis (Broughton, Higgins, Hicks, & Cox, 2010). Paul and Chung (2008) add their own broader examples including blogs, forums, social networking sites, wikis, and virtual communities.

Social media has undoubtedly evolved and continues to do so with each day. Social media in its infancy was not as widespread in the personal lives of people, let alone in the workplace. Recently, social media has captured a significant amount of time of individuals and exists in every aspect of their lives. Facebook is the most popular social media site and has over 1.3 billion monthly users as of March, 2014 (Lönnqvist & Itkonen, 2014). This technological phenomenon does not only affect the academic realm, but extends to every single workplace in existence.

Current Usage of Social Media in Hiring Practices

Because social media sites have been growing more and more popular, employers are taking advantage and using these sites in their hiring processes. Companies and organizations looking to hire applicants have seen an increasing value in utilizing social media to check the background of individuals. According to Davison, Maraist, Hamilton, and Bing (2012), a 2008 survey of United States human resources departments found 84% of employers utilized online search engines to find applicants, an increase from 77% back in 2006. The sample size in this study was not provided in the article. Furthermore, this survey also found that an additional 9% of those sampled planned to implement this feature into their human resources departments and hiring processes in the future. Nguyen (2014) writes, “According to the 2013 CareerBuilder survey conducted online within the U.S. and Canada, which polled 5,518 job seekers and 2,775 hiring managers, 44% of the hiring managers stated that they would research the job applicants on Facebook, 27% would monitor the candidate’s Twitter accounts” (p. 1). The candidate and employer relationship during background checks has changed from researching criminal convictions to looking over the moral and ethical character of an online persona.

There has been significant discussion on how the usage of social media in hiring practices can be both a benefit and a hazard for job seekers of today’s world. According to Vicknair, Elkersh, Yancey, and Budden (2010), a positive aspect of this practice is the additional information and skills that can be demonstrated by a candidate that simply cannot be
replicated through paper and pen. Candidates have been offered jobs due to their social networking profiles reflecting well-roundedness, creativity, displays of awards, and just looking like the correct fit (Vicknair et al., 2010). Individuals can post their past projects and examples of work to highlight qualities, showing how they can fulfill a void in a company or organizational structure. Some candidates have even taken to including their social networking personal sites in their cover letter or resume to entice employers to look online and view their posted material. Paul and Chung (2008) identify many advantages of online content for employers. This includes the ability to recognize conflicts between an employee’s application and online profiles. In addition, the online content connects employees through projects and personality similarities, and it also helps create employee based applications using latest technological research of employee behaviors. According to the authors Clark and Roberts (2010), “SNSs (social networking sites) are also serving as an inexpensive and quick source of background information on job applicants and current employees for employers” and will continue to do so into the future (p. 507). Because this process is extremely convenient and fast, it is not surprising that so many companies are turning to social networking sites. However, not everyone feels as if this is an ethical process. Clark and Roberts (2010) continue to write, “Even though employers may have a legal right to use SNSs in this way, it is wrong for employers to do this unless the information obtained in this manner is essential to the job” (p. 508). In essence, is screening a social networking site of a candidate necessary and will possible information seen be relevant in determining the “fit” for a new employee in a workplace?

There is no law in place that restricts employers from considering information on an individual’s Facebook profile when making a recruitment decision, but there are other issues involved with using social networks in this process (Broughton et al., 2009). It has been noted that candidates can create a hazard for themselves if their virtual personality is viewed as demonstrating poor communication skills, harshly criticizing previous employers, indicating drug use or excessive drinking, and even posting perceived provocative and inappropriate photographs. The applicants who have material posted to their social networking sites that is deemed inappropriate or offensive by a human resources agent could be rejected for a potential job. Sprague (2011) states, “70% of hiring and recruiting professionals in the United States have rejected a candidate based on data found online” (p. 5). The reasons these candidates were not chosen were mostly due to lifestyle concerns, in the form of inappropriate comments and text. Other concerns involved were unsuitable photos, videos, and information (Sprague, 2011). In addition, Davison, Marast, Hamilton, and Bing (2012) note that human resources departments are also using social networking sites of applicants to detect any differences between their resume and cover letter as compared to their virtual postings. Public profiles allow information that would not be seen on a standard paper application, which causes legal issues to flourish. Such information could include one’s nationality, marital status, age, gender, and other protected classes under federal or state employment anti-discrimination laws and statutes (Moore, 2011). Screening of social networking sites is expected to continue affecting job recruitment, hiring, promotion, training, performance management, and termination and it is necessary to understand these issues (Nguyen, 2014). Therefore, not only are potential employees at risk for not getting a job due to social media content, but they are also at risk for losing a job because of it.

What does this mean for job seekers in today’s world? Applicants are being screened beyond the physical papers handed in, like a cover letter or resume, and instead can be scrutinized through their virtual life. Applicants need to understand that their current actions via social media can lead to future problems. Individuals that have material posted to their social networking sites that is deemed inappropriate or offensive by a human resources agent could be rejected for a potential job. In this day and age, it is often said to be “safe rather than sorry” when considering posting any information online. With the increasing usage of social
networking sites as a screening tool for human resources management and other departments, these words would be wise to consider even more strongly than before.

Legal Considerations

The leading legal issue in conflict with companies’ and organizations’ social media screening of applicants involves the public profiles of candidates. Discrimination claims can be brought up against an employer if an applicant feels that an employer did not interview them due to knowing the applicant’s race, gender, nationality, religion, sexual preference, disability, marital status, or other information not afforded by a face-to-face interview (Moore, 2011). By looking at one’s social media profile, employers would be able to determine a lot of these traits, whether voluntarily offered through an online persona or not. Due to LinkedIn having a limited number of African-American (5% of the LinkedIn population) and Hispanic (2% of the LinkedIn population) participants, companies relying heavily on this social media site for recruiting principles may be accused of unlawfully trying to keep job offerings off-limits to these populations (Elefant, 2011). In further research Sprague (2011) states, “Social network searches should be conducted by someone who will not be making the hiring decision so that protected class characteristics that may be discovered can be removed from any information considered by the decision maker” (p. 32). Also, receiving an applicant’s consent prevents the idea that employers are imposing on an individual’s privacy (Elefant, 2011). Although many employers do not obtain applicants’ consent prior to the hiring process, it is a suggestion to be considered. Even courtroom attorneys and judges have been criticized or punished through the legal system for similar activity. An example includes individuals posting information that inadvertently reveals confidential information about a case (Lackey & Minta, 2012). With the increasing amount of employers looking to social media to screen applicants for open jobs, employers must be careful of how the information they see is interpreted and used.

According to Paul and Chung (2008), there are five personal or civil rights of the employee, including: (1) right of free speech, (2) right of privacy, (3) right to be free of defamation or attack, (4) right to protest employer action, and (5) implied right to be judged based on accurate information. With this idea in mind, each part can be used to help explain potential legal considerations. First, the right to free speech can be seen through the first amendment a person brings up when an employer looks to silence an employee’s protesting remarks about a company. If the employee disseminates information about a company that includes violent remarks, threats, or intimidation, or that reveals confidential information, this content may not fall under the right to free speech argument (Paul & Chung, 2008). Second, the right to privacy in regards to social networking sites continues to be a spot of conflict between employee and employer. In a general sense, courts do not consider individuals to have a reasonable expectation of privacy if the individual fails to use privacy settings or restrict access to content that others can find (Vinson, 2010). Third, the right to be free of defamation or attack can relate to the employer’s responsibility to provide a hostile-free environment in which an employee can work. This responsibility can include a number of considerations, such as not allowing sexual harassment or discrimination due to political views, but also simply not repeating the discriminatory views of others (Balkin, 1999). Employees should be able to protest employer action that creates a hostile environment but should make sure all information utilized is accurate, or else the employee can be liable for defamation claims (Raysman, 2012). Being judged on accurate information is something most applicants would like; thus the employer must be careful when seeking information from social networking sites to ensure a truthful representation of a person. As Davison, Maraist, Hamilton, and Bing (2012) report, social networking sites can reveal a snapshot view of a person’s state of mind at the time of the post, but do not give a full picture of the individual by any means.
One concern related to privacy protection includes an individual’s right to their own “place.” Sprague (2011) says, “In cyberspace, there are no physical spaces or clear boundaries delineating behavior and property” (p. 15). This lack of boundaries leaves very little protection for potential employees who utilize social media sites. Clark and Roberts (2010) state, “Online communities are a new way for people to interact, and this evolution of communication should be protected” (p. 514). It is important for companies to have their own regulations in place in order to protect themselves and employees as well. Elefant (2011) states, “Employers can monitor employees’ use of social media on work-issued equipment without concern about invasion of privacy when employees are made aware that their online communications are subject to oversight” (p. 17). One can omit some of the blurred lines by having open communication. In addition, ensuring employees understand the company’s standpoint on social media use is also helpful.

Another issue with online communication is that it is permanent, and even if a user omits information, it can still remain part of the SNS’s property and be recalled later on (Clark & Roberts, 2010). Cain (2008) writes, “Pictures or comments may remain linked with an individual long after the user’s attitudes and behaviors have matured” (p. 2). Having the appropriate privacy settings in place on social media sites can help prevent these pictures and comments from reaching those they were not intended for. However, many Facebook and other social media users are unaware of the privacy options and merely use the default settings. Facebook automatically defaults to the lowest possible privacy settings, assuming users want everything to be publicly available (Vinson, 2010). It is of great importance for candidates to understand the privacy options and to take full advantage of them.

One major argument regarding social media and the workplace is that there needs to be clear boundaries established between work and personal life (Clark & Roberts, 2010). It is important for applicants to differentiate the various contexts for situations. One thing they may say to a close friend could mean something completely different to an employer (Cain, 2008). When boundaries between personal and professional lives are blurred, it creates legal and ethical minefields (Vinson, 2010).

Ethical Considerations

Through public profiles, employers may see protected class information or sensitive and private activities that are not job-relevant but that may influence the employer’s view of a candidate, which brings in both legal and ethical questions (Moore, 2011). Not being able to independently verify information relating to a public profile means the credibility of what is found concerning the background of a candidate is at risk. Candidates who are the victims of identity theft may have no idea that a different virtual profile exists to which their name is attached and under which they are scrutinized. Additionally, employers may want to consider how searching candidates’ backgrounds online can affect the overall morale of current employees, who may feel discontent in their workplace due to fear arising from their own social networking profiles (Broughton, Higgins, Hicks, & Cox, 2010).

Another ethical question arises from whether candidates should have the right to know if employers are using social networking sites to screen or verify information they provided. In a 2009 survey, 49.3% of respondents were aware their social networking profiles could be viewed by employers, leaving a little over 50% believing otherwise (Vicknair, Elkersh, Yancey, & Budden, 2010). Furthermore, candidates and current employees may feel as if information exchanged between public profiles has an expectation of privacy from employers, but the open nature of the internet means this content can be accessed by anyone at any time (Cain, 2007). Most important for higher education employers, there is a push to understand the implications of searching candidates online. In the same 2009 survey above, 55% of the 289 respondents believed employers did not have access to view their social networking sites,
and yet 69.4% of the same population felt employers had the right to check their social networking profiles (Vicknair, Elkersh, Yancey, & Budden, 2010). This discrepancy can be explained if the on-campus respondents felt that employers could only research their profile and the information shared publicly, rather than those in which privacy settings have been utilized.

An additional ethical concern is related to who should be posting on behalf of the company. Raysman (2012) says, “Some businesses want their employees to contribute to the online public discourse within the company’s particular industry and enhance the company’s brand with meaningful interactions” (p. 11). However, in order for employers to avoid confusion and mishap in the workplace, a company should determine whether to encourage or discourage the use of social media by their employees (Raysman, 2012). If they decide to incorporate social media into the workplace, it is important to determine who has these rights. Having a designated person or group of people who are allowed to post on the company’s behalf ensures consistency, trustworthiness, and validity. A social media policy can help keep these policies in place. According to a description by Raysman (2012), “A social media policy is a written document that describes the dos and don’ts of employee behavior when communicating within the various new media platforms” (p. 11). This information is relevant to prospective employees because they could one day be designated to post on behalf of the company. It is extremely crucial for candidates to understand the multiple ethical concerns involved with their future employers, as they will have a great impact on these individuals when their time comes.

Higher Education Focus in Academic Departments

Higher education staff and faculty functioning within an academic department should take special note to understand the underlying issues possible with researching future employees online.

One of the easiest ways to help spread knowledge about social networking sites and potential screening processes by hiring departments is to educate upcoming university students about their postings and the lasting image they can have. In terms of academic departments, employers should understand the prevalence of social media on university campuses. As Lackey and Minta (2012) state, “the information often cannot be ‘unseen’ once someone who has hiring authority has viewed it [protected class information]” (p. 180). Vinson (2010) states, “Students, faculty, and administrators of law schools are using social networking in numerous ways and for various reasons, such as education, communication, marketing, fundraising, information, and socialization” (p. 375). If faculty or staff are in the habit of “ friending” students who then apply for positions where they work, these higher authority figures may have access to information that others would not know over the time the social networking connection was active (Vinson, 2010). If this information interferes with a person’s ability to view a potential candidate unbiasedly, then they should remove themselves from the selection process. The responsibility lies with faculty and staff to educate students about their social media sites as they prepare for their job searches. Understanding the implications related to the content of one’s social media site will be beneficial as individuals are considered by future employers.

Best Practices Moving Forward

With social networking sites evolving and continuing to permeate the workplace in multiple facets, it is important to understand, develop, and implement expectations for employees and employers alike to ensure a fair and positive environment. Davison, Maraist, Hamilton, and Bing (2012) had recommendations from their article, including (p. 15-17):
1. Develop policies regarding appropriate and inappropriate uses of internet searching
2. Base the use of internet screening media for selection purposes on recommendations from a job analysis
3. Conduct a risk-benefit analysis to determine if the legal risks of using internet screening media to assess applicants outweigh the potential benefits
4. Standardize assessments of internet screening media and use multiple raters
5. Verify the accuracy of information obtained from internet screening media
6. Disclose the potential use of internet screening media for selection decisions to applicants

According to Sprague (2011), “Employers need to be aware of what their employees post online, particularly if those publications relate to the employers’ products or services” (p. 33). Many individuals believe a right to privacy needs to be clearly established, in order to protect both the employer and employee (Clark & Roberts, 2010). Some guidelines for employers to consider when performing background checks via SNSs are: to not conduct a check unless it is directly related to the job, to provide notice to the employee prior to the check, to ensure the information collected is accurate, to not violate confidentiality, and to avoid intrusive data collection (Clark & Roberts, 2010).

One practice for moving forward to consider is designating specific individuals to represent the company in online posts, or having procedures in place for those wanting approval to speak on behalf of the company (Raysman, 2012). By having the proper policies and procedures established in regards to social media interactions, it helps prevent legal risks. Another practice for moving forward for employers to contemplate is rather than completely prohibiting social media at work, they can develop clear social media policies to guide employees regarding proper use during work hours (Elefant, 2011). Vinson (2010) also recommends a proactive approach in “Educating members of the legal field about the implications of using social networking, rather than prohibiting it,” (p. 405). In order to assist employees in understanding and following the implemented policies, employers should consider developing a social networking policy. This policy should clearly describe its purpose. In addition, a social networking policy should highlight the benefits, as well as the risks, involved. Lastly, it would be beneficial for the policy to explain the laws, social norms, and professional practices of communicating via social networking sites, while explaining ways to evade any harmful consequences (Vinson, 2010). It is highly recommended that companies create strict monitoring policies, and more importantly, ensure all employees are aware of these restraints (Elefant, 2011).

What does this mean for students and potential job seekers? Students need to be more aware of their online presence and how their posts, shares, “likes,” tweets, and other modes of communication can affect the outcome of their future with an employer. First, students should take a look at what has already been discussed on social networking sites regarding their behaviors offline. This would include looking for information posted not only by themselves but also by others about them. This will help students to understand how employers may view their behaviors or online presence through the eyes of someone else. Additionally, students need to be more informed about privacy settings and other options relating to their public profiles. Past research, as discussed above, demonstrates that students are growing in their online presence and it is easier than ever to find someone digitally through a simple Google search. By seeking privacy settings, students can help limit what information is available to those that seek it. However, it is ultimately on the student to understand how privacy settings work and whether utilizing the services will help or hinder their job prospects. Some employers may view restricted profiles with disdain as they ask the question, “What do they have to hide?” As a result, students will need to look beyond their current profiles and reconcile problems that may be hidden in the past of their social networking sites.
As we move forward, it is crucial for both employers and employees to be on the same page with social networking policies and procedures. Educating employees regarding the established guidelines will help prevent any mishaps in the workplace. Becoming informed on the best practices, and then applying them, will have a tremendous impact on the work environment.

References


The Human Ecology Dialectic: Culture as a Behavioral Adaptation

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The Human Ecology Dialectic (Figure 1) is a conceptual tool to understand how the seemingly oppositional theories championed by naturalist Darwin and cultural anthropologist Boas can coexist within the dialectic realm of biological anthropology. The theories will pose a dynamic discourse about the evolution of the Inuit and their ancestors’ behavioral adaptation process to the Arctic environment, which resulted in and was culturally demonstrated through their art. Foley (1984) wrote, “It thus belongs to a long anthropological tradition, that of man-environment relationships” (p. 3).

The core of Darwinian evolutionary theory is natural selection, and its doctrine facilitated in the understanding of the patterns of biological variation found in human behavior (Foley, 1984). In that, the environment would affect behavioral adaptation. The environment is not a static denominator but a viable biological community that is actively engaged in the human behavioral adaptation process. The human and environment correlation has been analyzed through the perspectives of different branches of anthropology, which resulted in conflicting results and questions. Does the environment impact human behavioral adaptation? Or does human behavioral adaptation manipulate the environment? The Human Ecology Dialectic allows the environment to influence human behavior. This dialectical process takes into account the evolution of a cultural and biological synthesis for stable community development, which results in a taxon to create artistic forms. Further, through the Human Ecology Dialectic human manipulation of the environment was achieved in accordance with the use of raw organic materials for cultural purposes. This transaction included the utilization of resources to produce functional tools for survival extending from prehistoric to contemporary cultures.
The Human Ecology Dialectic (Method)

Marx considered the dialectic as an interactive association between the involvement of individual human activity and an intentional social structure (Swingewood, 1975). In that, a human’s social existence determined his consciousness; thereby, knowledge is a trait of social structure and a component in change (Swingewood, 1975). Anthropologically, Marx considered social theory in terms of its human and historical nature (Swingewood, 1975). His fundamental summation of the human adaptation process was based on four tenets:

- Humans are part of nature; consequently, nature provided the objects that humans objectified (Patterson, 2009). According to Marx this interactive subjectification process caused the expansion of human self-expression (Patterson, 2009). Marx wrote, “Man is directly a natural being” (as cited in Patterson, 2009, p. 42).
- Humans are active beings that sense and feel their surrounding environment. Developed over millions of years, human perceptual and anatomical systems have disposed their environmental adaptation in a variety of ways, one of which was cultural development (Patterson, 2009).
- Humans differentiate themselves from their biological community through self-objectification (Patterson, 2009). Thereby, objects are subjected to human purposive activity (Patterson, 2009).
Humans convert their bodily limbs such as arms, legs, and brain into production mediums. This transformation enables humans and their objects hegemony over the biological action between themselves and nature (Patterson, 2009).

The culmination of these four tenets is Marxist essentialism. Marx considered real science a paradoxical dialectic because it involved apparent externalized forms and conscious motives and thoughts (Huaco, 1999). Therefore, through consciousness, humans formed externalized objects or artistic cultural expressions.

Environment as the Common Denominator: Canadian Central Arctic (Site of Study)

As with many cultures the connection with the environment, specifically the weather, produced traditional survival practices. The Inuit believed in *sila*, which is translated best by the concept of climate. *Sila* expressed itself in the four changing seasons (Stuckenberger, 2007). Nalungiaq, a Netsilik woman from the Canadian Central Arctic, told the folktale of how the winds, rain, snow, and storm came into being by the power of *sila* (Stuckenberger, 2007). Within the harsh Arctic environment the distinct seasons determined climatic conditions, or *sila*, in the forms of ice melts and floes, animal migrations, and the subsequent Inuit biological and cultural connectedness to them all. This relationship is understood conceptually through the uniqueness of their art.

Overall environmental facts should be identified to comprehend fully the contemporary Inuit seasonal way of life:

- Located in the Canadian Central Arctic the Nunavut Territory covers one-fifth of Canada. It spans from Ellesmere Island off the Greenland coast to a Saskatchewan/Manitoba border, then west to the Arctic coast near Amundsen Gulf. Geographically, the territory is diverse and consists of wilderness, tundra, cliffs, and plateau. Pack ice surrounds the Arctic Islands where the area meets glaciers and ragged mountains. Hazardous weather conditions can arise due to the combination of low temperatures and high winds. (“Nunavut Weather, Climate & Geography,” 2014).
- The cold winter is dark, and can last six to seven months of the year. Temperatures in January can drop to -22° F to -40° F.
- The short summer will last for two to three months of the year. Temperatures on the average range from 40° F to 60° F.
- Over eight hundred species of plants, hundreds of animals and a few dozen of bird species exist in the region (Hessel, 1998, p.5).
- The subsurface layer of soil is permafrost because it remains frozen for more than two consecutive years. The permafrost would bring about a plow-less subsistence (Figure 2).
Northern Canada Natural Resources - Permafrost Zones

Figure 2: Northern Canada Natural Resources – Permafrost Zones
(20 Nov. 2014).
The map illustrates the continuous permafrost zones of the Canadian Central Arctic.

Based on Arctic environmental factors art historian Auger (2005) reasoned:
The settlement patterns of the historic and prehistoric Inuit were affected by similar environmental conditions, so it is not surprising that both were characterized by seasonal changes in location in accordance with the necessary changes in subsistence base. Settlement patterns, particularly the degree of sedentariness, have a significant impact on social structure and, in many cases, on artistic production (p. 13).

Due to seasonal differences the prehistoric and historic Canadian Central Arctic Inuit lived in temporary settlements (Auger, 2005). Thus, subsistence required simple technologies for migratory settlement patterns centered on hunting and fishing. Lithic and other raw organic resources would have been gathered to fashion tools. Based on archaeological evidence in the Canadian Arctic, the earliest artifacts are called the Arctic Small Tool tradition (ASTt), which references the (a) Independence I (to c. 700 B.C.), (b) Independence II (to 200 B.C.), and (c) Pre-Dorset (to c. 700 B.C.) prehistoric cultural periods (Auger, 2005, p. 22).

Cultural Periods of Art of the Canadian Central Arctic Inuit (Participants)
The Pre-Dorset culture evolved into the Dorset culture around 800 B.C. (Crandall, 2000). In 1925, anthropologist Diamond Jenness identified the Dorset culture, which was named after Cape Dorset (Kinngait) on Baffin Island (Qikiqtaaluk) where some of their first artifacts were discovered. The Dorset culture gradually vanished due to two factors: the advent of warmer weather, approximately A.D. 900, and the arrival of the Thule from the West, about A.D. 1000 (Crandall, 2000). The Thule were named after a northern site in Greenland where their
cultural artifacts were found. They were considered the ancestors of the contemporary Inuit of the Canadian Central Arctic. The migration from the West contributed to the disappearance of the Thule culture around A.D. 1600 (Crandall, 2000).

Artistic cultures represented by the Pre-Dorset, Dorset, and Thule did not exist in isolation. The art demonstrated the migration or diffusion of the people themselves. Artistic trait distribution on the raw organic resources, such as walrus tusks and caribou antlers, provided mapping of where people had to seasonally migrate for food or lithic sources. In addition, trait acknowledgement provided evolutionary evidence of cultural interaction and assimilation or dominance as exhibited by the Thule. Foley (1984) developed the “diversity-stability” hypothesis to explain community evolution (p. 12). He stated, “The energetics and resource technology explanations suggest that stability is a function of the gross ecology of the community” (Foley, 1984, p.12). Whether the community settlement patterns were nomadic, semi-nomadic or more sedentary they had the capabilities to become stable and flourish culturally. The stabilization of the community was dependent upon evolutionary adaptations and the diversity of the “ecological space” (Foley, 1984, p. 12). For the Inuit and their ancestors the diversity of their environment was limited. The simplistic example of their use of chert tool stone drew the Pre-Dorset to occupy those areas where the lithic raw resource was obtainable (Landry, 2013). Thus, they were able to adapt to the environmental issue of resource availability. Foley (1984) contended that environmental issues could be a stimulus, and the adaptation the product, which is analogous to the Human Ecology Dialectic. Landry (2013) referenced an archaeological analysis in determining a technological process with the use of lithic raw resources. He stated the process flowed from (a) environmental conditions, (b) social strategies, (c) technological strategies, and (d) design to an (e) artifact form (Landry, 2013, p. 27). Thus, for both Foley and Landry the environment stimulated human behavioral adaptation where the outcome was art production.

Pre-Dorset Culture.
Due to decomposition of the raw organic resources used, the Pre-Dorset culture (1800 B.C. to 800 B.C.) left few intellectually designed artifacts for archaeological identification. These artistic objects include a piece of polished bone with cross-hatching, a small carved ivory seal, and maskettes (Crandall, 2000). Auger (2005) denoted Pre-Dorset cultural artifacts were similar to the Independence I cultural period; however, they also were indicative of advanced technology. The Early Palaeo-Eskimo (Pre-Dorset) artifact chosen as an example demonstrates the use of ivory, and illustrates the physical appearance of an ancestral Inuit from the Canadian Central Arctic (Figure 3).
Early Palaeo-Eskimo (Pre-Dorset)

Figure 3: Early Palaeo-Eskimo (ca. 1700 B.C.), Devon Island (True Love Lowlands). Miniature mask, ivory, 5.4x2.9x0.8, Canadian Museum of Civilization. Hessel, I. (1998). Inuit art. New York, NY: Harry N. Abrams, Inc. These materials are included under the fair use exemption and are restricted from further use.

Dorset Culture.
The Dorset culture (800 B.C. to A.D. 1450) was named after Cape Dorset in the Nunavut Territory where some of their first artifacts were found (Crandall, 2000). Given the limited diversity of resources in the Arctic, the Dorset developed a lithic technology that comprised of a more sophisticated adaptive “toolkit” (Landry, 2013 p. 20). This was evident in how they produced and fashioned artifacts, which included three-dimensional carvings (Crandall, 2000). The raw organic resources used were bone, antler, ivory, soapstone, and occasionally wood. Attention has been given to the symbolic importance of Dorset art based on their more nucleated and sedentary settlement patterns (Auger, 2005). This rationale is congruent with the correlation between increased leisure times with artistic productivity. Biologically, decreased stress would result in the evolution of more aesthetic artistic characteristics. Dorset art has been associated with shamanistic purposes, which would indicate thought progression to include the cultural spirituality facet. Kahler (1968) defined culture in an evolutionary milieu (p. 5). Anthropologically, culture was assessed in terms of the “other.” Hence, culture became synonymous with development. In that, it was measured by the progress established by the dominant standards of the succeeding culture. Thereby, certain cultures were determined as improved by the influence of the successor as artistically evidenced by the Pre-Dorset to Dorset cultures. The featured Dorset artwork is an antler with numerous carved faces with varying expressions (Figure 4).
Dorset (Late Dorset)

**Figure 4:** Late Dorset (A.D. 600-1300), Bathurst Island. Wand with faces, antler, 19.5x5.1x3.3, Canadian Museum of Civilization. Hessel, I. (1998). *Inuit art.* New York, NY: Harry N. Abrams, Inc. These materials are included under the fair use exemption and are restricted from further use.

**Thule Culture.**

Though the Dorset did contribute artistically to the Thule culture (A.D. 1000 to 1600), they gradually assimilated into the technologically advanced culture of the Thule (Auger, 2005). Archaeologists speculated the Thule arrived via Alaska to the Canadian Central Arctic. They were sea mammal hunters as identified by their functional artifacts, such as hunting weapons largely made of ivory, and the Alaskan heritage depictions (Hessel, 1998). While technologically more advanced, Thule art is more functional, and is considered as “rudimentary” when compared with the Dorset (Crandall, 2000, p. 19). However, beyond its functionality their art demonstrated skilled craftsmanship (Figure 5). This detail supported the migratory patterns of prehistoric Arctic peoples and the Darwinian biogeography theory.

**Thule**

**Figure 5:** Thule (A.D. 1100-1700), Baffin Island (near Arctic Bay). Bow-drill handle, ivory, 42.9x5.1x0.4, Canadian Museum of Civilization. Hessel, I. (1998). *Inuit art.* New York, NY: Harry N. Abrams, Inc. These materials are included under the fair use exemption and are restricted from further use.

The Thule culture was devastated by the Little Ice Age (A.D. 1600 to 1850) because it froze the food-rich sea waters (Hessel, 1998). This caused the Thule to retreat from the coastal areas into the interior to hunt for land mammals. The culture was further decimated.
by the encroachment of Western explorers. What emerged were “regional cultural patterns” now considered the contemporary Inuit (Hessel, 1998, p. 19)

**Contemporary Inuit Culture.**

When Inuit art is discussed there is reference given to the Historic Period (1770s to 1940s) during which time art shifted from traditional forms to that of a commodity (Hessel, 1998). The prehistoric cultures used raw organic resources to produce and create art for traditional purposes for the enhancement of life and for daily existence. Carvings were used for trade, amulets, weaponry, and tools. Today, the contemporary Inuit culture (1940s to Current) still use art to support their lifestyle and provide a reliable income for food security. Their art has been marketed as folk art, souvenirs, mass-produced, kitsch, camp, and museum quality. The contemporary cultures of the Canadian Central Arctic include the (a) Cooper, (b) Netsilik, (c) Igloolik, (d) Baffin Island Inuit, and (e) Caribou (Figure 6). More specifically, the Inuit of this particular Arctic area are identified as the (a) Cooper Inuit of Banks and Victoria Islands and the adjacent mainland, (b) the Netsilik of Boothia Peninsula, (c) the Igloolik of North Baffin island, (d) the Baffin Island Inuit of South Baffin Island, and (e) the Caribou Inuit of the west side of Hudson Bay in the region of Qamani’tuq (Auger, 2005, p. 4).

