Religious Beliefs and Mental Health Perceptions

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Abstract

The present study investigated the negative perceptions and prejudice between religious and non-religious groups, and how these overlap with mental health stigma. Atheists are considered one of America's most detested groups and are perceived as untrustworthy and a threat to moral values due to having no religious beliefs. Within some religious groups, people with mental illness are perceived as being demonically influenced, lacking true faith, and being disobedient to their religious doctrine. Using an online survey platform, participants (N = 175) completed mental illness prevalence rating questionaries for four religious and non-religious groups: Catholic, Protestant, Muslim, and Atheist/ Non-Religious targets. Participants also completed a religiosity questionnaire, competence and warmth scale, and mental health stigma measure. Religious groups were more likely to give higher mental illness ratings to atheists and lower mental illness ratings to other religious groups, and religious groups gave atheists higher competence and lower warmth ratings. Further research can explore mental health stigma in the context of religion and prejudice toward different religious and non-religious groups.

Religious Beliefs and Mental Health Perceptions

Prejudice and biases held toward people with different beliefs are found throughout societies across the world. There is a conflict between religious groups regarding who practices the right religion, and this can negatively impact the smaller religious groups or non-religious people. Specifically, atheists are one of the most disliked groups in the United States (US) and other countries experiencing prejudice, discrimination, and mistreatment. People with mental illness are also mistreated with negative perceptions attributed to them. Mental health stigma can result in mistreatment of people with mental illness, often blaming them for what they are experiencing and ostracizing them. Atheists and people with mental illness have these experiences in common. The status and labels that come with atheism and mental illness are associated with stigmatization, prejudice, and discrimination. The purpose of this study is to evaluate the negative perception of religious and non-religious groups toward one another and how this can relate to mental illness.

Perceptions of Atheists/ Non-Religious People

Religious values are one of the most important things in the lives of many people. There are also people with no religious beliefs and their morals and values come from outside religion. Atheism is the disbelief in the existence of a God or gods. Academic research on atheists was relatively scarce before the early 2000s. Only 100 scholarly articles were published on the topic of atheism from 2001 to 2012 and the portrayal of atheists and non-religious individuals during this time was critical or dismissive (Brewster et al., 2014). Estimates of the number of atheists in America have been inconsistent in the last 20 years. In 2010, 1.6% of American adults identified as an atheist, and this number increased to 4% in 2019 (Pew Research Center, 2010; 2019),

however, there has been more research in the last several years to see if the numbers are lower due to data being underreported.

Gervais and Najle (2018) hypothesized that the numbers are underreported due to those who identify as atheists not wanting to reveal themselves. Rather than using a single self-report question asking if someone believes in God, they created three sets of statements where the participants had to answer how many were true. The first set was questions like “I exercise regularly” and “I eat meat.” The second set added the question “I do not believe in god.” The third one replaced the additional question from set two with “I do not believe that 2 + 2 is less than 13.” They used a method called unmatched count technique (UCT), that can indirectly infer rates of socially undesirable or unacceptable outcomes and beliefs. People were more likely to indicate that they do not believe in God because it would be a part of the number of statements, they believe to be true. From this study, they concluded that 26% of the US population could identify as atheists from the results of the UCT method. The results may indicate that atheists felt safer or more comfortable stating their disbelief in a god in a subtle way.

Many people hold strong negative stereotypes about atheists. Atheists have been described as among America's most “detested” groups (Edgell et al., 2006). They have been described as judgmental and narrow-minded (Harper, 2007), untrustworthy (Gervais et al., 2011), more antipathic (Swan & Heesacker, 2012), narcissistic (Dubendoff & Luchner, 2017), immoral (Edgell et al., 2006; Gervais, 2011), and a threat to moral values (Cook et al., 2015). The negative assumptions about atheists have affected how they are treated personally by others, and how they are viewed and treated by the public.

When an American sample was asked about supporting an atheist presidential candidate, 53% of people said they would be less likely to support the atheist candidate (Pew Research Center,

2014). There was more support for a gay or lesbian candidate (27%) and a candidate who was having an extramarital affair (35%) compared to an atheist candidate. When asked about their child marrying an atheist, 48% of people would not approve (Edgell et al., 2006). Generally, the perceptions of atheists are based on assumptions regarding their character and their character can be questioned by others who may not trust them.

Gervais (2011) conducted multiple studies to evaluate the extent to which atheists were perceived as untrustworthy. Participants believed the description of an untrustworthy person was more accurate for atheists than other groups such as Christians, Muslims, homosexual men, feminists, or Jews. The only group viewed on the same level as atheists included those with a track record of distrust, such as rapists. Having atheists and rapists on similar levels of untrustworthiness and immorality shows the extent to which people will judge and distrust atheists. When describing immoral acts that are considered socially unacceptable or illegal, such as rape or murder, atheists are also perceived as committing those acts (Edgell et al., 2006; Gervais, 2011) and lacking morality (Brown-Iannuzzi et al., 2017; Cook et al., 2015; Edgell et al., 2006).

These stereotypes and perceptions of atheists impact how they are treated and whether they are accepted by others. Compared to religious and community-based groups, atheists are less likely to be welcomed publicly (e.g., large gatherings, social groups) and privately (e.g., family and friend's spaces) are more likely to be rejected (Edgell et al., 2006). This view of atheists can manifest in different forms of discrimination. When surveying atheists on the types of prejudice they had experienced, Hammer et al. (2012) found 29 different forms of discrimination experienced by atheists. The most common were slander, coercion, social ostracism, hate crimes, and denial of opportunities, goods, and services. These forms of

discrimination varied from being more direct (e.g., being told one's atheism is sinful and immoral) or more indirect (e.g., being expected to participate in religious services or attend religious services against one's wishes). These forms of discrimination can take place in many parts of an atheist's life, from their close family and friendships to their workplace and society as a whole.

When evaluating the extent of anti-atheist prejudice and discrimination, the workplace has provided important insight. For example, when applying for jobs, atheist candidates received 49% fewer emails and 43% fewer phone calls than the controls as other religious groups (Wallace et al., 2014). Atheists received significantly fewer e-mail contacts than Muslims and both groups had equally low chances of getting a response when reaching out to employers who contacted them. Atheists had the second-lowest overall preference rating from employers, with Muslim applicants being the lowest. The presence of discrimination within a workplace can impact which groups are viewed as more important or more valuable.

In the workplace, an atheist's lack of religious expression can be met with less tolerance compared to other religious groups such as Christians, Jews, and Muslims (Halper & Scheitle, 2021). Atheists and different religious groups are compared to one another, and this trend can affect how trusted and accepted atheists are in their workplaces, as one example (Edgell et al., 2006; Gervais et al., 2011). When giving a hypothetical scenario to the participant and whether they would accommodate an employee's request regarding beliefs, the participants were more likely to resist accommodations for atheists compared to Christian, Jew, and Muslim employees (Rios, Halper & Scheitle, 2022). This resistance was due to participants viewing atheists as a threat to the values and beliefs of other groups. Scenarios like these contribute to atheists feeling like "others" in the workplace and their society (Edgell et al., 2006).

