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THE LDS CONTEXT: RELIGIOUS TRAUMA, SOCIAL SAFETY, & LGBTQ+
HEALTH

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ABSTRACT

Within the Church of Jesus Christ of Latter-day Saints (LDS church), LGBTQ+ members have reported negative mental health outcomes related to their participation (Simmons, 2017; Dehlin et al., 2014). However, few studies have sought to measure how exposure to harmful beliefs and teachings experienced by LGBTQ+ members may be related to PTSD symptomology in a religious context, how this exposure (and/or the trauma such exposure evokes) may predict negative health outcomes, or how social safety may play a role in mediating the relationship between exposure, trauma, and these outcomes. This study evaluated LGBTQ+ individuals with past/present involvement in the LDS church (n = 642) through an online survey, which measured total exposure to potentially harmful LDS beliefs and teachings, religious trauma, social safety (both within and outside the church), and three health outcomes—depression, scrupulosity, and general subjective health (operationalized via the CESD-R, PIOS, and SF-36, respectively). Harmful exposure was operationalized via a measure designed by Simmons (2017), religious trauma was screened using the Secondary Traumatic Stress Scale (STSS), and social safety was operationalized via the Social Safety Questionnaire, designed by Dehlin (2021). Our research found significant positive correlations between exposure to harmful beliefs/teachings and religious trauma, as well as between social safety and religious trauma. Religious trauma significantly predicted worse health outcomes, and religious social safety mediated this relationship for scrupulosity alone. Finally, nonreligious social safety significantly predicted better health outcomes. The results of this study are discussed in the context of past research and broader implications are proposed.

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INTRODUCTION

Relative to non-LGBTQ+ individuals, members of the LGBTQ+ community experience greater difficulties finding and maintaining mental health wellness. They are frequently exposed to hate crimes, violence, and harassment (especially of a sexual nature), slurs, and social and familial rejection (Bourassa & Shipton, 1991; Burn, 2000; D'Augelli & Rose, 1990; DiPlacido, 1998; Herek, 1989, 2000; Herek, Cogan, & Gillis, 2002; Plummer, 2001; Thurlow, 2001). However, discrimination within organized religion is one area of conflict that is especially difficult to navigate for those LGBTQ+ members who are involved. Many prevalent types of institutionalized religion, such as Pentecostal Protestantism, are opposed to homosexuality and same-sex marriages (Adamczyk & Pitt, 2009; Whitehead, 2010; Sherkat, Powell-Williams, Maddox, & de Vries, 2011), and participation in such institutions significantly increases the risk of negative psychological outcomes for LGBTQ+ members compared to members of the community who have not participated or who no longer participate in these religions (Dehlin, Galliher, Bradshaw, & Crowell, 2014; Szymanski & Carretta, 2019; Nardelli, Baiocco, Tanzilli, & Lingiardi, 2019).

The Church of Jesus Christ of Latter-Day Saints (a.k.a. the Mormon or LDS church) is among those religions that oppose homosexuality, though they differentiate between same-sex attraction and behavior, such as same-sex marriage (Church of Jesus Christ of Latter-Day Saints, 2021). The LDS church is a conservative, highly centralized religion that emphasizes worldwide uniformity of doctrine and policy, with the likely result being that indoctrination rates within the organization are more homogeneous compared to those in less centralized religions (Simmons, 2017). In other words, all LDS members across the globe are likely exposed to the same teachings and doctrines to the same degree and within similar timeframes. So while mental health issues are a concern amongst all populations, LGBTQ+ members of the LDS church face disproportionate challenges in terms of trauma exposure and other mental health measures. In Simmons' (2017) study examining how spiritual trauma influenced PTSD rates within this demographic (LGBTQ+ members of the LDS church), it was found that roughly three-quarters (73.4%, $n=204$) of their respondents would likely have met the criteria for a PTSD diagnosis as defined by the DSM-IV-TR. Approximately 5.6% of adults in the U.S. identify as LGBTQ+ (Gallup, 2020), and the LDS church records its own membership at 6,721,032 (Church of Jesus Christ of Latter-Day Saints, 2021), meaning that around 376,378 LGBTQ+ Mormons could be experiencing the negative impacts of the Church's teachings and policies on sexuality and gender. However, relatively little is known about these impacts; therefore, the focus of the current study is to examine LGBTQ+ individuals who have experienced religious-based post-traumatic stress disorder, spiritual trauma, and deficits in social safety (whether one feels that they can be their authentic self in a particular area) within the LDS context. The findings of this study will add to a nascent, growing body of literature working to home in on the aspects of LDS membership that contribute to poor mental health outcomes among LDS-involved LGBTQ+ youth. Hopefully, this will help inform future interventions as they seek to treat an especially vulnerable subset of the already at-risk LGBTQ+ population.