*The Arctic People – Groups in the Canadian Central Arctic Region*

![Figure 6: The Arctic People – Groups in the Canadian Central Arctic Region (9 Nov. 2014).](http://firstpeoplesofcanada.com/images/firstnations/teachers_guide/inuit/Inuit_map.jpg)

Contemporary Inuit culture had been stretched from its traditional seams due to more stresses from the outside world. In the 1950s a TB epidemic ravaged the Arctic Inuit, which resulted in the separation of families (Crandall, 2000). Arctic Inuit were moved to the southern regions for treatment where they became exposed to a Western culture ripe with lower-protein foods and modern clothing styles (Crandall, 2000). Even when they returned to the Arctic, the Western acculturation had a permanent effect on their traditional life-ways. Artistically, the traditional use of raw organic resources, however, is still apparent in the contemporary culture (Figure 7)."
The Human Ecology Dialectic

Contemporary

Figure 6: Natar Ungalaq m. (born 1959). Igloolik. Sedna with Hairbrush, 1985, grey stone, fur, bone, 21.5x20.0, National Gallery of Canada. Hessel, I. (1998). Inuit art. New York, NY: Harry N. Abrams, Inc. These materials are included under the fair use exemption and are restricted from further use.

Darwin Biogeography Theory (Test One)

Biogeographically, Darwin (1859/1964) determined that “barriers of any kind, or obstacles to free migration, are related in a close and important manner to the differences between the productions of various regions” (p. 347). However, due to the recognition of the proximity of northern land regions there might have been free migration as demonstrated in “strictly arctic productions” (Darwin, 1859/1964 p. 347). As a naturalist Darwin reasoned that each species could not have been produced in one area alone. Instead, migration occurred because of geographical and climatic factors, which archaeologists have speculated transpired with the Dorset and Thule cultures. This speculation leads to another point of the Darwinian biogeography theory; in that, “successive groups of beings, specifically distinct, yet clearly related, replace each other” (Darwin 1859/1964, p. 349). A summation of Darwinian biogeography is best explained in his own words:

This bond, on my theory, is simply inheritance, that cause which alone, as far as we positively know, produces organisms quite like, or, as we see in the case of varieties nearly like each other. The dissimilarity of the inhabitants of different regions may be attributed to modification through natural selection, and in a quite subordinate degree to the direct influences of different physical conditions. The dissimilarity will depend on the migration of the more dominant forms of life from one region into another having been effected with more or less ease, at periods more or less remote; - on the nature and number of the former immigrants; - and on their action and reaction, in their mutual struggles for life; - the relation of organism to organism being, as I have already often remarked, the most important of all relations (Darwin 1859/1964, p. 350).

Based on the harshness of the remote Arctic, competition for regional subsistence among the Pre-Dorset, Dorset, and Thule cultures would prove which was better adapted to their environment. As history indicated the Dorset assimilated into Thule culture.

In the Inuit language a silarqisiurpuq is “someone who is smart enough to travel with good weather” (Stuckenberger, 2007, p. 33). This personal understanding of the perplexity of
the surrounding environment is extremely important because it denotes that one has grasped the skills to live off the land. As stated previously, the definition of environment is a biological community, and successful adaptation to it increases efficiency or specialization (Alland, 1967). Per Darwin (1859/1964) specialization exemplified a variation for survival and reproduction: “Man does not actually produce variability; he only unintentionally exposes organic beings to new conditions of life, and then nature acts on the organization, and causes variability” (p. 466-467). The artistic differences and use of raw organic resources among the prehistoric cultures, and later the contemporary Inuit, justified behavioral adaptation accessed through the interactive biological-environmental relationship. Again, reference is given to the adaptability of the Thule as they were forced to migrate to the interior to hunt for caribou as a result of the Little Ice Age.

Boas Cultural Adaptation Theory (Test Two)

Boas wrote there is “the elementary relationship between land and people” (Müller-Wille, 2014, p. 31). During the 1880s he was particularly focused on the relationship between the Inuit and their Arctic environment. In 1883 Boas embarked on a year-long expedition to the Canadian Central Arctic, notably Baffin Island, to conduct “geographical exploration and discovery with cartography, concentrating on Physiogeographie and Anthropogeographie with hints of ethnography, ethnology, and physical anthropology” (Müller-Wille, 2014, p. 38). A mentor of Boas encouraged him to study Inuit migrations and their causes (Müller-Wille, 2014). This additional scientific study is apparent in the slight overlap between the Boas culture and the Darwin biology numerators in The Human Ecology Dialectic. In other words, the Darwinian biogeography theory was applicable to the Boasian approach that linked cultural adaptation to climatic and other environmental conditions. Further acknowledgement of the connection the Inuit had with their environment was observed by Boas, and written in his journals. Boas (1888/1964) noted, “The Eskimo (Inuit) exhibit a thorough knowledge of the geography of their country” (p. 235). He noted Arctic environmental conditions affected hunting practices and potential, settlement patterns, economic endeavors, and social groups (Müller-Wille, 2014, p. 49).

In the book Primitive Art (Boas, 1927/1955/1983) homage was paid to the raw organic resources used by the Inuit for art production:

The second fundamental point to be borne in mind is that each culture can be understood only as an historical growth determined by the social and geographical environment in which each people is placed and by the way in which it develops the cultural material that comes into its possession from the outside or through its own creativeness (p. 4).

In reference to the quote, the first point made had equal validity:

The behavior of everybody, no matter to what culture he may belong, is determined by the traditional material he handles, and man, the world over, handles the material transmitted to him according to the same methods (Boas 1927/1955/1983, p. 1).

According to Boas the man-environment relationship was twofold: human behavioral adaptation was affected by environmental conditions, and humans used the raw organic resources for art production.

Behavioral Adaptation (Results)

Laughlin (1966) studied the circumpolar distribution of ancestral and contemporary Arctic populations. He concluded adaptation to the Arctic environmental conditions was “primarily physiological and cultural” (Laughlin, 1966, p. 474). His claim was based on research data for that time when the study of genetics of physiological adaptation was in its early stages and
not widely available (Laughlin, 1966, p. 474). Archaeological artifacts discovered from the prehistoric cultures displayed adaptation to the Arctic environment. For example, the epicanthic eye fold has been discussed as an evolutionary adjustment due to the acute glare off the ice and snow which could cause snow blindness (Laughlin, 1966, p. 476). However, the discovery of slit goggles proved eye protection was needed especially for travel (Laughlin, 1966, p. 476). As stated earlier, art consists of objects of various forms and functions with aesthetic qualities, which would include the slit goggles made from a raw organic resource.

Hildes (1966) agreed with a more Darwinian hypothesis, “The conditions of life in the Arctic have obvious bearing on physiological requirements” (p. 498). He wrote that it is of interest to contemplate the biological factors which may contribute to the environmental adaptability success of the Arctic peoples (Hildes 1966, p. 497). To prove his theory Hildes (1966) studied Arctic peoples in regard to (a) climate and geography, (b) living conditions, (c) health, and (d) physiological responses (p. 497). He also considered the climatic and environmental issues of (a) low temperature, (b) extended period of snow-covered soil, (c) extended darkness and/or light, (d) lack of agriculture, (e) low density of population, (f) communication problems, and (g) low economic growth (Hildes 1966, p. 498). In his concluding remarks, Hildes (1966) commented:

The experience which has been accumulated through field biological studies in the polar regions provides assurance that intensive studies of selected Arctic populations by multi-disciplinary teams can be carried out, and would provide new information on the role of genetic and environment factors in adaptation to circumpolar living (p. 506).

Dialectically diverse theories of Darwin and Boas worked with environmental conditions to prove how the numerators of biogeography and cultural adaptation interacted together and with environmental conditions generated behavioral adaptation and art production. The fact that the Darwinian biogeography theory was applicable to a Boasian approach that linked cultural adaptation to climatic and other environmental conditions was an interesting and unexpected development of the Human Ecology Dialectic.

Discussion

Darwin, Marx, and Wagner (book) by American historian Barzun reaffirmed the revolutionary roles the three men had on science, social science, and art, respectively (Barzun, 1947). He further explained the amalgamation of these fields that created dynamic social change in the Western world. The theories, ideologies, and philosophies of Darwin, Marx, and Wagner expressed through their modes of discourse exemplified dramatically evolving societal institutions and norms.

Upon the formation of the Human Ecology Dialectic foundation the artistic component of composer Wagner was replaced by Boas. In his own right, Boas was an ardent journal writer and eager sketch artist. These talents were apparent as a cultural researcher in the Canadian Central Arctic, notably Baffin Island. Boas became keenly aware of how the harsh Arctic environment affected the indigenous people, which propelled his anthropological research into the revolutionary realm of fieldwork and ethnography. Thus, the theoretical culmination of Marx, Darwin, and Boas gave rise to the cooperative relationship the Inuit and their ancestors had with their environment, thereby adapting to their ecological niche, which will be explained further.

LaLand and colleagues posed an interesting reverse perspective on how culture affected the human genome. Simply stated, they purposed a gene-culture co-evolutionary theory (LaLand, Odling-Smee, & Myles, 2010). Through the development of mathematical models a strong relationship between cultural processes and natural selection was established:
Such data are consistent with two branches of mathematical evolutionary analysis: gene-culture co-evolutionary theory, which explores how genetic and cultural processes interact over evolutionary time, and niche-construction theory, which investigates the evolutionary impact of the modification of environments by organisms (LaLand et al., p. 137).

Due to the lack of scientific study on the human genome during their lifetimes, this data was not available to both Laughlin and Hildes. However, they determined cultural and biological components were factors in environmental adaptation.

The niche-construction theory demonstrated by various animals was applicable to *Homo sapiens*. The theory explained in terms of inceptive and counteractive niche-construction, “leads to the expectation that gene-culture co-evolution has been a general feature of human evolution” (LaLand et al., p. 140). Inceptive niche-construction allowed humans to migrate to a new environment, but because of counteractive niche-construction they were able to adjust to some of the selection pressures (LaLand et al., p. 140). In other words, counteractive niche-construction could impede the effects of environmental change, and “it functions to protect organisms from shifts away from environmental states to which they are adapted” (LaLand et al., p. 140). Compared with animals, the human counteractive niche-construction acted more rapidly because of its reliance on culture (LaLand et al., p. 141).

The *Human Ecology Dialectic* provides room for the anthropological disciplines to coexist in order to explain culture as a behavioral adaptation due to environmental conditions, much like the inceptive and counteractive elements of the niche-construction theory. Humans can “initiate or respond to a change in an environmental factor” (LaLand et al., p. 140). As Marx the anthropologist asserted, humans cannot be separated from nature (Figure 8). In regard to the Inuit and their ancestors, archaeologists confirmed this coexistence. Prehistoric peoples migrated to new environments and behaviorally adapted, as explained by the bioanthropological Darwinian biogeography theory and the Boasian cultural adaptation theory, which became culturally verified by artistic production, thus concluding the adaptable relationships within the *Human Ecology Dialectic*.

*Contemporary*

**Figure 8:** Caribou parka with caribou pants, canvas over-pants, and caribou mittens, 1913-18, from Canadian Arctic Expedition: possessions of James Crawford, Stefansson Collection on Polar Exploration, Rauner Special Collections Library, Dartmouth College Library. Stuckenberger, N. (2007). *Thin ice: Inuit traditions within a changing environment*. Lebanon, NH: University Press of New England for Hood Museum of Art, Dartmouth College. These materials are included under the fair use exemption and are restricted from further use.
References


Boas, F. (1888 (1964)). The central Eskimo. Lincoln, NE: University of Nebraska Press.


Figures

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Figure 3 Early Palaeo-Eskimo (Pre-Dorset) Maskette
Figure 4 Dorset (Late Dorset) Wand
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Figure 7 Contemporary Sedna
Figure 8 Caribou Parka with Caribou Pants and Mittens

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i Columbus Travel Media Ltd. (2014). *Nunavut weather, climate and geography*. Retrieved from http://www.worldtravelguide.net/canada/nunavut/weather-climate-geography. The website provided a narrower geographic description of the Canadian Central Arctic, as it exists today.

ii The line pattern could represent facial tattooing or advanced age. This maskette is the oldest known depiction of a human from the Canadian Arctic (Hessel, 1998, p. 12).

iii The wand could have been used by a shaman. The various faces possibly represent spirit helpers, a community, ancestors, or clan members. Note, there are no carved animal faces on the wand (Hessel, 1998, p. 15).

iv The simplicity of the carvings on the long piece of ivory is indicative of the ability of the Thule to relate stories. Within a carved frame there are hunting, camping, and battle scenes (Hessel, 1998, p. 17).

v The sea goddess Sedna was believed to anthropomorphize the idea of fertility. When angered she would withhold food animals, which would cause starvation. To appease Sedna shamans would comb and braid her hair. This particular depiction of Sedna is amusing because the artist carved her as a diva who does not like to be kept waiting for her hair styling appointment (Hessel 1998, p. 56).
Poetry demands to be spoken aloud. If a reader peruses a poem silently, he must create a performance of the sounds in his mind, and how the words are laid out on the page can only suggest the aural experience in an indefinite way. The appearance of The Waste Land on its page is a significant element of its strangeness, for it creates a very strange sounding, imaginary poem when it is read silently, as it must be most often experienced. The lines appear in many places uneven and unlovely, with breaks seeming to come sometimes in arbitrary, or even in intentionally awkward places. When the poem is recited and heard, either the natural flow of a human voice must remove (or at least smooth over) the most awkward structures, creating, as it were, a different poem from the one on the page, or the natural flow of the voice must be broken to conform to the layout of the poem. Thus, there is either dissonance (or harmony depending on the recitation) between the visual and aural poem.

It is then remarkable that T. S. Eliot made two recordings of The Waste Land and that these recordings demonstrate both this harmony and this dissonance over different passages. And it is more remarkable still that scholarship has almost entirely ignored these two recordings. The first recording was made in 1935 at Columbia University and the second in 1946 for the Library of Congress at the NBC Studio in New York (Swigg 54, Hawlin 545). The later 1946 recording, being the only one published, is by far the more well known. The 1935 recording is understandably of much inferior sound quality and is difficult to find, but it is, of course, a recording of a younger Eliot, closer in time to the original composition of the poem (though still separated from it by fourteen years). The two recitations are not as different as some have argued, but they do differ in specific and interesting parts of the poem. By comparing the recordings to each other and to the written representation of the poem, it is possible to conclude that Eliot’s understanding and appreciation of his own work remained mostly steady over the years, but that by 1946 he was out of sympathy with his poem’s angst or at least that he was tired of others’ fretful interpretations of it.

Richard Swigg has written on the 1935 recording in “Sounding The Waste Land,” and is of the opinion that it is closer to Eliot’s original intent for the poem, something with which I must ultimately agree. As a marker of this intent, Swigg takes a diary entry made by Virginia Woolf in 1922: “He sang it & chanted it, rhythmed it. It has great beauty & force of phrase: symmetry and tensity” (Swigg 54). Swigg declares of the 1935 recording:

Listening to this, one is immediately struck by the freshness of a reading that imposes no recitatory dulling from outside the verse’s syntactic movement but is actually inside it. This is a rendering – often amazingly fast yet always varied, with Eliot’s voice mimicking character [sic] in the pub scene or Tiresias’s ‘Thank you’, but more usually marked by its shifts between the vehement and sorrowful, tender and vindictive, anguished and chastened – whose urgency constantly makes one imagine that one has returned for a moment to the 1922 reading. (54-5)

Swigg thinks that in the 1946 recording Eliot “is now so distant from the rhythms and daring of his original creation that he can now only offer a hardened version of that suppleness” (54). This is a gross overstatement of the differences between the recordings.
It is true that the 1935 recitation is overall at a faster tempo, lasting 23:21 in total, whereas the 1946 lasts 25:01. Only in the section, “Death by Water,” is the 1946 recording shorter than the 1935, and there only by about one second. Some parts of the 1935 recitation are indeed remarkably quick. For instance the end of “The Fire Sermon,” 308-310, is spoken at a very rapid pace. However, the 1946 recitation is similarly rapid. Indeed, though the overall tempo is slower in 1946, the accelerations and decelerations of the recitations are mostly consistent, and if parts are faster in 1935, like the end of “The Fire Sermon,” other parts are much faster in 1946, such as lines 425-6, “Fishing, with the arid plain, etc.” Likewise, Eliot in 1935 was, in general, more emphatic and flamboyant with his decrescendos and crescendos than in 1946, but the difference is only one of degree and not of the quality of the variation of voice.

Furthermore, in the few places where there is a real difference in the quality of voice, it is not always the 1935 version that is more energetic. The 1946 recitation is much louder and almost belligerent in the already mentioned lines 425-6, where the earlier recitation is resigned and sad. Yet, the 1935 version is similarly belligerent at the words “mon frère!” (76) where Eliot’s voice rises suddenly in pitch and volume from the previous “mon semblable” (Swigg 57). In the younger recitation he lowers his pitch by a hair’s breadth and stays at the same volume.

Although all of these observations on pitch, volume, and tempo are in part subjective, I assert that the recordings are more alike than dissimilar. Compare Swigg’s description of the 1935 recording given above to what Stefan Hawlin says about the 1946 version as he defends listening to the recording for what it reveals about the poem and the author’s intent:

Eliot’s reading is flexible and nuanced by comparison [to W.H. Auden’s recorded readings of his own poems]. Certain passages are read in a pressured, steady, slightly intoned manner . . . At other times there are changes of pressure and attack in the voice within and between fragments, small crescendos and diminuendos, and emphasized contrasts between colloquialness in direct speech and a different voice for the narrator or interlocutor. (Hawlin 547)

Hawlin wrote this in “Eliot Reads The Waste Land,” 1992. Apparently, he was unaware of the 1935 recording, or it was unavailable to him, as he does not mention it. Swigg does not mention Hawlin’s paper in his own, but writing in 2001, it seems unlikely that he was unaware of it. Swigg’s phrase, “he can now only offer a hardened version of that suppleness,” seems to be a rebuttal to Hawlin’s “flexible.” There is no quantifiable way of saying exactly how different the recordings are, and certainly no way of saying which is closer to Eliot’s “original creation,” but Swigg exaggerates how dull the 1946 recording is and how vibrant the 1935 is.

However, the recitations may be compared by a more objective aspect, which I have not yet addressed. That is the cadence of the lines, by which I mean the starting, stopping, and pausing that happens primarily at the end of lines, but also in their middle from time to time. The cadence of a line is also the aspect of a recitation that is most influenced by the way the line is written on the page, and so it serves as the best point of comparison between the written and spoken poem.

There are many long passages of the poem where the readings are almost identical. The distinctive scene between the laconic man and hysterical woman (if we may assign them such identities) in “A Game of Chess” is one such instance. The 1935 version is perhaps more staccato in the woman’s voice, and the 1946 version more languid in the man’s voice. Indeed, line 115, 124, 128, and 137, are all full stops in 1935, but enjambed in 1946. This enjambment in the 1946 recording has the overall effect of contrasting the man and woman and of deepening the divide between their voices. The memorable scene of Lil, Albert’s wife

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(139-72), that immediately follows is another case where the recordings are almost identical. The only differences in cadence in all thirty-four lines are slight stops in the 1935 version in the middle of line 142 and at the ends of lines 145 and 156, not present in the 1946. Both are read in a sort of pseudo-cockney American accent.

Another distinctive episode in which the recitations run extremely close is the song of the Thames-daughters in “The Fire Sermon.” From 266 to 304 there are only six lines with a different cadence in 1935 than in 1946. Four of those lines in the 1935 version are “Weialala leia / Wallala leialala” (277-8, 290-1), whereas the 1946 version has no stop in the middle of each line. Hawlin writes of these lines, “[Eliot] performs it quickly and rhythmically in the recording, so shutting down on the lyrical fullness that it might otherwise seem to suggest” (578). And this is only more true of the 1935 version than of the 1946 about which Hawlin is speaking. The other three lines of different cadence are line 274, where there is a very slight stop in 1935, and line 304, with a full stop in 1935. There is a slight hesitation in the 1946 version, but not a full stop. Either way, “Nothing” (305) is left to resonate in the quiet and properly marks the end of the song of the Thames-daughters. In addition to this long passage in the “The Fire Sermon,” note too that the Mrs. Porter interlude (196-206) is recited in precisely the same way in both versions.

The first thirty-eight lines of “What the Thunder Said,” (322-59) is a last, very distinctive section of the poem for which the two recordings are very close in cadence. Those lines are sung in a chant that starts on a high note on line 322. In the 1946 recording, the pitch stays the same until on line 328 it drops approximately a fifth. It recovers its high tone on line 332, then drops again on line 338 for just one line. In 1935 the pitch does not drop until line 331, then recovers over the course of line 332, and then the tone drops again in line 337 for just one line. Both recitations drop in tone a final time at “If there were water / and no rock” (346-7) as the word “rock” is drawn out slowly and painfully. Then the tempo accelerates to a feverous beat until slipping away with “Drip drop drip drop drop drop drop” (358). When one hears the two recordings of this section played one after the other, it is impossible to think Eliot did not know exactly how he wanted these lines to be read.

These five sections of the poem that are quite similar between two recordings—which I will call the languid man and hysterical woman, the Lil and Albert, the Mrs. Porter interlude, the song of the Thames-daughters, and the water among the rocks episodes—are remarkable for their vividness. These passages are some of the most graphically interesting in the poem as well. The fast part of the water among the rocks episode is kicked off with “If there were water” (345) aligned far right on the page. The next ten lines are all very short and rapid, and left aligned. They contain the word “rock” four times and “water” four times, usually at the end of the line. The passage ends with the visually distinct “Drip drop drip drop drop drop drop / But there is no water.” Likewise, most of song of the Thames-daughters is made of short, quick lines, with an indented “Weialala leia / Wallala leialala” twice ending eleven line stanzas. Further, the Mrs. Porter interlude is most visually striking with its “Twit twit twit / Jug jug jug jug jug jug / So rudely forc’d. / Tereu” (203-6).

The languid man and hysterical woman, Lil and Albert, scenes are visually distinct in other ways. The former has jagged lines aligned left or right across the page, and it contains the well-known “O O O O that Shakesperian Rag—” (128). The latter is a block of seemingly realistic lower class, pub conversation—more loquacious by far than the previous scene, but no more pleasant and perhaps even less hopeful. This block is slashed through five times by the all capital and arresting, “HURRY UP PLEASE ITS TIME” (141, 152, 165, 168, 169).

Clearly, when Eliot had a distinct and vivid scene or image in mind, he knew how it was to sound and subsequently how it should be written on the page to suggest such a recitation. That is why these four passages changed so little in his mind in the eleven years between the two recordings.
The end of “The Burial of the Dead” (60-76) is another passage where the recordings are almost the same. Yet, the French, final line (already discussed in brief) is the only graphically remarkable thing about the passage: “You! hypocrite lecteur!—mon semblable,—mon frère!” (76). The slight differences that exist between the recordings here are that in 1935 there is no stop between 61 and 62 and there is no extra stop before “so many” (62). There is also an extra stop in the middle of 69: “There I saw one I knew, | and stopped him . . . .” These differences do very little to change the feel of the scene. They all come before the second half of the passage, in which Eliot adopts a remarkable, seemingly amicable accent (but with hostile undertones) to address “Stetson” and accuse him of burying a corpse in his garden—a moment made memorable by both the bizarre subject and the sudden rhyme and regular iambic pentameter.

But it is not graphically remarkable; it does not fit the pattern. In fact, it is most similar in style to the Tiresias episode (215-65). These fifty-one lines are the most regular of the entire poem, being mostly rhyming, iambic pentameter. They tell the most coherent story in the poem too. Yet, the two recordings are not identical in cadence; there are approximately twelve differences, about half at line ends and half mid-line. That means an average of four lines per difference, which is not much different from the five lines per difference in the corpse garden episode. The force of the imagery at the end of “The Burial of the Dead” is responsible for the greater similarity between the recitations in that part. The Tiresias episode is similar in style, but never reaches the same heights of disturbing imagery and internal rhyme. Its tone is slower and sadder. Therefore its rhythm, though distinctly iambic, is malleable, and can tolerate some changes in cadence.

Much of the rest of the poem fits into this category: the recitations are not exactly the same, but they are mostly similar. It seems that the choices of cadence could be made differently from reading to reading depending on Eliot’s mood or momentary inspiration. In addition to the corpse garden and Tiresias episode, lines 19-59, 174-195, 207-214, and 360-385 seem to be of this type of verse. However, there are two sections where the recitations are deliberate and schematically different: the beginning of “The Burial of the Dead” (1-7) and the beginning of “A Game of Chess” (77-110). They require closer consideration.

The first seven lines of the poem are some of the most heavily wrought, bound together by alliteration, rhyme, assonance, and repeated structure and imagery. Visually, one cannot escape noticing that five of the lines end in an isolated present participle: breeding, mixing, stirring, covering, feeding:

April is the cruellest month, breeding
Lilacs out of the dead land, mixing
Memory and desire, stirring
Dull roots with spring rain.
Winter kept us warm, covering
Earth in forgetful snow, feeding
A little life with dried tubers. (1-7)

As Pericles Lewis points out, “The participial verb endings perform something like the function of rhyme, linking together the various underground motions of winter and spring” (133). The “-ing” suffix is naturally unstressed, though in both recordings Eliot places as much stress on it as he reasonably can. Still, the rhyme is quite poor except in the feminine rhyme of the first participle, “breeding,” and last, “feeding.” Yet, this reluctance in the rhyme is intentional and characteristic of the poet’s opening. Lewis says, “These lines seem uneven – as if the poet had started to write iambic pentameter but not completed the lines or as if he had to write shorter lines with three or four beats each but felt compelled to add the words that
appear after the commas” (132). This is indeed how it appears on the page, and the 1935 recording supports this interpretation, but the 1946 does not.

When these seven lines are recited, the natural flow of a human voice would remove or smooth over the awkward placement of these participles at the ends of the lines, creating, as it were, a dissonance between the visual and aural. This is precisely what Eliot does in the 1946 recording. He reads the lines as: “April is the cruellest month, | breeding lilacs out of the dead land. . .” Lewis points out the use of alliteration in these lines as well: “Eliot makes use of alliteration . . . in phrases such as ‘lilacs out of the dead land,’ ‘mixing / Memory,’ ‘Winter kept us warm,’ and ‘a little life’” (133). Notice he points out one instance of alliteration across lines (mixing / Memory), but when the lines are read as Eliot read them in 1946 many more instances become apparent: “Breeding lilacs out of the dead land,” “Stirring dull roots with spring rain,” and “Feeding a little life with dried tubers.” Note also the consonance between “stirring” and “spring” and the near-alliteration between the voiced and unvoiced labiodental stops and velar stops in “Covering earth in forgetful snow.” This near-alliteration binds the sixth line together audibly in a way that the eye easily misses.

Indeed, all of these auditory effects in the first seven lines only come into proper focus when, naturally, the lines are recited aloud. But what effect does this rearranging of the lines have on the meaning? As Lewis suggests (above), the way the poem is written on the page makes the poet seem reluctant to finish his lines, offsetting each of the participles with a comma and letting each line dribble away with an “-ing.” The first three participles describe the action of April, metaphorically and literally the beginnings of new life. Even the latter two, though actions done by winter in the poem, could just as well be attributed to April in a different context, covering the earth with green plants and feeding life with the fruits of those plants. By pushing the participles away from their referents, but more importantly away from the objects of their action, the poet supports what is already evident in the simple meaning of the lines: his theme of resistance to the beginning of new things and antipathy towards the germination of new life.

Yet, the visual effect is lost to the ear in the 1946 recording where the unevenness of the lines is greatly reduced. Also reduced is the poet’s apparent antipathy, but to a lesser degree. That antipathy is rooted in the simple meaning of the lines and cannot be removed entirely by any recitation, however varied. Nor did Eliot always think that the antipathy of the poet should be lessened in the recitation, for in the 1935 recording he quite consciously isolates each participle on both ends with a full stop. Furthermore, he isolates “April” and “Lilacs” with stops: “April | is the cruellest month, | breeding | / Lilacs | out of the dead land, | mixing | . . .” Swigg says of these lines, “Now it is indeed April, and no other, which is the cruellest month, while the now-distinct participles are the small agitations that prey on unwilling movement. Like a microcosm of so much in the poem, they tease the sluggishness of the buried potency into light and invigorated time” (55). Swigg is perhaps a little carried away here by his enthusiasm, for by his reasoning it would now be Lilacs and no other plant that are now being bred, but his larger point is on the nose. Then, what is the effect of this recitation on all of the tight poetic structure of the lines previously discussed?

All five of the end participles are bound to the following line by alliteration as we have seen. The isolation of the participles in the 1935 version lessens the power of the alliteration, but it is still there and is still felt to a lesser degree. Indeed, this may be why Eliot created the alliteration in the first place; he knew that the participles should be isolated as they are on the page and would need something to keep them rooted in the lines. Then, in 1946, when he changed his mind about how the lines should sound (for reasons explored below), the alliteration rose thick and creamy to the top.