Gervais et al. (2017) conducted studies looking at anti-atheist prejudice on an international level to see if there are trends in countries ranging in religiosity. Most people in countries with national churches or a high population of religious people perceived extreme moral violations as being indicative of atheists. While prevalent in religious societies, this was also a perception among people living in more "secular societies," countries with a higher population of non-religious citizens. In secular nations like Australia, China, the Czech Republic, the Netherlands, and the United Kingdom, atheists were more likely to attribute immoral acts to other atheists than people with religious beliefs.

Animal torture, serial killing, and mutilation were used to test moral bias since participants—including atheist participants—intuitively linked atheists with these heinous crimes (Gervais et al., 2017). These findings demonstrate that religious belief is considered a vital defense against the temptations of immoral behavior and that atheists are generally viewed as morally corrupt and dangerous. Others believe that having faith in a god is a sufficient moral barrier to prevent immoral behavior (Brown-Iannuzzi et al., 2017; Cook et al., 2015; Edgell et al., 2006; Gervais, 2011). However, not all people will treat someone of a different religion kindly based on having religious beliefs. There are scenarios where people of one religion will accuse the other of heinous actions and have negative perceptions of them.

Perceptions of Muslims and Islam

There are examples of prejudice and discrimination happening to other people with religious beliefs from other religious individuals. A specific example is Islam. Islamophobia is the negative feelings and behaviors that indicate fear and hatred toward Muslims and Islam (Ogan et al., 2014; van der Noll & Saroglou, 2015). These attitudes are found in many Western countries and have been present for centuries, however, these attitudes increased significantly

following the 9/11 attacks in the United States (Ogan et al., 2014). Acts of violence by terrorists were followed by increasing anti-Muslim and anti-Islam attitudes across many countries. Before these events, most anti-Muslim sentiments were from Christian populations in Europe, and now anti-Muslim sentiment spread in the US, and Canada, and continues across Europe.

Across Europe, anti-Muslim prejudice is still prevalent (Kayla, 2019; van der Noll & Saroglou, 2015; Zick et al., 2011). Many countries in Europe have a national church, and this can negatively impact the tolerance of Islamic practices. Kayla (2019) revealed that in European countries with a national church, normalizing Islam as a part of society increased anti-Muslim prejudice. In contrast, in countries without a national church, normalizing Islam as a part of society leads to more tolerance of Muslim populations. Across these countries, whether there is or is not a national church, political instability contributes to anti-Muslim prejudice and discrimination.

Conflict within politics and political parties are other reasons behind anti-Muslim prejudice. Right-leaning political parties like the Republican party in the US or the Alternative for Deutschland (AfD) in Germany have held rallies and protests that speak out against the lack of action taken against Muslim minorities and "illegal immigrants" in their country (Zick et al., 2011). Some European countries also have called to restrict the dress of Muslims, specifically the hijab and niqab which are head and face coverings worn by Muslim women. In 2004, France enacted a law prohibiting the wearing of religious symbols or clothing in public schools to promote secularism and sexual equality (Zalnieriute & Weiss, 2019). The United Nations allowed this as long as it did not lead to discrimination among students, and this led to political and legal tensions. There was outrage from the Muslim community, and they expressed their frustrations about how this could lead to prejudice and discrimination against Muslim children

and youth. One of the biggest contributors to this tension and other attributes of anti-Muslim prejudice and discrimination is how this information was portrayed and framed.

Media coverage of Muslims after 9/11, especially Muslim Americans, contributed to harmful stereotypes and fueled prejudices (Smith, 2013). Media outlets, usually right-wing, were alleged to use Americans' fear to shape public opinions. Additionally, it was suspected that this tactic would increase views on their networks from those who were fearful of terrorist acts. There was growing evidence of an imbalance in media coverage and increasing negative coverage and perceptions of Muslims and Islam among American audiences. Between 2002 and 2010, there was an increase in negative coverage of Islam that coincided with partisan differences in faith (Organ et al., 2014; Smith, 2013).

Smith (2013) observed the interactions between the news cycle, partisan affiliation, and faith, and identified three likely explanations for these interactions and their effects on American audiences. First, there was patronizing behavior from Democrats and Republicans toward partisan media outlets that increased tension. The disagreements were not always faith-based, however, there was a difference in opinions regarding faith being used in secular media outlets and politics. Second, right and left-leaning media outlets changed their framework used to represent Islam and Muslims more negatively for a decade, leading to their coverage being more effective in convincing viewers. Media outlets used many sources to construct and frame ways to represent Islam and Muslims that built a foundation for misconceptions regarding how people viewed them. Last, people with less personal knowledge of different faiths were more susceptible to competing representations. Islam was not as common as Christianity in the US, and the tension between both of these religious groups allowed Christianity to shape the perception and suppress some ways that people could learn about Islam (e.g., limiting the

teaching of Islam in religious courses in schools). The way that Islam is framed and how much people learn about it has an impact on how Muslims are perceived.

One difficulty with how people learn about Islam is the arguments about its inclusion in the school curriculum alongside other religious disciplines (van der Noll & Saroglou, 2015). Generally, racial intolerance of any kind from someone of any religious belief is associated with a decreased likelihood of supporting Islamic religious education in school, especially in non-Muslim majority populations. The combination of political conflict, media framing, and religious disputes contribute to how anti-Muslim prejudice continues to impact many who practice Islam and want to freely express their religious beliefs. Prejudice, discrimination, and mistreatment of any kind can harm the person's well-being and how they see themselves regarding their identity.

Well-Being and Identity of Atheists

Well-being and identity can play an important role in how someone may view themselves. Brewster et al. (2020) identified a strong correlation between stigma consciousness and internalized anti-atheism. An atheist's personal experience of discrimination and perceptions of atheists as a vilified group were associated with lower psychological well-being (Doane & Elliot, 2014). Negative perceptions like this can impact their identity and whether they decide to disclose their identity can impact their well-being (Abbot & Mollen, 2018; Doane & Elliot, 2014; Mackey et al. 2020). Atheists may handle discrimination by strengthening their conviction that their atheism is significant and integral to who they are (Doane & Elliot, 2014). This process of rejection and identification may ultimately safeguard well-being by lessening the detrimental impacts of prejudice. However, the concealment of a marginalized identity can reduce direct experiences of discrimination among isolated atheists.

A person's religion has an impact on their stigma awareness and self-reported identity concealing. Abbot and Mollen (2018) found that less identity disclosure, more identity concealment, and poorer mental and physical health were all related to higher levels of stigma among atheists. More disclosure, less concealment, and greater psychological and physical well-being were all correlated with stronger ingroup links, such as a sense of connectivity with other atheists, and higher ingroup affect, or good emotions linked with one's atheist identification. Familial relationships are important to whether they positively or negatively affect the well-being and identity of an atheist family member, especially if that family member is experiencing anti-atheist prejudice (Brewster et al., 2021). Those who have identified as atheists for longer periods may find it easier to come out to the family about their atheism, but coming out to religious family systems can cause stress and tension, adding to the stressors that atheists experience.