Review of the Literature

Religion and LGBTQ+ Identityhood

Recent literature has increasingly explored the effects institutionalized religion has on LGBTQ+ individuals. Szymanski and Carretta (2019) found that religious-based sexual stigma (RSS) was indirectly related to more psychological distress and less well-being via higher levels

of internalized heterosexism and religious struggle in faith/religion-affiliated LGB individuals. However, the indirect effects of RSS on both psychological distress and well-being were only significant at moderate and high (but not low) levels of religiosity, indicating that less adherence to religious beliefs and practices may decrease how threatening RSS is perceived to be by an individual. In specific relation to the LDS church, Dehlin et al. (2014) found that LGB individuals who reported active religious activity in the LDS church scored the worst in terms of internalized homophobia, sexual identity distress, depression, self-esteem, and quality of life (in comparison to inactive, disfellowshipped, excommunicated, and resigned members). Both studies indicate that there are negative effects of religious activity on LGB individuals; however, neither specifically investigates the role played by social interactions in affecting mental health during religious activities, even though organized religions are often an important source of social connection.

Mormonism – Doctrine and Culture

In their most recent General Handbook (a guide outlining all of the major doctrines, policies, and practices of the LDS church), the LDS church characterizes romantic/sexual relationships between individuals of the same gender as immoral and considers same-sex marriages to be worthy of discipline (up to and including excommunication) via membership council (Church of Jesus Christ of Latter-Day Saints, 2021). As such, LGBTQ+ members of this church are encouraged to remain chaste, since they are not allowed to engage in sexual behavior outside of heterosexual marriage. In the same handbook, the LDS church also requires that transgender individuals refrain from pursuing surgical, medical, and social transitions in order to receive church callings, as well as temple recommends and ordinances. The latter two are especially critical components of the LDS faith—for example, it is within LDS temples that worthy families are sealed, allowing them to stay together in the afterlife. These rules pertaining to transgender individuals are based on longstanding church doctrines, including *The Family: A Proclamation to the World*. This document specifies that gender and gender roles are sacred, and that marriage should only take place between a man and a woman (The Church of Jesus Christ of Latter-day Saints, 1995). Paired with the LDS church's centralized structure and homogeneous indoctrination rates, this means that Mormons are (at least) aware of the Church's stance on sexuality and gender. In addition, the LDS church encourages higher levels of church attendance, religious importance, beliefs in Biblical inerrancy (i.e., believing that the Bible is the literal word of God), and conservative political views, all of which are associated with oppositional attitudes towards gays and lesbians (Adamczyk and Pitt, 2009; Whitehead, 2010; Sherkat et al., 2011). It is therefore plausible that these factors contribute to an unhealthy, potentially traumatic environment for LGBTQ+ individuals, and this study aims to further investigate whether these oppositional attitudes are perceived as threatening by LDS-involved LGBTQ+ individuals to the point of becoming traumatic.

Prevalence of Trauma in Religious Settings, Including Mormonism

Few recent studies have examined the relationship between anti-LGBTQ+ prejudice and trauma in a religious context. One such study, conducted by Nardelli, Baiocco, Tanzilli, and Lingardi (2019), administered both the Measure of Internalized Sexual Stigma for Lesbians and Gay Men (MISS-LG) and the Dissociation Scale (DIS) of the Trauma Symptom Inventory (TSI) to a sample of Italian gay men. They found that dissociative symptomatology had a significantly positive association with the sexuality dimension of MISS—in other words, those who had a pessimistic evaluation of the quality and duration of same-sex relationships and a negative concept of same-sexual behavior (which also concerns affectivity beyond sexuality) exhibited

more dissociative symptoms. This was especially true among actively Catholic participants, as compared to atheist participants.

The most relevant paper on the topic, however, and the one from which this study draws much of its inspiration, is Simmons's (2017) investigation of LGBTQ+ individuals with prior or current membership within the LDS religion. Simmons analyzed the effects of religious orientation (one's functional relationship with a given religion) on PTSD through a moderated mediation of orthodoxy (having a literal belief in a religion's teachings) and spiritual trauma (psychological/emotional harm due to religious experiences). Ultimately, no significant effects of religious orientation or orthodoxy on either spiritual trauma or PTSD were found; yet a significant effect *was* found between spiritual trauma and PTSD using DSM-IV-TR criteria. This indicates that no matter how the participants related to or literally believed in their religion and its teachings, they were still exposed to sufficiently high amounts of spiritual trauma to meet the criteria for a PTSD diagnosis. What Simmons did not explain was the mechanism by which spiritual trauma correlated positively with PTSD; the current study hypothesizes that perceived social safety is that mechanism.

Stressors/Traumatic Events and Their Relationship to Social Safety

In their systematic review of trauma literature, Bovin and Marx (2011) set out to show that an essential component of any traumatic experience is the individual's subjective response to the experience. Through their analysis, they proposed a model in which appraisal, or the process by which one organizes intense emotional experiences, categorizes experiences as either relevant or irrelevant to one's well-being and determines whether one has sufficient resources to deal with the stressor. If the stressor is found to be relevant to well-being and taxes/exceeds a person's perceived resources, it is more likely to qualify as a traumatic event and contribute to the development of PTSD. With this in mind, also consider Eisenberger's (2003) study examining the brain's response to social marginalization. She found that the brain processes painful experiences of social marginalization in much the same way as it processes acute painful stimulation—through the anterior cingulate cortex. Given these two sets of conclusions, a possibility arises: the experience of social exclusion in certain situations (such as within a close-knit Mormon community) may be sufficiently painful or threatening to one's well-being to be experienced as a traumatic stressor.

