Malcontents in the Middle: Uncertainty-Identity, Extreme Religious Groups and Leader Rhetoric

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Uncertainty-Identity, Extreme Religious Groups and Leader Rhetoric

BY

Jared K. Chapman

Claremont, California

2022
APPROVAL OF THE DISSERTATION COMMITTEE

This dissertation has been duly read, reviewed, and critiqued by the Committee listed below, which hereby approves the manuscript of Jared K. Chapman as fulfilling the scope and quality requirements for meriting the degree of Doctor of Philosophy in Psychology.

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Abstract

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Jared K. Chapman

Claremont Graduate University: 2022

Because religious extremism can set people on a path of aggression and violence toward others, sometimes in the form of terrorism (Moghaddam, 2005), identifying factors that increase susceptibility to religious extremism is essential to ending terrorism. One possible factor that acts as a catalyst leading people to religious extremism is uncertainty (Hogg et al., 2010a). To test this possibility, Chapman (2012) conducted an exploratory study assessing the effects of religiosity (defined as group, ritual, extrinsic, or external religiosity), spirituality (defined as individual, spiritual, intrinsic, or internal religiosity), and uncertainty (low, high) on a number of proxies for religious extremism, finding some evidence that low religiosity people were more susceptible to extremism than those with high religiosity or no religiosity. This unexpected finding informed the primary “malcontents in the middle” hypothesis for the present dissertation, which predicts low religiosity people to increase—and high religiosity people to decrease—their preferences for religious extremism under high uncertainty. Study 1 (N = 499) utilized measures and procedures derived from the 2012 study to assess the effects and interaction of religiosity and uncertainty while controlling for spirituality on five measures for proxies or correlates of religious extremism (ingroup clarity, ingroup superiority, member similarity, disliking critics, and engaging critics). Although the interactions were not significant, the trends were in the direction suggested by the primary hypothesis. Study 2 (N = 546) built on the design of Study 1,
adding religious leader rhetoric (moderate or extreme) as a predictor and religious leader endorsement as the main dependent variable. In line with the primary hypothesis, high religiosity people did not increase their endorsement of an extreme leader from low to high uncertainty, although they did significantly decrease their endorsement of a moderate. As expected, low religiosity people did not differ in their endorsement of the moderate leader regardless of uncertainty. However, contrary to the primary hypothesis, they did not increase their endorsement of the extreme leader as uncertainty increased. These findings may suggest that, compared to those with high religiosity, low religiosity people experiencing high uncertainty tend to be more susceptible to religious extremism, except when the extremist rhetoric is explicit.
Dedication

I dedicate this dissertation to my wife and sons, my mother and siblings, and every other friend or family member who has loved and supported me through this long and sometimes treacherous academic adventure. I also dedicate this dissertation to the memories of my grandparents, who did not live long enough to see me accomplish this triumph.
Acknowledgments

I would be remiss to not first acknowledge the person who inspired and mentored me in such a way that made me believe I could achieve a doctorate. My advisor and mentor through my undergraduate and pseudo-graduate studies at California State University, Bakersfield, Dr. Anne Duran, taught me how to turn my outlandish notions and ideas into social psychological research topics for which I could collect data, analyze, interpret, and present at conferences and in competitions. With her guidance, I achieved multiple scholarships, fellowships, and awards, boosting my self-confidence while suppressing any feelings of incompetence.

Admittedly, my time at Claremont Graduate University has been much longer than expected, given those earlier triumphs on my educational path. Still, I’m thankful for all I have learned and the amazing relationships I have developed here. Before arriving at Claremont Graduate University, I had a summer internship at UMASS-Amherst. While there, I gathered article after article on many topics, and a big chunk had Dr. Michael A. Hogg’s name all over them. So, when it came time to choose an advisor, I knew exactly who I wanted to court. I’m extremely thankful he allowed me into his inner sanctum of the Social Identity Lab because my imposter syndrome during my first year was overwhelming.

However, with Dr. Hogg’s guidance, I overcame it and developed a solid and interesting master’s thesis, which resulted in a serendipitous finding that would lead the way to this dissertation. Without his mentorship and understanding, I may not have completed my doctorate. I often questioned myself and where I was, but more often than not, he had the right answers to push me through, and for that, I am incredibly thankful.