Hammer et al. (2012) deduced four “minority stressors”, stressors faced by a stigmatized or marginalized group, that atheists can experience. The purpose of these stressors was to provide a more detailed explanation of some of the stressors that atheists experience and the impact on their well-being and mental health. Those stressors include assumed religiosity, lack of a secular support structure, lack of church and state separation, negative effects on family, unreciprocated tolerance, and anticipatory stress. Assumed religiosity can emerge from social situations where another person uses phrases or terminology to assume the other person is religious, especially regarding tragedy (i.e., keep them in your prayers) or death (i.e., they are in a better place now). The lack of a secular support structure can indicate a lack of opportunities for volunteer work or charity that does not have a religious component or a lack of recognized holidays that do not focus on religious beliefs. Lack of church and state separation ranges from having religious activities in public schools to the use of the religious doctrine in state or federal

government proceedings, despite diverse religious and non-religious groups. Negative effects on family mean the stress from a family due to concern for an atheist family member experiencing harassment or tension in a family due to discourse from one member's atheist identity or lack of religious beliefs. Unreciprocated tolerance entails non-religious people feeling pressure to respect the beliefs of religious people yet not receiving the same respect from religious people. Anticipatory stress is the stress that builds over time in preparation for an event that will have a discussion related to a god or is religiously themed, such as a wedding or funeral. Each of these negatively correlated with outness and was linked with worse mental health (i.e., greater distress, lower self-esteem).

Research on the well-being and mental health outcomes associated with atheism has found mixed results. Some research finds no direct relation between atheism and poor physical well-being (Speed & Fowler, 2016) or atheism and psychological well-being outcomes including self-esteem (Brewster et al. 2019). When evaluating health outcomes of religious versus non-religious individuals, Speed and Fowler (2016) found that atheists were less likely to experience conflict than theists do, aside from disagreements about personal relationships and life's ultimate meaning. Atheists may be less prone to the conflicts, tensions, and worries that might come with a relationship with supernatural powers, such as worries about divine, demonic punishment, or resentment toward a higher power that has let them down. Thus, atheists may be less likely to have moral conflicts due to their morals not being a result of religious beliefs. However, that is not always the difference in well-being between someone who is and is not religious and the strength of one's religious beliefs.

According to Baker et al. (2018), atheists reported significantly lower levels of anxiety, paranoia, obsession, and compulsion compared to religious individuals. However, some studies

link atheism to more negative outcomes, such as poorer physical and psychological well-being due to negative assumptions made about the group (Doane & Elliot, 2014). Less concealment of their atheist identity can result in greater psychological and physical well-being (Abbott & Mollen, 2018). Speed and Fowler (2016) indicated that concerns with morality, ultimate purpose, and, to a lesser extent, interpersonal conflict exist with atheists, indicating lower levels of well-being. Lower levels of well-being can have a long-term effect on mental health and lead to developing a mental illness.

Mental Health Stigma

Mental health and mental illness are parts of life that many have experienced. Like atheists, people experiencing a mental illness endure a lot of negative experiences, including the direct result of the mental illness, the negative treatment from others, and self-deprecation; these can result from the societal perceptions of mental illness. Mental health stigma can be characterized into two types: public and personal/self-stigma (Corrigan, 2004; Corrigan & Watson, 2002; Rüsch et al., 2005). Public stigma is the bias that develops when the broader public supports certain preconceptions, such as the idea that all individuals with mental problems are incompetent and unable to hold down a meaningful job (Corrigan & Watson, 2002). Public stigma is evident through stereotypes, prejudice, and discrimination. People with mental illness experience negative stereotypes such as they are incompetent, weak, and a danger to others, prejudice from others in the forms of anger toward and fear of them, and discrimination by being prevented from job opportunities or social experiences (Corrigan, 2004; Rüsch et al., 2005). Corrigan, 2004). Personal stigma is the bias that develops about oneself and supports certain preconceptions about the competency oneself based on having a mental illness (Corrigan & Watson, 2002). Similar to public stigma, personal stigma is evident through stereotypes,

prejudice, and discrimination. Stereotypes result in negative beliefs about themselves (e.g., incompetence, weak, and danger), embracing prejudice of fear around them, resulting in low self-esteem and self-efficacy, and with discrimination, they prevent themselves from pursuing opportunities because of their mental illness. (Corrigan, 2004; Rüsch et al., 2005). The stigma around them and how they view themselves can negatively impact how they are treated for their mental illness, and whether they will seek treatment for their mental illness.

When looking at mental health stigma in students, Eisenberg et al. (2009) had several findings regarding demographics and impact on help-seeking. First, compared to personal stigma, perceived public stigma was much higher in this student population. Second, students who were male, young, Asian, international, more religious, or from low-income households were more likely to experience personal stigma. Third, reported stigma was not significantly associated with help-seeking, whereas personal stigma was significantly associated with many measures of lesser help-seeking. The feeling of stigma within each of these groups can show societal and community perceptions about mental health, either within gender, ethnic/ racial communities, socioeconomic status, and religious groups.

A proposed solution from researchers to help people prevent self-stigma and be resilient to public stigma is to be more open and accepting of their mental health. Individuals who are open about their mental illness tend to be less negatively impacted by self-stigma on their quality of life (Corrigan et al., 2010). People who are open about their empowerment will experience more life satisfaction. Individuals with mental illness appear to be more susceptible to low self-esteem and low empowerment—that is, to self-stigma—when they are depressed or experience prejudice. The implications are that reducing the perceived legitimacy of prejudice may shield people with mental illnesses' self-esteem and empower them (Rüsch et al., 2006). Reducing the

legitimacy of prejudice can provide the empowerment to talk about their mental illness and receive treatment.

Without the empowerment and support of those with a mental illness, prejudice can perpetuate the underreporting of mental illness and treatment for it. The underreporting of mental illness can impact the magnitude of the need for mental health treatment and continue to perpetuate a cycle of concealing a mental illness. The under-reporting rate of mental illness diagnoses among people who have had brief treatment for depression is greater than 50% and the under-reporting rate of mental illnesses is close to 20% among persons who have received treatment for depression for a length of time. (Bharadwaj et al., 2017). Regardless of the level of therapy, people are more inclined to underreport mental illness than other physical illnesses or injuries. The people who are more likely to underreport their mental illness are simultaneously less likely to seek mental health care. This shows a larger disconnect to how a mental illness is taken less seriously compared to a physical ailment that is more visible and socially acceptable to society.