Diamond, Alley, and Dehlin (2021) further investigated this possibility, at least in part. In systematically reviewing the health impacts of safety cues on sexually diverse and gender-diverse individuals, Diamond et al. asserted that deficits in social safety, defined as “the availability of unambiguous connectedness, inclusion, and protection” (Diamond et al., 2021, p. 33), can trigger chronic distress and systemic inflammation. In other words, the mere absence of social safety cues is enough to cause psychological and physiological damage. This is especially true for ambiguous relationships, as the combination of positive and negative characteristics can create uncertainty, one of the most threatening psychological experiences (Brosschot et al., 2016; Carleton, 2016). Diamond et al. also presented evidence showing that laws and policies pertaining to LGBTQ+ populations had significant impacts on their measures of psychological distress (Raifman et al., 2018), thus indicating that social safety plays an important role in the mental and physical health of LGBTQ+ individuals at all levels of a given social environment, including (presumably) religious ones. This study intends to investigate whether such trends extend to the LDS context, as well as observe which specific mental health outcomes arise from a lack of social safety cues.

Purpose of the Study

The purpose of this study is to examine the unique contributions of religious trauma and social safety to the mental and physical challenges of LGBTQ+ members of the LDS faith. Our primary health outcomes are depression, scrupulosity (a religious subset of OCD symptoms), and general subjective health. The research questions for the current study are:

1. Do individuals who report greater exposure to harmful religious beliefs and teachings report more PTSD symptoms (a.k.a., religious trauma)?
2. Is exposure to harmful teachings related to mental health? And if so, is this effect mediated by the religious trauma associated with these teachings?
3. Are exposure to harmful beliefs and religious trauma associated with social safety?
4. If it is, then is the effect of religious trauma on mental health mediated by religiously-specific social safety?
5. Does nonreligious social safety contribute to mental health, independent of religious trauma?

METHODS

Participants

Participants were required to 1) be over 18, 2) hold a sexually-diverse and/or gender-diverse identity, and 3) be a current or former member of the LDS church. Investigators conducted power analyses using G*Power (Erdfeider, Buchner, & Lang, 2009), finding that a sample size of 98 is adequate for detecting small effects with a power of .8. The sample consisted of 642 individuals between 18 and 74, with an average age of 29.0 (SD = 9.9) years. Self-reported ethnic-racial identification included White (95.5%, $n = 613$), Black or African American (0.3%, $n = 2$), Asian (1.1%, $n = 7$), Native Hawaiian or other Pacific Islander (0.2%, $n = 1$), and Other (3%, $n = 19$); race was unknown for 0% of respondents. 6.1% ($n = 39$) of respondents reported being of Hispanic, Latino, or Spanish origin.

Respondents identified as either male (35.4%, $n = 227$), female (45.3%, $n = 291$), female-to-male/transgender male/trans male (1.7%, $n = 11$), male-to-female/transgender female/trans woman (2.3%, $n = 15$), genderqueer, neither exclusively male or female (12.8%, $n = 82$), or other (2.3%, $n = 15$), with 1 (0.2%) “prefer not to say” response. Assigned sex at birth distribution was 40.8% male ($n = 262$) and 59.2% female ($n = 380$). In terms of sexual orientation, 50.8% ($n = 326$) identified as lesbian or gay, 36.6% ($n = 235$) identified as bisexual, 2.3% ($n = 15$) identified as same-sex attracted, 0.3% ($n = 2$) identified as straight, and 9.3% ($n = 60$) identified as another sexuality, including nonbinary and pansexual. Sexual orientation was unknown or unreported for 0.6% ($n = 4$) of respondents. In total, 19.3% ($n = 124$) identified as non-cisgender.

Measures

The Center for Epidemiologic Studies Depression Scale Revised (CESD-R)

Developed by Eaton, Smith, Ybarra, Muntaner, & Tien (2004), the CESD-R is a widely used self-report scale used for measuring depression. It is composed of 20 Likert-scale items measuring a wide range of symptoms experienced over the past few weeks. Ratings range from 1 (not at all) to 5 (nearly every day for at least two weeks), and responses are summed for analysis.

36-Item Short Form Health Survey (SF-36)

The SF-36 (Saris-Baglama, Dewey, Chisholm et al., 2010) is a scale widely used to measure various aspects of health—physical functioning, role functioning (physical and emotional), energy/fatigue, emotional well-being, social functioning, pain, general health, and health change. Each item is based on the Likert scale, though the scale varies depending on the aspect being measured. The general health subscale was used for the study's main analyses, and scores were averaged for analysis.

Penn Inventory of Scrupulosity (PIOS)

The PIOS (Abramowitz, Huppert, Cohen, Tolin, & Cahill, 2002) is a 19-item self-report scale used to measure religious obsessive-compulsive symptoms. It is split into two subscales—Fear of Sin (12 items) and Fear of God (7 items). Responses to each item are made on a five-point Likert-type scale, with frequency items rating from 0 (never) to 5 (constantly), and distress of symptoms items rated from 0 (not at all distressing) to 4 (extremely distressing). Items from each subscale were summed for this study. Cronbach's alpha has been calculated at $\alpha=0.93$ for this measure, making it sufficiently reliable for use in this study (Abramowitz et al, 2002).