I would also like to thank Dr. William D. Crano for enhancing my understanding of research methodology and attitude change, along with Dr. Suellen Crano, for giving me
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I met so many amazing people at CGU who have helped me through the years. I wish I could name them all, but space is limited. First, I would like to thank Dr. Amber M. Gaffney for the honor of agreeing to be the external reader for my dissertation. As a senior social identity lab member, she, along with Dr. David Rast, Dr. Monique Matelski, and John Haller, provided much-needed mentorship and some collaboration. From the health lab, Dr. Alexis Alabastro and Dr. Yuliyana Beleva provided support and mentorship. From my cohort, Dr. Brian Coaxum, Dr. John Coffey, Dr. Stephen Miller, Cody Packard, Dr. Shawn Serrano, Eugene Chang, and David Somlo, shared both struggles and good times, creating long-lasting friendships. So many have been collaborators, editors, and proofreaders on assignments and papers. I’m thankful for them all, and I know this dissertation is partly accomplished because they were in my life.

Finally, I want to acknowledge the people who have made tremendous sacrifices for me to achieve this wonderful accomplishment. For the first four years of my program, I drove back and forth every other week for two and a half hours in one direction to spend time with my sons. I’m thankful for and extremely proud of Mason and Jared (JD). They moved in with me when I married Heather, which can be difficult, but we made it work. Every day, she amazes me more and more, and I’m a better person because of her. I’m thankful for our son, Ronan, who has had to endure my doctoral experience from birth to five years old. And I’m extremely grateful for my mother. Without her support and love, I’m certain none of this would have been possible from the beginning.
# TABLE OF CONTENTS

**CHAPTER 1** ........................................................................................................... 1  

- Literature Review ............................................................................................... 1  
  - Religiosity, Social Identity, and Uncertainty ................................................. 2  
  - Entitativity, Extremism, and Uncertainty ..................................................... 4  
  - Preference for Extreme Religious Groups and Leadership ......................... 5  

- Master’s Thesis Reanalysis ................................................................................... 6  
- Current Research ................................................................................................. 8  

**CHAPTER 2** ........................................................................................................... 9  

- Study 1 .............................................................................................................. 9  
  - Method ........................................................................................................... 9  
    - Participants and Design ............................................................................. 9  
    - Procedure and Materials ......................................................................... 10  
  - Results ........................................................................................................... 15  
    - Scale Assessment and Demographic Analyses ....................................... 15  
    - Preference for Religious Extremism ........................................................ 17  
    - Contextual Religious Social Identification ............................................ 22  
    - Ancillary Analyses ..................................................................................... 23  
  - Discussion ....................................................................................................... 24  

**CHAPTER 3** ........................................................................................................... 27
TABLE OF TABLES

Table 1. Reliabilities, means, SDs, and intercorrelations of the IVs and DVs (Study 1)...........16
Table 2. Reliabilities, means, SDs, and intercorrelations of the IVs and DVs (Study 2)...........32
TABLE OF FIGURES

Figure 1. Study 1: Ingroup clarity as a function of religiosity moderated by uncertainty (± 1SD) for data from 2012 and present ................................................................. 19

Figure 2. Study 1: Ingroup superiority as a function of political orientation moderated by uncertainty (± 1SD) ................................................................. 24

Figure 3: Study 2: Religious leader endorsement as a function of religiosity moderated by uncertainty (± 1SD) and religious leader rhetoric (± 1SD) ........................................ 35

Figure 4: Study 2: Religious leader endorsement as a function of political orientation moderated by uncertainty (± 1SD) and religious leader rhetoric (± 1SD) ........................................ 38

Figure 5. Study 2: Religious social identification as a function of political orientation moderated by religious leader rhetoric (± 1SD) ................................................................. 40
CHAPTER 1

Literature Review

Who is more susceptible to violent religious extremism, a faithful adherent (strongly religious), an adamant atheist (strongly non-religious), or someone floundering in the middle (weakly religious)? Research indicates that religiously weak people—lacking religious literacy yet strongly identifying with their religion—are more likely to engage in extreme violence (Wilner & Dubouloz, 2010; Urooj & Tariq, 2015). Further, the act of strengthening group identification may increase susceptibility to the radicalization processes of extreme groups (Gartenstein-Ross & Grossman, 2009). Nevertheless, why would a weakly religious person strengthen their identification with an extreme religious group in the first place?