Why Eliot isolates “April” and “Lilacs” in the 1935 recording becomes evident if the entire first eighteen lines are listened to. Eliot struggles to start the poem, saying no more than four words without a full stop until line four gives him five words and line seven gives
him six. His momentum builds through the first seven lines and the stops become shorter. Then at “dried tubers” the poem nearly comes to a halt again. These words have two very long syllables on their accents. In addition, the adjacent dentals in “dried tubers” force the reciter to slow down in order to articulate the consonants separately. Then with line eight Eliot finally hits his stride. The form stays almost the same at first, but the lines lengthen: “Summer surprised us, coming over the Starnbergersee” (8). There is heavy alliteration and a comma followed by a participle as before, but this time it is not followed by a stop. Eliot’s tempo increases greatly, his tone rises, and the lines flow fluently until the break.

Many things bind the second section of lines (8-18) to the first, but it is unmistakably a section separate from the beginning. The difference is in tone. These lines tell stories of life and action, of summer, sunlight, rain, and of winter, yes, but lively winter, though these stories are memories of the past, either near or distant. It is as if life forces itself through the cracks of the poet’s dismayed mind and grows until it fills the poem, for a little while. Thus, the first seven lines are a subterranean struggle that slowly loosen into the freedom of a sunny afternoon in summer and a sled ride in the mountains.

Eliot in 1946 does not aim for such a gradual progression from torpor to excitement. As already mentioned, he begins in a completely different fluid style. Then in lines 8-18 he proceeds much like in 1935, although his stops at the commas and semicolon of lines 8-10 are slightly more pronounced. This has the effect of prolonging the use of the same cadence as the first seven lines, which the 1935 recitation has only just adopted at line 8. Thus, in the 1946 recording Eliot does not start as low as in 1935, but both recitations end up in about the same place.

How remarkable that, as if in mirror to the first seven lines, the end of poem has a similar set of single words enjambed with a neighboring line, the only other place I have found such a device in the poem.

_Damyata:_ The boat responded
Gaily, to the hand expert with sail and oar
The sea was calm, your heart would have responded
Gaily, when invited, beating obedient
To controlling hands
I sat upon the shore
Fishing, with the arid plain behind me (419-426)

Notice that here we have the exact opposite visual effect to the one used at the beginning. Three times (420, 422, 425) the line begins, instead of ends, with a two syllable word with the accent on the first syllable. The emotional impact of this effect is different, though not exactly opposite, to that in the beginning. Now, instead of being belatedly and begrudgingly crammed onto the end of the line, “gaily,” comes first in a new line as if the poet is surprised by the jollity of the thought. “Fishing,” is not as obviously positive a word as “gaily.” However, most of “What the Thunder Said,” is describing a parched landscape where there is no water (331), or even the sound of water (353), and the wells are dry (385). Thus, “fishing,” and the rest of the sailing imagery takes on a wholly positive sense at the end of the poem.

Eliot reads these lines as conscientiously differently in the two recordings as he does the first seven. In 1935 he pauses before and then puts so much emphasis on the first “gaily” that he sounds almost alarmed at the possibility of happy control. Swigg says:

This is joy not running away but zestfully guided . . . It is not the restriction of self-enclosure heard entrenchingly earlier . . . but the enticement to a shared rhythm of delight where ‘your heart’ . . . has an intimate directness yet also an [sic] non-
personal quality. One belongs to a momentum greater than the self . . . when ‘your heart would have responded / Gaily, when invited’; and with such a warm invitation that the heart, in pleasurable order, seems already to be ‘beating obedient / To controlling hands.’ (60)

I wholly agree with this understanding of the lines. That the passage is a moment of peace is obvious. It is remarkably loosely constructed. The abundant alliteration which curls the first seven lines tightly in upon themselves is mostly gone here. There is alliteration on “sh” between “shore” and “fishing”, but the heaviest alliteration comes at “beating obedient,” and this seems to mimic the beating of a human heart. There is also a loose rhyming on “-and” and on “-ore” that comes at only semi-regular intervals, as do the two syllable starting words, “gaily” and “fishing.” This gives the last stanza an incredible feeling of unhurried peace and serene order. And it is absolutely fitting that this harmony and peace should arise from the structure at the same moment a major angst of the poem is, if not resolved, at least mitigated. Lewis says, “The return of the waters suggests the possibility of a different type of sexual relation from those seen in the poem so far” (146). How different must be the controlling hands of line 423 from the exploring hands of the young man carbuncular (240), and how different the indifferent lover with automatic hand (255) from the obedient beating heart of line 422.

The 1946 recording differs from the 1935, of which Swigg was speaking above, but the differences only support Swigg’s interpretation more strongly. In 1946 Eliot sounds surprised and resignedly pleased with “gaily.” Just as he does not pause after the participles in the first seven lines, neither does he pause before the first “gaily.” The lines come contentedly with only natural breaks. In contrast, in the 1935 recitation Eliot’s tone rises twice to “gaily,” and then falls away swiftly without pause, except for before first “gaily.” The peace of the moment is more obvious in the 1946 version, just as the struggle of the first seven lines is more defined in the 1935 version.

Now that we start to see a real difference between Eliot’s intentions in 1946 and 1935, what can we say about the beginning of “A Game of Chess,” 77-110? The 1935 recitation is, as always, slightly faster. It is also in a semi-chant like voice, though not quite as strong as the beginning of “What the Thunder Said.” The cadence is where the real difference lies. In 1935 Eliot much more frequently runs from one line to the next without a pause and almost never stops in the middle of a line, whereas in 1946 he often does. It may well be that again, in 1946 Eliot was more at peace and so reads more placidly than in 1935. Swigg says of the 1935 recitation, “Vocal speed therefore intimates an attempted reaching beyond the synthetic linkages of this enclosed space, yet also the compulsion of those linkages – not to be broke, but going on and on” (55). If Eliot’s rapid and high, strained voice shows that he was indeed thinking of the poet escaping such a setting (where he is trapped with an unbearable woman, recall) we must look for why this theme was important to him in 1935 but not important enough to energize his recitation in 1946.

Thus, we are justified in briefly examining the events of Eliot’s life between 1935 and 1946 that bear on this subject. Eliot separated from his first and mentally unhealthy wife, Vivien, when he went to America in 1932. When he returned to England, he refused to see Vivien although she pursued him with some drive and cunning until she was committed to a mental hospital in 1938 (Ackroyd 233). His first recitation was given in a period where he must have constantly been in fear of his wife. But 1935 also marked the beginning of his great master piece, *The Four Quartets*. The first part, “Burnt Norton” was published 1935, and “East Cocker” 1940, “The Dry Salvages” 1941, and “Little Gidding” 1942. *The Four Quartets* guaranteed Eliot’s status as the preeminent English poet in his life time (Sharpe 158-64). Thus, by 1946 Eliot had proven his ultimate worth as a poet and written something that
many critics thought better than The Waste Land (1921), and he had been free of fear of his wife for about eight years.

It then makes perfect sense that his 1946 recitation should be calmer, slower, and less flamboyant than the 1935 recording. He had less to fear with Vivien institutionalized and less reason to care about The Waste Land since he had written The Four Quartets. Indeed, he may have been quite tired of The Waste Land by that point, or at least tired of the morbid interpretations that proliferated. As I have shown, in 1946 he read the poem in largely the same style, especially in the more scenic and vivid sections, but he did not include some of the original stylistic elements that he intended when he wrote the poem. Gone is the jagged cadence of the opening seven lines and the rising cry of “mon frère!” Gone is the frantic chanting of the beginning of “The Game of Chess.” But in return, the 1946 reading offers a peace in “What the Thunder Said” that far surpasses the 1935—a peace Eliot achieved only years after he originally wrote The Waste Land.

Bibliography


Potable Water Production from Third River in Nasiriyah City

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Introduction

Water is vital for all living creatures on Earth. About 97% of water on Earth is ocean seawater, leaving only 2.5% of water on Earth as fresh water, and about 99% of that water is ice and underground. Due to population growth, industrialization, and climate change, water scarcity has become one of the most pervasive problems afflicting people throughout the world.

All water for drinking purposes must be treated to achieve standard quality. Therefore, there is a significant challenge to produce suitable drinking water. General treatment of drinking water consists of several stages to remove or reduce suspended and dissolved solid and microbial pollutants (Doosti et al., 2012). The choice of which treatment to use from the great variety of available processes depends on the characteristics of the water, the types of water quality problems likely to be present, and the costs of different treatments (Mohammad and Entesar, 2010).

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Table 1: Specification of Third River Water

Coagulation is a process used to neutralize charges and form a gelatinous mass to trap (or bridge) particles, thus forming a mass large enough to settle or be trapped in the filter. Flocculation is the step where destabilized colloidal particles (or the particles formed during the coagulation step) are assembled into aggregates. Flocculation is gentle stirring or agitation to encourage the particles thus formed to agglomerate into masses large enough to settle or be filtered from the solution (Rahul et al., 2014). Coagulation is the step where colloidal particles (similar to spheres of a diameter of less than 1 micrometer) are destabilized (SNF, 2003).

Microfiltration (MF) is the process of removing particles or biological entities in the 0.025 µm to 10 µm range from fluids by passage through a micro porous medium such as a membrane filter (Hjerpe and Olsson, 2012). Reverse Osmosis is a water filtration method. It is referred to as hyper-filtration as it is the highest known form of filtration to date, removing all solids including metal ions and aqueous solids in brackish water application.
This operation is a membrane separation process in which brackish water permeates through a membrane by applying a pressure larger than the osmotic pressure of the brackish water. The membrane is permeable for water, but not for the dissolved salts and molecular organic contaminants from water. In this way, a separation between a pure water fraction (the permeate) and a concentrate fraction (the retentate) is obtained. Most RO membranes are thin-film composite membranes and the membranes are usually configured in spiral wound modules (Hanane, 2008 and Merten, 1966).

**Chemical Reactions**

The addition of alum (hydrated aluminum sulfate) to water produces insoluble aluminum hydroxide according to the reaction (MRWA, 2003):

\[
\text{Al}_2(\text{SO}_4)_3 \cdot 18\text{H}_2\text{O} + 6\text{H}_2\text{O} \rightarrow 2\text{Al(OH)}_3 + 6\text{H}^+ + 3\text{SO}_4^{2-} + 18\text{H}_2\text{O}
\]

While the addition of ferric chloride to water produces insoluble ferric hydroxide, according to the reaction (MRWA, 2003):

\[
\text{FeCl}_3 \cdot 18\text{H}_2\text{O} + 3\text{H}_2\text{O} \rightarrow \text{Fe(OH)}_3 + 3\text{H}^+ + 3\text{Cl}^-
\]

Aluminum and iron coagulants react with bicarbonate alkalinity (HCO\(^-\)) in acid drainage creating aluminum; ferric hydroxide flocs can be represented by the following equations (MRWA, 2003):

\[
\text{Al}_2(\text{SO}_4)_3 \cdot 18\text{H}_2\text{O} + 3\text{Ca(HCO}_3)_2 \rightarrow 2\text{Al(OH)}_3 + 3\text{CaSO}_4 + 6\text{CO}_2 + 18\text{H}_2\text{O}
\]

\[
2\text{FeCl}_3 + 3\text{Ca(HCO}_3)_2 \rightarrow 2\text{Fe(OH)}_3 + 3\text{CaCl} + 6\text{CO}_2
\]

**Theoretical Aspects**

1. **Water and Solute Fluxes**

The Water and salt Fluxes through RO membrane can be described by two models: solution-diffusion model and irreversible thermodynamics models. The two models are selected based on the credibility they have among researchers as well their domination in practical applications. The two models are conceptually different. The expressions for water and salt (solute) fluxes through the membrane are given by the following equations (Thor and Harald, 2006):

\[
J_w = A_p (\Delta P - \Delta \pi)
\]

\[
J_s = \left( \frac{D}{K\delta} \right) \Delta C
\]

Where \(J_w\) is the product water flux, \(AP\) is the pure water permeation, \(\Delta P\) is the operating pressure, \(\Delta \pi\) is the difference in the osmotic pressure across the membrane, \(JS\) is the flux of salt permeating the membrane, \((D/K\delta)\) is the salt permeability coefficient, and \(\Delta C\) is the difference in salt concentration across the membrane. The salt permeability coefficient takes...
into account the diffusivity coefficient of the salt through the membrane, $D$, the partitioning of salt concentration between the bulk solution and the membrane, $K$, and the membrane thickness, $\delta$. The model considers $(D/K\delta)$ as an intrinsic parameter, which is not calculated by dividing the diffusivity coefficient to the product of the partitioning coefficient times the membrane thickness (Ahmed, 2007 and Rana, 2011).

2. **Recovery**

The recovery is the percentage of the feed flow that passes through the membrane and becomes the permeate stream. It is an estimation of the performance of a membrane system. It measures the volumetric fraction of permeate to the feed showing how much of permeate is recovered from the feed. It is also called separation efficiency.

$$R_w = \frac{Q_p}{Q_f} \times 100\%$$

Where $R_w$ is the recovery percentage, $Q_p$ is the permeate (or product) flow rate and $Q_f$ is the feed flow rate (Richard, 2012 and Uche, 2011).

3. **Salt Rejection Percentage**

Membrane salt rejection is a measure of overall membrane system performance, and membrane manufacturers typically state a specific salt rejection for each commercial membrane available. Salt rejection through RO membrane (crossflow operation) is nominally given by:

$$R_s = \left(1 - \frac{C_{\text{permeate}}}{C_{\text{feed}}} \right) \times 100\%$$

Where $R_s$ is the rejection percentage, $C_{\text{feed}}$ is the concentration of a specific component in the feed solution to the membrane process and $C_{\text{permeate}}$ is the concentration of the same specific component in the cleaned discharge stream leaving the membrane system (Nicholas, 2002).

4. **Concentration Factor**

The concentration factor (CF) is the ratio of the concentrate TDS concentration in the concentrate or reject stream to its concentration in the feed stream (Lauren et al., 2009):

$$CF = \frac{C_{\text{concentrate}}}{C_{\text{feed}}}$$

---

**Materials and Methods**

**Materials:**

- Water samples: from Third River.
- Coagulants: alum $[\text{Al}_2(\text{SO}_4)_3 \cdot 18\text{H}_2\text{O}]$, ferric chloride $[\text{FeCl}_3]$ and Polyelectrolyte.

**Methods:**

- Jar test apparatus: A conventional unit was used with three beakers, each 1000 ml in
capacity.

- HACH (2100 N) Turbidimeter: to measure the turbidity of the samples throughout the experimental work in NTU unit.
- pH meter (type inoLab 7110 basic pH/mV/T benchtop meter WTW): to measure the pH variation during the chemical reaction.
- MF Membrane: Water filter cartridge 5 µm and water filter cartridge 1 µm) are used.
- RO Membrane: KFLOW element (0.1 – 2.1 MPa and 5 – 40°C) fits in standard residential membrane housings was used.
- Vessels: Two vessels with capacity of 25 liters were used as feed and concentrate vessels. In addition, vessel with a capacity of 10 liters was used as permeate vessel.
- Pump: One centrifugal pump (10 – 30 l/min, 20 – 12 m.H, 370 Watt, 220 – 240 V, 2.5 A, MARQUIS) was used.
- High Pressure Pump: Positive displacement, diaphragm pump was used.
- Pressure Gauge is used in the feed line to indicate the feed brine pressure (range of 0 – 20 psi).
- Rotameter: Calibrated rotameter (range of 1 – 7 LPM) is used.
- Heater: One submersible electrical coil (220 Volt, 1000 Watt) was used as a heating media.
- Total Dissolved Solid (TDS) Meter: The concentration of the feed, the reject (outlet concentration) and the permeate (product solutions) were measured by means of a digital TDS hand – held meter.
- Digital Balance: A digital balance with four decimal points (Sartorius BP 301 S max. 303 g, d = 0.1 mg) is used.
- Furnace: A Barnstead/Thermolyne Small Benchtop Muffle Furnace, Type 1400, Thermo Scientific was used in the sulphate test.

Procedure:
The practical part of this work consists of three stages: Coagulation/Flocculation process, Microfiltration, and RO process.

1. Coagulation and Flocculation Process:
   - Set of experiments were done using three initial turbidity contents: 30, 50 and 100 NTU
   - The first sets of tests were to find the efficiency of turbidity removal using alum, ferric chloride, and polyelectrolyte as individual coagulants. The second trail was to test speed and time of slow mixing and settling time with the above coagulants in turbidity removal.
   - The experimental work (jar test) was performed as rapid mixing at 100 rpm for 2 min.
   - Samples were withdrawn from the top inch of each beaker for turbidity measurement.
   - Turbidity was measured by using the turbidimeter.

2. Microfiltration:
   Known turbidity and TSS water is fed into 5 µm MF membrane and 1 µm MF membrane severally then the turbidity and TSS of outlet was measured.

3. RO Membrane Separation Process:
   - An experimental rig was constructed in the laboratory as shown schematically in figure 1 and pictured in figure 2.
   - Feed solution is prepared in the 25-liter vessel and then the outlet valve of
the feed vessel is opened to let the solutions fill the whole pipes of the system. The feed water is drawn from the vessel by means of a centrifugal pump to pass through filters (5 µm and 1 µm) then the water introduced into the RO elements by means of a high-pressure pump. Through RO element, water transports from the inlet stream across the salt rejecting membrane and into the product.

- Sets of tests are done and the different concentrations of feed water are putted in the feed vessel and the readings for rejected stream and produced stream are recorded. Also effect of the operating temperature is studied.
- Other sets of tests are done by the recycle mode where the rejected stream is recycled to the feed vessel and the reading is recorded for known periods of time.
- The Gravimetric Method is used to determine sulphate ion in the feed permeate and reject streams. The titration is used to determine total hardness, calcium, magnesium, and chloride ions in the feed permeate and reject streams (David, 2000, Jeffery et al., 1989, Aparna, 2013).
- Osmotic pressure of a solution is related to its dissolved solute concentration and is calculated from van’t Hoff equation:

\[ \pi = \Phi iRT \sum X_i \]

Where: \( \pi \) is the osmotic pressure (kPa), \( \Phi \) is the osmotic coefficient, \( i \) is the number of dissociated ions per molecule (van’t Hoff factor), \( T \) is the temperature (K), \( R \) is the universal gas constant and \( \sum X_i \) is the concentration of all dissolved salts (kgmol/m³). The van’t Hoff factor is introduced to cover deviations from ideal solution behavior that include finite volume occupied by solute molecules and their mutual attraction as in van der Waals attraction. For all solutes \( \Phi \) depends on the substance and on its concentration. As the concentration of any solute approaches zero its value of \( \Phi \) approaches 1. In ideal solution, \( \Phi = 1 \) (Robertus, 2006 and Mohammed, 2008).

Figure 1: Schematic Diagram of RO Separation Process
Figure 2: Experimental System of RO Membrane Separation Process

Results and Discussion

In the present work, the parameters such as turbidity, total suspended solids (TSS), total dissolved solids (TDS), concentrations of studied components, and temperature are studied with their ranges in Third River water. In the Reverse Osmosis (RO) membrane technology experiment with recirculation mode, the time parameter reaches to (50 min) where the difference between operating pressure and osmotic pressure became very small then the process is stopped.

Coagulation and Flocculation

1. Effect of Coagulant Dosage on Turbidity Removal:

The effect of different coagulants dosages (Alum, FeCl₃ and Polyelectrolyte) on turbidity removal from Third River water is shown in figures 3, 4, and 5 for initial turbidities of 30, 50 and 100 NTU respectively. These figures show that the optimum dose for alum was 40, 45, and 50 ppm for 30, 40, and 100 NTU initial turbidity respectively. Meanwhile, for ferric chloride it was 20, 25, and 30 ppm and for polyelectrolyte 6, 8, and 10 ppm for 30, 50, and 100 NTU initial turbidity respectively. A similar observation was noticed in the experimental study of Hasan et al., 2010 and Kadhum et al., 2011.

Colloidal particles in nature normally carry charges on their surface, which lead to the stabilization of the suspension. By addition of some chemical dose, the surface property of such colloidal particles can be neutralized and precipitated so as the turbidity can be decreased until all colloidal particles are neutralized and precipitated where the minimum turbidity can be obtained. Any more addition of the chemicals dose leads to increase the turbidity because there are no charged colloidal particles to neutralize with. These excess chemicals stay in the water as suspension and increase turbidity.
Figure 3: Effect of Coagulant Dosage on Turbidity removal (Coagulation Time 2 min (100 rpm), Flocculation Time 30 min (25 rpm), Settling Time 30 min, Initial Turbidity = 30 NTU, pH = 8.2)

Figure 4: Effect of Coagulants Dosage on Turbidity Removal (Coagulation Time 2 min (100 rpm), Flocculation Time 30 min (25 rpm), Settling Time 30 min, Initial Turbidity = 50 NTU, pH = 8.2)
Figure 5: Effect of Coagulants Dosage on Turbidity Removal (Coagulation Time 2 min (100 rpm), Flocculation Time 30 min (25 rpm), Settling Time 30 min, Initial Turbidity = 100 NTU, pH = 8.2)

2. Effect of Speed and Time on Turbidity Removal

Figures 6, 7, and 8 show the effect of speed of the second step (flocculation step), time of the second step, and settling time on turbidity removal respectively for the same initial turbidity concentration (30 NTU) of water from Third River. In these experiments, the optimum speed of second step was (25 rpm) for both of alum (40 ppm), ferric chloride (20 ppm) and polyelectrolyte (6 ppm). While the optimum time of the second step was (30 min) for both of alum (40 ppm), ferric chloride (20 ppm) and polyelectrolyte (6 ppm) and of settling was (30 min) for both of alum (40 ppm), ferric chloride (20 ppm) and polyelectrolyte (6 ppm). A similar observation was noticed in the experimental study of James et al., 2004.

It has been found that for high solids concentrations and relatively low doses, flocculation occurs rapidly, but the flocs are not stable and can be broken at moderate stirring rates so high values of turbidity are obtained. Increased mixing speed of the second step leads to low values of turbidity. Increased agitation more leads to the production of smaller flocs and the turbidity increased. By reducing the rate of stirring shortly after dosing, floc size (and settling rate) can be held at plateau levels, without subsequent decline.

Incomplete mixing of the flocculant may result in local overdosing and restabilization of a small number of particles, giving rise to a persistent haze in the water so high values of turbidity are obtained. Increased mixing time of the second step decreases values of turbidity. By continuity, the restabilization state appears for small number of particles and the turbidity increased.

Decreases settling time, allowing much higher flow rates to be treated. The electrostatic repulsive forces do not constrain the particles from approaching each other because the suspension is characterized as unstable; therefore, short time period is required for settling. After this time there is no express change in turbidity recorded.
Figure 6: Effect of Speed of Second Step on Turbidity (Coagulation Time 2min (100 rpm), Flocculation Time 30 min, Settling Time 30 min, Initial Turbidity =30 NTU, pH = 8.2)

Figure 7: Effect of Time of Second Step on Turbidity (Coagulation Time 2min (100 rpm), Flocculation Speed 25 rpm, Settling Time 30 min, Initial Turbidity = 30 NTU, pH = 8.2)
Figure 8: Effect of Settling Time on Turbidity (Coagulation Time 2 min (100 rpm), Flocculation Time 30 min (25 rpm), Initial Turbidity =30 NTU, pH = 8.2)

**Microfiltration Membranes**

Microfiltration (MF) membranes (5 µm & 1 µm) are used to remove the turbidity and TSS from water. The same feed water inlet into MF membranes (5 µm & 1 µm) and the results show that the quantity of the production for 5 µm MF is more than that for 1 µm MF.

When the pore size of membrane was small, the quality of the production was better and the operating pressure was high, see figures 9 and 10.

Figure 9: Effect of Feed Turbidity Change on Product Turbidity
Reverse Osmosis RO Membrane Technology

1. Effect of Feed Concentration:

   By increasing concentration of water feed from Third River, osmotic pressure increases, then driving force (ΔP – Δπ) decreases. This appears as a decrease of water flow through the membrane to 0.66 l/h at feed concentration 8170 mg/l. This is shown in figure 11. Also, figure 11 show the effect of feed concentration of Third River water on recovery where upper value of recovery percentage was 16.857 % at feed concentration 2000 mg/l and by increasing the concentration of water feed from Third River, the recovery percentage decrease until reaching to lower value 1.571 % at feed concentration 8170 mg/l according to the equation 7. By increasing feed concentration of water, solute flux increases according to the equation 6, this appears as an increase of solute concentration in the product as shown in figures 12 and 13.

Figure 10: Effect of Feed Total Suspended Solids (TSS) Change on Product TSS

Figure 11: Effect of Feed Concentration Change on Permeate Rate and Recovery Percentage (at T = 27°C, P = 85 psi, pH = 8, QF = 42 l/h)
Figure 12: Effect of Feed Concentration on Permeate Concentration and Rejection Percentage (at T = 27°C, P = 85 psi, pH = 8, QF = 42 l/h)

Figure 13: Effect of Feed Concentration on Reject Concentration and Concentration Factor (at T = 27°C, P = 85 psi, pH = 8, QF = 42 l/h)

Figure 14 shows that the increasing in feed concentration of Third River water leads to increased sulphate ion concentration (SO₄) (27.323 – 70.624 mg/l), TH (65 – 480 mg/l), Ca²⁺ (2 – 20 mg/l), Mg²⁺ (9 – 59 mg/l), and Cl⁻ (37 – 692.25 mg/l) in the permeate respectively because by this increasing in feed, solute flux increases according to the equation 6, this appears as an increase of solute concentration in the
permeate.

**Figure 14:** Effect of Feed Concentration on Solute Permeate Concentration (at T = 27°C, P = 85 psi, pH = 8, QF = 42 l/h)

**Figure 15** shows the change in rejection percentage. The salts which have high molecular weight such as SO$_2^-$ and Ca$^{2+}$ pass through the membrane with rejection percentage larger than salts which have low molecular weight such as Mg$^{2+}$ for the same values of valence. For different values of valence, the salts which have high valence such as Ca$^{2+}$ pass through the membrane with rejection percentage larger than salts which have low valence such as Cl$^-$ for the same or approaching molecular weights. This relation was contingent with the equation 10.

**Figure 16** shows that the increasing in feed concentration of water from Third River leads to increase sulphate ion concentration (SO$_4^{2-}$) (651.16 – 978.721 mg/l), TH (1000...
- 3090 mg/l), $\text{Ca}^{2+}$ (120 – 698 mg/l), $\text{Mg}^{2+}$ (140 – 269 mg/l), and $\text{Cl}^{-}$ (624.41 – 3920.04 mg/l) in the reject respectively because pure water transfer from feed side to the permeate side across the membrane and this leads to concentrate of solute in the reject.

**Figure 16:** Effect of Feed Concentration on Solute Reject Concentration (at $T = 27^\circ\text{C}$, $P = 85$ psi, $\text{pH} = 8$, $Q_F = 42$ l/h)

The increasing in feed concentration of water from Third River leads to decrease in concentration factor for sulphate ion ($\text{SO}_4^{2-}$) (1.168 – 1.079) TH (2.536 – 1.037), $\text{Ca}^{2+}$ (1.714 – 1.551), $\text{Mg}^{2+}$ (2.059 – 1.206), and $\text{Cl}^{-}$ (1.43 – 1.109) according to equation 9. This is shown in figure 17.

**Figure 17:** Effect of Feed Concentration on Solute Concentration Factor (at $T = 27^\circ\text{C}$, $P = 85$ psi, $\text{pH} = 8$, $Q_F = 42$ l/h)

**Effect of Operating Temperature**
Increasing of inlet operating temperature with the range of (20 – 37 °C) will increase the product rate with the range of (2.7 – 5.82 l/h) and recovery percentage of water with the range of (6.429 – 15 %). This is shown in figure 18. A change in operating temperature of feed water from Third River changes (1) the densities and viscosities of the feed, and (2) the osmotic pressure of the system. An increase of temperature increases the osmotic pressure of feed water from Third River, resulting in a decrease in the driving force (ΔP – Δπ). Thus while change (1) above increase the relative flow of the pure water through the membrane with increase in temperature; the change in the osmotic pressure has the opposite effect. A similar observation was noticed in the experimented study of Mohammed, 2008 and Mattheus et al., 2002.

**Figure 18:** Effect of Operating Temperature on Product Rate Flux and Recovery (at $C_F = 3500$ ppm, $P = 85$ psi, $pH = 8$, $Q_F = 42$ l/h)

The increase of operating temperature for feed water from Third River with the range of (20 – 37°C) leads to increase the flux; this appears as an increase of salts concentrations in the product with the range of (150 – 280 mg/l). The effect of operating temperature on salts concentrations, can be explain the decreasing of rejection percentage with increase in operating temperature, see figure 19. While figure 20 show that the reject concentration and concentration factor decrease with the ranges of (2840 – 2210 mg/l) and (1.136 – 0.884) respectively with increasing temperature because the increasing of pure water passed through the membrane into permeate stream leads to decrease the salts concentration in the reject. A similar observation was noticed in the experimented study of Mohammed, 2008.
Recirculation of Concentrate

In some experiments, the RO is used to recovery of water from effluents of Third River. The permeate is removed and the concentrate stream is recycled back to the feed vessel in order to recover high quantity from pure water. At time equal to zero, for recirculation of concentrate the operating conditions for the water from Third River with 4430 mg/l concentration were \( V_F = 25 \text{ l} \), \( Q_F = 50 \text{ l/h} \), \( T = 27^\circ \text{C} \), \( P = 85 \text{ psi} \).