Social Safety Questionnaire

The Social Safety Questionnaire (Dehlin, 2021) is a self-report measure recently developed to study general social safety levels in an individual's life. Here, safety is defined as “feeling secure enough that you don't have to devote thought or energy into how you will be perceived and treated – allowing you space to be/feel like your authentic self” (Dehlin, 2021, p. 82). It is composed of 25 5-point Likert-like scale items, each ranging from “unsafe” (1) to “safe” (5) and including an option to indicate that the item is not applicable. Scale totals were summed for analysis. Because research into the effects of social safety is in a relatively early stage of development, this questionnaire has not been tested for scale reliability; however, it is consistent with the conceptual structure described by Diamond (2021) and thus is appropriate for this study. The questionnaire has been modified to better study social safety in an LDS context (e.g., reporting the degree to which one feels safe in Sunday School).

Spiritual Trauma Questionnaire

Created by Simmons (2017), the Spiritual Trauma Questionnaire is a 32-item self-report measure developed to gauge the degree to which both potentially abusive experiences from ecclesiastical leadership (12 items) and potentially abusive religious teachings/beliefs (20 items) were experienced by LGBTQ+ individuals in the LDS church. All items are rated on a 5-point Likert-like scale from “extremely beneficial” (1) to “extremely damaging” (5) and were summed. In the Simmons (2017) study, 11 of the 32 items were removed due to missing data in the form of “not applicable” responses, but the remaining items produced a Cronbach's alpha of .95 ($n=61$), making it acceptable for use in the present study.

Secondary Traumatic Stress Scale (STSS)

The STSS (Bride, Robinson, Yegidis, & Figley, 2004) is a 17-item self-report measure made to assess PTSD-related symptoms of intrusion, avoidance, and arousal. All items are scored on a five-point Likert-like scale indicating how often symptoms were felt in the last seven days. Items were summed for this study. Though the symptoms measured are generally associated with secondary traumatic stress, Simmons (2017) determined that this would provide enough sensitivity to measure the impacts of both unintentional and intentional traumatic experiences, only modifying it to refer better to one's religious experiences and finding high internal reliability for his sample ($\alpha=.92$, $n=273$). This modified version was the one used in the present survey.

Procedure

Because no comprehensive census of LGBTQ+ Mormons and ex-Mormons exists to facilitate probability-based sampling, the present study used a convenience sample of the target demographic through a variety of sources. The survey used in this study was advertised through various digital listservs, organizations involved in the LGBTQ+ community (such as Encircle and the University of Utah LGBT Resource Center), and the social media platforms of multiple individuals known to the LGBTQ+ community. The survey was distributed online and confidential data was collected through Qualtrics. In beginning the survey, participants were presented with a cover letter informing them that the survey would include questions about their personality, mental and physical well-being, sexual and gender identities, different types of experiences within the LDS church (such as meetings with their bishop), and social relationships. Participants were also assured that all information would be kept strictly confidential, that any questions could be skipped, and that they could decline or withdraw from the survey at any time. Information on available mental health resources was also given. Participants were asked if they understood the conditions set forth in the cover letter, and indication of understanding was received as informed consent. Documentation of consent was waived by the University of Utah due to the low-risk nature of the survey, as documentation of consent may have compromised confidentiality.

In taking the survey, participants were first asked to provide demographic information, including age, race and ethnicity, sexual and gender identity, sex at birth, and state of residence during their period of greatest concern (the time at which they had the greatest concern about being LGBTQ+ and LDS). They were then asked to answer items measuring scrupulosity, social safety, spiritual trauma, and secondary traumatic stress. On average, the survey took 32 minutes to complete.

Data Analysis

We used correlational and regression analysis to test our hypotheses. Our five outcomes were (1) self-reported PTSD symptomology in response to religious involvement (here denoted *religious trauma*), (2) self-reported experiences of social safety across both religious and nonreligious settings, (3) depressive symptoms, (4) scrupulosity (obsessive-compulsive symptomology related to religious expression), and (5) self-reported general health. The predictors were (1) age, (2) gender assigned at birth, and (3) cumulative exposure to religious teachings and beliefs that were experienced as harmful. All continuous variables (age, religious trauma, harmful religious teachings/beliefs, and religious/nonreligious social safety) were centered before analysis.

RESULTS

Descriptive Analyses

Church Engagement

The vast majority of respondents (98.0%, $n = 629$) were born into the LDS church; 1.9% ($n = 12$) were converted after age 8, and 0.2% ($n = 1$) preferred not to say. A minority of respondents (24.8%, $n = 159$) of respondents were currently active in the church (attended services at least once a month), while the majority (74.9%, $n = 481$) were inactive. Church activity was not disclosed for 0.3% ($n = 2$) of respondents. In terms of current standing with the church, 42.8% ($n = 275$) were members in good standing (not under church discipline), 2.5% ($n = 16$) were under formal or informal probation, 2.0% ($n = 13$) were disfellowshipped (placed in a probationary state as a result of having committed an infraction) 1.9% ($n = 12$) were

excommunicated, and 37.5% ($n = 241$) had resigned. 12.6% ($n = 81$) selected “other” for current standing, while 0.5% ($n = 3$) preferred not to say and 1 participant did not select an answer.