Why might people consistently underreport receiving mental health care? Henderson (2013) described four common factors that increase the risk of someone delaying treatment for mental illness. First, having a lack of knowledge to identify features of mental illnesses. Lacking the knowledge to identify a mental illness from features can impact how seriously someone is taking what they are experiencing. The person may believe that they are overreacting to life circumstances or that what they are experiencing is not real. Second, being ignorant about accessing treatment. Healthcare can be expensive and someone unfamiliar with the system may be overwhelmed about which health professional to approach to figure out what is happening. Third, having a prejudice against people who have a mental illness. Experiencing a mental illness

with negative perceptions of others with mental illness can develop into self-loathing and a sense of shame for considering treatment for help. Last, expecting discrimination against people with mental illness. The fear of being discriminated against for something a person cannot control can result in repressing the feelings and fear of being treated differently by peers and society as a whole.

People are more likely to keep their distance from an outgroup than others if they endorse an authoritarian, or strict and rigid, view of mental illness. The authoritarian view of mental illness means that a strict mental health system should make decisions for those with psychiatric disabilities because they are unable to care for themselves (Corrigan et al., 2001). People who are substantially more familiar with mental illness—through education or personal experience with friends and family—are less likely to support negative stereotypes about this group. Additionally, people from minority ethnic groups are less likely to endorse stigmatizing views on mental illness. More familiarity with mental illness can help to combat the negative stereotypes that can be held about the groups deemed different, however, the groups someone may be a part of, such as religious communities, can impact how someone may view mental illness and people with mental illness.

Religiosity and Mental Health

Some people attribute moral standing to religion and perceive religious individuals as morally better than those who are not religious. Compared to non-religious or “secularized” individuals, people who identify as "highly religious" were significantly more likely to assert that they meaningfully contribute to society and belong to the community. Religious individuals were more likely to believe that difficulties in life improve them and give their lives purpose or

direction (Dilmaghani, 2018). Yet, the difficulties in life that they experience would not always include mental illness and mental illness would be attributed to other causes.

From a religious perspective, there are varying beliefs as to what may cause mental illness (Al-Krenawi & Graham, 1997; Mathison et al., 2022; Mercer, 2013). Some Abrahamic religions such as Christianity and Islam can hold dramatic spiritual explanations of mental illness, such as demonic or jinn influence; this refers to an immoral and unholy presence that is the result of a demon or jinn (Al-Krenawi & Graham, 1997). This immoral and unholy presence does not always refer to direct possession, however, some Christian communities like Pentecostals, Catholics, and Anglicans believe a more invasive demonic possession can be a cause of mental illness (Mathison, Jackson, & Wade, 2022). Some Muslim groups believe that jinn, spiritual beings who can act in good, neutral, or negative ways, are sometimes to blame for people's changed moods and mental states like depression, anxiety, delusions, and hallucinations (Al-Krenawi & Graham, 1997).

The solution to the possession or demonic influence seen in these religious circles is often exorcism or deliverance to remove the demon or jinni from the victim of possession (Mercer, 2013). By eliminating the demon, it is said that the person will be liberated from their symptoms and afflictions. However, deliverance practices occasionally result in unintentional harm. The deliverance practice itself may be traumatizing and cause the recipient of the deliverance to become a victim again; in some cases, there have been injuries resulting in fatalities. In Christianity, some religious leaders preach a doctrine of obedience in the faith to avoid fear and emotional problems and have a sound mind; those points found in popular doctrines include having enough faith, praying often and correctly, reading their Bible devotedly, and regularly attending church services (Webb et al. 2008). Mathison, Jackson, and Wade (2022) argue how

negative beliefs about mental illness can result in increased stigma. If a mental illness, such as depression, is brought on by a lack of prayer or faith, pent-up resentment, or the influence of Satan, then those who are depressed can readily be accused of lacking in proper religious practice, being unfaithful, wanting only to be angry, and being under demonic influence. People who experience depression not only battle a mental illness but also the stigma associated with mental health within some religious groups.

There can be concerns with attributing mental illness to a lack of faith, especially with a religious person. Attributing the responsibility for having a mental illness to the person is positively correlated with how much the person is influenced by their religious beliefs on a day-to-day basis (Pingani et al., 2022). The belief that someone with a mental health condition is responsible for their condition and the attitude of pity and anger derived from it are all associated with the idea that people with mental health conditions are potentially dangerous, causing greater fear.

In other cases, different ethnic groups within religious groups can hold specific beliefs about mental health and treatment. For example, Santos and Kalibatseva (2019) found that Hispanic Pentecostals, a Protestant sect of Christianity, were more likely to believe the cause of depression was social-relational factors as opposed to biological or spiritual ones. They were more likely to endorse spiritual treatments over professional mental health treatment though to get a regional understanding of mental health perceptions, Royal and Thompson (2012) surveyed 540 Protestant Christian participants in the Southeastern United States about emotional, mental, and relationship problems and their causes. When asked about the causes of these issues, 18.9% stated that those problems, such as depression, anxiety, grief, loneliness, substance abuse, or self-harm, are the main result of spiritual and religious factors. Even among those who did not

endorse this item, it was common to believe that a person should only go to a mental health professional as a last resort.

There are leaders in some religious communities advocating for better treatment of those with mental illness and more education on mental health. In a community of Muslims in Britain, the Muslim faith leaders provided substantial counseling, and routinely referred individuals in the community to mainstream mental health services on a personal basis (Meran & Mason, 2019). The leaders embraced the varying causes of mental illness, such as biological, environmental, and religious. These leaders stated that their goals were to emerge as allies to those in their community struggling with mental illness, challenge the stigmatic views, collaborate with local mental health professionals, and deliver holistic care.

In addition to the stigma held against mental illness itself, there remains a stigma of seeking help from mental health professionals (Royal & Thompson, 2012). There are two common reasons why those who are religious are wary of seeking help from mental health professionals. Firstly, seeking health from a religious leader may carry less stigma than seeking help from mental health professionals (Crosby & Bossley, 2012). This can be due to perceptions of "secular" assistance on what is seen as a spiritual issue and information provided by the religious community. The second reason is the concern of a mental health professional discrediting or undermining their faith or the experience weakening their faith from information given during the session (Mayers et al., 2007). If a religious person feels more comfortable with talking about their mental or spiritual health with another religious person, they may be more hesitant to take a chance with "secular assistance." This begs the question of intersectionality between secular assistance and how atheists and other secular individuals are perceived. Is

secular assistance perceived as having a negative influence on the religious individual and likely to affect the assumed causes of mental illness?

The Present Study

The purpose of the study was to evaluate how members of different religious and non-religious groups perceived the likelihood of the other groups having a type of mental illness (e.g., anxiety, mood, substance abuse), and how this may be reflected in their beliefs about mental health stigma. The present study tested six specific hypotheses based on the literature reviewed in the introduction.

Hypothesis 1a: Religiosity of Catholic, Protestant, and Muslim participants will be positively correlated with general mental health stigma.