Figure 21 shows the effect of time on volume of permeate and recovery percentage. As the time increased the product rate decreased. This leads to decrease the recovery percentage according to the equation 7. Because of an increase of the feed concentration with time in the recirculation mode, the salts concentration in the product increased with the increase in operating time. This means that the rejection percentage decrease, see figure 22.
Conclusion

Using conventional methods and Reverse Osmosis membranes. In coagulation/flocculation process, optimum dosage for alum was 40, 45 and 50 ppm for 30, 50 and 100 NTU initial turbidity respectively. While, for ferric chloride it was 20, 25 and 30 ppm and for polyelectrolyte 6, 8 and 10 ppm for 30, 50 and 100 NTU initial turbidity respectively. The optimum speed of second step was 25 rpm. While the optimum time of the second step was 30 min and of settling was 30 min. For the same dosage, the ability of alum, ferric chloride and polyelectrolyte to remove the turbidity is arranged progressively as the following: Polyelectrolyte → Ferric chloride → Alum.

Microfiltration can be used to reduce the turbidity, TSS and bacteria. For the same feed, the ability of 1 µm MF membrane to remove the turbidity and TSS from water was more than that of 5 µm MF membrane. RO membrane can be used to reduce the TDS to the demand limits. The product rate of the membrane decreases with increasing feed concentration. The maximum recovery percentage (16.857%) was at CF = 2000 mg/l for P =
85 psi, QF = 42 l/h, T = 27°Cand pH =8. Maximum component rejection percentage at P = 85 psi, QF = 42 l/h, T = 27°C and pH = 8 95.1 %, 90.647 %, 97.143 %, 86.765 %, 91.526 % for sulphate, TH, Ca²⁺, Mg²⁺ and Cl⁻ respectively. In recirculation of concentrate process, maximum value of volume of permeate is (3.186 liter) from feed vessel (25 liter) after 50 min.

**Recommendations**

Testing other types of membranes (e.g. cellulose acetate CA) to investigate their behavior in the same module type. Studying the effect of the pH on flux and sulphate rejection and studying the effect of fouling and cleaning of membranes in order to improve separation efficiency.

**References**


**Appendix**

**Table 1:** Specification of Third River Water

**List of Figures**

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*Figure 2:* Experimental System of RO Membrane Separation Process

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*Figure 4:* Effect of Coagulants Dosage on Turbidity Removal (Coagulation Time 2 min (100 rpm), Flocculation Time 30 min (25 rpm), Settling Time 30 min, Initial Turbidity = 50 NTU, pH = 8.2)

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Figure 18: Effect of Operating Temperature on Product Rate Flux and Recovery (at C_F = 3500 ppm, P = 85 psi, pH = 8, Q_F = 42 l/h)

Figure 19: Effect of Operating Temperature on Product Solute Concentration and Rejection Percentage, (at C_F = 3500 ppm, P = 85 psi, pH = 8, Q_F = 42 l/h)

Figure 20: Effect of Operating Temperature on Reject Concentration and Concentration Factor (at C_F = 3500 ppm, P = 85 psi, pH = 8, Q_F = 42 l/h)

Figure 21: Effect of Operating Time on Volume of Permeate and Recovery Percentage (Recirculation of Concentrate, V_F = 25 l, Q_P = 42 l/h, T = 27°C, pH = 8 and P = 85 psi)

Figure 22: Effect of Operating Time on Permeate Concentration and Rejection Percentage (Recirculation of Concentrate, V_F = 25 l, Q_P = 42 l/h, T = 27°C, pH = 8 and P = 85 psi)
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The Problem of Nomological Impossibility for Epistemic Structural Realism

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I. Introduction
In his article “Structural Realism: The Best of Both Worlds?”, John Worrall introduces the concept of ‘structure’ in order to defend a version of Scientific Realism that respects historical considerations of ontological discontinuity between successive scientific theories. Worrall argues that despite the fact that there is no ontological continuity between successive scientific theories in general, successor theories do preserve the formal structure of earlier theories. The formal structure of an earlier theory is usually preserved as a “limiting case” of the successor theory’s structure: the earlier structure can be recovered from the successor structure by allowing some quantity in the latter to tend towards some limit (Worrall 1989, 120).

This retention of formal structure between successive theories, according to Worrall, underlies the cumulative nature of science. This cumulative nature, in turn, provides reason to believe that the formal structures of current scientific theories are (approximately) accurate. If formal structure is in fact preserved between successive theories, then only the accuracy of the relevant formal structures can adequately explain the empirical success of science. Despite the potential loss of ontology between theories, then, the Scientific Realist is justified in believing in the approximate accuracy of the structures of current scientific theories.

The fact that most cases of structure retention involve limiting cases, however, presents a problem for Worrall’s account. It seems that some earlier theories can only be recovered from successor theories as nomologically impossible idealizations of the latter, since this recovery involves allowing some quantity in the formal structure of the successor theory to tend towards some physically unrealizable limit. But if this is the case, then the earlier theory cannot be physically realized either. It is thus unclear in what sense the structure of the earlier theory can be said to accurately represent the physical structure of the world, since the former is nomologically impossible while the latter is actual (*ex hypothesi*). If the nomological impossibility of the earlier theory’s structure undermines the Scientific Realist’s justification for believing in it, moreover, then the preservation of structure through theory change will fail to secure justification for the belief in the accuracy of the successor theory’s formal structure. The Scientific Realist will thus be left with no reason to believe in the structural accuracy of current scientific theories.

II. Epistemic Structural Realism
Worrall introduces the position of Epistemic Structural Realism in order to accommodate Scientific Realist intuitions about the empirical success of science as a whole while addressing concerns about theory change. Worrall notes that the main argument in favor of Scientific Realism is the so-called “No Miracles” Argument: the only adequate explanation of the empirical success of science is the claim that mature sciences are approximately true; we should therefore believe in the approximate truth of the mature sciences (Worrall 1989, 100).

This argument for the Scientific Realist position, Worrall notes, relies on the claim that the succession of scientific theories has historically been “essentially cumulative” (Worrall 1989, 105). Some elements of the supplanted (yet mature) theory, in addition to its successful (observational) empirical consequences, must be preserved to some degree by the successor
(and also mature) theory in order for the two successive theories to exhibit a robust form of continuity between them. It is in virtue of this type of continuity that the Scientific Realist can be justified in advancing the “No Miracles” Argument. Once the continuity has been established, the Scientific Realist can infer by induction that any future succession of scientific theories will also be essentially cumulative. All earlier mature theories will thus be viewed as approximately correct from the standpoint of later theories by virtue of this continuity. This approximate correctness, in turn, will serve as the only adequate explanation of their empirical success and must therefore be accepted.

The crucial claim that science is essentially cumulative faces a forceful historical objection, however. This objection is expressed by the Pessimistic Meta-Induction Argument, which denies the robust continuity between scientific theories to which the Scientific Realist appeals. According to this argument, the history of science includes many examples of mature and empirically successful theories that were once believed to be approximately true but are now considered thoroughly false from the perspective of current mature and successful theories. This suggests science is not essentially cumulative, as there have been mature and successful theories once thought to be approximately correct that have not been preserved to any degree by contemporary theories. But if successive scientific theories do not exhibit the requisite continuity, the Scientific Realist cannot appeal to the approximate truth of theories (both supplanted and successors) in order to explain the empirical success of science as a whole.

Worrall believes the Scientific Realist should concede the fact that science is not essentially cumulative with respect to theoretical posits (Worrall 1989, 109). Despite preserving the successful empirical consequences of its predecessor, a successor scientific theory rarely (if ever) retains the complete theoretical ontology of this predecessor. Nevertheless, Worrall claims there is robust continuity of formal structure between successive theories (Worrall 1989, 120). The mathematical equations describing the relations between the theoretical posits of a supplanted theory are preserved to a large extent by the corresponding successor theory. This suggests that the Scientific Realist need not commit to the continuity of ontology between successive theories as the crucial factor underlying the cumulative nature of science. The Scientific Realist can account for the empirical success of scientific theories by appealing to the retention of formal structure between successive theories, which indicates that the Scientific Realist can be justified in believing the accuracy of these formal structures in approximating the actual physical structure of the world. This Realist epistemic attitude towards the formal structures of mature and empirically successful scientific theories constitutes the core of Worrall’s Epistemic Structural Realism.

III. An Objection

Christopher Pincock (2011) raises a worry for the Epistemic Structural Realist concerning the accuracy of an empirically successful theory’s structure. The empirical success of a scientific theory, Pincock claims, does not guarantee that the structure of the theory is an exact representation of the structure characterizing the relevant physical phenomenon being studied.

Pincock argues that the formal structure of an empirically successful scientific theory might fail to accurately represent the physical structure of the world (or of some relevant sub-domain of the world) in one of two ways: the relevant theory might contain too much structure, or it might contain too little (Pincock 2011, 74). In the first case, the mathematics of a theory might be more complex than what is in fact needed to describe the relations obtaining among the entities of a particular physical system. The theory containing this overly complex mathematical structure could still be empirically successful, since it would contain the necessary resources to generate accurate predictions. Nevertheless, the structure of such a theory would not be faithful to the physical structure of the world.
The structure of a theory can also fail to capture the entire structure of the physical system it studies. It might be the case that the formal structure of such a theory does not take into account certain parameters whose effects, while being exemplified or instantiated in the physical system under consideration, are not noticeable enough at the scale under consideration to sufficiently affect the empirical adequacy of the theory at this scale. The structure of the scientific theory would thus seem to accurately represent the structure of the physical system being studied, but only because certain ranges of initial and boundary conditions (corresponding to smaller and larger scales of the physical system) are not taken into account.

If the formal structure of a theory fails to have the exact amount of structure, Pincock, argues, “there is no reason to think that the structures appealed to will survive theoretical change” (Pincock 2011, 75). This would then rob the Epistemic Structural Realist of a key premise in the relevant formulation of the “No Miracles” Argument: the claim that science is essentially cumulative with respect to formal structure.

IV. Limiting Cases

Pincock notes, however, that an Epistemic Structural Realist can at this point appeal to the limiting relation that is supposed to obtain between mature successive scientific theories in order to rescue the notion of structural continuity between theories (Pincock 2011, 75-76). The Epistemic Structural Realist can grant the fact that structure is rarely carried over intact from an earlier theory to a successor theory. Even when mature scientific theories do not contain the correct amount of structure (they contain too much or too little), successor theories can add needed structure or subtract excess structure without violating structural continuity between theories. This can be accomplished by ensuring that the formal structure of an earlier theory is preserved as a limiting case of the successor theory’s structure (Worrall 1989, 120).

In his (1981), Larry Laudan provides a straightforward description of the limiting case relation that the Epistemic Structural Realist claims obtains between successive theories. If an earlier theory $T_1$ is a limiting case of a successor theory $T_2$, then (1) the variables representing both observational and theoretical terms that are assigned a value in $T_1$ form a subset of the set of variables that are assigned a value of $T_2$, and (2) the values that $T_2$ assigns to the variables in this subset are sufficiently close to the values that $T_1$ assigned to the variables in that subset, provided certain initial and boundary conditions are met (Laudan 1981, 39).

Laudan argues that this characterization of the limiting case relation commits the Scientific Realist to the perfect preservation of ontology (including theoretical posits) whenever $T_1$ is succeeded by $T_2$, if $T_1$ is to count as a limiting case of $T_2$ (Laudan 1981, 40). But notice that the Epistemic Structural Realist need not commit to such a strong claim. While granting the above description of what the limiting case relation between two successive theories is, it will be enough for $T_2$ to preserve the relations between the variables assigned a value by $T_1$ in order for $T_1$ to count as a limiting relation of $T_2$. In preserving the relations between the variables of $T_1$ described by the mathematical equations of this theory, $T_2$ need not also preserve the ontology of $T_1$. By simply preserving the structural relations of $T_1$, the theory $T_2$ will also preserve the arity of these relations and can thus preserve the variables of $T_1$. In this way, the two theories can satisfy a weakened form of condition (1) above without the need for the retention of ontology: the variables of $T_2$ that stand in the same relations to each other as the relations in which the variables in $T_2$ stand to each other need not refer to the same entities in $T_2$ as they did in $T_1$. Condition (2) can similarly be satisfied without the need for a shared ontology between the theories $T_1$ and $T_2$: the preserved variables can be assigned similar values by $T_1$ and $T_2$ without having to refer to the same entities in both theories.
Once again, this retention of structure need not be complete. If the theory $T_1$ contains too little structure to accurately represent the structure of the physical world, the theory $T_2$ can “preserve” the variables of $T_1$ while including more relations among these variables, as well as adding more relations between the variables of $T_1$ and the new variables found only in $T_2$. As such, $T_2$ can supplement the deficient formal structure of $T_1$. If, on the other hand, $T_1$ has more structure than $T_2$, then a corresponding story can be told. It is possible for $T_2$ to eliminate redundant elements of $T_1$’s formal structure, where these surplus structural elements might be identified by the discovery of their unnecessary role in generating successful predictions, lack of heuristic value, etc. In this way, $T_2$ can pare down the surplus structure of $T_1$ while preserving the essential structural components of $T_1$ (where what is “essential” will presumably be determined by criteria such as causal efficaciousness, for example).

A result of the imperfect preservation of structure between successive scientific theories is the fact that the Epistemic Structural Realist must limit claims of justification to beliefs about the approximate accuracy of a scientific theory’s formal structure. Because there is reason to believe that neither the earlier theory nor its predecessor will have the exact level of structural detail that perfectly matches the amount of physical structure exhibited by the world, the Epistemic Structural Realist must settle for a version of the “No Miracles” Argument that employs the assumption of partial structure preservation between successive theories. The Epistemic Structural Realist can then argue for the comparatively modest conclusion that the formal structures of mature scientific theories are approximately accurate representations of the physical structure present in the world.

V. Idealizations in Scientific Model Construction

How exactly can the structure of an earlier theory be recovered as a limiting case of a successor theory? Many instances of the limiting case relation between mature (according to Worrall’s criteria) successive scientific theories involve idealization assumptions. In discussing the process of model construction in the context of the Semantic View of theories, Anjan Chakravartty identifies two processes involved in this construction: abstraction and idealization (Chakravartty 2007, 190). According to Chakravartty, abstraction involves ignoring some of the often numerous factors present in a physical system in order to construct a model that will serve as a simplification of this physical system (Chakravartty 2007, 190). The simplified model only represents some of the factors that are potentially (or in fact) relevant to the behavior of the physical system, usually for pragmatic reasons. It is often the case that the number of factors relevant to the behavior of the physical system being studied is too many to be included in a model of that physical system. Moreover, the relative significance of these ignored factors is negligible in the particular context in which the physical system is being studied; the effects of these factors on the predictive accuracy of a theory may be miniscule at the relevant scale, for example. Abstraction, however, “does not undermine the idea that putative representations of factors composing abstract models can be thought to have counterparts in the world. The fact that some factors are ignored is perfectly consistent with the idea that others are represented” (Chakravartty 2007, 191). The fact that certain factors are ignored when constructing a model of some physical system does not mean the relevant model cannot be an approximately accurate representation of the physical system.

Idealization is also often employed when constructing scientific models. Unlike mere abstraction, however, idealization involves more than simply excluding factors potentially relevant to the behavior of the physical system being studied: idealization also “[incorporates] factors that cannot exist as represented given the actual properties and relations involved” (Chakravartty 2007, 191). In other words, idealization employs certain nomologically impossible assumptions in order to simplify the model being constructed (where this simplification can be motivated by the pragmatic constraints mentioned above).
As an example of abstraction and idealization in a scientific model, consider that of a simple pendulum (Chakravartty 2007, 191). Such a model is usually presented as consisting of a weight attached to a pivot point by means of a rod. Factors such as the air resistance affecting the motion of the weight or the friction of the rotating pivot are usually excluded from the model, in accordance with the abstraction process. Notice, however, that there is no principled reason why such a model that ignores these factors could not be physically realized. A closed physical system containing no air resistance and no friction is nomologically possible: i.e., it could be physically realized without violating the actual laws of nature.

Other elements of the model are simplified beyond what is physically realizable in any such system, however. Examples are the rod’s total lack of mass in the model, as well as the representation of the weight as a point-mass: an object whose total mass is concentrated at a single extension-less point. These types of simplifications (idealizations) could not in principle be physically realized by any system: a rod pivoting around a point with a weight attached must have some non-zero mass in any physical system; likewise, the mass of this weight could not be completely condensed down to a single dimensionless point in any physical system conforming to the actual laws of nature.

Both abstraction and idealization are often used simultaneously in scientific practice for the construction of models (Chakravartty 2007, 191). Nevertheless, the distinction concerning nomological possibility mentioned above will prove to have significant implications for the epistemic attitudes of the Structural Realist towards the formal structures of scientific theories.

VI. Limiting Cases as Idealizations

Recall the notion of structural continuity that is at the heart of the Epistemic Structural Realist’s version of the “No Miracles” Argument. The Epistemic Structural Realist will argue that there is substantial (even if incomplete) structural continuity between successive mature scientific theories, which means the formal structures of earlier theories will be viewed as approximately accurate from the point of view of later (mature) theories. This claim of approximate structural accuracy, in turn, will be the only acceptable explanation of the empirical success enjoyed by each of the successive theories and so should be accepted.

Again, the notion of incomplete preservation of structure between successive theories is understood in terms of limiting cases. Consider the successive theories of classical thermodynamics and statistical mechanics, for example. Both theories seem to meet the criterion of maturity (in Worrall’s sense), since both have enjoyed novel predictive success. Moreover, the two theories exemplify the limiting case relation with which the Epistemic Structural Realist explains partial structural continuity. The formal structure of thermodynamics can be derived from the formal structure of statistical mechanics by taking the “thermodynamic limit” in the latter: assuming the relevant physical system contains an infinite number of particles (Batterman 2005, 227). By allowing the number of particles in the system to tend to infinity, the formal structure of thermodynamics can be recovered from the formal structure of statistical mechanics.

Notice, however, that this “thermodynamic limit” is an idealization: no system with an infinite number of particles could be physically realized. It follows that the limiting case relation between thermodynamics and statistical mechanics can only be instantiated by making use of an idealization (viz., the “thermodynamic limit” assumption). But this means that the formal structure of the theory of thermodynamics can only be recovered from the formal structure of statistical mechanics through the use of an assumption that is not merely (strictly) false, but physically impossible. In other words, the partial retention of formal structure between these two mature theories in terms of the limiting case relation employs a nomologically impossible assumption.
VII. Problems with Employing Idealizations

This use of idealization in the derivation of limiting cases can be found among many other mature successive scientific theories. It poses a problem, however, for the Epistemic Structural Realist’s claim about the approximate structural accuracy of scientific theories. Suppose, for the sake of argument, that there is partial structural continuity between two mature successive theories such as thermodynamics and statistical mechanics. The presence of this partial structural continuity will imply that the two theories exemplify the limiting case relation, since the partial structural continuity is understood in terms of this limiting case relation for the Epistemic Structural Realist. So thermodynamics will constitute a limiting case of statistical mechanics. This, in turn, means that the derivation of the thermodynamic formal structure from the statistical mechanical formal structure will involve an idealization. The theory of thermodynamics will thus constitute an idealization of the relevant physical system by virtue of the role the “thermodynamic limit” (discussed above) plays in deriving the formal structure of thermodynamics from the formal structure of statistical mechanics. But if this is the case, then the formal structure of thermodynamics will be rendered not just inaccurate, strictly speaking; it will constitute a nomologically impossible structure, by virtue of the use of the “thermodynamic limit” idealization. Given that the structure of thermodynamics cannot be physically realized, then, in what sense can it be said to be an approximately accurate representation of the physical structure of the world? To what degree could a nomologically impossible structure approximate a (the) nomological structure that actually obtains?

Notice that the Epistemic Structural Realist cannot fall back on an appeal to approximate, as opposed to strict, accuracy of structure here (as was done in response to Pincock’s objection above). The problem for the Epistemic Structural Realist is not just that the formal structure of the thermodynamic theory is strictly false, and therefore disconnected from reality to some extent. The problem is deeper than this: the formal structure of thermodynamics could not possibly be realized by the structure of the physical system that actually obtains in our world. The notion of its approximate accuracy in representing the physical structure of the world is thus rendered a complete mystery. As a result, the Epistemic Structural Realist is left without a reason to believe in the approximate structural accuracy of thermodynamics.

The nomological impossibility of the thermodynamic theory’s formal structure thus undermines the motivation for believing in its approximate truth. But if belief in the approximate accuracy of the thermodynamic structure can no longer be justified, then the Epistemic Structural Realist is left without an explanation for the empirical success of science. Without a reason to believe in the approximate accuracy of the thermodynamic formal structure, the structural continuity obtaining between thermodynamics and statistical mechanics is no longer enough to mount a structural version of the “No Miracles” argument. This appears to undermine the entire Epistemic Structural Realist position.

VIII. Potential ESR Responses and Replies

(1) Appeal to Empirical Success

At this point, the Epistemic Structural Realist might appeal to the empirical success of thermodynamics in order to argue that the use of idealization assumptions does not undermine the reasons for believing in the approximate structural accuracy of the theory. Of course, the mere empirical success of thermodynamics is not enough to ground the realism of the Epistemic Structural Realist: the latter must give an explanation of this empirical success.

The problem, it seems, is that this explanation will have to take the form of another “No Miracles” argument: the reason thermodynamics proved so empirically successful is the fact that its formal structure is an approximately accurate representation of the physical structure.
in the world (Worrall 2007, 143). But it is precisely the approximate structural accuracy of
the theory that is being questioned. So an appeal to empirical success will either not be
enough by itself (since this will not be enough to grant the Epistemic Structural Realist a
“Realist” status), or will presuppose the approximate structural accuracy of the theory that is
at issue.

Other types of explanation seem to be off-limits to the Epistemic Structural Realist
precisely because of the epistemic commitment to structures only. Worrall (2007) notes that
the way in which the formal structure of a theory can successfully represent the physical
structure of the world “cannot be further specified—to suppose that it can would be to
suppose that we can somehow have access to the universe that is not theory-mediated and thus
can directly compare what our theories say with reality”, this last claim being “untenable”
(Worrall 2007, 143). In other words, any explanation that purported to specify exactly how
the formal structure of a theory manages to successfully represent the physical structure of the
world would have to go beyond an epistemic commitment to mere structures. But this
would be to go beyond the Epistemic Structural Realist position itself.

(2) Appeal to Alternative Derivations

The Epistemic Structural Realist might also respond by claiming that the above argument
concerning structural continuity between thermodynamics and statistical mechanics does not
generalize. Even if the structural continuity between thermodynamics and statistical
mechanics involves the use of an idealization, it does not follow that all instances of the
limiting relation between mature successive theories will necessarily involve idealization
assumptions. It may be possible to derive the formal structure of an earlier theory from the
formal structure of its successor without the need to invoke nomologically impossible limits.
The formal structure of classical mechanics, for example, may be derived from the formal
structure of relativistic mechanics by allowing the velocity of an object to approach zero
instead of letting the speed of light tend toward infinity. In this way, physically unrealizable
assumptions may be avoided as consequences of partial structural continuity between
successive theories.

The mere possibility of derivations that do not rely on idealization assumptions is not
enough, however. In particular, the above alternative characterization of the limiting case
relation that obtains between classical mechanics and relativistic mechanics does not clarify
the structural continuity between thermodynamics and statistical mechanics, or the sense in
which the structure of the former can be said to be approximately accurate. The successful
avoidance of idealization assumptions in a single case of theory succession, in other words,
does not resolve the mystery of how the formal structure of an earlier theory can be an
idealization of its successor, and yet count as approximately accurate, in many other cases of
paradigm structural continuity between successive mature scientific theories. Similar
alternative derivations of structure that avoided the use of idealizations would have to be
provided for other paradigm cases of structural continuity between successive theories. Until
then, cases such as the transition from thermodynamics to statistical mechanics remain
problematic for the Epistemic Structural Realist’s claim to the approximate structural
accuracy of predecessor theories.

(3) Appeal to Approximation

Finally, the Epistemic Structural Realist can appeal to a distinction between
approximation and idealization (Frigg and Hartmann 2012, §1.1). Though conceptually
similar, approximation can be characterized as divorced from any concerns regarding
nomological possibility. When a mathematical equation is approximated by another equation
by letting some quantity tend toward some limit, “the issue of physical interpretation need not
arise. Unlike [idealization], which involves a distortion of a real system, approximation is a
purely formal matter” (Frigg and Hartmann 2012, §1.1). In other words, the limiting case relation that obtains between the formal structure of thermodynamics (for example) and that of statistical mechanics can be a purely formal (mathematical) relation. This would avoid the use of problematic idealization assumptions in the derivation of the thermodynamic structure from the statistical mechanical structure, while preserving some sense in which the former is a limiting case of the latter (and therefore preserving structural continuity between the two theories).

But is this sense of “limiting case” robust enough for the Epistemic Structural Realist? Approximation, as described above, is an entirely formal relation obtaining between the structures of successive scientific theories. It does not appeal to the relevant physical system (the system the two theories are presumably studying) in order to derive the formal structure of the earlier theory from the formal structure of the successor theory. This, again, is in contrast to a derivation involving idealization assumptions. But appeal to the relevant physical system seems necessary in securing the continuity of a structure that the Epistemic Structural Realist can have reason to believe (approximately) corresponds to the structure of the physical world. Without appealing to the relevant physical system, the derivation of one formal structure from another reduces to what Newman (2005, 1378) calls “a trivial symbolic realism”. The Epistemic Structural Realist no longer has reason to believe that the formal structure being preserved as a limiting case through the use of approximation is appropriately correlated with the physical system being studied. Strictly formal relations between structures, after all, are not enough to show that both structures accurately represent (to an acceptably approximate degree) the physical relations obtaining within the relevant physical system. Even if the formal structure of statistical mechanics were an approximately accurate representation of a given physical system, the mere fact that the structure of thermodynamics was formally related to the structure of statistical mechanics would not guarantee that the formal structure of thermodynamics was also an approximately accurate representation of the physical system. A more robust relation than mere approximation is needed in order to secure the structural accuracy of thermodynamics from the fact that there is structural continuity between the two theories of thermodynamics and statistical mechanics.

**IX. Additional Implications of Employing Idealizations**

The use of idealization assumptions in establishing a limiting case relation between successive theories undermines the Epistemic Structural Realist’s reasons for believing in the approximate structural accuracy of the earlier theory. This result, however, poses potential problems for belief in the approximate structural accuracy of successor theories as well.

One possible difficulty for the Epistemic Structural Realist is the inability to justify belief in the structural accuracy of the successor theory, given that belief in the structural accuracy of the earlier theory is no longer tenable. The use of idealization assumptions in the derivation of the earlier theory’s structure from the successor theory’s structure casts doubt on even the approximate structural accuracy of the earlier theory, since these idealization assumptions imply that the structure of the earlier theory could never be physically realized. But if belief in the approximate structural accuracy of the earlier theory is thus undermined, what reason does the Epistemic Structural Realist have left to believe in the approximate structural accuracy of the successor theory? A significant motivation for establishing structural continuity between successor theories, after all, is to provide justification for the belief in accumulation of true structural content: justification for the belief that the refinement of structure leads to an increasingly accurate representation of the physical structure of the world. If there is reason to doubt the approximate structural accuracy of an earlier theory, however, then structural continuity will not provide justification for the belief in the approximate structural accuracy of the successor theory. The earlier theory cannot bequeath approximate structural accuracy to any successor theories if it does not have this approximate
structural accuracy in the first place. Consequently, the justification of the Epistemic Structural Realist for the belief in the structural accuracy of successor theories is also undermined.

A second possible worry is a version of the Pessimistic Meta-Induction, in terms of idealization. If the structure of thermodynamics is a physically unrealizable idealization of the structure of statistical mechanics, how can the Epistemic Structural Realist be sure that the structure of statistical mechanics will not itself be an idealization of some future theory’s structure? Epistemic Structural Realism, after all, was proposed as a philosophical theory that respected the occurrence of theory-change in the sciences, and took seriously the likely possibility that even current scientific theories will (likely) one day be superseded. But if the theory of statistical mechanics, for example, may one day be shown to be simply a limiting case of some future theory, then all of the reasons for doubting the approximate structural accuracy of thermodynamics pose a risk to the Epistemic Structural Realist’s confidence in the structural accuracy of statistical mechanics as well. Even if there are reasons independent of structural continuity and the empirical success of science for believing that the structure of some future theory accurately represents (to some degree) the structure of the physical world (what would these reasons be?), this does not preclude the possibility that statistical mechanics itself, the currently more mature scientific theory available (as compared with thermodynamics), will be shown to have a physically unrealizable structure. Consequently, the Epistemic Structural Realist is left without reason to believe in the approximate structural accuracy of any mature scientific theories, whether they have already been superseded or will one day be supplanted.

X. Conclusion

Epistemic Structural Realism claims there is preservation of formal structure through the succession of one scientific theory by another. It appeals to this structural continuity in order to formulate an argument for the structures in mature theories being approximately accurate representations of the physical structure of the world. The concept of structural continuity is understood in terms of a limiting case relation obtaining between successive theories. This limiting case relation, in turn, is often established using idealization assumptions: the structure of a theory is a limiting case of the structure of its successor theory when the earlier structure can be derived (recovered) from the successor structure, given certain initial and boundary conditions.

It is often the case, however, that these initial and boundary conditions are idealizations of the physical system being studied by both theories. The derivation of an earlier structure from its successor, therefore, employs nomologically impossible assumptions. This suggests the earlier structure is itself physically unrealizable, which undermines the claim that it is an approximately true representation of the structure governing the physical system being studied. But if the earlier structure can no longer be considered approximately accurate, this undermines whatever claim to approximate truth the successor structure enjoys: the successor structure cannot inherit any approximate accuracy from the earlier structure if this earlier structure has none to bequeath in the first place, after all. This suggests Epistemic Structural Realism as a whole is undermined, which in turn threatens the justification for a belief in the accuracy of scientific theories overall.