Respondents were asked to indicate their past and current involvement with the LDS church. For those respondents who were born as male, 98.9% ($n = 259$) were ordained to the Aaronic Priesthood (which usually occurs at age 12), and 79.4% ($n = 208$) were ordained to the Melchizedek Priesthood (which usually occurs at or after age 18). Women in the LDS church are not given access to either priesthood. Over three-quarters of respondents (79.8%, $n = 512$) held presidency positions in their Young Women’s or Young Men’s quorums prior to age 18, the cutoff point where members transfer from youth to adult programs. After age 18, 64.2% ($n = 412$) of respondents held/continue to hold leadership positions within the LDS church, including within the Melchizedek Priesthood quorum presidency, Relief Society presidency (the female equivalent of Melchizedek Priesthood presidency), ward and stake auxiliary presidency, and ward bishopric. Other forms of past involvement include receiving temple endowments (57.3%, $n = 368$), going on a proselytizing mission (42.7%, $n = 274$), and being sealed to a spouse in the temple (21.3%, $n = 137$). A minority of respondents (17.9%, $n = 17.9$) had current temple recommends, which are only given to individuals once they have affirmed their worthiness to enter. Recommends allow one to enter LDS temples and carry out sacred temple ordinances, some of which (temple endowments and marriage sealings) are considered essential to salvation (Nelson, Bednar, Scott, Allred, Parkin, & Thomas, n.d.). Overall, while the majority of respondents were not active within the church, many have engaged (or are currently engaged) with church practices and structures to a high degree.

Period of Greatest Concern

To better investigate exposure to potentially harmful church practices, respondents were asked to identify the age at which they first became concerned about the intersection of their LGBTQ+ identity and their LDS membership. Ages of first concern ranged from 8 to 62, with the mean age being 19.63 ($SD = 6.9$) years old. Duration of concern was calculated by subtracting the age of first concern from the respondent’s current age, and the average duration was found to be 19.63 ($SD = 9.3$) years. Due to missing responses, 631 responses (out of 642) were used to calculate the average. Roughly half of the respondents (58.4%, $n = 375$) were located in Utah when they felt the most concern about being LDS and LGBTQ+, while 41.6% ($n = 267$) were located outside of Utah during this period of greatest concern.

Primary Study Variables

Exposure to Harmful Religious Beliefs/Teachings

Exposure to harmful teachings was measured using the Spiritual Trauma scale developed by Simmons (2017). Respondents were presented with a list of beliefs and teachings pertaining to sexual and gender identities that are commonly present within the LDS church and asked to rank each on a Likert scale, with 1 being “extremely beneficial” and 5 being “extremely damaging,” while 3 was “neither damaging or beneficial.” Answers to each question were then categorized by whether the teaching/belief was considered beneficial (1-2 on the Likert scale) or harmful (3-5 on the Likert scale) by the respondent. The two categories were then summed for each respondent, with each answer being given a value of 1. The sum of beneficial beliefs/teachings ranged from 0 to 17, and the average sum was 0.3 ($SD = 1.1$). The sum of harmful beliefs/teachings ranged from 0 to 31, and the average sum was 20.4 ($SD = 6.3$).

PTSD/Religious Trauma

Religious trauma was operationalized via STSS, a secondary trauma scale with 17 items ($\alpha = .89$). With each item scored along a Likert scale from 1 (never) to 5 (very often) and modified to measure traumatic symptomology experienced in the LDS context, the average score was 3.4 ($SD = 0.9$).

Religious & Non-Religious Social Safety

Social safety was measured by asking individuals to rate the degree to which they felt safe across a variety of religious and nonreligious settings: “feeling safe” was explicitly described as “feeling secure enough that you don't have to devote thought or energy into how you will be perceived and treated - allowing you to be/feel like your authentic self.” Participants were asked to indicate their feelings of safety on a five-point Likert scale, with higher scores indicating greater safety. Nonreligious social safety (14 items) was assessed across the following settings: immediate family, extended family, close friends, acquaintances, strangers, sexually-diverse individuals, gender-diverse individuals, the workplace, home, public restrooms, airports, therapy, support groups, local LGBTQ centers or organizations. Religious social safety (11 items) was assessed in sacrament meeting, Sunday school, priesthood meeting-young women's, elders quorum-relief Society, high priests quorum, during stake conference, during Gen. conference, during mutual, during meetings with the bishop, during meetings with the stake presidency, and during seasonal-miscellaneous church social functions. Participants were instructed to leave items blank if that particular setting did not apply to them.

Depression

Depression measured with the the CESD-R measure, which is made up of 10 Likert-scale items ($\alpha = .91$) ranging from 1 (not at all) to 5 (nearly every day for at least two weeks). For this study, the average score was 2.4 ($SD = 0.9$).

Scrupulosity

Scrupulosity (a religious subset of OCD symptoms) was operationalized via the PIOS measure, an 18-item measure ($\alpha = .96$). Each item is scored along a Likert scale from 1 (never) to 5 (constantly). For this study, the average score was 2.5 ($SD = 1.0$).