Uncertainty-identity theory (Hogg, 2000, 2007, 2012, 2021) asserts that people experiencing self-uncertainty about who they are, how they fit in the world, and what their future holds are filled with an overwhelming sense of discomfort. Uncertainty motivates people to seek ways to extinguish their negative feelings, so they can once again view the world as predictable and their behavior in it as effective. Strengthening identification with a group is one of the best ways to resolve the discomfort caused by uncertainty. However, if group identification is not readily available, people may seek new and potentially more extreme groups to do so (Hogg et al., 2010b). Unfortunately, the groups people tend to gravitate toward while experiencing uncertainty are highly entitative and ethnocentric, foster socialization and homogeneity, and promote populism (Gøtzsche-Astrup & Hogg, 2020). They may also espouse ideological orthodoxy through the rhetoric of a powerful, authoritative leader (Hogg, 2014, 2021; Horgan, 2016; Sageman, 2014; Wilner & Dublouoz, 2010). Accordingly, research has found that uncertainty increases the likelihood of joining and identifying strongly with an extreme group, as
well as supporting extreme actions and a strong leader (Hogg & Adelman, 2013; Hogg et al., 2010b; Rast et al., 2012; Rast et al., 2013).

The purpose of this dissertation is to examine the roles of religiosity and uncertainty in susceptibility to extremism. The review in this chapter begins with a summary of religiosity categorizations and their descriptions, which leads to an outline of social identity theory (Tajfel & Turner, 1979; Turner et al., 1987) and uncertainty-identity theory (Hogg, 2000, 2007, 2012, 2021) in relation to religion. This is followed by a brief review of entitativity (Campbell, 1958; Lickel et al., 2000), its relation to extremism, and how entitative groups may be preferred by people experiencing uncertainty, which can lead to greater preferences for extreme religious groups and leadership. Next, a brief overview of reanalyzed data from Chapman’s (2012) master’s thesis is presented. Finally, two experiments are outlined to test the hypotheses proposed in this review.

**Religiosity, Social Identity, and Uncertainty**

Research on religions is complex because religions provide both a group for identification needs and an existential belief system offering rewards in a future paradise for a life well-lived, in accordance with pre-ordained rules. Although the value or merit of a religious belief system cannot be addressed through psychological scientific methods, people can be categorized based on their level or type of religiosity to assess their religion in terms of a social group or identity. Past research has often categorized religion by (a) individual faith or belief, intrinsic, internal, private, or spiritual aspects of religiosity, or (b) group or identity, extrinsic, external, public, or ritual aspects of religiosity (Allport & Ross, 1967; Batson et al., 1993; Zinnbauer et al., 1997). The first is described as mature, open-minded, putting others before self, and viewing religion as an end in itself, whereas the second is described as immature, close-minded, self-serving, and
viewing religion as a means to obtain something (Batson et al., 1993). As such, type of religiosity can have pronounced effects on the attitudes and behaviors of adherents. For example, people more group-oriented versus individual faith-oriented (Allport & Ross, 1967) or religion-focused versus God-focused (Rowatt et al., 2014) tend to be more prejudiced.

Through the lens of social identity theory (Tajfel & Turner, 1986; Turner et al., 1987; also see Abrams & Hogg, 2010; Hogg, 2018; Hogg et al., 2017), religion can be assessed as a social group or identity, and its influence upon people can be explored. Two processes are involved when defining oneself in terms of a social group or identity (categorization and self-enhancement). Like other social groups or identities, religions are cognitively represented by categorizing people with prototypical attitudes and behaviors to explain ingroup members (including oneself) and stereotypical attitudes and behaviors to explain outgroup members. This depersonalization process transforms the way people view themselves (self-concept) and others, supplanting personal identity with the social identity defined by the categorization used. As the group defines the self, internalization of group norms and feelings of group-belongingness increase, thereby meeting self-enhancement needs (increased well-being and self-esteem) as the group offers support and status for the individual.