References


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i Worrall defines “mature” scientific theories as those theories that lead to novel empirical generalizations beyond any empirical consequences that have already been observed. These generalizations must be shown to generate new and empirically successful predictions (Worrall 1989, 113-114).

ii Worrall associates the formal structure of a scientific theory with the mathematical equations describing the behavior of theoretical entities in a physical system (Worrall 1989, 118-119).

iii By way of an example, Pincock writes: “We could imagine a competing electromagnetic theory which ascribed two kinds of charge to particles and had complicated equations relating these different kinds of charges to each other and to the trajectories of the relevant particles” (Pincock 2011, 74).

iv Another example: “Maxwell’s electromagnetic theory ignored these possibilities [of electromagnetic interactions being affected by intra-particle forces at high energy levels] and so this parameter [representing the relevant intra-particle forces] did not appear in that theory. Additional structure is needed to account for phenomena at higher energies, but we have no hint of this from the experiments conducted in Maxwell’s time” (Pincock 2011, 74).

v Cf. Worrall (2007, 142-144) for a discussion of partial structural retention.

vi The Semantic View of theories claims scientific theories should be identified with collections of models, as opposed to being identified with a linguistic formal axiomatic system (as the Syntactic View suggests). For further discussion, see Chakravartty (2007, 187-190).

vii Chakravartty’s distinction between abstraction and idealization roughly corresponds to the distinction between Aristotelian idealization and Galilean idealization. See Frigg and Hartmann (2012, §1.1) for further discussion.

viii Pincock (2011) discusses this example in relation to his objection described above (Pincock 2011, 77). See also Batterman (2005), whom Pincock cites.
It is an interesting question whether or not the number of particles in a physical system could continue to grow infinitely, without ever actually being infinite. Regardless, the structure of such a system would not be a realization of the structure of thermodynamics, which would require an infinite number of particles according to statistical mechanics.

Famous examples include the conception of (1) Classical Mechanics as a limiting case of Relativistic Mechanics under the idealization of letting the speed of light tend to infinity in the formal structure of the latter, and (2) the Ideal Gas Law as a limiting case of certain thermodynamic equations under the idealization of having an ideal gas composed of point (dimensionless) particles. Thanks to Marc Alspector-Kelly for bringing these examples to my attention.

Cf. Mark Newman’s (2005) objection against the Epistemic Structural Realist, in which he argues that structural “retention through theory change is not sufficient” to establish the claim that a theory’s formal structure succeeds in accurately representing the physical structure of the world (Newman 2005, 1377).

This is also the reason why the Epistemic Structural Realist cannot appeal to an ontological conception of formal structure in order to avoid the issues posed by the use of idealization assumptions. Cf. Chakravartty (2007, 143-144) for a discussion of how an ontological conception of the Laws of Nature may avoid the “in-principle vacuity” of idealized formulations of these Laws.

It is not clear, however, that replacing a limit towards infinity with a limit towards zero will always succeed in avoiding idealization: it might also be nomologically impossible for certain quantities to tend towards zero in a physical system. Recall, for example, the use of point-particles (whose dimensions tend toward zero), or the rod used in the simple pendulum model (whose mass tends towards zero).

This can be the case even when the use of purely formal methods to relate different structures proves empirically successful. Cf. Johannes Kepler’s successful use of Platonic solids to model the distance relationships between the six planets known at the time (Di Liscia 2011, §3). Thanks to Marc Alspector-Kelly for bringing this example to my attention.

Cf. Pincock’s assertion concerning the considerations motivating preservation of structure: “If [purely] mathematical concerns are driving things, then there is little reason to believe the structural claims of the scientific theory” (Pincock 2011, 76).

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Venice at Night

Winner of Artwork Award, Spring 2015

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In Awe of the Past

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Rachel had been missing for almost two hours. Or that’s when we noticed she was gone. Orleanna had burst onto the porch with wet cheeks and fluttering hands.

“We have to find her, Richie,” she said. “She’s not big enough for the deep water yet.”

Rachel was a skate Orleanna had found a week earlier in a tidal pool behind Aunt Charlie’s house, down by the mouth of Narrow River. We always walked barefoot through the pools on summer afternoons, our pant legs rolled halfway up our calves, picking our way around prickling urchins and clots of seaweed.

Rachel had been tucked beneath a plate of live rock, algae and bristle worms infesting its jagged, pocked surface. Orli had reached right in when she saw the tail, thinking it was a dead shark pup. She squealed when Rachel thrashed beneath her touch, her body flapping in the tepid water, revealing the gray-white of her slick belly.

Orli tore through the sand toward Aunt Charlie’s for a bucket. She trusted me with guarding Rachel. I squatted in the pool, my feet sinking into the dark sand. Rachel stuck her face back into the rock and wagged her finned tail in the shallow water.

Our mother had left about two weeks before. She dropped us off with Aunt Charlie a few times a year, and one of these times was almost always in late summer. This was the best time to be at Aunt Charlie’s because the New England sea was as pleasant as it ever would be, clear and cool and steady.

Aunt Charlie was my mother’s father’s sister. She was eighty-seven years old that summer and had lived in Narragansett her whole life. She never had a good reason to leave, and I don’t think she ever looked for one. Aunt Charlie never married, never had children. But she never turned us away, even if my mother disappeared for weeks on end. Family was family.

My mother had always loved the sea, but had been forced to move from Rhode Island to Connecticut when she finished college. Our father had gotten a job in New Haven, and she ended up finding work as a receptionist at a dentist’s office. I think she relished the trips to the coast to visit her family as much as we did, even more so after our father left. The visits were few and far between, considering how close we lived. But they always lingered with me, into the fall and through the winter, so that I was always quietly yearning for the river, for the tide. I knew Orli felt the same way, and we would both continue to return to the sea again and again, even as we grew and separated, came closer to accomplishing all that we would.

Sometimes we would jump off the rotting wooden dock that jutted out from under Aunt Charlie’s back porch and let the river carry us all the way to the ocean. The waves became tall and narrow at the mouth of Narrow River, the current rough and quick. Or we would trek through the dense grass that surrounded Aunt Charlie’s and ran along the river, picking our way over dunes and along creekbeds.

We would see how far we could get, see if the grasses would end. We would always get just far enough that Aunt Charlie would inevitably appear on the porch to shout at us through the grass, as if the shuddering reeds themselves had given us away.
As I squatted by what would soon be known as Rachel, I tried not to think of what Mom might say about our excursions. She had always accompanied us on our riverside adventures when we were younger, never letting us out of her sight as we tore through the shallow current, searching for eels and sea slugs, spider crabs and dogfish.

She had grown up in Narragansett, only a short drive from Aunt Charlie’s. She too frequented the curving beaches, the smooth dunes. She had trudged through the nagging tide of Narrow River, and she was familiar with its inhabitants.

She was the one who had told us about the man in the shack. She would point at it from the shore, back when she used to wade into the river with us to search for hermit crabs, back when Grandpa was still alive.

“You see that there?” she’d say, hunching down and putting her hand on my shoulder, stretching out her arm and focusing my gaze on the thin strip of sand that rose in the crook of the river, where it bent and swelled and shifted before emptying into the surf. Knots of brown grass huddled along the strip of land, the tide never reaching over its prickling tips. In the center of the island, a small cabin sat amidst the reeds. The wood was flecked with crumbling strips of white paint. The windows were crisscrossed with planks of sunbaked wood, rusting nails bunching along the edges. The door was low and had shrunk away from its frame so that slits of dark ran along the top and bottom. The swayback roof was bleached with salt and sun, the ends of the planks curved upward.

My mother would lean down until I could feel her cheek against my neck, until her voice was close and full in my ear.

“You see that old shack? A man lives there. He wears sharkskin pants and straps horseshoe crab shells to feet. He ties the white strings of his hair back with seaweed and boils hermit crabs in turtle shells. He steams oysters in sea grass bowls and slurps out their bellies, grinds the pearls to powder between his teeth. He wades out into the surf at sundown, and he catches the seagulls off the rocks. He grabs them and he eats them raw and the feathers stick in his teeth.”

Orli used to beg her to tell us about the man in the shack when we would go to bed at night, after she had returned from her trip and we’d left Narragansett, were safe in our own beds, far from the sea. Being the older brother, I would beg along side my sister, determined to be brave in the face of the haunting tales. My mother would tell us that we’d have to wait, that the stories only came to her on the river, when the man was close enough to hear them. We would giggle and whisper in the darkness of our room, swapping tales of the man we swore she’d told us the year before, things she’d only whispered to us as we waded through the brackish river, things we didn’t want to forget.

When Grandpa died and Nana moved back to Iowa, our mother stopped staying with us in Narragansett during the summer months. Now we only went to the town when she was forced to leave on one of her overseas business trips. I tended not to mind the somewhat sudden vacations. Although far from the slow, seaside weeks spent with my Grandpa, it was still an excuse to stay near the shore. But as I got older, time away from school and friends got less and less appealing. Orli didn’t mind. She was nine the summer we lost Rachel, three years younger than I was, and still as excited as ever to romp through the shallow tides and grassy undergrowth by the river.

Each summer, we would try to build each other’s courage to swim out to the island. We would convince ourselves that the man was friendly, that if we were caught, he would not catch and eat us raw like the gulls, would not slurp out our watery stomachs like a steamed clam. We would stand on the shore and dare each other closer. We would shuffle into the water, creeping out as far as we could until our toes barely touched the bottom, until our chins skimmed the surface and we begged to be let back. The other would shout encouragement or
merciless taunts from the shore, until finally the brave soul would turn back and crawl from
the water to shiver on the damp sand.

She came tearing back toward me down the sandy hill that summer day, the day we found
Rachel, a red bucket flying by her hip in a clutched fist. She dipped the lip of the bucket in the
water and coaxed the skate in. Rachel thrashed against the thin plastic, her eyes perched on
her smooth back like gray marbles. Orli rained a thin layer of sand over her and stuck in a few
lumps of dark seaweed.

“There. Now she’ll feel like she’s home,” Orli said.

We had Rachel in the garage for the first few days, and she’d seemed less than
comfortable. Orleanna kept bringing her scraps of tilapia and chicken from our dinners, but
Rachel never seemed interested. The strips of meat collected along the edges of the bucket
and were beginning to stink.

“She needs more room, Orli,” I said. “She can’t move at all.”

Orli agreed and I helped her build a permanent tidal pool up near the dunes, back a bit
from the actual shore. At high tide, the waves fed the pool some, but we built a high wall of
shells and sand so that the water never spilled over. Orli said we’d just keep her a few weeks.
Until she was stronger.

We checked on her daily, and Orli had even sat with her in the pool a few times. I noticed
her one morning as I was wandering along the shore just after breakfast. I thought Orli was
inside watching television, so I was startled when I heard a voice out amidst the sand. That far
down on the shore, we were really the only ones. The tourists pretty much stuck to the shops
and bars a few miles down, and no paved roads led out that far along the river

I immediately hugged the dunes as I inched toward the sound, my bare feet disap-
pearing

I lay flat on my belly and wriggled around the edge of the dune. I noticed movement, and
saw Orli’s hand poking up from beneath the dark, wet sand. Shells topped her fingertips like
thimbles. Seaweed was woven between her fingers like spider’s webs, trailing down to pool in
her palms. She had rocks on her stomach, lined up along her body, down her arms and up over
her legs, covering her pale skin that shimmered just below the shallow surface of saltwater.
She had dotted her limbs with more seaweed. I saw shells topping her toes and running up
into the hollow of her neck.

Something moved on Orli’s stomach, and I saw the vague outline of Rachel shift on the
rocks. Orli chattered on in the pool, her chin making tiny ripples along its smooth surface. She
was laying perfectly still, her body niched among the clumps of rock and sand we had piled
into the water for her skate.

“We are going to go into the shack. This summer,” I heard her saying. “Richie tells me
that Mom wouldn’t want it. But I know better. I know that she would.”

Rachel began to glide along Orli’s body. She settled between her ankles.

“The man in the shack is just lonely, Rachel. I know he just wants someone to talk to.
Why else would he stay living there all these years? He has to know we are watc

I squatted in the grass and moved quietly back toward Aunt Charlie’s porch, the sound of
Orli’s voice fading amidst the tide.

“Come on, Richie. She’s a baby. She’s probably just terrified,” she said as I dragged my
feet through the shallow water so I wouldn’t accidentally step on Rachel or one of her
relatives if they happened to be lurking in the dark sand.
Orli decided it would make the most sense to check in the little creeks that fanned out from Narrow River, back into the reeds. The water was calmer and shallower, the perfect place for a baby skate. We picked our way through the dry grass. Orli was determined to find Rachel before nightfall.

“Do you think she made it to the river?” Orli said. She was swatting bunches of grass from her face. A few brown bits of rotting foliage were glued to her calves with sandy mud and sweat.

“Maybe,” I said, “there’s really no way of knowing.”

We were steadily moving upriver, away from the crashing waves and open air of the bh. Heat clung to the grass in an unmoving haze. Mosquitoes swarmed our mouths and noses, and we spat and swatted to keep them away. I pushed wet hair from my forehead and moved down closer to the small creek we’d been following, trying to stay closer to water

“Orli, don’t you think Rachel is happier this way, maybe?” I said. My sister didn’t turn to look at me as she marched along the shallow creek, scanning the divots and crevices along its sloping bank. “She lived in the ocean before we found her, after all. And she seemed to be doing okay.

Orli turned to look at me, her face a flushed, scrunched scowl.

“She’s too little,” she said. “And she won’t last out here. I just know it.”

I followed her in silence. We moved toward the river and bent with it through the reeds.

We stepped into the water as the river widened and the banks slopped steadily downward. We waded deeper.

Orli paused. Her hands had disappeared beneath the surface, and little ripples fanned out around her wrists and waist as the tide tugged at her.

“Do you think the man in the shack caught her?” she said.

I looked to the island. The shack stood amidst the dry grass. The tide was low, pulled back from the sandy swell of land so that it slopped steeply into the river.

“I don’t know. I’m not sure he’d want her,” I said.

“He might want to eat her. She’s small. He could boil her right up,” she said. I could hear the tears choking her voice as she started to move deeper into the river.

“Orli, the tide is coming back in. The current is going to get too strong and we won’t be able to swim home.”

I followed her into the water. We had both kicked off of the bottom and were swimming, thrashing through the tide as it dragged us toward the sea. We were still wearing our shorts and t-shirts, and even these light summer clothes were too much in the swift current.

One summer about two years before we lost Rachel, we made it to the island. I had dared Orli to go, and shouted at her from the shore until she was swimming, gasping and whining back to me until her knees scraped sand. She crawled up onto the shore of the island, grabbing at patches of grass, relieved to be out of the tugging river. I told her to come back, that getting to the shore was enough. She shook her head.

“I’m going to open the door,” she said. She stood and began to pick her way over bits of wood and grass. I ran into the river, water thrashing at my ankles. I paddled to the island, chest heaving as I clawed up the sand and stumbled toward her. She was halfway to the shack, her back straight, arms stuck to her sides.

“Stop,” I said, running to catch her arm. “We have to go home. Aunt Charlie is going to be upset if we don’t answer when she yells.”

“You are being a little chicken,” she said. She yanked her arm away and glared. Her cheeks were red and patchy, hair matted to her forehead and cheeks by the salt of sea and sweat. A little curl of it wound up along her neck and towards her jaw. “You go in.”

I looked at the shack. The gap between the door and the frame was jagged and winding. Up close, it looked more like a tear.
“All right,” I said. I walked up to the side of the shack and touched the wood. It felt dry and brittle. I moved towards the window. It was just over my head, and I knew that if I stood on my tiptoes, I would be able to see inside. I heard Orli shuffle her feet in the grass behind me.

I laid my palms against the wood, and it pricked my fingers as I leaned into it. I craned my neck to see into the dark window, the tide roaring in my ears somewhere along the shore. Tears pricked my eyes, and I could feel saliva collecting along my gums when Orli began to whimper.

“Richie. Richie, can we go home now? I want to go home,” she said. I turned and she was hunched there in the sun, her white shoes gray with sand and water, soggy and heavy on her feet.

I spun toward her and marched away from the shack. My back tensed, and my throat felt small and tight.

“Come on,” I said. I grabbed her arm and we jumped into the river, splashing our way toward shore. It took us a long while to catch our breath as we sat on the sand and stared back across the river at the dark windows.

We had not ventured back to the island since. We stopped talking as much about the man. Our mother hadn’t mentioned him since the last time we had come to visit Grandpa and Nana. We began to forget about him, or forget that he was something we shared. We recreated him in solitude and in silence.

I swam after Orli toward the island. The sun was beating down on the river and the water was bright and flashing as I kicked my way to the shore. We crawled up onto the sand, and Orli was on her feet, jogging to the shack. I could see something along the far edge, back where the island butted right up to the shack, where the wood almost touched water.

Since the tide was out, there was more sand to buffer the shack from the surf, but whatever was behind it was bunched up along the side, dark and crumpled. Orli had noticed it.

“Is that a net?” she said. She began to run. I followed her, careful not to slip on any of the seaweed that had washed ashore. She stopped short, and it took me a minute to come up behind her and look over her shoulder at the mass. Her eyes were wide and glossy and strained. Her mouth fell open, and I heard a thin whistle of breath amidst the distant tide.

Jutting from the mass was a gray arm, a web of fine brown hair swaying in the shallow water that lapped up over it. The arm was buoyant and bloated, resting in the bit of the river that had already began to creep back up over the island. The fingers were knobby bulges along the ballooning palm.

I followed the length of the mass and noticed a bobbing orb of brown hair. A white, round face was turned sideways in the shallow water, resting on the sand. The cheeks were swollen, the lips a pale, puckered circle, curled out and up like a fish. The eyes were open and bulging, the whites of them flecked with the grit that floated in the water around them.

The legs sprawled out and up on the bank, black boots coated with a fine layer of sand and salt. Dark pants and a thick coat clumped around the bloated frame.

“He’s dead,” Orli said. Her voice was small and far away at my side. “The man in the shack. He died.”

I stared at the swollen body. I wondered if his stomach had burst beneath all of those layers, what could be crawling and wriggling inside of it. Where was the thin white hair? The seagull feather teeth? The horseshoe crab shells tied to bare, cracked feet?

“We have to go,” I said. The sun beat down so heavily on my shoulders that I could feel the heat running down my back and down my arms in flashing waves. My throat felt dry and caked with salt, and I was afraid it would close up and I would begin to choke. “We have to go right now.”
Orli started to cry and I pushed her into the river. She hit the water with a smack and started screeching as I yanked at her shirt, her arm, her hair, pulling her away from the island, dragging her away from the shack and the dead stranger on the shore. She gasped and gargled and choked on the saltwater as I hauled her toward the opposite beach. My tears mixed with the river, and I swore I could hear the dead man’s breath every time my ears dipped below the surface. I could hear the slow dragging as he sucked the heavy water into his lungs, the whoosh as he forced it out again.

When we finally reached the reeds, far from the shack and the current and the bloat, Orli was wailing into her arms, calling out for Rachel, for my mother, for the man in the shack. She curled along the sand and recoiled when I tried to touch her, backed away until I reached out and grabbed her. I held her to my chest and pressed her head so hard into my ribs that she had to give in, had to collapse against my wet shirt, wail into the hot, dripping fabric as it stuck to my body with salt and sweat.
Lucy

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*Australopithecus afarensis*: Hominid dating back 3.2 million years

They find a femur
sticking out of the vegetable mould.

They work their way up
and work their way down

the hillside, the dry river bed,
cataloguing every part of her.

I try just as hard to find every lost and loose end
of my lover but I find myself

lost in her landscape and instead scatter
like Lucy on the hillside, the dry river bed.

I rope off my life, search memory
recycle it, turn it

like earth, extract
meager pieces of protein,

mark it on my map.
So many bones are collected.

I give them names:
youth, regret, drug-induced.

When I believe I have collected
all the bones it starts to rain

the topsoil drains in rivulets
exposing more –

under the frost-line,
there is a heart

but for now –
bone and rain and more bone.
Free Zone Scientology: The Social Structure of a Contemporary Reform Movement

Winner, 2014 Graduate Humanities Conference

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The Church of Scientology has a notorious history of controversy. The sources of this controversy stem from both the legal realm (most notably in the acquisition of the legal label of “religion” and, therefore, tax exempt status) and the social sphere, with critics from both the Christian and secular “anti-cult” movements publishing polemics against the Church. There also, however, exists a third source of criticism: self-identified Scientologists who have chosen to leave the official institution of Scientology. These understudied groups, practicing outside of the Church, are known as Free Zone Scientologists, or alternatively as Independent Scientologists. United by a belief in the discoveries of their founder, L. Ron Hubbard, these groups simultaneously hold the conviction that the institution he founded in 1952 has since misled and corrupted his teachings. While scholarly research on the Church of Scientology lags far behind that of other new religious movements, academic investigations of reform groups working against the Church are virtually non-existent. Because of this lacuna, as well as the cultural impact of Hubbard’s legacy, such groups deserve sustained attention as a legitimate piece of Scientology’s unfolding history.

Many independently operating Free Zone groups exist with no necessary homogeneity between them, and as such there is little unity between groups of reformers and no essential teachings shared among them. The earliest self-identified independent group was founded in 1950 as an auditing association, a derivation of psychotherapy used in Scientology to remove painful memories called “engrams” from one’s mind (based on Hubbard’s book *Dianetics: The Modern Science of Mental Health*). Recently, these groups have gained popularity after several high-profile Church leaders left their positions to practice Free Zone, forcing the Church to acknowledge the movement. This acknowledgement included trademarking the use of the term “Scientology,” as well as the creation of a community to help ex-reformers—a website titled the “Freezone Survivors Association,” which states that there are "ways to survive the Free Zone and “independents” with as little damage to yourself and your family as possible." Today, the largest reform group in terms of active practitioners is the International Free Zone Association, which sticks closely to the writings of Hubbard as a source of authority and practice. Other movements, though, have not held strictly to Hubbard’s writing. Many Free Zone groups disagree concerning how far one may deviate from Hubbard’s work, and if he created a closed canon or merely a foundation for further research. Those that fall into the latter groups interpret Free Zone as open-ended and have developed Hubbard’s thought in a syncretic fashion by combining Scientology’s doctrine with other religious and scientific ideas and practices.

Free Zone may be most clearly distinguished from the Church of Scientology regarding what are considered the legitimate sources of authority. Although the Church of Scientology has been cast as an individualistic movement (due to the intimate nature of auditing), practitioners may only advance to higher levels within the religion at the discretion of certified auditors. Therefore, the apparently individualistic nature of the practice is nestled within a clearly defined and strictly controlled vertical hierarchy. Official auditors move individuals through a series of set stages towards “Clear,” a state of perfect psychological
health and rationality. Although Dianetics, the source and earliest form of auditing, was originally popularized outside of any institutional structure, the sociologist Roy Wallis has argued that the history of Scientology can be characterized as a history of “centralizing authority” and “the exercise of greater control over the collectivity.”

In contrast to the rigidly defined institutional structure of The Church of Scientology, Free Zone Scientologists communicate primarily over long distances using print media and virtual communication, a phenomenon some scholars have called “cyber-religion.” According to Eileen Barker, because of the long distance between practitioners and the difficulty in enforcing orthodoxy in the lives of individual members, “the authors on most cyber-religious sites seem to subscribe to the idea that their religions are not seriously institutionalized.” This creates a social structure unique to modern print and cyber-culture in which “[t]he designers of cyber-religions seem to be focusing primarily on transmission and testing of ideas and thoughts rather than promotion of sacral institutions, hierarchies, or sacraments.” This transmission and testing of new ideas naturally opens the door to religious innovation, and Free Zone communities have been no exception to this.

One such movement, communicating over vast distances by utilizing online communities and publications to interact with one another, centers on a quarterly publication titled *International Viewpoints*, or *IVy* for short. The content of *IVy* can be taken as a prime example of the continuing development of Hubbard’s works through the exegesis of Independent Scientologists. The publication is composed of submissions from its readers rather than any professional staff, and thus the preoccupations of Independent practitioners are voiced. This correspondence will be used to show how the contributing members maintain among themselves a unified notion of practice, even in instances in which such practice is scattered and fragmentary. Underlying this examination is the recognition that the participation in long-distance and online religious communities, while far from liturgical and ritual forms, is the primary act through which individual contributors to *IVy* practice their Scientology.

*International Viewpoints*

*IVy* was first published in May 1991 by Antony Phillips, who refers to himself as one of the first “free scientologists” in Denmark. The first issue of *IVy* begins with an article titled “Welcome,” by Phillips. Here, he defines the journal as interested in Hubbard’s work but disenchanted with the Church, and, as a result, the journal’s initial contributors are unified by a desire to reform the Church of Scientology. Phillips introduces potential subscribers to his interest in increasing communication among those who have left the Church but still practice. However, he leaves out exactly what this entails, saying that the journal is “unpredictable because it is dependent on what our readers send in.” Initially, the only substantive unifying declaration in the publication is a negative one—we are not the Church of Scientology—and, therefore, the legitimate areas of discussion have no predefined boundaries. The community responds with a highly eclectic mix of personal innovations to Hubbard’s thought, as well as articles not explicitly concerned with Scientology. The initial articles fall into two general categories: those primarily concerned with the world’s religions, and those concerned with new scientific discoveries.

Early submissions in the former category tend to espouse the virtues of various religious systems. This manifests largely in an appropriation of occult and Eastern religious ideas, and a strategic use of the distinction between institutionalized religion and sincere spirituality. Contributors do not limit themselves to the ideas of a single religious tradition; the comparison of Scientology to the traditions of Daoism, Buddhism, and the ancient, esoteric Christianities is commonplace. As such, the early community is ecumenical in nature.
Emblematic of the category of religious innovation is the January 1995 article, “Psychic [H]ealing; a [M]eans of [P]ersonal [E]xpansion,” by regular contributor Mark Jones. Jones begins by noting that auditing is meant to produce a psychic healing of sorts, so Scientologists should not deny *prima facia* the possibility of the efficacy of other forms of psychic healing. With this small disclaimer, promoting the similarity between Scientology and psychic healing, Jones says,

I have been studying and developing some abilities dealing with psychic healing in the last few months, so I’ll describe some experiences and the premises on which they are based. Since hearing about them, experiencing certain subjective changes in myself, and learning of those of others, I hope they will be of some interest to IVy readers.

Jones recalls how he had learned from a psychic healer in New Zealand that one could remove illnesses and physical pain by manipulating a person’s “energy,” by running their hands over the body of the subject. The teacher, we are told, could manipulate auras and had healed over 30,000 people, including an incapacitated individual in front of an audience. Jones says that he has “used this simple procedure [at home] to remove pain and immobility” from his back. However, the author is convinced that psychic healing can be achieved through various methods. Under the heading “Other [F]orms of [P]sychic [H]ealing,” a story is recalled of an American healer named Sherry Edwards who uses a method of accessing the “energies of the universe” through “the use of sound.” Individual healers must first become attuned to the universe, after which they may achieve great results. However, Jones laments that, unlike the hand method, this approach is more difficult to teach. Nonetheless, he learned these methods in classes taken from a medium after personally experiencing their effect. After the classes, Jones notes that his first patients—even those that were initially skeptical—experienced vast improvements in the “bodily energy flows.”

In this article, parallels are drawn between the healing experiences mentioned above and the experience of auditing in the Church of Scientology. The heightened states that come from psychic healing are, Jones says, reminiscent of post-auditing experiences. He concludes his article by assuring readers that psychic healing has produced noticeable changes in his life and his relationships, and by offering a full explanation of his healing methods, including “a cassette with suitable background music for $10 or equivalent.”

Alongside those who espouse various religious doctrines, many contributors are interested in discussing new scientific developments. The mass appeal of the superficially understood conclusions of quantum mechanics has spawned a phenomenon referred to as “quantum mysticism.” Quantum mystics are interested in the ramifications of the quantum world, and draw conclusions based on this new field of physics that lead to new views of the spiritual world. This rudimentary understanding of quantum mechanics combined with an overarching spiritual mysticism is used to justify a host of mental powers and held up with pride by proponents as an example of science finally catching up with and explaining esoteric knowledge.
This trend, which is often mocked by mainstream scientists as an imaginative-but-poor understanding of physics, has become increasingly popular in the 20th century. These considerations are widely discussed in the liberated atmosphere of Free Zone Scientology. For example, Antony Phillips, in an article recounting an early conference in Holland, writes that, Ray [Kemp] went on to show that there needs to be a datum of comparable magnitude to O.T. [Operating Thetan] before one can fully understand it. The datum Ray used was Quantum Physics... where the physical rules as generally known, observably start to break down, and the phenomena can only be explained by introducing such items as “Alternate Universes,” “Time is a consideration,” and “Particles are only located in space by the prior creation of that space”.xvi

Shortly after this summary, Phillips concludes,

During the break a couple of attendees, who had an existing background in Quantum Mechanics, got into an animated discussion, talking entirely in mathematical formula and filling the blackboard with equations.xvii

Given the inaccessible nature of this conversation to most of the attendants, Ray Kemp contributed an article in a later issue detailing his findings for the non-physicists and arguing that quantum mechanics holds the key to faster access to higher OT levels, or higher points on the scale of spiritual advancement in Scientology.

Because of the precarious and shifting nature of doctrine in online communities, little can be taken from these articles in terms of any unified creed. No official unifying statement is created by Independents drawing on Scientology, psychic healing, alternative physics or other proposed practices. However, the nature of the conversation can tell us about the individual’s perceived role within the Free Zone community. Early on, IVy provides an opportunity for practitioners to broadcast their religious and scientific discoveries without being labeled “heretics,” or, as they are commonly referred to by the Church of Scientology, “suppressive persons.” Not only would many of the articles’ considerations be outside of the Church’s official definition of orthodoxy, but the size of the Church, along with its highly developed bureaucratic structure, guarantees that no single lay-practitioner’s experiments or discoveries would come to have notable influence. Within the context of the relatively small and undefined Free Zone community, however, such experiments may take center stage.