Hypothesis 1b: The positive correlation will be stronger for Catholic and Protestant participants compared to Muslim participants.

Previous research shows that religious groups have negative perceptions of people with mental illness due to assuming mental illness is less of a biological issue (Santos & Kalibatseva, 2019), and more of a spiritual problem. Mental illness is attributed to possession (Al-Krenawi & Graham, 1997), demonic influence (Mathison et al., 2022), and a lack of faith and obedience (Mercer, 2013; Webb et al., 2008). These reasons are attributed to the choices and character of the person. For Hypothesis 1b, research showed more instances of Christians supporting harsher views of people with mental illness and how it only has spiritual causes or only needs spiritual treatment (Al-Krenawi & Graham, 1997; Royal & Thompson, 2012). In comparison, some Muslim community leaders are advocating for more mental health resources and less stigmatized perceptions (Meran & Mason, 2019).

Hypothesis 2: Non-religious participants will have a lower mental health stigma score than religious participants.

There was not much research that explicitly stated that atheists report less mental health stigma, but the research references for hypotheses 1a and 1b suggested religious individuals show more negative perceptions of people with mental illness. Those reasons for the negative perceptions are often related to their religious views (Al-Krenawi & Graham, 1997; Mercer, 2013; Webb et al., 2008)

Hypothesis 3: Religiosity of Catholic, Protestant, and Muslim participants will be positively correlated with mental illness prevalence ratings of atheists.

Although no research explores this finding directly, there are parallels between anti-atheist prejudice and mental health stigma surrounding religious individuals' negative perceptions of atheists (Edgell et al., 2006) and those with mental illness (Pingani et al., 2022).

Hypothesis 4: Religiosity will be negatively correlated with mental illness prevalence ratings of religious groups.

Research related to the causes of mental illness according to religious individuals states that the cause of mental illness is a lack of obedience and faith (Mercer, 2013). Connected, Webb et al., (2008) states that preventing mental illness and emotional problems comes from obedience to their faith and actions. Thus, religious individuals may assume other religious people are more likely to be more obedient to their religious doctrine and stay faithful to their beliefs.

Hypothesis 5: Religious participants will rate non-religious participants as less competent and less warm than religious participants.

Regarding competence, religious participants could view non-religious participants as incapable and unreliable. Atheists are perceived as less trustworthy (Gervais et al., 2011) and less likely to

be appointed to higher societal positions like president (Pew Research Center, 2014). Regarding warmth, atheists are perceived as apathetic (Swan & Heesacker, 2012), narcissistic (Dubendoff & Luchner, 2017), immoral (Edgell et al., 2006; Gervais, 2011), and a threat to moral values (Cook et al., 2015). Describing someone as warm indicates they are good-natured, friendly, and a person someone feels comfortable with being around thus religious participants may rate non-religious targets as less warm.

Hypothesis 6: Among religious participants, mental health stigma will negatively predict the warmth and competence ratings of non-religious participants.

People with mental illness and non-religious individuals are negatively perceived by religious individuals. Mental illness is a sign of a lack of faith and obedience to doctrine (Mercer, 2013) and non-religious individuals do not have that doctrine and are viewed as a threat to moral values (Cook et al., 2015).

Method

Participants

There were 175 participants recruited from the online survey platform, Prolific, completed an online questionnaire through Microsoft Forms. Participant ages ranged from 18-84 (M = 36.3, SD = 14.2). There was almost an equal split in gender identity with 50% of participants identified as a man, 48% identified as a woman, and 2% identified as non-binary. The most frequently endorsed racial identity was White (63.4% White, 1.7% American Indian or Alaska Native, 20.5% Asian, 9.1% Black or African American, 8% Hispanic, Latino, or Spanish Origin, 2.2% Middle Eastern or North African) Reported racial identities total more than 100% because participants could select multiple identities. The most commonly reported types of

education included a bachelor's degree (39.4%), some college but no degree (25.7%), and a graduate degree (14.9%).

We recruited 50 participants from each of four specific religious and non-religious groups using pretest data that identifies the religious or non-religious affiliation they provided There were 43 Muslim, 46 Catholic Christian, 42 Protestant Christian, and 44 Atheist/ Non-Religious participants. Due to exclusion criteria, the number of participants in those groups changed. Participants were excluded from all analyses if they incorrectly answered an attention question that asked participants to choose the response labeled '*tends not to be true*' for the question, and if they select '*no*' when asked if we should use their data when analyzing the results of the study. Nine participants were excluded for failing to answer the attention question correctly and 16 participants were excluded because their response was '*no*' when we asked if they thought we should use their data. This study was approved by Wittenberg University's Institutional Review Board (IRB# 039-202223). The preregistered hypotheses and analysis plan, study materials, and all data are provided on the project's OSF page (https://osf.io/jr5q8/)

Materials

Participants completed an online survey that included the below materials in the order presented.

Mental Illness Prevalence Ratings

We asked participants to evaluate each of the four religious/non-religious affiliated groups and their likelihood of experiencing different mental health disorders compared to the general population. Those mental health disorders included mood disorders (such as bipolar or depression), anxiety disorders, hallucinations, delusion/psychotic disorders (such as schizophrenia), and substance-use disorders. Items were on a 7-point Likert scale from 0 (*much less than the general population*) to 7 (*much more than the general population)*. We calculated

an overall mental health prevalence score for each group by averaging the responses across the four questions.

The Stereotype Content Model

To assess the perceived warmth and competence of other groups, participants rated items based on the general stereotype categories described in the Stereotype Content Model (SCM; Fiske et al., 2002). We asked each participant to rate the competence and warmth of each target group: Protestant Christian, Catholic Christian, Muslim, and Atheist/ Non-Religious. Items were rated on a 7-point scale from 0 (*much lower competence/warmth*) to 7 (*much higher competence/ warmth*). The questions were phrased in the following format: "In general how competent (e.g., capable, confident, skillful) do you think people with __ religious beliefs are compared to the general population" for competence and "In general how warm (e.g., friendly, good-natured, sincere) do you think people with __ religious beliefs are compared to the general population" for warmth.

The Duke University Religion Index

The Duke University Religion Index (DUREL) is a self-report questionnaire that assesses one's religious involvement (Koenig & Büssing, 2010). The DUREL included five questions and was divided into two sub-categories: non-organizational religious activity (NORA), and intrinsic religiosity (IR). Scores from each subscale were calculated by averaging the items. NORA items were rated on a 6-point scale from 1 (*never/rarely or never*) to 6 (*more than once a week/more than once a day*). Items from the NORA sub-category includes "How often do you spend time in private religious activities, such as prayer, meditation, or Bible study" and "How often do you attend church or other religious meetings" ($M = 3.17$, $SD = 1.29$, $\alpha = .714$). IR items were rated on a 5-point Likert scale from 1 (*definitely not true*) to 5 (*definitely true to me*). Items from the

IR category include “My religious beliefs are what lie behind my whole approach to life,” “In my life, I experience the presence of the Divine (i.e., God)” and “I try hard to carry my religion over into all other dealings in life” (*M* = 3.31*, SD* = 1.28*,* α = .932).