Uncertainty-identity theory (Hogg, 2000, 2007, 2012, 2021) extends social identity theory, suggesting that increased identification with a social group or identity is one of the most effective ways to reduce self-uncertainty. Uncertainty causes discomfort, motivating people to alleviate it and restore some semblance of certainty in their lives. Because group identification is especially effective in alleviating uncertainty, people will tend to seek out new groups or increase identification with a present group during times of uncertainty (see meta-analysis by Choi & Hogg, 2020), especially highly entitative groups (Hogg et al., 2007; Hogg et al., 2010b;
Reid & Hogg, 2005; Sherman et al., 2009; also see Castano et al., 2003; Jetten et al., 2000; Yzerbyt et al., (2000) and more extreme groups (Hogg et al., 2010b).

**Entitativity, Extremism, and Uncertainty**

Entitativity refers to the clarity and distinctiveness of the identity of a group and corresponds to the interdependence and similarity (among other characteristics) of the group’s members (Campbell, 1958; Lickel et al., 2000). Highly entitative groups offer distinct boundaries to define who are and who are not members, as well as prescribe and proscribe distinct attitudes and behaviors for members to follow, which increase ingroup similarity and uniformity (Campbell, 1958; Hamilton & Sherman, 1996; Hogg 2004, 2005; Hogg et al., 2007; Jetten et al., 2000). These factors make highly entitative groups especially appealing during times of uncertainty because they eliminate the strange or unknown and provide some semblance of security (Hogg, 2014, 2021; Hogg et al., 2007). Accordingly, research manipulating uncertainty and entitativity indicates the greatest social identification occurs among people facing uncertainty when their ingroup is highly entitative (Hogg et al., 2007).

Extreme groups, especially those linked to terrorism, have the characteristics of highly entitative groups (Hogg et al., 2010a). However, not all extreme groups are violent (Ghosh et al., 2017). Extremism generally refers to an extreme attitude toward a group’s strong ideological orthodoxy, which corresponds to the belief that the group holds the only true ideology that all people must adhere to (Davies, 2009). The problem arises when extreme groups incorporate violence deemed justified by their extreme beliefs and moral superiority, as well as actively radicalizing members, increasing their willingness to accept and commit such violence (see Belavadi et al., 2020). Research on extremism and uncertainty indicates that people experiencing uncertainty will seek more extreme groups. If the new group does not fully accept them (or they
do not exactly fit), then they are more likely to become zealots and engage in extreme (and often violent) group behaviors to gain greater acceptance within the group (Goldman & Hogg, 2016; Hohman et al., 2017). Therefore, uncertainty may be the primary precursor to terrorism, as it is the catalyst that makes the individual susceptible to extremism (Hogg, 2014, 2021; Hogg et al., 2010a).

To be sure, uncertainty leads to increased religious seeking (Laurin et al., 2008; Silber & Bhatt, 2007; Van den Bos et al., 2006), more extreme and orthodox religious beliefs, and increased religious conviction or zeal (Kay et al., 2008; McGregor et al., 2008; McGregor et al., 2010). Further, those suffering existential or ideological uncertainty are very susceptible to the promises of relief provided by extremist propaganda (e.g., Kruglanski et al., 2006; Kruglanski et al., 2020; Kruglanski & Webster, 1996). For example, left-leaning individuals showed greater interest in and are more vulnerable to the persuasiveness of right-wing extremist propaganda when faced with an existential threat (Frischlich et al., 2015). Additionally, there is some evidence that people become more protective of their religious identity and beliefs under self-uncertainty, and that effect is strongest for people whose religious identity is central to their self-concept (Van den Bos et al., 2006).

**Preference for Extreme Religious Groups and Leadership**

All groups are probably prone to extremism during uncertain times, especially religions with strong assertions of moral superiority (Hogg et al., 2010a; Van den Bos et al., 2006). They provide affirming identities important to self-concept and belief systems to alleviate existential concerns, which can reduce uncertainty and enhance group identification. As group identification is strengthened, people experiencing uncertainty may become more susceptible to the group’s ideology, beliefs, attitudes, and behaviors that are likely more extreme than those they had
previously held (Gaffeney et al., 2014; Hogg, 2014; Van den Bos, 2009). Consequently, people experiencing uncertainty are more likely to identify with extreme groups that are highly entitative and ethnocentric, support extreme actions that may ultimately result in violence, and prefer a powerful and authoritative leader who espouses a clear mission (Hogg, 2014, 2021; Hogg & Adelman, 2013; Hogg et al., 2010b; Rast et al., 2012; Rast et al., 2013).