Due to the emphasis placed on individual discovery, on testing, and on the dissemination of new and innovative practices, contributors can be seen as engaged in a form of religiosity coined by scholars of new religious movements as “seekership”. Seekership entails the adoption of a
“problem-solving perspective while defining conventional religious institutions and beliefs as inadequate.” Alternatively, sociologists of religion John Lofland and Rodney Stark define seekers as persons “searching for some satisfactory system of religious meaning to interpret and resolve their discontent.” The rejection of the Church of Scientology, along with the adoption of independent practice, can be considered one form of the perceived inadequacy of conventional religious institutions and, therefore, the examples from IVy used above are attempts at “problem-solving.” Psychic healing and quantum mechanics have no necessary connection. However, in presenting their findings to other Independent Scientologists for consideration, Ray Kemp and Mark Jones are seeking together. Despite having different personal goals, IVy contributors are united by a shared desire to continually discover, refine, propose, and accept or reject any idea even marginally related to Scientology.

**Coping With Institutional Precariousness**

Not every contributor, however, fits neatly under the label of seeker. The first exception to this open dialogue on all things religious and scientific comes in the sixth issue and anticipates a question that will soon permeate the publication. In the sixth issue of IVy, Terry E. Scott asks whether non-Scientology “knowledge” should be considered by “Free Scientology” publications.

> In my opinion, an underlying unity - such as the Tech - is essential if there are to be benefits from the diversities. I am not proposing to limit freedom of ideas or investigation. Far from it. I advocate interest in speculative areas - even whacky ones might bring results some day. But diversity without discipline might broaden the contents of Independent publications so much that the Tech might take a back seat. If that were to happen, at least some Free Zone journals could become like certain New Age periodicals: woolly.

The argument that the incorporation of these speculations will lead to the journal becoming “woolly,” or lacking in substance, akin to other New Age publications—although the author has no problem with New Age ideas and regularly practices astrology—raises the new question of the degree to which IVy is actually concerned with Scientology. The journal’s unifying conception, which Scott identifies broadly as the “Tech,” or Study Technology (method for applying Scientology), but which we may call Hubbard’s thought in general, will gradually sink into the undifferentiated world of astrology, U.F.O.s, palm readings, and astral projection. He continues:

> Well...in our Independent (Free Zone) Movement, writers in various publications are diversifying into areas such as channeling (known to some as spiritualism), clairvoyance, Christianity, and much else.

> All very interesting. I have some curiosity about the true origins of Christianity, occasionally amaze myself with a telepathic -zap!-, am well versed in astrology, and take a passing interest in the mathematics of the Great Pyramid. But I keep them separate from the Tech.

For a little more than a year the question concerning what unifies the group becomes of primary concern to IVy contributors, overshadowing a previous emphasis on the presentation of discoveries. This concern is initiated in an article titled “Whither, Scientology,” by the German Free Zone Scientologist Ulrich, which questions the nebulous boundaries of the group. Ulrich (who will soon pose his own standard for Free Zone Scientologists) begins with a critical remark.
Now, is there such a ‘group’ at all? I can’t see it. 14 issues of IVy have evidenced the fact that ‘free scientology’ is not carried forward by a unified or homogeneous group but consists of many separate ones.\textsuperscript{xii}

Ulrich is not the first to raise this critique against the community (as noted above in the sixth issue), but he is the first to propose a unifying standard in response. It consists of a more explicit adherence to the definition of the group as “people who agree on some basic principles, which I regard as scientology.”\textsuperscript{xxiii} After noting the eclectic series of ideas and practices that have been proposed by contributors—“psychotherapy, shamanism, ‘esoteric’ healing techniques”—Ulrich suggests the creation of an “admin scale,” a system designed to organize a group of individuals.\textsuperscript{xxiv} In Scientology 0—8, L. Ron Hubbard remarks that the admin scale should be used to determine the “sequence (and relative seniority) of subjects relating to organization.”\textsuperscript{xxv}

Ulrich proposes a whole standardized system from training qualifications, certifications for auditors, steps on the path to “Clear” and, finally, standards for the verification of a person’s “Clear” state. All of these standards are, from the perspective of the Free Zone, associated with the bureaucratization and corruption of Hubbard’s work by the Church. The only notable difference between this system and the standards of the original Church of Scientology is Ulrich’s recommendation that this be based on “actual result—instead of by enforcing such agreement by heavy promotional campaigns.”\textsuperscript{xxvi} Even with this new foundation, the call for greater institutionalization is taken by most as an unwelcome intrusion on the egalitarian periodical.

In the same issue, published in April 1994, the attempt at standardization is further complicated. Motivated by the aforementioned controversy, Phillips polled contributors about their goals for the community. The sixteenth issue of IVy presented the results by way of thirty-eight suggestions for group goals. These ranged from vague aspirations, to ambitious and worldwide goals, to a small number of mid-range goals that entailed “groups of people meeting together on a regular basis at one another’s homes to share ideas and use their knowledge of Tech to help one another”; as well as a further prompt from Ulrich: “See my most recent article: we need an admin scale for scientology.”\textsuperscript{xxvii}

While the poll established no concrete goal, criticism of the group’s loose boundaries continued. In the twentieth issue, Ulrich submits another article titled “A Puzzled Reader.” He opens, “There are times when I fail to understand what IVy has to do with scientology, what with all sorts of new, strange and unexplained processes, rundown and seemingly scientological offspring popping up all over the place.”\textsuperscript{xxviii} Citing a now standard list of alternative and New Age practices advocated in previous issues, Ulrich wonders what any of this has to do with “good old LRH-style auditing.”\textsuperscript{xxix} This concern had been raised in earlier issues: to what extent is lack of authority an impediment to the success of the movement? His solution:

Anyone who deems it necessary to use ‘other tech’, such as alternative approaches, mixed approaches, or new OT levels, in a word, anything that goes beyond the basic tools mentioned above, ought to be held to explain why it is necessary to do so.\textsuperscript{xx}

Furthermore, Ulrich gives an actual formula for future submission, including a statement of the problem, the data, and the solution—as well as an explanation of why the solution is necessary if it is not Scientology, or why auditing was unable to fix the problem. He stops short of explicitly limiting the practices that can be used to achieve solutions, and thereby avoids setting explicit boundaries on orthodoxy. However, since he has yet to find a problem that Scientology cannot solve, Ulrich implies that a stricter “scientific” standard will naturally filter out the practices that can be considered unorthodox.\textsuperscript{xxxi}
Each of these figures is reacting to the overrunning of ideas traditionally associated with Scientology by unrestricted seekershup, and proposes to the group a means by which they can more strictly self-organize. However, by suggesting doctrinal limits in reaction to the loosely defined nature of IVy, contributors also introduce friction into an otherwise inclusive community. The struggle caused by the conflicting visions of Free Zone Scientology culminated in a change to the journal’s “Aim” section at the beginning of each issue. After repeated failure by some contributors to impose stricter guidelines on orthodoxy, IVy officially embraced the role of the seeker. Prior to March 2006, the official aim of the journal was as follows:

In 1934 the book *Scientologie* by A. Nordenholz was published. In the middle of the twentieth century the subject of Scientology was greatly expanded as a philosophy and technology by L. Ron Hubbard and a big band of helpers. This band coalesced into the Church of Scientology, which became a little secretive, restrictive, expensive and slightly destructive. From 1982 on, many left or were thrown out of that church, and continue to use and develop the philosophy and technology.

It is this large subject that *International Viewpoints* deals with, and it is our aim to promote communication within this field. We are independent of any group (sect).

With the seventy-sixth issue, the aim was changed:

The aim of International Viewpoints is to relay communication amongst those interested in the positive use of MetaScientology. MetaScientology encompasses the many groups, individuals, and teachings arising from the study of Scientology, starting with the Nordenholz book *Scientologie: Wissenschaft von der Beschaffenheit und der Tauglichkeit des Wissen* [Scientology: Science of the Constitution and Usefulness of Knowledge] of 1934, through the present. This includes many groups which arose, especially after the events of 1980. *International Viewpoints* deals with this large arena. We relay many viewpoints, sometimes opposing. (We have no connection with the current official Scientology.)

The original declaration contains a short history of the rise of Scientology, and the reasons that the Free Zone Scientologists cite for breaking with the Church. The focus of the statement is on separating IVy from the Church of Scientology, and although the goal of increasing communication among Scientologists is cited, no specific account is given of what this may include or exclude. The new “Aim” is the result of over a decade of correspondence between members. It begins with a statement of the function of International Viewpoints, that is, to put interested Independent Scientologists in communication with one another. The subject, however, is now changed to “MetaScientology.” By defining the focus of IVy as the “many branches, groups, and individuals arising from Scientology,” the contributors have sterilized the issue of definition that was of such concern during the early years. Meanwhile, the inclusion of opposing viewpoints normalizes the disagreements which originally caused so much friction.

**Seeking in Cyberspace**

It would appear that there is little unity to be found within the community of IVy, and that attempts to unify the group have been greatly resisted or simply ignored. Along with this disunity, though, Independent practice may be categorized on the whole as a propensity to discover and share practices rather than to enact them. Individuals do not see themselves as following a particular plan for success, but as constantly searching for a more refined set of
practices. This collective search constitutes the primary goal of IVy contributors. For Phillips, Jones, and other regular contributors, being an Independent Scientologist involves the sincere pursuit of a more effective implementation of Hubbard’s thought. In IVy, a religious institution created within the new medium of cyberspace, collective participation in the search for “truth” becomes the primary duty.

IVy, far from being viewed merely as a medium to discuss ideas, has allowed for a form of religious expression unique to online seekership. Furthermore, IVy has rejected traditional religious institutions in favor of what sociologist Colin Campbell calls “permanent seekership”. Campbell argues that groups of seekers “may in fact have lost sight of their original aim, and through the ‘displacement of goals’ have come to accept seeking itself as the primary end.” In Free Zone Scientology the willingness to self-experiment in an attempt to discover new, more effective practices trumps any commitment to the effectiveness of any existing practices, or to the authority of any particular institution.

References


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1 This movement, the California Association of Dianetic Auditors, is not properly a Scientology reform movement, since it predated the Church by more than two years. However, after the Church formed the Association held a position very similar to other post-Scientology reform movements, claiming to be the “Oldest Independent Dianetic Organization in existence” (*California Association of Dianetic Auditors*. http://ca-da.org/whoweare/whoweare.html [accessed 08/15/13]).


3 Peter Andersen and Rie Wellendorff, “Community in Scientology and Among Scientologists” in *Scientology*, 144.


v Eileen Barker, “Crossing the Boundary: New Challenges to Religious Authority and Control as a Consequence to Access to the Internet” in *Religion and Cyberspace*, 55.

vi Ibid.

vii The only exception to the categorization of IVy as a long-distance community is an annual conference held with the goal of discussing and developing Free Zone Scientology.


ix Ibid.

x Ibid.


xii Ibid.

xiii Ibid.

xiv Ibid.

xv Ibid.


xvii Ibid.


xix Jones’ article on psychic healing contains a further parallel with one type of seeker noted by Lofland and Stark. They note that some “began to explore the occult milieu, reading the voluminous literature of the strange, the mystical and the spiritual and tentatively trying a series of such occult groups as Rosicrucians, Spiritualists and the various divine sciences” (Lofland, John and Rodney Stark. “Becoming a World-Saver: A Theory of Conversion to a Deviant Perspective.” *American Sociological Review* 30, no. 6 (December 1965): 862-75.). The primary difference between seekers involved in IVy and the seekers described by Lofland and Stark is that IVy serves as a consistent group to test ideas, while seekers often regularly move between groups with defined boundaries.
xxi Ibid.
xxiii Ibid.
xxiv Ibid.
xxv L. Ron Hubbard, Scientology 0—8: The Book of Basics, 347.
xxix Ibid.
xxx Ibid.
xxxi Or more specifically, that cannot be solved by “the combination of tech, admin, and ethics” (Ibid.).
The 1960s and 1970s were a decade of turbulence, militancy, and unrest in America. The post-World War II boom in consumerism and consumption made way for a new post-materialist societal ethos, one that looked past the American dream of home ownership and material wealth. Many citizens were now concerned with social and economic equality, justice for all people of the world, and a restructuring of the capitalist system itself.

According to Max Elbaum, the traditional narrative of the 1960s begins with an “idealistic, impassioned” youth working on voter registration and civil rights and ends with “days of rage as the sixties movement, frustrated by the Vietnam War, became irrational and self-destructive.” What started out as middle-class students organizing in the South for civil rights slowly transformed into “the emergence of the New Left, the antiwar movement, women’s liberation, and identity based politics.”

The New Left protest groups of this decade are important to gay radicalism because they created the foundational strategies for future gay activism. Although Homophile organizations existed in the 1940s and 1950s, gay radicalism did not fully blossom until the language, style, and strategies of the New Left emerged during the decade of discontent, chiefly embodied by the Students for a Democratic Society (SDS) and the Black Panther Party. In Maurice Isserman and Michael Kazin’s view, “the New Left was a profoundly American movement, inspired by the civil rights movement, and fashioning its early political beliefs from a combination of American radical traditions.” Originally, the New Left focused on social justice issues – poverty, race, equality – through conscience raising events. Eventually, as the Vietnam War escalated, and the stark realities of American imperialism became more apparent, many adopted a militant approach.

The scholarly literature of gay history explains that gay liberation and gay rights groups have borrowed and adopted the various frames and strategies of previous protest movements. This paper seeks to understand the direct connections between homophile and gay liberation groups and previous social movements in the United States using cultural framing theory. To accomplish this, I explore two of the more powerful and resonant frames: the “Gay is Good” and “Gay Power” frames, both of which were adopted from the American Civil Rights Movement and Black Power respectively. This paper is not meant to imply a unidirectional relationship; I simply focus on two of the many frames employed by gay liberation and gay rights groups.

Gay radicalism may easily be placed within the larger New Left struggles of the 1960s and 1970s. Following the turbulent Stonewall Riots of 1969, a new form of activism emerged – gay liberation. Many of the narratives regarding gay liberation mark Stonewall as the beginning of the movement, both in scholarly literature and public memory. Popular myth places those riots as the origin of the gay liberation movement. To some, Stonewall began all gay activism. David Carter writes, “it is also commonly asserted that the riot…marked the beginning of the gay rights movement.” Simon Hall concurs, offering Stonewall as the “year zero” of “public consciousness and historical memory.” As John D’Emilio and numerous others have shown, Stonewall was not the ground zero of activism. Meaghan Nappo explains that Stonewall simply possesses a large mnemonic capacity that allows for a unified “beginning” in the collective memory of many individuals, both within and outside of
the gay community. xi Others have asserted the myth of Stonewall was a conscious effort on the part of gay liberation activists, to provide a simple breaking point between the assimilationists and single issue focus of 1950s homophile groups and the new liberation strategies of the Gay Liberation Front after Stonewall. xii

While this origin story is contested in the literature, Stonewall did have a direct impact; a few days after the riot, the Gay Liberation Front of New York (GLF/NY) was formed. xiii The GLF/NY quickly adopted “the rhetoric of political manifestos” from the numerous “self-identified minority group activist organizations.” xiv Within a year, gay liberation organizations sprouted in many American cities, including Philadelphia, San Francisco, Washington, DC, and Detroit. xv

The Gay Liberation Front (GLF) was a new type of organization within the larger gay community. Co-opting the language of other liberation groups, the GLF began to distribute information and hold meetings. Flyers read, “Do you think homosexuals are revolting? You bet your sweet ass we are. We’re going to make a place for ourselves and the revolutionary movements. We challenge the myths that are screwing up society.” xvii Another flyer asked homosexuals to join the organization “to examine how we are oppressed and how we oppress ourselves and to fight for gay control of gay businesses,” reminiscent of the Black Panther’s call of self-sufficiency. xviii The general ethos of gay groups changed from the assimilation strategies of homophile groups to the liberationist tactics of the 1960s. xix In fact, Marxism was prevalent in many of these groups, and the pre-Stonewall “homophile goal of tolerance for homosexuals” was inadequate; “sexual freedom required structural change, not just changes in laws.”

In an effort to resolve the dilemma of resource mobilization and political process theory that does not account for cultural elements and ideas, David Snow and others have written extensively on the framing processes of social movement groups and actors. xxi In fact, according to Doug McAdam et al., it was the importance of culture elements that differentiated new social movements from the old. xxi For this essay, I borrow Mayer Zald’s traditional definition of culture as “the shared beliefs and understanding, mediated by and constituted by symbols and language, of a group or society.” xxii Likewise, frames are the “specific metaphors, symbolic representations, and cognitive cues used to render or cast behavior and events.” xxiii

From “Black is Beautiful” to “Gay is Good”

The genesis of “Gay is Good” as a slogan and a cultural frame is easy to determine. As stated earlier, many gay organizations groups adopted tactics, rhetoric, and strategies from previous social protest movements. The most common example is the Civil Rights movement, which framed their grievances in relation to civil liberties and equality for all. “Gay is Good” is directly adopted from the “black is beautiful” movement of the 1960s. xxiv In an effort to combat the racial stereotypes of ugly physical features, various black rights groups sought to recuperate the “malign, defiled, [and] destroyed black body” of the past. xxv

Franklin Kameny was the primary figure of the “Gay is Good” frame. A co-founder of the Mattachine Society of Washington, DC, Kameny became increasingly vocal of his displeasure with the homophile movement’s assimilationist tendencies. Speaking at a convention of the Mattachine Society of N.Y. in 1964, Kameny asserted his beliefs against “the homophile obsession with discovering the cause of homosexuality and the organization’s deferment to the psychology establishment’s labeling of homosexuality as a mental sickness.” xxvi He introduced the idea of homosexuality as not an illness, but a “characteristic marking a particular group of people.” xxvii According to Stephen M. Engel, Kameny used the cultural frame of the civil rights movement, contending that the National Association for the Advancement of Colored People or the Congress of Racial Equality (CORE) did not worry about which gene caused black skin; they were only interested in securing fairness and
equality. xxviii This is a prime example of frame alignment – the act of interpreting a group’s cause or goals with already created and culturally understood concepts. xxix As much of the literature attests, this civil rights frame is one of the more widely used in American protest movements. xxx

The following year, as head of the newly formed Washington, DC, chapter of Mattachine, Kameny reemphasized this point. Speaking at the 1965 Eastern Region Conference of Homophile Organizations (ERCHO) he stated that “homosexuality is not a sickness, disturbance, or other pathology in any sense, but is merely a preference, orientation, or propensity, on par with, and not different in kind from, heterosexuality.” xxxi Just as the Black Power movement combated racial stereotypes, Kameny was beginning to create the foundation of “Gay is Good” as a new way to view one’s own homosexuality and, in turn, influence a greater societal acceptance.

The formal acceptance of the slogan was approved in 1968 at the North American Conference of Homophile Organizations, which adopted “Gay is Good” in its official platform. The homophile movement, which was pre-Gay Liberation, had officially shifted its focus from a quiet campaign of acceptance to a more aggressive stance demanding equal access, rights, and fairness within existing political and societal institutions. The key to note is that Homophile groups still wanted to change these existing structures; gay liberation, as with other liberation groups, would focus on a complete destruction of the structures themselves.

Franklin Kameny, writing in his essay titled “Gay is Good,” asserts the parallel between “Black is Beautiful” and “Gay is Good” was a conscious effort. He writes the slogan was a “parallel effort to replace negative feelings up on the part of the homosexual…with the positive feelings of pride, self-esteem, self-confidence, and self-worth so necessary to true human dignity.” xxxii Borrowing from David A. Snow, the active and conscious effort of Kameny in creating this frame does indeed imbue it with the qualities of a collection action frame, implying “agency and contention at the level of reality construction.” xxxiii

According to Robert D. Benford, the activity of framing consists of three core tasks: diagnostic, which identifies the problem; prognostic, which creates solutions to the problem; and motivational, which calls for action against the grievance. xxxiv The “Gay is Good” frame meets all of these requirements:

- Diagnostic: Kameny identified the issue of homosexuality as a sickness and sin as a problem for inner perception and outward portrayal.
- Prognostic: The solution, for Kameny, was a complete change in both how homosexuals view their sexuality and how they push for equal rights within society.
- Motivational: Through the adoption of “Gay is Good” as a slogan, Kameny created a call to arms for homophile activists wishing to move past assimilation.

The Genesis of Gay Power

While “Gay is Good” was the pre-Stonewall slogan of affirmation, the “Gay Power” frame came to replace it as gay social movements became increasingly militant after the Stonewall Riots of 1969. Although some within the gay liberation movement have spoken against the homophile organizations of the 1950s and 1960s, most historians recognize the importance of previous protest actions for the creation of “Gay Power”. xxxv As Simon Hall asserts, the “Mattachine Societies in Washington and New York…staged a series of public demonstrations protesting discrimination against homosexuals.” xxxvi Mattachine adopted the civil rights master frame and used the non-violent protest tactics of the African American Civil Rights movement to shed light on homosexuals’ plight in America. xxxvii Moreover, although this tactic and master frame would take a backseat during gay liberation’s heyday, it would soon become the dominant strategy in the years to come. Just as SNCC and CORE
moved away from the civil rights master frame by creating the Black Power frame, the gay liberationists adopted a more militant approach to gay is good, which would eventually turn into “Gay Power”.

“Gay Power” is an overt imitation of the Black Power movement, a term originally coined by Stokely Carmichael, then head of the Student Nonviolent Coordinating Committee. Carmichael first used the term “Black Power” during a march organized by James Meredith, the first black student at the University of Mississippi. In Carmichael’s speech, given after a protest march on July 28, 1966, he defined the move from a civil rights frame within SNCC to one of Black Power. Carmichael elucidated many topics during this speech, including the need for a black-only, Black Power movement, governed and led by black people. He called for all black activists to come together, “so that we don’t cut each other…and don’t destroy each other but move to a point where we appreciate and love each other.” Most importantly, he called for action; he called for blacks to claim their own power. He called for blacks to “smash any political machine in the country that’s oppressing us and bringing us to our knees.”

Dennis Altman writes, “The essential quality of gay liberation…lies in its assertion of gayness, its refusal to feel shame or guilt at being homosexual.” He continues, writing that “Gay Power” is not equivalent to Black Power, but it does register “substantial conceptual debt.” “Gay Power” was tied to the increasing militant aims of 1960s protest groups, especially those aimed at overthrowing the institutions that oppressed them. As with the Black Power movement, gays were now espousing revolutionary rhetoric. From A Radical Manifesto: The Homophile Movement Must be Radicalized, activists wrote, “we see the persecution of homosexuality as part of a general attempt to oppress all minorities and keep them powerless. Our fate is linked with these minorities…a common struggle, however, will bring common triumph.”

Similar to Carmichael’s call for black-owned businesses and black-led organizations, one of the first known liberation documents made the same claims. Within days of the Stonewall Riots, a flyer began to circulate Greenwich Village. The Homophile Youth Movement urged homosexual men to open their own businesses; boycott establishments run by the Mafia (in reference to Stonewell’s management); and unite to fight New York’s oppressive policies against homosexuals. As with Black Power, the newly radicalized gay liberationists wanted control of their spheres of public and private life.

According to Donn Teal, “Gay Power” was “demanding to be recognized as a powerful minority with just rights that have not been acknowledged; it is an insistence that homosexuality has made its own contribution to civilization…and homosexuality…does nonetheless have unique aspects which demand their own standards of evaluation and their own subculture.” As “Gay Power” continued to infect various social movement organizations, so too was the call for recognition and celebration of gay differences.

Carl Wittman, a member of the Students for a Democratic Society and the Gay Liberation Front, wrote in A Gay Manifesto, “We know we are radical, in that we know the system we’re under now is a direct source of oppression, and it’s not a question of getting our share of the pie. The pie is rotten.” This is just one of many examples of how gay liberationists now spoke in the rhetoric of other New Left organizations; liberationists wanted liberation from oppression and to make revolution against “imperialist Amerika.” A common concluding statement on GLF literature were the words “All power to the oppressed peoples! Power to all the people!”

This frame diffusion was common within gay liberation. In addition to their relation with various power movements, gay liberationists also borrowed strategies and tactics from other groups they were involved with. According to Steven Epstein, the antiwar movement provided suspicion of the government; the New left provided an “apocalyptic rhetoric and sense of impending revolution”; the women’s movement elucidated the idea of the sexual as
political; Third world liberation movements reinforced the notion of “resistance to an imperial state”; and the hippies reinforced ideas of mistrusting authority and having fun with your social protests.\textsuperscript{xlii} Once again using Benford’s core frames, the “Gay Power” frame is easily placed in the following tasks:

- Diagnostic: While “Gay is Good” and instills pride, it does not address the underlying grievances of equality, discrimination, and self-sufficiency within the gay community.
- Prognostic: Gay social groups must be more forceful, calling for equality and a voice. To attain this, gay groups need to embrace liberationist strategies, similar to Black Power groups.
- Motivational: “Gay Power” became a slogan, calling for action within gay organizations. Additionally, “Gay Power” linked the struggles of homosexuals to that of other minority groups within the United States.

Conclusion

Within just a few years of the Stonewall Riots, gay liberation seemed to have lost its rhetorical power and frenzied protest actions. As society slowly started to change its opinion of homosexuality and governmental institutions began to relax or repeal laws of discrimination, the liberation movement lost its steam. The Gay Liberation Front of New York experienced factional discord, as was common within decentralized and participatory revolution groups.\textsuperscript{xlviii} The realization that total structural overthrow of governmental institutions was impossible forced many members to switch their efforts to a more focused, rights-based approach to attaining any kind of success. Upon breaking from the Gay Liberation Front, the newly formed Gay Activists Alliance would, according to its constitution, “focus only on achieving civil rights for gay people” and not on political and societal liberation or associating with other radical militant protest groups.\textsuperscript{xlix} According to Steven Valocchi, there had always existed a tension between the liberation and minority frames since the beginning of gay liberation groups.\textsuperscript{1} The idea of remaking society had vanished.

This was not the end though. The strength of the civil rights master frame persisted and is the focus of today’s contemporary movement. Starting with the removal of homosexuality as a sickness in the \textit{Diagnostic and Statistical Manual of Mental Disorders} in 1973, a flurry of successes accumulated for gay rights groups: Kathy Kozachenk became the first openly gay elected official, winning a seat on the Ann Arbor City Council; the Democratic Party adopted a plank in support of gay rights during their national convention in 1980; Wisconsin became the first U.S. state to outlaw sexually based discrimination in 1982; Vermont became the first state to legalize Civil Unions in 2000; Sodomy laws were struck down by the US Supreme Court in 2003; and a flurry of anti-discrimination ordinances have been enacted throughout the country.

The tactic of portraying homosexual’s differences from the “straight” majority is gone for the most part and the movement has turned back to a moderate, political campaign aimed at securing anti-discrimination and right-to-marry laws with the established political and power structures of the United States.

If one was to measure success purely on tangible results, the Gay Liberation movement could be deemed an utter failure. They did not change the power structure of America, nor did they overthrow hegemonic institutions. These are the wrong criteria for judgment though. The Gay Liberation movement accomplished the goal of consciousness raising. Prior to 1969, the majority of homosexuals were largely unseen and unable to advocate for themselves. After gay liberation, gays and lesbians were now provided structure and support to become a
vocal majority with political agency. The successes of the past twenty years would not have been possible without the protest actions of the liberation movement.

References


Hunt, Ronald J. *Historical Dictionary of the Gay Liberation Movement: Gay Men and the

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iii Similar to many other authors of gay history, the use of identity labels is often messy. An individual or organization’s use of a specific term is a very personal decision. Consequently, I have adopted the standard practice of referring to a movement or organization as they would have been during the historical period in which they existed. Hence, for much of the 1960s and 1970s, “gay” or “lesbian and gay” would have been used to refer to a community of homosexual individuals. Furthermore, I refer to the Gay Liberation movement and Gay Rights movements with two very distinct definitions. Gay liberation sought the goal of destroying a system in which gays and lesbians were treated as second-class citizens; on the other hand, the Gay Rights Movement was specifically targeting laws and ordinances, within the political system, which discriminated against gays and lesbians. At no point should my misuse of a term be construed as a lack of sensitivity.


vii The Stonewall riots started on June 28, 1969, after a police raid on the Stonewall Inn in Greenwich Village.


Although this binary construction between assimilationist and liberationist is simplistic, I employ its use for the sake of brevity. Most of the recent literature recognizes the complexities and differing strategies between various homophile groups.


Doug McAdam, John D. McCarthy, and Mayer N. Zald, *Comparative Perspectives on Social Movements: Political Opportunities, Mobilizing Structures, and Cultural Framings* (Cambridge University Press, 1996), 5.

Ibid.

Mayer Zald, “Culture, Ideology, and Strategic Framing,” in *Comparative Perspectives on Social Movements: Political Opportunities, Mobilizing Structures, and Cultural*

Ibid.


Bell, “Arresting Developments,” 129.

Engel, The Unfinished Revolution, 56.

Ibid.

Ibid.

Ibid., 155.


As quoted in Bell, “Arresting Developments,” 129.


For the importance of Mattachine providing the groundwork and foundation to gay liberation movements, see D’Emilio, Sexual Politics, Sexual Communities; Duberman, Stonewall.


Diane Richardson and Steven Seidman, Handbook of Lesbian and Gay Studies (SAGE, 2002), 6.


Ibid.


Homophile Youth Movement, “Get the Mafia and the Cops Out of Gay Bars.”

Teal, The Gay Militants, 60.


D’Emilio, Sexual Politics, Sexual Communities, 234.
From “Black is Beautiful” to “Gay Power”

For more, see various Red Butterfly Pamphlets at www.paganpressbooks.com


Michael Bronski, A Queer History of the United States (Boston, MA: Beacon Press, 2012), 211.