General Health

General health was operationalized via the SF-36 measure, which is made up of eight subscales: physical functioning (9 items, $\alpha = .88$), physical role limitations (4 items, $\alpha = .87$), emotional role limitations (3 items, $\alpha = .85$), fatigue (4 items, $\alpha = .85$), well-being (5 items, $\alpha = .86$), social functioning (2 items) pain (2 items), and general health (5 items, $\alpha = .86$). The subscale used in our primary analyses was general health ($M = 65.5$, $SD = 19.0$).

Inferential Analyses

Question 1: Do individuals who report greater exposure to HARMFUL religious beliefs and teachings report more PTSD symptoms?

Exposure to harmful religious beliefs and teachings was positively correlated with greater self-reported PTSD symptomology, Pearson's $r(640) = .59$, $p < .001$. This strong positive association is graphically depicted in Figure 1 (see Appendix), which shows a scatterplot of participants' self-reported religious trauma as a function of their exposure to harmful church teachings.

Question 2: a) Is exposure to harmful teachings related to mental health (depression, scrupulosity, and general health)? And if so, b) is this effect MEDIATED by the religious trauma associated with these teachings?

a) A multivariate linear regression was run to test the predictive power of harmful LDS teachings/beliefs on mental health outcomes (depression, scrupulosity, and general health). It was found that the teachings/beliefs presented to participants significantly predicted self-reported symptoms of depression ($t = 5.23, p < .001$), scrupulosity ($t = 3.74, p < .001$), and general health ($t = -3.75, p < .001$). See Table 1 (in Appendix) for further details.

b) Religious trauma was then added to the model to test for mediation effects, and we found that the predictive power of religious trauma fully mediated the effect of harmful teachings/beliefs on mental health outcomes, $t = 8.66 (p < .001)$ for depression, $t = 4.10 (p < .001)$ for scrupulosity, and $t = -4.87 (p < .001)$ for general health. See Table 2 (in Appendix) for further details).

Question #3: Is religious trauma (and for that matter, exposure to harmful beliefs) associated with social safety?

A correlational analysis was run to determine whether religious trauma and/or exposure to harmful beliefs were associated with religious or nonreligious social safety. Significant negative correlations were found between religious social safety and both harmful beliefs ($r(642) = -.46, p < .001$) and religious trauma ($r(642) = -.53, p < .001$). A significant negative correlation was also found between nonreligious social safety and religious trauma ($r(642) = -.13, p = .001$), but the correlation between nonreligious social safety and harmful beliefs was not significant ($r(642) = .03, p = .408$).

Question #4: Given that social safety is associated with religious trauma, and that both religious trauma and social safety are related to mental health, is the effect of religious trauma on mental health mediated by religiously-specific social safety?

A multivariate linear regression model was run to test the mediating effect of religious social safety on the predictive relationship between religious trauma and mental health outcomes, and we found that religious trauma maintains its sole predictive power over mental health in two out of three cases. For depression, the effect of religious trauma remained dominant at $t = 8.18 (p < .001)$, while the effect of religious social safety did not reach significance at $t = -1.11 (p = .267)$. A similar result was found for general health; religious trauma maintained its significance at $t = -4.56 (p < .001)$, while religious social safety did not have a significant effect ($t = .82, p = .416$). However, religious social safety did have a significant effect on scrupulosity ($t = -2.65, p = .008$), independent of the significant effect of religious trauma ($t = 3.36, p < .001$). See Table 3 (in Appendix) for further details.

Question #5: Does nonreligious social safety contribute to mental health, independent of religious trauma?

For our final question, we ran a multivariate linear regression to find whether nonreligious social safety has an effect on mental health (controlling for religious trauma). Significant effects on all three mental health measures—depression ($t = -7.30, p < .001$), scrupulosity ($t = -5.99, p < .001$), and general health ($t = 3.41, p = .001$)—were found. See Table 4 (in Appendix) for further details.

DISCUSSION

The aim of the present study was to examine the unique contributions of religious trauma (LDS-specific PTSD symptomology) and social safety to the mental and physical health challenges of SGD (sexually- and gender-diverse) members of the LDS faith. We explored five different research questions, beginning with the more general (i.e., whether individuals who report greater exposure to harmful religious beliefs and teachings report more PTSD symptoms) and gradually narrowing the scope from there. First, inferential analyses found that as individuals were exposed to a greater number of harmful religious beliefs and teachings (e.g., their sexual or gender identities were associated with addiction or other temptations), they tended to report greater levels of religious trauma. Second, exposure to harmful religious teachings/beliefs significantly predicted all three of the measured health outcomes (depression, scrupulosity, and subjective general health), and when added to the analysis, religious trauma fully mediated this predictive relationship. In other words, the negative impact of harmful religious teachings on individuals' health was likely due to the trauma these teachings provoked. Third, we found that cumulative exposure to harmful religious beliefs/teachings and religious trauma were each significantly correlated with both religious and nonreligious social safety, thus hinting that social safety may also play a predictive role in how harmful religious teachings (and by extension, religious trauma) within the LDS faith affects the measured health outcomes.