However, high religiosity people belonging to a religious group may not need to seek a more extreme group to resolve their uncertainty because their present group provides a solid religious foundation that alleviates any feelings of uncertainty. Rather, people with low religiosity who do not have the same religious foundations as those with high religiosity are more likely to be susceptible to extreme religious groups and the rhetoric of their leaders, whose autocratic and directive styles are preferred during times of uncertainty.

Group leaders are generally prototypical group members, personifying the attributes of the group and serve as attitudinal and behavioral models, but people experiencing uncertainty are more willing to support a non-prototypical leader (Hogg, 2001, 2005, 2007, 2014; Hogg et al., 2012; Rast et al., 2012; Tyler & Lind, 1992). Further, uncertainty tends to lead people to support leaders who are more directive or autocratic than democratic (Hogg, 2005, 2007; Rast et al., 2013; Schoel et al., 2011) because they are likely perceived as having greater clarity and sense of direction than democratic or moderate leaders (Hogg & Adelman, 2013). As such, people facing uncertainty will support clear, powerful leaders even if they are far from being prototypical of the group as a whole (e.g., America’s Donald Trump and Brazil’s Jair Bolsonaro).

Master’s Thesis Reanalysis

Chapman’s (2012) master’s thesis adapted a number of items from common measures to assess the effects of religiosity, spirituality, and uncertainty on preference for 65 proxies of
religious extremism. The initial analyses with religiosity (low, high), spirituality (low, high), and uncertainty (low, high) as categorical predictors revealed an unexpected finding; people with low religiosity increased their preference for proxies of religious extremism, whereas those with high religiosity decreased their preference, especially considering preferences for clear and powerful leadership, a group with a clear mission, and engaging critics. This serendipitous finding guided the development of the “malcontents in the middle” hypothesis and the focal interests for each study in the present dissertation. Still, the exploratory nature of the master’s thesis had several limitations, including the sheer number of items needing to be completed, which may have resulted in participant fatigue.

To address the limitations and aid in the design of the studies in the present dissertation, data from the master’s thesis (N = 163) were reanalyzed. First, all items underwent reliability and exploratory factor analyses to define new measures. From 45 religiosity items, five items assessing religiosity (e.g., group or identity, extrinsic, external, public, or ritual) and five items assessing spirituality (e.g., individual faith or belief, intrinsic, internal, private, or spiritual) were retained to create a 10-item religiosity composite scale. From 65 items reflecting possible proxies of religious extremism, measures were developed to assess five factors: ingroup clarity, ingroup superiority, member similarity, disliking critics, and engaging critics. Second, procedures were streamlined or modified to enhance their power. For example, adverbs connoting urgency were added to the uncertainty prime, and a 60-second certain/uncertain word search was added between the prime and religiosity measure to provide a boost and to buffer from a possible affirming identity. Finally, hierarchical multiple regressions of religiosity and uncertainty with spirituality as a covariate were performed on the five measures for proxies of religious
extremism, confirming and fine-tuning the unexpected finding from the original master’s thesis analyses.

**Current Research**

Two studies were designed to test the malcontents in the middle hypothesis that resulted from the serendipitous finding of Chapman’s (2012) master’s thesis and supported by its reanalysis: low religiosity people will increase their preference for extremism when experiencing high uncertainty, but those with high religiosity will decrease. The present studies built upon that previous work by utilizing more refined techniques and measures drawn from the reanalyzed data. In both studies, participants completed the religiosity composite scale and were primed with uncertainty. Study 1 examined the effects and interaction of religiosity and uncertainty (while controlling for spirituality) on preferences for proxies of religious extremism. Contextual religious social identification was counterbalanced as a dependent variable in both studies. Study 2 added the prime for religious leader rhetoric (moderate, extreme) as a predictor between the religiosity composite scale and uncertainty prime to examine their effects and interactions (while controlling for spirituality) on the endorsement of the religious leader.
CHAPTER 2

Study 1

Study 1 built upon Chapman’s (2012) master’s thesis to test the new malcontents in the middle hypothesis with refined measures and techniques drawn from a secondary analysis of the thesis data. To test the proposition that individuals lower in religiosity will be more susceptible to religious extremism under high uncertainty than those with high religiosity, participants first completed the religiosity composite scale. The religiosity subscale was the continuous predictor, and the spirituality subscale was a planned covariate. Next, participants were experimentally primed with uncertainty (categorical predictor). Finally, participants completed five measures reflecting different proxies of religious extremism (ingroup clarity, ingroup superiority, member similarity, disliking critics, and engaging critics) counterbalanced with the contextual religious social identification measure.