Community Attitudes to Mental Illness

Community Attitudes to Mental Illness (CAMI) is a self-report scale to measure stigma toward the mentally ill (Taylor & Dear, 1981). We used the 12-item short form of CAMI (Sampogna et al., 2017) plus four additional questions from the CAMI 27-items. The CAMI is divided into four sub-categories: Authoritarianism (A), Benevolence (B), Social Restrictiveness (SR), and Community Mental Health Ideology (CMHI). Items were measured on a 5-point scale from 1 (*strongly disagree*) to 5 (*strongly agree*). Examples of items include “One of the main causes of mental illness is a lack of self-discipline and will-power" for Authoritarianism (*M* = 2.16*, SD* = .745, α = .67), “People with mental illness don’t deserve sympathy” for Benevolence (*M* =1.67*, SD* = .645*,* α = .540), “People with mental health problems should not be given any responsibility” for Social Restrictiveness (*M* = 2.46*, SD* = .710, α = .537), and “It is frightening to think of people with mental problems living in residential neighborhoods” for Community Mental Health Ideology (*M* = 2.32*, SD* = .70, α = .075*)*. The four additional items were “People with mental health problems should have the same rights to a job as anyone else” from Social Restrictiveness, “Anyone with a history of mental problems should be excluded from taking public office” from Social Restrictiveness, “People with mental illness are a burden on society” from Benevolence, and “People with mental illness have for too long been the subject of ridicule” from Benevolence.

Mental Illness Experiences

We asked all participants if they "have any of the following mental health conditions" and to "please select all that apply" from the options provided. We also asked if they "have close friends or family members with any of the following mental conditions" and to "please select all that apply." The mental health conditions options provided for both include mood disorders such as depression or bipolar, an anxiety disorder such as social anxiety or generalized anxiety, disorders that may include delusions or hallucinations such as schizophrenia, substance abuse disorders such as drug or alcohol abuse, and attention-deficit hyperactivity disorder (ADHD).

Demographics

Participants indicated their age and how they describe their gender identity in two free-response questions. Participants indicated their race/ ethnicity by selecting all that apply from the following options: American Indian or Alaska Native, Asian, Black or African American, Hispanic, Latino, or Spanish Origin, Middle Eastern or North African, Native Hawaiian or Other Pacific Islander, White, some other race, ethnicity or origin, and I prefer not to answer. We asked if they have a present religion if any from the following options: Catholic, Jewish, Protestant (e.g., Lutheran, Baptist, Presbyterian), Muslim, Buddhist, Hindu, Atheist, Agnostic, nothing in particular, prefer not to answer, and other (please specify). We asked participants to select the highest level of education they have attained from the following options: less than high school degree, high school degree or equivalent (e.g., GED), some college but no degree, associate degree, Bachelor's degree, graduate degree (e.g., Master's, Doctorate, JD, MBA), and other (please specify).

Procedure

Participants completed an online survey through the online survey platform Prolific (https://www.prolific.co/). The online survey was targeted to participants with specific religious

and non-religious affiliations: Protestant Christian, Catholic Christian, Muslim, and Atheist/ Non-Religious. We prescreened and recruited these participants who had previously indicated each of these religious and non-religious beliefs. Participants completed the consent form and filled out the questionnaires as described in the materials section. Afterward, they complete the demographic questions and a series of questions about whether they answered honestly, what the study was about in a few sentences, and if they have any thoughts or comments about the study. Participation was voluntary and could be withdrawn at any time.

Results

Hypothesis 1a and 1b

We first tested for a significant correlation between religiosity and mental health stigma using the CAMI scales (Authoritative, Benevolence, Social Restrictiveness, Community Mental Health Ideology). To test Hypothesis 1a, we temporarily excluded non-religious participants from the sample and examined the correlation between the religiosity of three groups, Catholic Christian, Protestant Christian, and Muslim participants, and mental health stigma having predicted a positive correlation. There were no significant correlations between the DUREL and CAMI scales ($ps \geq .169$). To test Hypothesis 1b, we assessed the relationship between the religiosity and mental health stigma of each religious group. We predicted a stronger correlation for Catholic and Protestant participants compared to Muslim participants. There were no significant correlations for each of the religious groups ($ps \geq .129$).

Hypothesis 2

To test Hypothesis 2, we conducted a one-way ANOVA to examine how Atheist/Non-Religious participants rate their group using the four subscales of CAMI compared to the three

religious groups. We predicted that non-religious participants would rate themselves lower compared to the other religious groups.

For the Authoritative subscale in CAMI, the one-way ANOVA revealed there was a statistically significant difference in mental health stigma rating between groups, $F(3, 89) = 20.83$, $p < .001$). Tukey post-hoc tests showed that Atheist/Non-Religious participants ($M = 5.61$, $SD = 1.82$) were rated significantly lower than Muslim ($M = 8.69$, $SD = 3.24$; $p < .001$), Catholic ($M = 8.17$, $SD = 2.64$; $p < .001$), and Protestant ($M = 9.05$, $SD = 3.04$; $p < .001$) participants on the Authoritative sub-scale of CAMI.

For the Benevolence subscale in CAMI, the one-way ANOVA revealed there was a significant difference in mental health stigma rating between at least two of these groups, $F(3, 9) = 4.298$, $p = .007$). Tukey post hoc tests showed that the Atheist/Non-Religious participants ($M = 2.75$, $SD = .967$) were rated significantly lower than Protestant participants ($M = 3.51$, $SD = 1.165$, $p = .023$). There was no statistically significant difference between Atheist/ Non-Religious participants and Muslim ($M = 3.14$, $SD = 1.37$, $p = .444$) or Catholic participants ($M = 3.40$, $SD = 1.32$, $p = .061$) on the Benevolence sub-scale of CAMI.

For the Social Restrictiveness subscale in CAMI, the one-way ANOVA revealed there was a statistically significant difference in mental health stigma rating between at least two of these groups, $F(3, 93) = 6.07$, $p < .001$. Tukey post-hoc tests showed that Atheist/Non-Religious participants ($M = 7.86$, $SD = 2.92$) were rated significantly lower than Muslim ($M = 10.21$. $SD = 2.41$, $p = .001$), Catholic ($M = 9.63$, $SD = 3.24$, $p = .020$), and Protestant ($M = 9.95$, $SD = 2.71$, $p = .005$) participants on the Social Restrictiveness sub-scale of CAMI.

For the Community Mental Health Ideology subscale in CAMI, the one-way ANOVA revealed there was not a statistically significant difference in mental health stigma rating

between at least two of these groups, $F(3, 94) = .742$, $p = .530$). Tukey post hoc tests showed that there was no statistically significant difference between Atheist/ Non-Religious participants ($M = 4.41$, $SD = 1.484$) and Muslim ($M = 4.74$, $SD = 1.465$, $p = .694$), Catholic ($M = 4.44$, $SD = 1.307$, $p = .999$), or Protestant ($M = 4.76$, $SD = 1.462$, $p = .663$) participants for the Community Mental Health Ideology sub-scale of CAMI.