This potential was explored in the fourth question, and we ultimately found that a lack of religious social safety (social safety in contexts exclusive to the LDS faith) did not predict higher levels of depression or subjective general health when compared to religious trauma; however, both religious social safety and religious trauma had significant effects on scrupulosity. It is unclear why religious social safety had a significant predictive effect on levels of scrupulosity, but overall, it seems that a perceived inability to safely express oneself within LDS-specific social situations does not significantly impact levels of depression or subjective general health. Finally, in exploring the potential effects of nonreligious social safety on participants' health outcomes, we found a very encouraging outcome—greater social safety outside of LDS contexts significantly was related to better health outcomes across the board, predicting lower levels of depression and scrupulosity, as well as better subjective general health. This result indicates that if one has access to at least a single supportive social network outside of LDS contexts, they are less likely to have high levels of depression and scrupulosity and more likely to have high levels of subjective general health.

Past research laid the groundwork for this study; one branch showed that participation by LGBTQ+ individuals in religions with discriminatory policies and doctrines was linked to negative health outcomes, including psychological distress, depression, and lower quality of life (Szymanski and Carretta, 2019; Dehlin et al., 2014), while another branch works linked traumatic symptomology in LGBTQ+ individuals to participation in discriminatory religions (Nardelli et al., 2019; Simmons, 2017). In both regards, the results of this study are consistent with previous research; as with Simmons (2017), a relationship was found between exposure to harmful beliefs/teachings in the LDS religion—labeled as *spiritual trauma* in Simmons's paper, though the measure used in the present study is identical—and religious trauma. However, the present study went further, finding that religious trauma plays a mediating role between harmful exposure and health outcomes, thus linking the two branches of literature. Interestingly, when controlling for the total amount of exposure to harmful beliefs and teachings, the single belief that uniquely predicted trauma symptomology was believing that one would be separated from their family because of their sexual/gender identity. This finding alone holds important implications for how LDS teachings are harmful to LGBTQ+ members and needs to be explored further.

The present study is also the first to propose social safety as a potential mediator in the relationship between PTSD/trauma and negative health outcomes in the context of institutionalized religion, despite there being a strong link between a lack of social safety cues and various health outcomes (Diamond et al., 2021). But while the present study did find significant correlations between social safety and all the measured health outcomes, religious social safety did not mediate the relationship between religious trauma and two of the outcomes—depression or general subjective health. This is inconsistent with the trends described by Diamond et al., but may simply be due to the fact that traumatic symptomology is a stronger predictor, while social safety may play a more subtle role.

Limitations

Due to the exploratory nature of the present study, some limitations should be noted. First, our study made use of convenience sampling for data collection, and as such, our results may not generalize perfectly to the population we attempted to study (LGBTQ+ individuals with past or present membership within the LDS church). The majority of respondents (~75%) were inactive in the church, but a significant minority (~25%) still attended services at least once a month; in addition, 64.2% of respondents held leadership positions within the church after age 18. And during the period of greatest concern about the intersection of LGBTQ+ and LDS identities, nearly half (41.6%) of participants lived outside of Utah. Due to these levels of variance within our sample, we do believe that the trends seen in our results may apply to both active and inactive segments of the population. And because of said sample variance, our future analyses will examine potential interactions of harmful exposure, PTSD symptomology, and social safety with varying durations and levels of involvement within the LDS church. Unfortunately, our sample demographics did not allow us to test for interactions with race or ethnicity.

Another limitation of our study is its retroactive nature. Many survey questions asked respondents to consider the impact of past events, and for some participants, these events may have taken place many years ago. Because of this, the accuracy of responses may vary across participants. This was also a cross-sectional study, with measures only being taken at one point in time. As such, this study was unable to detect any temporal effects of harmful exposure and/or trauma on health outcomes. This line of research would benefit massively from longitudinal study, and we plan to expand the present study to fill that need. Along a similar vein, the survey's measure of general subjective health measured participants' health across multiple timespans (in the past year, the past four weeks, etc.), and may have been impacted by the negative effects of SARS-CoV-2. Multiple respondents noted as much in their survey responses, citing COVID-19 as a cause of their recent health issues. As such, some subjective general health scores may be lower than they would have been otherwise.

A final limitation of this study is the lack of a comparison to the non-LGBTQ+ LDS community. Our work focused on the experiences of LGBTQ+ members, and as such, non-LGBTQ+ members were excluded from the study. However, without the capacity to compare our results with a community base rate, our ability to determine the differential impact of LDS participation on LGBTQ+ members is limited. Future research will need to take this into account.

Conclusion & Future Directions

Despite its limitations, the present study made some significant findings, many of which have important clinical implications. First and foremost, this study finds that many LGBTQ+ individuals within the LDS church have been exposed to harmful teachings and beliefs, and the

trauma evoked by these teachings and beliefs reliably predicts worse health outcomes in terms of depression, scrupulosity, and subjective general health. Second, this study finds that having sources of social safety outside of the LDS church (e.g., in school, peer groups, and LGBTQ+ support groups) reliably predicts better health outcomes, even when controlling for religious trauma. Together, these two findings imply potential avenues of treatment for this demographic, suggesting that greater outside support needs to be provided to LDS-involved LGBTQ+ individuals, especially in cases where said individuals are still active in the church and working to find balance in their lives. The APA Task Force on Appropriate Therapeutic Responses to Sexual Orientation (2009) emphasizes the importance of providing autonomy to individuals who are experiencing conflicts between their telic congruence (congruence with one's spiritual beliefs) and their organismic congruence (congruence with one's sense of self—in this case, one's sexual identity), as opposed to only providing the binary options of leaving their religion vs. suppressing their sexual identity. Providing nonreligious social support to those currently in the process of finding balance between their telic and organismic congruences may lessen the impact of harmful religious exposure, creating a much-needed protective buffer while they determine what type of identity integration will best fit them. More research is necessary to further explore and test these implications.