Ibid.

“I Love the Country but I Can’t Stand the Scene”:
Teaching Literature to Examine and Complicate Adolescent National Identity

Winner, 2013 Graduate Humanities Conference

By Suzanne Ehst
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I was teaching high-school English on September 11, 2001. As my seniors finished their essay exams on the novel Siddhartha, a colleague poked her head into my room to whisper to me, “There’s something going on at The World Trade Center. A plane flew into one of the buildings… and it might not have been an accident.” As students finished their tests, I passed on this breaking news, which prompted one of my self-proclaimed globally aware students to ask, “The World Trade Center…that’s in D.C., right?” In subsequent days, students’ everyday lexicons grew to include places, phrases, and names like “Al-Qaeda,” “Osama bin Laden,” “twin towers,” and “global terrorist networks” as these attacks on the United States spawned a new awareness of the political struggles in and with countries of the modern Middle East.

Yet it’s unsettling to me that, for my students as for many U.S. citizens, the narrative of “The War on Terror” begins with that cataclysmic event.

The high school where I was teaching prides itself on nurturing globally informed, politically aware students, and developing students as “global citizens” is explicitly named as a school-wide core value. Perhaps it’s presumptuous to say that if my students entered the 9/11/01 era with little related global context, then the majority of U.S. high school students were similarly naïve. However, studies of both mainstream rhetoric and U.S. secondary schools suggest that the dominant American narrative begins on September 11 with a declaration that “they” (terrorists) attacked “us” (innocents) because they are evil and we stand for good. This bowdlerized version of the 9/11/01 story isn’t just a layman’s perspective; when articulated by the country’s leader and repeated endlessly on the airwaves, it saturates youth’s malleable sense of national identity.

Students such as mine are in a developmental phase when they are actively constructing social identities and building/refining personal ideologies. While Erik Erickson attributed general questions to this phase like “Who am I?” and “Where am I going?”, studies of adolescence conclude that high school students are also seeking group identification, including the construction of a national identity. More specific versions of Erikson’s core questions might include, “What does it mean to be ‘American’?” “What do we mean by the phrase, ‘American values?’” and “What are the national myths that I reject or espouse?” While core aspects of adults’ belief systems are somewhat fixed, the adolescent’s ideology is comparatively fluid. It is imperative that educators leverage this developmental phase to foster in youth a critical consciousness with regard to their American identities. Specifically, teachers of literature are uniquely positioned to invite students to consider complicating narratives, texts written from international perspectives that critically describe the impacts of United States’ foreign policy and both expose and challenge our national myths about who we are as a country and how we act on the national stage. The intent of such study is not to undermine students’ love of country, but rather to augment democratic participation through a more globally informed, nuanced understanding of national identity.

I reluctantly admit that in the fall of 2001, my own English classroom was not a powerful instrument for developing students’ critical awareness of pre- and post-9/11 politics. In the days following the attacks, our online discussion forum did turn toward current events, with students sharing thoughts on civil liberties, nonviolence, grief, and their questions about the
conditions that gave rise to the terrorist attacks. This lasted a few days, however, before we
returned to the scheduled Shakespearean play. I was, after all, in the process of preparing
them for college.

I have come to believe that this was a missed opportunity, both on my part and on the
part of thousands of teachers who returned to their time-honored curricula in the wake this
national “earthquake.”

By “national identity,” I mean something distinctly different from “ethnic identity” or
“multiculturalism.” Education in recent decades has increasingly devoted attention to the
latter. Scholars like James Banks, Gloria Ladson-Billings, and Linda Christensen represent
this trend; their work in multicultural education, critical race theory, and social justice
education respectively have had a definitive impact on public education goals, teacher
training, and curriculum. For example, accreditation by NCATE, the most influential teacher
education accreditation body, is contingent upon the degree to which a college of education
prepares future teachers to take an inclusive, strengths-based approach to “diversity” in
teacher training. In contrast, standards for both curriculum and teacher training say virtually
nothing about the discussion of national identity, though this is arguably one of the founding
principles of the U.S. public school system.

National identity is often conceptualized as shared ancestry, background, and experience,
yet these traits, according to Heather Malin, are less applicable to our racially dynamic,
pluralistic society. Contemporary national identity, claims Malin, is better described as a set
of “shared beliefs, civic attitudes, and actions” (59). Specifically, Os Guinness describes
“Americanism” as including the following ideals: “notions of equal opportunity, freedom of
conscience, freedom of speech…the rule of law, separation of church and state” (qtd. in Malin
56-57).

While these ideals might be taught in the social studies curriculum as fact, critical
examination of them, especially post-9/11/01, is blatantly absent in adolescents’ education,
and the idea that September 11 should foster a reflective national discourse is far from
popular. Those attempting to raise any questions of how The United States’ foreign policy
might have influenced the attacks are quickly deemed anti-American, and this sentiment—
prizing nationalist fervor over reflective democratic discourse—pervades the public schools
as well. Thea Renda Abu El-Haj, Professor of Education at Rutgers University, claims that
“from the colonization of indigenous peoples to the current wars in Afghanistan and Iraq,
education has played a critical role as a force for spreading American ideals and values”
(245). Abu El-Haj argues that these forces, often presented as benevolent and liberatory,
shroud imperial ambitions. Additionally, they leverage the classroom space to promote a kind
of national mythmaking through curriculum and discourse. Certainly this is not the case in all
schools, in all classrooms, and for all students; however, trends of promoting unquestioning
nationalism over what we might call “critical patriotism” can be traced in three areas of
curriculum, often described by curricular theorists as “explicit,” “latent,” and “null”
curriculum.

Studies of national symbols in public schools illustrate the prizing of unquestioning
loyalty in the “explicit curriculum,” the portion of curriculum and school agenda that is
consciously taught and promoted. For example, from 2001 to 2003, 17 states enacted or
amended “pledge laws,” and as of 2011, 35 states mandated that the Pledge of Allegiance be
recited on a daily basis in U.S. schools (Chiodo 39). Shortly after 9/11, a group in Madison,
Wisconsin attempted to pass legislation that would ensure all students actively participated in
reciting the pledge; when this was struck down by the school board as an infringement on
students’ rights, the epithet “Anti-American” was cast at both the board and at any student
who dared not recite the pledge for reasons of conscience (Ladson-Billings qtd. in Chiodo
42). While this study of the pledge is just one small component of a typical school day, these
findings are symptomatic of a public-school discourse that prioritizes recitation of national ideals over reflective examination of them

“Latent curriculum” refers to the way in which students are implicitly taught through the thousands of interactions that occur every day in the schools—images in textbooks, disciplinary policies, arrangement of furniture, dress codes, etc. all send students messages about national, social, and academic values. Post-9/11/01 implications for the latent curriculum are illustrated by a case study of a diverse suburban high school in Pennsylvania. In this study, Abu El-Haj conducted qualitative research to examine how students’ sense of nationality was constructed through “everyday racialized and gendered discourses and practices inside [the] school” (243). With a special focus on Palestinian-American students, Abu El-Haj concluded that through their speech about and with Muslim students, well-meaning teachers

unconsciously mobilized contemporary political discourse about ‘a clash of civilizations’ and its relation to the war on terror to create us as a benevolent nation in which individual freedom, tolerance, and political liberty reign supreme against them who stand for cultural captivity, intolerance, and political oppression. (250, emphasis in the original)

Abu El-Haj illustrated this sentiment through multiple interviews and anecdotes, including that of a well-meaning female teacher who asked to see a female student’s hair, concealed by her hijab. In an interview, this teacher presented her actions as a kind of feminist liberation; however, the student responded with discomfort, causing Abu El-Haj to describe such actions as reifying the idea of an “us” who loves freedom liberating a “them” plagued by repression.

Such anecdotes of post-9/11 school culture illustrate a dangerous trend not just because of what is being taught, consciously and unconsciously, but because of what is being omitted (the “null” curriculum): namely critical discourse about and informed understanding of the most important geopolitical issues of students’ current worlds. In a public lecture, Allen Webb, Professor of English Education, said that he often asks his undergraduate seniors how many of them studied September 11th or the wars in Afghanistan and Iraq in high school. Webb noted that in classes of 20 to 30 students, usually one or two students indicate such units of study. While this is an informal survey conducted from professorial interest, Webb concluded that literature bears out what he observed in his own Midwestern students: U.S. high schools often gloss or omit the study of 21st-century war and terrorism, thus perpetuating the ideal that the United States is a country of peace and freedom and resisting a national identity complicated by narratives of aggression and preemptive war.

When such discourse is squelched, we make room for national narratives that border on (or cross into) jingoism. While it’s popular to blame “the media” in a generalized manner for fostering such distortions, several specific studies do help us understand the type of media-generated narrative that education often fails to counter, and thus ostensibly upholds. In the documentary Reel Bad Arabs, Dr. Jack Shaheen reports on his analysis of the depiction of Arabs in more than 1,000 Hollywood films. The patterns in these films lead Shaheen to conclude, “We know the mythology of Arab as ‘villain’ regardless of where we live,” and more recent films develop that generalized villain into a caricature of the modern-day terrorist. These repeated images obviously beget stereotyping, but Shaheen also asserts their political implications; “Politics and Hollywood’s images are linked,” he claims. “They reinforce one another.”

An additional effect of these stereotypes is a decrease in empathy for the Middle Easterner. In such one-dimensional portrayals, “the humanity is not there,” Shaheen says. “And if we cannot see the Arab’s humanity, what’s left? If we feel nothing, if we feel that the Arabs are not like us, then let’s kill them all. They deserve to die, right?” Perhaps the most important conclusion Shaheen makes is that “Islamophobia” has become part of the American

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psyche, yet the stereotype is invisible to many. We embrace the mythology of the “reel bad Arab” without realizing the destructive inaccuracies of the myth.

Another subtler way in which students’ national narratives are limited is through social networking and online search engines. In a 2011 TED talk, MoveOn.org organizer Eli Pariser gives a compelling account of the way in which online interfaces use algorithms to tailor news to our preferences. While this might initially seem helpful, Pariser calls this a dangerous “filter bubble” that protects us from any stories and perspectives that might challenge our existing viewpoints. To exemplify, he describes two friends in New York who Googled “Egypt” during the Arab spring and got drastically different results; one friend’s top hits were of political updates while the other’s were largely travel sites and tantalizing tourist images. This type of phenomenon helps to explain a 2007 Newsweek poll that found roughly 41% of Americans polled still believed that Saddam Hussein had something to do with the 9/11/01 attacks (Braiker). If we seek only news sources that confirm our pre-existing biases, the internet algorithms will readily aid us in sheltering ourselves from any complicating evidence.

The risk in such illustrations is that some youth cement their national identities in a dangerously uncomplicated manner. Little in the school system challenges them to question what educational activist Parker Palmer calls “national myths” that we adhere to even when reality contradicts those myths. Among these, Palmer claims, is the myth that “America is the world’s leading superpower,” this moniker describing our ability “to achieve major foreign policy by military might” (182). In this national myth, such policy is often associated only with the promotion of justice and freedom, and not with economic and political self-interest.

Drawing on a long history of educational philosophers like John Dewey and Horace Mann, Palmer lauds the classroom as one space where students might be “formed inwardly” to play a creative role in democratic society. One job of the teacher, according to Palmer, is to help students connect the “big stories” of human history with their own “little stories” (122), a narrative way of constructing social and national identity. To illustrate, Palmer reflects on his own childhood introduction to the Holocaust and how, as a young student, he was able to process this era as if it were something “that had happened on some other planet” (126). Little in his teacher’s presentation encouraged him to connect himself to the horrific human experiences embedded in the historical narrative. Too often, stories of global injustice are taught as if they happened “over there” or “back then,” freeing us from the necessity of self-reflection in the wake of such facts, allowing us to avoid the connections to ourselves, here, today.

With regard to 9/11/01, the decades leading up to it, and the decade following, how we tell the story matters. It matters a great deal. First, to use Palmer’s language, we must find ways to help students connect their “little stories” to this “big story,” including the students who appear to have no immediate connection. Additionally, we must encourage students to see that to begin the 9/11/01 story on 9/11 is to begin in medias res; there are decades of prehistory that help us better understand the attacks without exonerating the hijackers.

This latter point is admittedly contentious territory, especially for teachers whose job security often hinges on parental and community approval. It is, however, necessary territory. Judith Butler argues, “The United States needs to think about how its own political investments and practices help to create a world of enormous rage and violence” (14). In her collection of five essays, Precarious Life: The Power of Mourning and Violence, she explicitly denies that such national introspection exonerates the 9/11/01 hijackers. Rather, she claims, it invites us to start the story of this horrific event earlier, to look beyond merely examining the “personal pathology” of the likes of Mohammad Atta or Osama bin Laden to understand any “relevant prehistory” (5). Claiming that there is no relevant prehistory and the only motivations for the attacks are “they hate our freedoms” is possibly more comfortable; but it is not ethically superior and, I would argue, it is profoundly “un-American” in that it ignores the value of engaged and informed democratic participation.
In what ways, then, are the secondary English curriculum and teacher uniquely positioned to invite students toward a more complicated national identity in general, and a fuller 9/11/01 understanding specifically? While it might seem like a logical connection, state and national standards say almost nothing about the use of literature to develop an introspective, globally informed national identity. The common core standards, adopted by 45 states, heavily emphasize textual analysis, and such standards are linked to precious few aims beyond reading and interpretation skills. Notably absent is the use of literature to make sense of present-day issues on a national and international scale. Also informative is the list of “illustrative texts,” or texts suggested to illustrate “the complexity, quality, and range of student readings” (58). The list is populated by the likes of Fitzgerald, Steinbeck, Keats, and Twain, and interlaced with the usual females like Dickinson, Hansberry, and Hurston—all worthy texts, to be sure, but none of which provides students with any critical perspective on recent foreign policy, insularity, or nationalistic rhetoric. While Steinbeck, Hansberry, and Hurston do offer a critique of historic discrimination, their settings allow students the luxury of what Palmer described as reading as if “that happened on some other planet”—we’ve overcome that era, thank God.

While these now-familiar standards govern particular skill sets, the introduction to The Common Core is explicit in its delegation of freedom to teachers and districts. It states that these standards are to be “complemented by a well-developed, content-rich curriculum,” and that they do not impose “a set of restrictions that limit what can be taught” (5). Despite this encouraging preamble, teachers’ intellectual freedom is often trumped by curricular mandates, especially in districts where a panic over test scores begets a policy of “teaching to the test.” My central point, however, is that the mandate to allow teachers professional, curricular freedom is written into many state’s standards and thus allows teachers creative space to develop the ethical dimensions of their own curricula.

There are three primary traits I was looking for in a text to read with high school students: 1) It could be taught to meet Common Core Standards; 2) it would be readable and engaging for 9th-12th grade students; and 3) it would meet the aims of complicating mainstream national narratives. The Reluctant Fundamentalist by Mohsin Hamid meets all of these aims, and while I trust readers of this paper to see the implicit alignment with curricular standards, I’m mostly interested in explicitly delineating what the text might provide to students with regard to the third goal and how a teacher might work with the text to best achieve this aim.

Before examining the traits of the novel itself, I want to describe pedagogical theory that guides this teaching endeavor. Because students are reading The Reluctant Fundamentalist with the express intent of reflecting on their national identities, the teacher must structure personal interaction with the text into learning activities. Central to how I envision teachers working with this novel is the now-popular Reader Response theory. Despite its rich theoretical history, it is common to see high school teachers using this approach in a reductive “anything goes” sort of manner that is counterproductive to the goal of deep engagement with text. Students often respond in an “I think it, I said it, end of discussion” kind of manner. However, Louise Rosenblatt’s classic Literature as Exploration gives a useful theoretical framework for more meaningful engagement with the text.

In this book, Rosenblatt detailed her “transactional” theory of reading which claims that reading is “a live circuit set up between reader and text.” This explains why “meaning is not ‘in’ the text or ‘in’ the reader. Both reader and text are essential to the transactional process of making meaning” (24-27). Adolescent attention is already “to an extraordinary degree focused on the personal import of what he [sic] reads” (42); the job of the teacher, under Rosenblatt’s model, is to ensure that the exchange between reader and text is not unidirectional, with the adolescent merely reading her prior experience and ideology into the text,
but reciprocal, with the reader carefully examining the text to further refine her initial interpretations and personal perspective.

Extrapolating from this definition, Rosenblatt argues that literature is uniquely positioned to expand students’ ideas about the world. The transactions between text and student often have the effect of bringing student biases and generalizations into the open for examination. When text is carefully selected and taught under this theoretical model, students “will see how often they have been dominated by ideas only because they have heard them again and again” (114). With subconscious (or conscious) biases exposed, students then return to the literature to complicate their own preconceived notions.

According to Deborah Appleman, much of contemporary high school pedagogy can best be described as a blend of Reader Response and New Criticism—carefully analyzing the text itself for how it works and responding personally to literature. However, Appleman confirms that much contemporary practice has moved away from Rosenblatt’s original vision, resulting in teachers’ “overprivileging and romanticizing the individual at the expense of considerations of context” (31). Rich interaction with text occurs at the intersection of these two theoretical lenses, where personal reaction and careful study of the narrative are brought into conversation with one another.

Literature has the profound ability to stir an emotional reaction in students, especially around issues of grave importance—issues of equity, justice, and human relationships, or in this particular case, issues of war, liberty, national solidarity, and international relations. It has the ability to bridge “the individual’s intellectual perceptions on the one hand and his [sic] emotional attitudes on the other” (Rosenblatt 170). In a story, “issues” aren’t abstracted; they are embodied and animated by believably human characters, characters that trigger empathy or disgust in a way that facts, statistics, and ideas do not.

The structure of The Reluctant Fundamentalist invites this pedagogy. The novel unfolds almost entirely in a café as a one-sided dialogue between Changez, a native Pakistani, and an unnamed, uneasy American. While we never actually see or hear the unnamed man, Changez’s observations and reactions serve to characterize him for the reader. Throughout the novel, Changez breaks away from the story of his past to address the American and to observe and invite his reactions. This American, referred to only as “you,” serves as a stand-in for any American reader. From the very first page when Changez addresses his companion—“Do not be frightened by my beard: I am a lover of America”—the reader, too, sits in the café with him and absorbs his critiques of American foreign policy, post-9/11/01 racial profiling, and financially driven corporate values. This narrative frame invites adolescent readers to connect their “little stories” to a “big story” (to use Palmer’s phrases): “How do I respond to these critiques of my country? Do I see any truth in them? To what degree do I enable and participate in what Changez describes?”

One noteworthy trait of Changez’s story is that it directly confronts what the scholars I’ve cited have named as core tenets of dominant national mythology: that The United States is benevolent in its foreign relations, promoting freedom and open-mindedness in countries plagued by sexism, poverty, and repression. As Changez tells his personal history, we learn that he attended a prestigious American university and was eventually employed by “Underwood Samson,” a top-notch valuation firm that represents the pinnacle of the American corporate ladder. Changez’s work with Underwood Samson took him to the Philippines and Chile to value companies in ways that would dramatically alter the lives of everyday locals working for those companies. While Underwood claimed their activity was neutral, Changez names the imperial nature of international corporate policy; with every company they reviewed, they promoted U.S. corporate values of “efficiency” and “advancement” (37). “In this constant striving to realize a financial future,” Changez reflects, “no thought was given to the critical personal and political issues that affect one’s emotional present” (145).
The text also critiques the “U.S. as superpower” myth in several ways. In Changez’s view, U.S. military involvement is rooted in self-interest, not justice, as evidenced by the U.S.’s refusal to help Pakistan in the face of Indian aggression despite their military bases already established in Pakistan. Other 20th-century military affairs in Taiwan, Korea, and Vietnam earn this critique from the narrator: “I have always resented the manner in which America conducted itself in the world; your country’s interference in the affairs of others was insufferable” (156). In these and other critiques, a student reader must confront the popular image of the U.S. military as either an agent of justice or a necessary protector from outside aggression; in Changez’s eyes, the military is neither of these. It is rather the bully force of an imperial government, seeking its own gain despite the impact on the lives of others. To be clear, I am not saying that the student reader must adopt the narrative perspective; rather, honest discussion of this complicating narrative might trouble easy national ideals that are rooted in good/evil binary thinking.

Another important trait of the text is that it upends the colonial portrayal of an “us” who is civilized and a “them” who is savage. In colonial narratives, cultural achievements and histories of the colonized are often devalued and suppressed (Appelman 88). However, in several sections of text, Changez subverts the colonial narrative by painting Anglo history as barbaric and Pakistani/Urdu history as refined. It was the people of the Indus River basin that “had cities that were laid out on grids and boasted underground sewers while the ancestors of those who would invade and colonize America were illiterate barbarians” (34). Later in the text, Changez again praises the cultural history of his people when he says emphatically, “We built the Royal Mosque and the Shalimar Gardens in this city, and we built the Lahore Fort with its mighty walls and wide ramp for our battle-elephants. And we did these things when your country was still a collection of thirteen small colonies, gnawing away at the edge of a continent” (102).

In addition to countering the image of the “barbarian,” Hamid’s narrative also challenges the portrayal of “the Arab” critiqued by Shaheen in Reel Bad Arabs. The flat image of the Arab/Muslim/terrorist is countered by this round central character who expresses anger toward the United States and corporate America, but who also has a complex backstory informing his anger. Changez was successful in an Ivy League school; he was devoted to a mentally ill American woman; he feels surges of national pride, and his pride extends at times to his native Pakistan and at times to his adopted city, New York. Additionally, Changez’s anger has roots that move beyond easy causality like “he hates freedom.” It also moves beyond mere “personal pathology,” which Butler says is an inadequate explanation for terrorism. Changez’s anger is rooted in systemic factors such as global corporate influence that ignores the needs of the local people and post-9/11/01 “line-drawing” that repeatedly declares him outside of the American “tribe” (117).

A teacher of this novel might also invite students to consider the role of gaze, perception, and seeing: What are the lenses through which characters (and, by association, students) look through? Our imaginations often impose identity on another, and it is our job to do as Changez has done, to take off these lenses and examine them, examine our perception, instead of focusing intently on the other. This imposed gaze is illustrated when Changez is riding in a car with his colleagues in Manila. At a stoplight, he realizes that a Filipino man of about his age is staring angrily at him through the car windows. In this moment, Changez sees himself as this other man sees him: a sell-out to his own culture. Changez then turns to a “fair-haired colleague” sitting next to him and thinks, “You are so foreign” (67). These lucid moments of self-awareness are piqued by an examination of the self in relation to another, and invite students to a similar exercise of considering oneself and one’s country from the view of “The Other.”

Viewing oneself through the eyes of another can be painful, and some scenes in this text may elicit a defensive anger from students. The most difficult passage of the novel to teach is
likely when Changez sees and responds to the planes crashing into the World Trade Center on September 11th. While students might have varied reactions to this iconic image—from anger to pain to fear and even awe—it is almost definite that Changez’s reflexive smile will make most North Americans bristle. Even his later qualification that his thoughts weren’t with the victims but “with the symbolism of it all” (73) would do little to pacify the students who closed themselves off at the mention of a smile.

In this case, Rosenblatt’s claim that meaning is a “live circuit” between reader and text is useful. As teachers, we often want to “teach over” students’ potentially negative reactions, to justify a text before students question it or to explain a controversial passage before students articulate their offense. However, Rosenblatt invites teachers to draw student resistance into the open where it can be heard, validated, and discussed. Ideally, the discussion then leads students back into the text to further complicate or develop their unstudied reactions. In the case of Changez’s smile, the narrative frame normalizes any student anger as we see the American interlocutor bristling at this revelation. Yet despite his anger, he continues to listen to his Pakistani companion; the conversation continues despite the brazen clash of perspectives.

Clearly this text is rich in examples of how it might engage adolescents in critical reflection on patriotism, national identity, and cultural values. Yet it is just one of many books that could be used in such a way. General traits of this text that might be found in other novels, poems, and stories include the following:

- a non-Western narrative perspective is privileged,
- core aspects of content complicate popular national myths,
- elements of the text provide portals for student reflection, and
- structural elements of the text support the above.

It would be far-fetched to suggest that the implementation of a single book into an English curriculum could effect profound shifts in students’ national identities. The evolution of identity is a process that spans our entire lives, and a three-week unit in high school English is a relatively small sector of anyone’s life. However, if the pedagogy and curriculum imagined here can develop even a moderately more critical orientation toward stereotypes, national ideals, and international relations, then education is one step closer to achieving its mandate to develop students as active citizens, ready to thoughtfully engage the most pressing issues of their generation.

References


“Common Core Standards for English Language Arts and Literacy in History/Social Studies and Science.” Common Core State Standards Initiative, 2011. Online. 10 April 2012.


\[1\] NCATE is an acronym for The National Council for Teacher Accreditation, soon to be CAEP, or The Council for Accreditation of Educator Preparation.
Ancient Magic and Modern Accessories: A Re-Examination of the Omamori Phenomenon

Runner-Up, 2013 Graduate Humanities Conference

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Fireworks exploded, newspapers rushed “Extra!” editions into print and Japanese exchanged “Banzai!” cheers at news of Japan’s crown princess giving birth to a girl after more than eight years of marriage… In a forestate of the special life that awaits the baby, a purple sash and an imperial samurai sword were bestowed on the 6.8 pound girl just a few hours after her birth - - along with a sacred amulet said to ward off evil spirits. The girl will be named in a ceremony Friday, after experts are consulted on a proper name for the child. (Zielenziger)

This quote, which ran on December 2, 2001, in an article from the Orlando Sentinel, describes the birth of one of Japan’s most recent princesses. In honor of her status and in preparation for her “special life” she received three gifts upon her birth, a purple sash and a samurai sword, both powerful symbols of her station, as well as “a sacred amulet said to ward off evil spirits.”

Omamori, a class of objects so tied to Japanese identity that they are one of the first gifts given to children at birth, are the focus of this paper.

Omamori, from the Japanese root mamoru, “to protect”, are objects meant to protect or benefit their possessor. Translated as talisman, amulet, or charm, and a catch-all term for any object with protective or beneficial traits, variations of omamori have been present throughout Japanese history. Omamori have evolved over time into what is today their most iconic form: small objects sold by Buddhist, Shinto and other Japanese religious institutions. These objects are generally made of wood, paper, metal or plastic, often placed inside a fabric pouch and customarily cost between three and fifteen U.S. dollars. Although there are exceptions (for example, omamori that are meant to be left in the home or the car) the majority of omamori are meant to be carried with a person at all times in which they seek that object’s aid. The proximity of an omamori to its beneficiary is key to its efficacy.

Omamori, as material objects, hold a great deal of information about the aesthetic tastes and concerns of modern Japanese society, as well as the relationship of that society with its religious institutions. More than many other world religions, Buddhism and Shintoism concern themselves with aiding the population through “this worldly benefits”, which are immediately obtainable through the acquisition of omamori. As such, the benefits these religions presume to offer society are readily visible through the omamori they offer.

Omamori are something most Japanese have owned at some point in their lives. These are not obscure objects functioning on the margins of society, but a regular component of everyday life in Japan. Omamori act as gifts which express the support and concern of family and friends towards one another; a commercial force that keeps the economies of various temples and shrines alive; representations of a “traditional” Japanese culture; souvenirs; expressions of social identity; an organic link between religion and the populace; and a means of bearing the weight of the human condition. Omamori offer people a way to combat, express and bear their concerns, and help them overcome what cannot be prevented or cured. These objects are a commodity altered in both form, the morphology and design of an omamori, and function, the supernatural benefits an omamori offers its possessor, by the concerns of the Japanese public. As such, the examination of omamori holds great
implications for furthering our understanding of Japanese society, as well as for the interaction of religion with a modernizing and globalizing world.

It is for these reasons, and others, that this paper will examine omamori as they exist in contemporary society, as well as the ways in which omamori have altered to accommodate changes in Japanese society over the last thirty years. I will examine the latter through a comparison of my findings and observations with those in Eugene Swanger’s 1981 article, A Preliminary Examination of the Omamori Phenomenon. Swanger’s article is the only work centered on omamori that has been published thus far in English and, therefore, serves as an important precursor to this paper, as well as a fitting starting point from which to identify changes in omamori that have taken place over the last three decades.

Even in such a short period of time, omamori have seen a dramatic increase in both form and function, a set of changes that has also altered the traits which make these omamori popular. Each of these three qualities (omamori’s form, function, and the reasons for their popularity) were examined by Swanger, and, for this paper, will serve as the focus of comparison between modern omamori and those discussed in his article.

Omamori are organic, they change with the society in which they are immersed. As such, an analysis of the ways in which omamori have changed in the last thirty years will offer insight into both the ways in which Japanese culture has changed during this time, as well as the ways that religious institutions saw fit to accommodate those changes through omamori.

**Omamori Through Time**

Omamori, and the ways they are conceptualized, have changed a great deal over the course of Japanese history. In the Nara period (645-784 A.D.) we find the first extant and known examples of written history in Japan, the *Kojiki* and the *Nihongi*. Both of these documents contain examples of talisman use that can be categorized as representing kinds of (or possibly predecessors to) omamori. Within these books there is a great deal of discussion deities who utilize mystical objects with a variety of useful traits. These range in form and power, and include: a bow and arrow that give life, a hammer shaped object with the ability to grant wishes, a scarf that can ward off insect and reptilian threats, and peaches that repel demons. Each of these objects benefited its user and only functioned when it was in the immediate possession of a person or deity. Aside from sharing a similar mode of use, these objects also offered benefits similar to those of modern omamori; evil-deterring omamori, wish granting omamori, and omamori for longevity, most directly.