Hypothesis 3

To test Hypothesis 3, we examined correlations between religiosity and mental illness prevalence ratings of atheist targets. The higher the prevalence ratings, the higher likelihood that a person assumes someone in a certain group would have a mental illness. We predicted that the religiosity of religious participants would positively correlate with and predict ratings of mental illness prevalence in atheists as an outcome. Non-organized religious activity (NORA) was positively correlated with mental illness prevalence ratings of atheist targets, $r\ (129) = .331$, $p < .001$. Intrinsic religiosity (IR) was also positively correlated with mental illness prevalence ratings of atheist targets, $r\ (129) = .325$, $p < .001$.

We separated participants into groups based on their own religious beliefs (Catholic, Protestant, Muslim) and examined the mental health prevalence ratings given to atheist targets from each group. For Catholic participants, NORA was not correlated with mental illness prevalence ratings of atheist targets, $r\ (44) = .188$, $p = .210$. IR was also not correlated with mental illness prevalence ratings of atheist targets, $r\ (44) = .270$, $p = .069$. For Protestants, NORA was positively correlated with mental illness prevalence ratings of atheist targets, $r\ (40) = .319$, $p = .040$. However, IR was not correlated with mental illness prevalence ratings of atheist targets, $r\ (40) = .236$, $p = .132$. For Muslim participants, NORA was positively correlated with the mental illness prevalence rating of atheist targets, $r\ (41) = .350$, $p = .022$. IR was also

positively correlated with mental illness prevalence ratings of atheist targets, r (41) = .349, p = .022.

Hypothesis 4

To test Hypothesis 4, we examined the correlation between religiosity and mental illness prevalence ratings of religious targets. We examined the mental illness prevalence ratings of each religious group, and the collected ratings from participants in the three religious groups. We predicted that the religiosity of participants in each religious group would negatively correlate with ratings of mental illness prevalence in religious participants; this hypothesis was accidentally reversed in the pre-registration as positively For Catholics, NORA was negatively correlated with mental illness prevalence ratings, r (44) = -.201, p = .008, but IR was not correlated with mental illness prevalence ratings for their group, r (44) = -.132, p =.082. For Muslims, NORA was negatively correlated with mental illness prevalence ratings, r (41) = -.319, p < .001, but IR was also negatively correlated with mental illness prevalence ratings, r (41) = -.215, p = .004. For Protestants, NORA was not correlated with mental illness prevalence ratings, r (40) = -.141, p = .062, but IR was negatively correlated with mental illness prevalence ratings, r (40) = -.168, p = .027.

Hypothesis 5

To test Hypothesis 5, we conducted two repeated measures ANOVA analyses to examine the effect of target religion on competence and warmth ratings. Non-Religious targets were filtered out, and we looked at competence and warmth ratings across the targets. There was a significant main effect of target religion on competence ratings, F(3, 130) = 2.95, p = .032. Post-hoc tests using Turkey's HSD showed that atheist targets (M = 4.31, SD = .072) received higher competence ratings than Protestant (M = .3.99*, SD* = .07*; p* = .017*)* targets. There were no

significant findings from the other targets with $p \geq .128$. There was a significant main effect of target religion on warmth ratings, $F(3, 130) = 5.76$, $p < .001$. Post-hoc tests using Turkey's HSD shows that atheist targets ($M = 3.66$, $SD = .08$) received lower warmth ratings than Protestant ($M = 4.07$, $SD = .08$; $p = .010$) and Catholics ($M = 4.25$, $SD = .11$; $p < .001$) targets. There was no significant finding from Muslim targets ($M = 3.99$, $SD = .11$, $p = .109$), indicating no significant difference in warmth ratings compared to atheist targets.

Hypothesis 6

To test Hypothesis 6, we examined correlations between mental health stigma using CAMI scales and the warmth and competence ratings given to atheist targets by participants in the religious groups. We predicted that among religious participants, mental health stigma will negatively predict the warmth and competence ratings of non-religious targets. The Authoritative (r (173) = -.372, $p < .001$), Benevolence (r (173) = -.196, $p = .010$), and Social Restrictiveness (r (173) = -.329, $p < .001$) subscales negatively predicted warmth ratings of atheist targets. In contrast, Community Mental Health Ideology (r (173) = -.068, $p = .370$) was not significantly correlated with warmth ratings. The Authoritative subscale (r (173) = -.151, $p = .050$) negatively predicted competence ratings. In contrast, Benevolence (r (173) = .012, $p = .873$), Social Restrictiveness (r (173) = -.077, p = .312), and Community Mental Health Ideology (r (173) = .017, $p = .825$) were not significantly correlated with competence ratings of atheist targets.

Discussion

In this study, we looked at how different religious and non-religious groups perceive one another and how this relates to mental health and mental health stigma. We did not find support for Hypothesis 1a and 1b that predicted mental health stigma being positively correlated with the

religiosity of the three religious groups. This differs from previous research that shows negative perceptions of those with mental illness from other religious groups due to possession (Al-Krenawi & Graham, 1997), demonic influence (Mathison et al., 2022), and a lack of faith and obedience (Mercer, 2013; Webb et al., 2008). With Hypothesis 1b, the results differed from previous evidence supporting harsher views of the mentally ill from Protestant Christians (Royal & Thompson, 2012) compared to some Muslim communities advocating for less stigma and more support for mental health services (Meran & Mason, 2019). This could imply a changing attitude toward mental health stigma among religious groups. While previous research indicates strong mental health stigma from religious groups, newer research may show an emergence of more openness within those communities for people with mental health. More in-depth research on the attitudes toward mental health stigma within religious communities can provide more potential answers.

We found partial support for Hypothesis 2 which predicted that non-religious participants would report lower mental health stigma compared to the three religious groups. Each of the four subscales provided different results. For the Authoritarian subscale, Atheists scored lower than Catholic and Muslim participants. For the Benevolence subscale, Atheists scored lower than Protestant participants. For Social Restrictiveness, Atheists scored lower than Protestant, Catholic, and Muslim participants. For Community Mental Health Ideology, there were no significant differences between the groups. Each religious group scored higher than atheists in two of the four subscales.

We found partial support for Hypothesis 3 which predicted that religiosity would positively correlate with mental illness prevalence ratings of atheist targets. Catholic participants' mental illness prevalence ratings of atheists were not correlated with either subscale

of religiosity, while Protestant's mental illness prevalence ratings of atheists were positively correlated with NORA, and Muslim participant's mental illness prevalence ratings of atheists were positively correlated with NORA and IR. Although no previous research mentioned in this study confirms this conclusion, there are similar patterns between anti-atheist prejudice and mental health stigma surrounding religious individuals' negative perceptions of atheists (Edgell et al., 2006) and those with mental illness (Pingani et al., 2022). The treatment of both groups usually stems from religious groups based negative perceptions on religious doctrines that dictate the morals and behaviors of others. In their minds, atheists, and people with mental health deviate from these religious beliefs.