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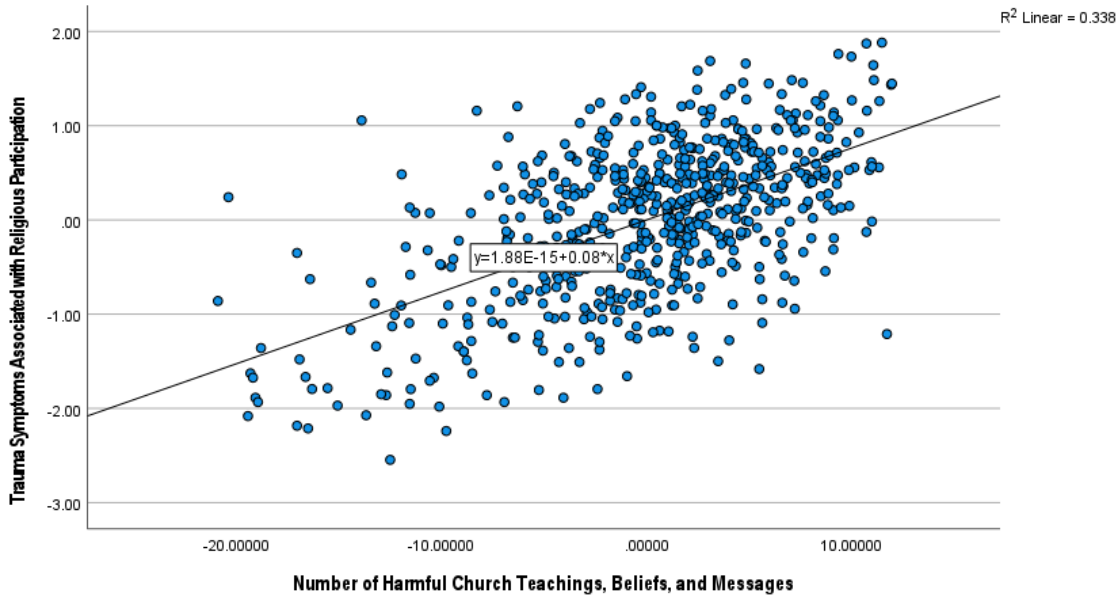
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APPENDIX

Figure 1

Association between exposure to church teachings and religious trauma, controlling for depressive symptoms



Note. A strong positive correlation is seen here; as exposure to harmful teachings and beliefs increased, religious trauma also increased.

Table 1

Results of regression model predicting depression, scrupulosity, and general health from cumulative exposure to harmful LDS teachings and beliefs

Variable	B	SE	t	p	%CI	η_p^2
Depression	.03	.01	5.23	< .001	[.02, .04]	.04
Scrupulosity	.02	.01	3.74	< .001	[.01, .04]	.02
General Health	-.45	.12	-3.75	< .001	[-.68, -.21]	.02

Note. The negative values seen for General Health reflect the structure of the SF-36, which assigns lower values to symptoms of poor health.

Table 2

Results of regression model testing the mediating effect of religious trauma on the relationship between cumulative exposure to harmful teachings/beliefs and mental health outcomes

Variable	B	SE	t	p	%CI	η_p^2
Depression	.40	.05	8.66	< .001	[.31, .49]	.11
Scrupulosity	.23	.06	4.05	< .001	[.12, .34]	.03
General Health	-.5.09	1.05	-4.87	< .001	[-7.15, -3.04]	.04

Note. The negative values seen for General Health reflect the structure of the SF-36, which assigns lower values to symptoms of poor health.

Table 3

Results of regression model testing the mediating effect of religious social safety on the relationship between religious trauma and mental health outcomes

Variable	B	SE	t	p	%CI	η_p^2
Rel. Trauma						
Depression	.386	.047	8.18	< .001	[.29, .48]	.10
Scrupulosity	.192	.06	3.36	.001	[.08, .31]	.02
General Health	-4.89	1.07	-4.56	< .001	[-7.00, -2.79]	.03
Rel. SS						
Depression	-.003	.002	-1.11	.267	[-.01, .002]	.002
Scrupulosity	-.01	.003	-2.65	.008	[-.01, -.002]	.01
General Health	.05	.06	.82	.416	[-.06, .15]	.001

Table 4

Results of regression model testing the effect of nonreligious social safety on mental health outcomes (controlling for religious trauma)

Variable	B	SE	t	p	%CI	η_p^2
Depression	-.02	.003	-7.30	< .001	[-.03, -.02]	.08
Scrupulosity	-.02	.004	-5.99	< .001	[-.03, -.02]	.05
General Health	.26	.08	3.41	.001	[.11, .41]	.02