Heian Japan (784-1185 A.D.) also has evidence of omamori use that survives through literature. Two of the more famous examples are found in *The Tale of Genji* and in a portion of *The Tale of the Bamboo Cutter* called the “Easy Delivery Charm of the Swallows”. A continued presence of protective objects and a move to their use by humans instead of deities can be seen through these two stories.

*The Tale of Genji* offers an interesting example of omamori use in popular culture from the Heian period. In this book, author Murasaki Shikibu, relays the life of Genji, a son of the emperor. At one point in his life, Genji comes down with a grave fever, and after “all sorts of spells [are] cast and healing rights done, but to no avail,” he seeks out a hermit in a mountain, reputed to be able to cure any illness.iii The ascetic then “made the necessary talismans, made Genji swallow them, and preceded with the rite”iii. Genji does in fact quickly recover from his illness with the help of these talismans.

This is one of the first cases in which there are extant examples of omamori that can be obtained with the same general form and purpose.iv Though they are rare today, Koganji Temple, in the Tokyo area, distributes this kind of talisman, which, when ingested, is said to cure illness. This modern omamori takes the same form as the one described in *The Tale of Genji*, a small slip of paper carrying the Sanskrit name of a deity.v Although I have yet to

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encounter any sources which mention similar omamori prior to the example found in The Tale of Genji, it is clear that the use of omamori was already established by the Heian period, based on their inclusion in this novel.

By the Tokugawa period (1615-1867 A.D.) charms purchased from religious institutions were carried on a person in a manner that would make the activity inconspicuous to others. Patrons of omamori wore them around their necks, in their pockets, or inside small cases that hung from their obi.\textsuperscript{vi}

Tokugawa period omamori were aesthetically very simple. Comprised mostly of a small piece of paper or wood bearing a short inscription\textsuperscript{vii}, the aesthetics of omamori does not seem to have been a driving force in their public appeal. That is not to say that quality was neglected, as there are references to the use of fine woods and high quality paper\textsuperscript{viii}, but these objects seem to have been designed for their supernatural function alone. Tokugawa period omamori were objects with a purpose, they were bought and used for that purpose, and discarded when that purpose had been fulfilled.

\textit{Omamori Today}

For the aims of this paper, I will now focus on changes in three main aspects of omamori: their functions, forms, and the ways in which they are popularized. These three aspects have been chosen because they are explicitly discussed by Swanger in his article, and because these three aspects encompass three of the most informative and organic (adaptable) aspects of omamori.

\textbf{Functions}

As times have changed, so have the functions omamori have come to serve. There are functions of omamori which have existed since as early as the Kojiki, and possibly even the Jomon period in the form of dogū.\textsuperscript{ix} These omamori functions are ever-present and represent aids to the human condition, or as Swanger puts it, “ritual sustenance of the normal order”.\textsuperscript{x} These functions include promotion of good health, longevity, deterrence of evil, the “opening” of one’s luck, relationship aids, and prosperity.

In addition to these ever-present functions, new additions have been made to the omamori roster as society and its concerns have changed. With the development of new technologies, conditional stressors, such as traveling on foot, can be abandoned by omamori functions in favor of more pressing concerns, such as driving-safety. The functions which omamori serve only persist for as long as their patrons need them; once their need has diminished they can, and have been, abandoned for more relevant stressors.

In the past century there have been at least two major developments in terms of omamori function. The first, and most apparent of these two, is the development and rampant popularity of travel/auto safety omamori. Before these, there were omamori for travelers which protected them from misfortunes (such as bandits) and from pain due to extensive walking. Today, these omamori are all but extinct, replaced by sales of omamori for safety in vehicles, most commonly cars, but also planes and bicycles. Traffic related purification ceremonies at a temple in Kawasaki went from 100 incidents in 1963 to 67,000 in 1982.\textsuperscript{xi} An increased volume in vehicular transportation, and the threat such an increase carries, has given rise to driving-safety omamori. Swanger discussed this type of omamori, and, as he noted it was then, it is still one of the most popular kinds of omamori functions available.

The second, and newest, development in omamori function is the creation of omamori for the protection of electronics and the data these carry. This type of omamori function is still uncommon; however, based on personal observations, its availability did increase between 2008 and 2010.
Omamori for the protection of electronics and their data did not exist when Swanger wrote his article in 1981, and are a result of the increased dependence society has developed on electronics since then. With the proliferation of cell phones, personal computers, and other electronics, the potential loss of information associated with these objects has become a major stressor in modern society. Due to this, people in Japan have begun to turn to religious institutions for an increased sense of security in the safety of their cyber-data. With society’s continuing dependence on electronics, it is likely that this function will quickly multiply and proliferate to the point that it may one day rank among the most popular omamori available.

Beyond the addition of new functions for omamori, the array of functions that a single temple or shrine offers has also increased since Swanger wrote his article. As Swanger put it, of the seven specific functions he identified that omamori commonly served (“traffic safety, avoidance of evil, open luck, education and passing the examination, prosperity in business, acquisition of a mate and marriage, and healthy pregnancy and easy delivery”) “seldom are all seven needs met by a single shrine or temple”. He went on to specify that omamori at Tenmangu Jinja in Dazaifu served seven different “functions”, omamori at Senso-ji in Tokyo served 6 “needs”, and omamori at Kompira Shrine in Shikoku offered omamori for forty-five “needs”. By removing Kompira Shrine from consideration, as it represents an anomalous shrine that is reputed for its array of omamori types and functions, and looking at tables one and two, we can see a trend for increase in the variety of functions offered at a sampling of today’s temples and shrines.

<table>
<thead>
<tr>
<th>Shrine/Temple Name</th>
<th>Omamori Functions*</th>
</tr>
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<tbody>
<tr>
<td>Sensō-ji</td>
<td>10</td>
</tr>
<tr>
<td>Asakusa Jinja</td>
<td>10</td>
</tr>
<tr>
<td>Hie Jinja</td>
<td>14</td>
</tr>
<tr>
<td>Inokashira Benzaiten</td>
<td>9</td>
</tr>
<tr>
<td>Hokkaidō Jingū</td>
<td>13</td>
</tr>
</tbody>
</table>

Table 1: Omamori offered at various temples and shrines in 2010

Table 2: Omamori offered at various temples and shrines as described by Swanger in 1981

<table>
<thead>
<tr>
<th>Shrine/Temple Name</th>
<th>Omamori Functions*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sensō-ji</td>
<td>6</td>
</tr>
<tr>
<td>Tenmangu Jinja</td>
<td>7</td>
</tr>
</tbody>
</table>

*The quantities for omamori functions in table 1 and 2 were derived in the following ways:

Table 1: I collected these quantities personally on site at each temple and shrine. Distinctions were made based on the advertised function of each omamori at its specific shrine or temple. For all omamori in which no description of a specific function was given, I categorized them under a single function of general purpose omamori. For omamori that were not specifically advertised for any single function, but were attributed with more than 2 functions, I also categorized them as general purpose omamori. In the case that a temple or shrine advertised an omamori for a single specific purpose, however, written on the omamori were additional attributes, I categorized them under the function as advertised by the temple, rather than as general purpose omamori. I did not condense any omamori functions into categories, for instance, if a shrine had an omamori for recovering from an illness, one for good health, and another for longevity, even though all of these functions pertain to health, they were left as distinct functions. The only time I condensed functions was when an omamori was attributed...
with the same function as another, for instance, each of these temples and shrines had more than one omamori specifically for driving safety, thus all driving safety omamori would be categorized under a single function.

**Table 2:** These quantities were taken from Swanger’s article “A Preliminary Examination of the Omamori Phenomenon”. In this article he gave numbers for what he called omamori functions, but did not elaborate on how he obtained these numbers or delineated between functions.

Senso-ji alone has increased its repertoire by 4 functions, and the other 4 shrines have 4-7 more functions than Tenmangu Jinja did. The shrines chosen for comparison range in fame and size from smaller and less famous to larger and more famous than Tenmangu Jinja, and show that even smaller and less frequented shrines serve more functions today than Tenmangu Jinja did when Swanger performed his analysis.

Although the source of this rise in the variability of omamori functions is difficult to identify, there are two likely causes. The first is that the proliferation of mass manufacturing has created such ease in the production and acquisition of various omamori that temples and shrines see no reason not to offer a wider array of functions, which would appeal to the concerns of a broader set of patrons. This explanation alone, however, seems insufficient. It is likely that this reasoning is encouraged by the results of what is often argued to be a growing lack of belief in these objects by the Japanese population. This issue will be discussed further, but for now, it is important to understand that there are many people, if not most people, in Japanese society who claim that the act of purchasing omamori is not a religious act but a societal custom.xiv

If one accepts this premise, the persistence of this custom is often attributed to the act of obtaining omamori as a souvenir and/or gifting omamori to show your concern or support for someone, generally family. xv When someone is going through something difficult, stressful, or dangerous, a way to express one’s concern and support for that person is to gift them an omamori with a function relevant to their issue. I believe that this rise in gift giving, as a motivation for purchasing omamori, represents one of the main reasons that shrines and temples have increased the variety of functions they offer since Swanger wrote his article. With a decreased importance given to belief in the potency of omamori, the reputation of that institution for a specific purpose would diminish in importance as well. A greater variety of omamori functions would allow any temple or shrine to offer a patron an omamori that would address the concerns of their loved one(s), giving shrines and temples a one-stop shopping feature.

**Form**

Industrialization and technological advancement have altered omamori’s form as well. Originally produced by lay womenxvi, omamori are now almost entirely produced by large secular manufacturing companies that specialize in the production of religious objectsxvii. The switch to secularized manufacturing is due to both an increase in popularity, and the ease of long-distance travel. The high demand for omamori has made it impossible for temples and shrines to continue using their laity for omamori production.xviii This transition from laity to industry caused Peter Takayama, who wrote the supplemental remarks for Swanger’s article, to project that maintaining an aspect of uniqueness in omamori for individual temples and shrines was unlikely.xix His projection, however, did not come to pass. Although mass manufacturing has produced a degree of ubiquity amongst omamori, one rarely encounters an omamori with the same form and function at more than one temple or shrine.xx
The visual aspect of *omamori* has become extremely significant. As stated above, earlier in their history, *omamori* took on very practical forms — a small piece of wood, or paper with a prayer or the name of a deity written on it. The only apparent concerns for aesthetics were in the quality of wood and paper used to create the *omamori*, likely done to avoid the charm’s potency being called into question due to poor craftsmanship. In modern times, however, *omamori* have seen a drastic change in their form. As the circumstances and beliefs of Japanese culture have changed, so have the aesthetics of *omamori.*

Previously, *omamori* needed be little more than objects which brought about a desired effect. If a person was being haunted or came down with an illness, that person bought an *omamori* to alleviate their problem, carried it with them, and kept it hidden until it served its purpose. Today’s *omamori* have changed a great deal. In addition to carrying religious power, *omamori* have now become objects of personal adornment.

The first major change made to modern *omamori*, which was also discussed by Swanger, was the addition of a cloth pouch. It is a long standing belief in Japan, especially within Shintoism, that deities inhabit hollow and dark places - hollow trees, mountains, and the inside of stones for example. Since an *omamori* carries the essence of a deity, it was believed that for that essence to remain in the charm, the individual would have to keep the *omamori* in a dark place, hidden from light. Since the part of the *omamori* inhabited by a deity’s essence was now constantly enclosed in a dark place, a cloth pouch, it was no longer necessary to keep the *omamori* hidden.

With this innovation, the potential for *omamori* changed a great deal. Not only could *omamori* aid its possessor, it could now also be made visible, advertising for the temple and allowing the person to use the *omamori* as an accessory. These uses for *omamori* were not discussed by Swanger, and likely represent more recent phenomenon. Based on Swanger’s article, *omamori* at the time he did his research were used in a manner similar to the way they had been before, kept inside a bag, pocket, or wallet, and generally hidden from sight. What likely popularized *omamori*’s transformation into an accessory since then was the development of bumper sticker and adhesive *omamori* for cars, and *keitai*-strap *omamori* for cell phones, electronics and their cases.

Cell phones have become one of the most personalized objects in Japanese culture. A cell phone in Japan, especially for young people, is “more than just a tool, it is something they are highly motivated to animate and customize as a dream catcher, good luck charm, an alter ego, or as a pet.” This fad was seized by shrines and temples, which turned *omamori* into objects meant to be hung from one’s cell phone, keys, bag or adhered to a car. Putting *omamori* in plain sight, and selling them as something that would be visible to others, created a need for shrines and temples to make *omamori* more attractive.

One of the ways that this attraction is achieved is through the use of popular culture. For example, the use of cute culture, the adoption of popular characters like Hello Kitty, Abe no Semei (popularized by graphic novels and a set of films), and Sakamoto Ryoma (popularized by TV dramas, films, and graphic novels) and the variety of colors and styles available to choose from are all ways in which *omamori* have been altered to accommodate popular demand.

Since Swanger wrote his article, cute culture has become such a significant element of Japanese popular culture that, in 1992, the word kawaii (cute) was “estimated to be the most widely used, widely loved, habitual word in modern living Japanese.” Cuteness in Japan is said to be represented by “being small, soft, infantile, mammalian, round, without bodily appendages, and without bodily orifices (e.g. without mouths)...” The dramatic spread of cute culture since the 1980s left few objects unchanged, there were even houses one could purchase especially marketed for their embodiment of cuteness. This new aesthetic craze was not to leave behind *omamori*. Through their aesthetics, *omamori* become a collective embodiment of kawaii (cute) culture.
It has become nearly impossible to visit the amulet counter at a temple or shrine and not encounter a wide array of cuteness. The twelve animals of the Chinese zodiac are made into characters one would expect to see in a children’s book (Figure 1), warriors of legend are turned into little cloth characters with tiny limbs (Figure 2), and Jizo, a deity, is turned into a small, round, chubby snowman-like figure (Figure 3). With the rebellion towards growing older and gaining responsibility in Japan finding its expression largely based in cuteness, Japan’s consumption of cute culture is enormous, and the creators of omamori do not fail to take advantage of this situation.

Part of cute culture, the popular Hello Kitty character is one of the only non-religious figures to permeate omamori. There is in fact one shrine in Tokyo in which more than half of the types of omamori sold there feature Hello Kitty. Hello Kitty is undeniably one of the most powerful marketing characters of Japan’s post-war generation. Representing a billion-dollar industry, she successfully crosses the age gap, appealing to children as being cool, adolescents as being cute, and adults as being nostalgic. Hello Kitty is so powerful that a
study from Tôyô Gakuan University in Japan showed that when asked, people who claimed not to like Hello Kitty often owned something with her likeness on it, and act as though they like her around others. The Hello Kitty trend is so powerful that people feel obligated to be fond of the character. As I have stated, this marketing power and love from her fans is understood and utilized by temples and shrines that feature her on their omamori.

Color variation is also a highly used means of making omamori appealing. There are many religious institutions that offer the same talisman in a variety (generally 2 or 3) of colors, and an array of other charms that can complete the color rainbow. The purchasing of omamori today can be dictated solely by their attractiveness to a patron or tourist, and in various cases are purchased as souvenirs, even collected. The reality is that, omamori have become accessories, and must accentuate images that individuals with to project.

It is clear that these changes have affected the variety of omamori forms (their morphology and design) available at temples and shrines. The increased importance in aesthetics, due to the new application of omamori as accessories, has resulted in a dramatic increase in the selection of omamori one has to choose from. Swanger described Senso-ji as having 15 “forms” of omamori and Tenmangu Jinja as having 19 different “kinds” of omamori. The ambiguous nature of Swanger’s language makes certainty in cross analysis impossible, as he did not specify what constituted a kind or type of omamori in his assessment. However, some comparisons can still be made.

<table>
<thead>
<tr>
<th>Shiné/Temple Name</th>
<th>Types of Omamori</th>
<th>Absolute Number of Types</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sensō-ji</td>
<td>16</td>
<td>37</td>
</tr>
<tr>
<td>Hie Jinja</td>
<td>22</td>
<td>51</td>
</tr>
<tr>
<td>Hokkaidō Jingū</td>
<td>29</td>
<td>40</td>
</tr>
<tr>
<td>Inokashira Benzaiten</td>
<td>14</td>
<td>21</td>
</tr>
<tr>
<td>Asakusa Jinja</td>
<td>18</td>
<td>37</td>
</tr>
</tbody>
</table>

*Table 3: Omamori Offered at Various Temples and Shrines in 2010*

<table>
<thead>
<tr>
<th>Shiné/Temple Name</th>
<th>“Kinds of Omamori”</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sensō-ji</td>
<td>15</td>
</tr>
<tr>
<td>Tenmangu Jinja</td>
<td>19</td>
</tr>
<tr>
<td>Konpira Shrine</td>
<td>77</td>
</tr>
</tbody>
</table>

*Table 4: Omamori Offered at Various Temples and Shrines as Described by Swanger*

In table 3 I have provided two sets of tallies for each of five temples and shrines. The first set, categorized as “types of omamori,” includes a tally of omamori which differed in any combination of shape, design motif or function. I condensed omamori which were identical in every way except color variation or size, combining those into a single “type”. I also condensed omamori which were of the same form and style, but varied based on the recipients’ year of birth, i.e. if there were 12 omamori, one for each animal of the Chinese zodiac (see Fig. 1), or 9 omamori, one for each of the Buddhas/bodhisattvas one might be born to, the set was condensed into a single “type” all 12 or 9 omamori respectively counting only as 1. The second tally, “absolute number of types,” does not make this distinction. I
counted each omamori offered at a shrine or temple as one, thus including all of the omamori excluded in the “types of omamori” tally. xxxvii

As stated, Swanger failed to discuss the way in which he counted types of omamori, and thus, it is impossible to state with certainty whether his numbers match my “types of omamori” or “variety of types” categories. However, based on context, and the fact that Swanger counted 77 different “kinds” of omamori at Kompira Shrine, I will be working off the assumption that his “kinds” match my “absolute number of types” category.

Even this assumption, we can see a dramatic increase in the variety of omamori forms available for purchase at a given shrine, again, removing Kompira Shrine from the equation as an anomaly. At Sensō-ji, in the last thirty years, omamori forms have increased from 15 to 37, more than double what the count had been. We see similar numbers in contemporary shrines, the closest to Swagner’s counts coming from Inokashira Benzaiten, a much smaller and less frequented shrine than any of the others discussed by myself or Swanger. We can see from the changes discussed in this section, most significantly the use of omamori as objects of adornment, that the variability of omamori forms offered at a single shrine or temple has increased dramatically in the last 30 years.

Popularization of Omamori

The final aspect of omamori that I will discuss here is the modes by which temples and shrines popularize omamori. The popularization of omamori was discussed by Swanger, and the ways in which it has changed over the last thirty years say a great deal about contemporary Japanese society.

Association with the past has a great deal to do with the popularization of omamori. It can be hard, for many, to deny that a tradition which has survived for over a thousand years is correct. xxxviii Using images and stories that tie a temple, shrine, or specific omamori to a past supernatural power or event, creates a degree of justification for belief in that power. This in turn makes omamori use more defendable to oneself and others, and thus more publically acceptable. xxxviii

These stories create a framework, a justification and a tradition for the belief in the mystical potency of objects. xxxix They imply another time and place, in which mystical energies and divine magic were both powerful and commonplace. xl The stories then proceed to tie supernatural beings to this world by making them the deities of it, and by making the land in which many of the stories took place Japan itselfxli.

An important example of how supernatural power is tied to the Japan inhabited by humans, and then used for omamori, can be found in the Kojiki’s story of the deity Izanagi fleeing the land of the dead after having broken his vow to the deity Izanami. Izanagi is being pursued by “the eight thunder deities and a horde of warriors of Yōmi” and arrives at the foot of a pass.xlii Upon arrival, Izanagi “took three peaches which were there and, waiting for his pursuers, attacked them with the peaches. They all turned and fled. Izanagi-nō-mikötō said to the peaches: “Just as you have saved me, when, in the Central Land of the Reed Plains, any of the race of mortal men fall into painful straits and suffer in anguish, then do you save them also.” xlii

In this portion of the story of Izanami and Izanagi, there are a multitude of interesting inferences that can be made. In this story, what was used as an amulet was not originally a possession of a god, but rather a fruit found in its natural state. Many other examples of talismanic objects from the Kojiki are items that were owned and utilized by deities with no reference to humans. The story of the peach allowed for objects in nature to hold inherent mystical power, as well as for the employment of that power by humans. This helped lay the
groundwork for many modern omamori which contain pieces or symbols of objects found in nature, such as trees, seeds, and the peach itself, which are said to empower them.

In his article, Swanger discussed the importance of a good engi, or back story, to justify and popularize omamori, and this persists as one of the features which make an omamori marketable today. People will still travel from all over Japan to visit a temple or shrine that is famous for a given omamori, a popularity that is often rooted in some kind of engi. Though engi are extremely important to the popularization of omamori, changes in popular belief about omamori and their efficacy have influenced the creation of new methods of popularizing omamori.

Today, religion itself is a matter of great debate among scholars studying Japan and its people. It has become commonplace for Japanese people to say that they are not religious, often stating that they do not actively practice any specific religion, and any activities they partake in that may be construed as religious are nothing more than tradition and habit. In such a modernized society, it is often seen as old-fashioned to consider oneself religious, with many people only visiting a local temple or shrine for special occasions, like New Year’s and Obon festival, and at times of need, like before college and high school entrance exams.

Although many Japanese are passionate about their claim to be non-religious, their actions seem to betray them. It is from this modern controversy that the current perceptions of omamori have taken shape. Even though most Japanese claim to be non-religious, many still visit temples and shrines and partake in the purchasing of omamori. There has been much debate over the actual religiousness of this activity, and there are two arguments made for the secularity of purchasing omamori.

The first is that, for many people, omamori are no longer considered to be magical, and are believed to hold no power of their own. They are purchased, instead, to follow in the tradition of showing your consideration to someone by gifting them an omamori. This case is especially true for parents or grandparents, and their children. Through the gifting of omamori, a person is given the opportunity to express his or her feelings toward others, especially those of concern and encouragement. When giving someone an omamori for success on a final exam, you are not necessarily offering them something you think will give them a supernatural edge, but showing them that you are concerned and invested in their success and prosperity.

The second, and rather contradictory, argument against the religiousness of the act of obtaining omamori is that omamori are believed to hold no supernatural power. However, with their long history in Japanese culture and their ties to religion, there is a chance that they may have some power, so one should buy them “just in case”. It is true that omamori are a gift which allows someone to show concern for an individual. To a sick loved one you give a health charm, and travel safety charm to a child going abroad. In addition to showing concern, however, there is considered to be a small chance that the folklore about omamori is true. It is this sort of practical thinking which has allowed omamori to maintain their status as potentially powerful objects, for, though they are unlikely to have any power, their deep history in Japanese culture gives them too much credibility to be regarded as pure myth.

Though there are people who fully believe in the efficacy of omamori, what I have attempted to show here are popular opposing views within and without Japanese culture that have had a significant effect on omamori’s conceptualization and status. This debate over their religiosity has given rise to new, secular reasons for the popularization of omamori which should not be ignored.

Today, it is not uncommon for people to purchase omamori primarily as souvenirs, accessories and collectables, their potential religious benefits acting as a nice bonus or even a non-issue. Though support of this motivation by religious institutions is rarely verbalized, acceptance and accommodation of this type of omamori purchasing can be seen in the omamori offered by temples and shrines today. Religious institutions offer omamori that
depict a famous garden, scene, or aspect of the temple or shrine to serve as souvenirs of the place or a festival.

The public aspect of omamori is extremely significant in the reserved social atmosphere of Japan. Showing one’s true nature, or the ties one has to religion is a very revealing act, something that is not taken lightly. Taking this into consideration, omamori can be thought of as coming in two basic forms, traditional – those which are plainly religious in nature from their appearance; and non-traditional – omamori which take the form of an animal, character, or object, which are only verifiably religious upon closer inspection. The use of a traditional omamori makes it clear to those around an individual that he or she is employing a religious object. Non-traditional omamori, however, are far more discrete. These omamori tend to look identical to secular cell phone charms that can be bought at shopping centers and souvenir shops, and which carry no institutional religious ties. Often the only way to know if a non-traditional omamori is in fact an omamori to look at the small silver or gold tag attached to the strap which carries the name of the temple or shrine where it was purchased. The discretion, and often exaggerated cuteness or coolness of these charms in particular, makes them the ideal talisman for someone who wishes to use an omamori, but do so inconspicuously.

The rapidly changing degree of faith in Japanese society has allowed omamori to become popular for reasons which do not seem to have come into play to such a degree for Swanger. Trends for accessorizing and cuteness, which experienced heightened growth after Swanger’s article, made room for the popularization of omamori for non-religious reasons, focusing on their appearance rather than their religious functions. The greater degree to which open religiosity has come to be seen as old-fashioned has created space for the popularization of omamori which are not plainly religious. Again, there are many people who believe in omamori and seek them out for the powers they are attributed with. I have not attempted to privilege non-religious motivations for purchasing omamori, but, instead, to illustrate one of the ways that they have changed over the last thirty years to accommodate a changing society.

Conclusion

Several changes have taken place since Swanger wrote his article, which have dramatically altered omamori. A rise in mass production and the changing aesthetic preferences of the population have created greater variability in omamori form and aesthetic. A rise in dependence on technology has created a new function for omamori. The mass use of cell phones created a niche for keitai (cell phone) strap omamori to fill, a development which also helped bring omamori into the realm of personal adornment objects. Finally, changes in beliefs surrounding omamori have created new reasons for the popularization of certain omamori that either did not exist or were too sparse for Swanger to deem worthy of inclusion in his analysis.

Omamori are a patron-driven commodity. They have changed form and purpose over time along with the society in which they exist. With a reduction in attesting to belief in supernatural powers, omamori became gifts offered to show people your concern and consideration for their plights. With a rise in popularity of cute and accessorizing objects, omamori’s forms have changed to fill this desire. With the adoption of new technologies, and thus new stressors, omamori have also adopted new functions such as the driving safety and the protection of electronic data. The ability of omamori to adapt in these ways is a significant reason why a tradition tied to ideas that might be considered magic has persisted into modern times. In depth research into omamori would greatly enhance the understanding of the concerns, lives, and tastes of various periods of Japanese history. Omamori deserve a closer examination from the social sciences and humanities to bring attention to an
understudied piece of material culture that can greatly inform us about present and past peoples of Japan.

This class of objects can no longer be allocated to the sidelines of academia. Researchers must create a systematized way to count and organize *omamori* so as to make comparative research possible, a problem discussed in the form and function sections of this paper. In addition, the beginning stages of the lifecycle of *omamori* need to be explored to better understand the relationships between modernization and religions, as well as the local versus national associations of *omamori*. Are these objects designed and produced by companies who distribute them throughout Japan? Or are at least some *omamori* still designed by individual temples and shrines?

A better understanding must also be sought as to the conceptualizations of these items by both the religious institutions that disseminate them and the populace that uses them. Beyond simply asking whether or not these are believed to function in a supernatural manner, reasons for their aesthetic, functions, and popularity can give us significant insight into the relationship between society and religion. *Omamori* have a great deal to tell researchers about both present and past societies, and once we are able to broaden our perspectives and refine our methods when dealing with these amulets they will prove to be an invaluable catalyst to expanding our understanding of Japanese society, and possibly the interaction of humans with amulets on a global scale.

Appendix 1
Appendix 2

Asakusa Jinja Omamori - Absolute Number of Types

\[ \begin{align*}
&+ + + = 3 \text{ color variation} \\
&+ = 2 \text{ color variation} \\
&+ = 2 \text{ color variation} \\
&+ + + + = 4 \text{ color and size variation} \\
&+ + + + + + + + + + = 12 \text{ design variation} \\
\end{align*} \]

Appendix 3

Senso-ji - Types of Omamori

\[ \begin{align*}
&+ + = 1 \text{ color variation, but, identical size, design, and benefit} \\
&+ + + = 1 \text{ color/metal variation, but, identical size, design, and benefit} \\
&+ + + + + + + + = 1 \text{ design variation as a result of recipient's birth year} \\
&+ + + + + + + + + = 1 \text{ design variation as a result of recipient's birth year} \\
&1 1 1 1 1 1 1 1 1 1 = 12 \text{ benefit and/or design variation} \\
\end{align*} \]
Appendix 4

**Senso-ji Omamori—Absolute Number of Types**

\[ + + = 2 \text{ Color variation} \]

\[ + + = 2 \text{ Color/Metal variation} \]

\[ + + + + + + + + + = 9 \text{ Design variation} \]

\[ + + + + + + + + + + + + + + + = 12 \text{ Design variation} \]

\[ \text{Benefit and/or design variation} \]

References


Philippi, Donald. (1968) *Kojiki*. Tokyo, Japan: University of Tokyo Press.


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i Zielenziger
ii Murasaki, pg 83
iii Murasaki, pg 83
iv See Chamberlain (1893), 363, and discussion of omikage omamori distributed by Kōganji which is “a small paper image of Jizō designed to be swallowed or stuck to the skin at the point of the affected area” Swanger 1981: 242
v Murasaki, pg83
vi Miyake, pg 69; and Traphagan, pg 114
vii Swanger, pg 240
viii Hur, pg 41
ix Habu, pg 142-144
x Swanger, pg 237
xi Reader, pg 190
xii Swanger, 239
xiii Swanger, 239. In his article, Swanger uses the words “function” and “need” interchangeably to describe the supernatural benefit(s) offered by an omamori. For the purpose of clarity, however, in this paper, when discussing omamori, function will always refer to the supernatural functions omamori are attributed with (i.e. driving safety, longevity, opening luck).
Personal observation from informal fieldwork in 2008 and 2010 which included the visitation of over 100 temples and shrines throughout mainland Japan and Hokkaido.

See Appendix 1, 2, 3, and 4 for an illustration of this process for Asakusa Jinja and Sensō-ji.