We found partial support for Hypothesis 4 which predicted that religiosity would negatively correlate with mental illness prevalence ratings of religious groups. Catholic participants' mental illness prevalence ratings of religious groups negatively correlated with NORA, Protestant participants' mental illness prevalence ratings of religious groups negatively correlated with IR, and Muslim participants mental illness prevalence ratings of religious groups negatively correlated with both. Webb et al. (2008) stated that preventing mental illness and emotional problems comes from obedience to their faith and actions. Thus, a religious individual may perceive a faithful religious person as less likely to have a mental illness.

We found partial support for Hypothesis 5 which predicted that religious participants would rate atheist targets as less competent and less warm. Atheists received higher competence ratings than Protestants and lower warmth ratings than Protestant and Catholic targets. The original thought behind the hypothesis for competence was related to how atheists are viewed as less trustworthy (Gervais et al., 2011) and less likely to be appointed to higher societal positions like the president (Pew Research Center, 2014). This lack of being appointed to important

positions and being seen as less trustworthy could be attributed to perceptions of atheists as incompetent. Regarding warmth, this finding is consistent with the findings saying that atheists are rated as more apathetic (Swan & Heesacker, 2012), narcissistic (Dubendoff & Luchner, 2017), and immoral (Edgell et al., 2006; Gervais, 2011), and a threat to moral values (Cook et al., 2015). Describing someone as warm indicates they are good-natured, friendly, and a person someone feels comfortable being around. Thus, the findings indicate that religious participants perceived atheists as not embodying these traits.

We found partial support for Hypothesis 6 that predicted mental health stigma would negatively predict warmth and competence ratings in non-religious targets. Authoritarian, Benevolence, and Social Restrictiveness subscales negatively predicted warmth in non-religious targets while only the Authoritative subscale negatively predicted competence. Consistent with previous hypotheses, this result could indicate an overlap between how religious people may feel about non-religious individuals and those with mental illness.

Strengths and Limitations

There were strengths of this study that helped to advance the research. First, using Prolific to find participants expanded the pool of participants and allowed for more religious diversity, meaning more options for different religious groups. Having this diversity expanded the options for participant pools that we would have for this study. It was helpful when looking for equal-sized groups and expanding the size of participants we had for the study. To fairly evaluate the responses from each religious and non-religious group to see how they differ and are similar, each group needs to have about the same number of participants. Second, some within-subjects analyses supported the small sample size by still providing significant results. Last, it opens the doors to studying mental health in the context of religious and non-religious groups. Mental

health being studied in the context of religion is growing in the academic field and within conversations, thus it can raise awareness of the negative impact of anti-atheist prejudice, mental health stigma, and the negative perceptions held on these groups.

There were limitations to this study that provide suggestions for future studies studying these topics. First, the subscales for CAMI had lower reliability and this impacts how the results may be viewed. Lower reliability can affect the validity of the results and how seriously they may be taken for how applicable they are. The reliability being low may have been due to fewer questions per sub-scale and a disproportionate number of questions per sub-scale. Future research could involve more questions from the full form of CAMI or a different mental health stigma questionnaire with higher validity that looks at mental health stigma within this context and expand upon the findings.

Second, the study focused on Abrahamic religions that are prominent in the US, especially Christianity. Using these populations is important to add to existing research, however, it is important to consider limited research on other religious groups when studying these topics. Expanding to more religious beliefs could expand upon knowledge of how other religious beliefs view non-religious individuals and people with mental illness. With more resources, the study can expand to polytheistic religions, have more spiritual and ritualistic traditions, and be found in countries in the continents of Africa and Asia. For example, more research could investigate Hinduism in Southeast Asia, and Buddhism in places like Japan to see if religions that are more spiritual and philosophical have a different perspective on atheists and mental illness. Different religions that are religious minorities in the US and primarily found outside of the US would allow for more diverse perspectives on mental illness and how they perceive other religious groups. Anti-atheist prejudice research has been done in multiple

countries across the world looking at how atheism and atheists were viewed in countries that were religious or non-religious. More research can compare the differences in how these marginalized groups are perceived in countries where religions like Christianity and Islam are the majority compared to ones where they are the minority.

Last, there is a lot of diversity within the different religious sects focused on in this study. For example, within Protestant Christianity, there are Evangelical, Baptist, Lutheran, and many others that can differ from each other in beliefs and treatment of other groups. There is more research looking into the Evangelical sect of Christianity in parts of the southeast in US and their strong views on religious beliefs and mental illness. Future research can expand upon the basic borders of the religious sects and determine the variations in how these groups feel about mental health and non-religious people.

Concluding Remarks

The findings from this research can have broader impacts on the related academic field and society. Within the academic field, this expands upon every growing research that looks at non-religious individuals and the treatment they receive from others, especially religious individuals. Research on atheist beliefs and treatment of atheists has grown significantly in the last 20 years and more research can bring awareness and understanding to the prejudice they face. Societal impacts could be awareness going from research to advocacy and conversations to how religious beliefs or no religious beliefs dictate how someone may be treated by others. The prejudice and discrimination faced by atheists show the impact on their overall well-being, both physical and mental. This study presented findings that added to how atheists are viewed negatively (e.g., less warmth and higher competence in a threatening manner). It implies that religious individuals are more likely to assume higher prevalence ratings of mental illness in

atheists as well. More advocacy and awareness can bring this information beyond the research and into more mediums of discussion that more people would be able to reach. Mental health stigma research emphasizes the perceptions of people with a mental illness and the negative impact it has on people. Academically, this research expands upon the ways mental health is viewed, specifically from the lenses of religious and non-religious people. The ways to expand upon this research to present more support for its importance can be looking beyond negative perception and bias, to behaviors and ways that negative perceptions are used in the lives of people who are affected.

The importance of research like this is to expand the knowledge on groups that are affected by this prejudice, like religious minority groups, non-religious groups, and people with mental illness. Especially due to research describing the prejudice and discrimination experience, this extends to the long-term well-being of both groups and how accepted they do or do not feel. How these groups are portrayed and the community that they are in can harm their mental health, well-being, and sense of identity. Future research can investigate the different non-religious groups and compare atheists, agnostics, and people who consider themselves spiritual but not religious. This study focused on people who identify as atheists, but there are some people who are non-religious that do not use the term "atheist" out of fear of being treated negatively by others. Further investigation can provide more explanation on how to help these negatively affected groups and address the concerns toward the groups contributing to the negative perceptions and prejudice happening. Research like this can further investigate the intersectionality of religiosity, atheism, and mental health stigma, and show the importance of expanding the perception of how these groups may interact.

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