It was hypothesized that in the low uncertainty condition, people higher in religiosity would show greater preferences for the proxies of religious extremism and have higher religious identification than people low in religiosity. However, in the high uncertainty condition, it was hypothesized that low religiosity people would strengthen their religious identification and preferences for the proxies of religious extremism, whereas high religiosity people would weaken their preferences.

Method

Participants and Design

The data from 542 participants from the United States of America who were not adamantly non-religious were recruited from Amazon’s Mechanical Turk (MTurk) via CloudResearch.com. MTurk is a crowdsourcing website where anonymous “workers” are paid
minimal compensation to complete Human Intelligence Tasks (HITs) posted online by requesters. It has been effectively used to collect reliable and valid data from online participants (Hauser & Schwarz, 2016; Paolacci & Chandler, 2014). The sample size was determined by a power analysis using G*Power (power = .90, $f = .20$, $p = .05$).

After data screening, 43 participants (8%) were dropped due to admission of adamant non-religiousness (12 participants or 2%) or incomplete or incorrect responses to the uncertainty manipulation (31 participants or 6%), which follows Mason and Suri’s (2012) recommendation to remove “bad” data when using MTurk for data collection. The resulting dataset sample size was 499 (286 female, 209 male, 4 non-binary/third gender) aged 19 to 80 ($M = 41.49$, $SD = 13.490$). Participants were predominately white (76.8%), followed by African-American (9.4%), Asian-American (7.6%), Hispanic (4.0%), and other (2.2%). Most participants were college-educated (19.4% had some college, 11.2% had a two-year degree, 43.1% had a four-year degree, and 17% had a graduate degree); only 9% had a high school education or less. Most participants indicated they were Christian (76.4%); the remainder were other (9.8%), agnostic (5.6%), Buddhist (3.4%), Islamic (1.8%), Hindu (1.4%), and Jewish (1.4%).

Participants completed an online survey (hosted by Qualtrics) assessing religious feelings, beliefs, behaviors, and attitudes. Religiosity and spirituality were measured, and uncertainty was primed before participants completed the counterbalanced dependent variable measures. Compensation to participants was $1.00.

**Procedure and Materials**

A HIT was posted on MTurk, asking participants to complete “an academic survey of religious feelings, beliefs, behaviors, and attitudes” with a pay rate of one dollar ($1.00) for completion. The HIT asked the following prompt, “This study is about your religious feelings,
beliefs, behaviors, and attitudes. If you are an atheist or have no interest in religion for yourself, please do not continue with this survey.” The following question then appeared below, “Are you an atheist or have no interest in religion?” This question attempted to reduce the number of adamantly non-religious individuals in the dataset who were thanked for their time and interest. Participants who answered no were automatically redirected to the informed consent page of the online survey hosted by Qualtrics.

**Religiosity Composite Scale**

After completing the informed consent, participants were directed to the survey (see Appendix A: Measures for Study 1). First, they completed the pilot tested 10-item religiosity composite scale derived from the 2012 data reanalysis, consisting of two highly correlated ($r = .633$) counterbalanced 5-item subscales measuring different dimensions of religiosity.

The religiosity subscale assessed group or identity dimensions of religiosity often described as extrinsic, external, public, or ritual (Allport & Ross, 1967; Batson et al., 1993). The five religiosity items were “I attend religious services more than most people I know,” “Besides religious services, I often take part in other activities at my religious center,” “I feel that it is very important to offer my talents to my religious community,” “I go to my religious center because it is a place where I can make good friends,” and “Being a member of my religion allows me to establish myself as a person in the community,” 1 not strongly disagree, 9 strongly agree – ($\alpha = .835$).

The spirituality subscale assessed faith or belief dimensions often described as intrinsic, internal, private, or spiritual (Allport & Ross, 1967; Batson et al., 1993; Zinnbauer et al., 1997). The five spirituality items were “I find comfort in my spirituality,” “I find strength in my spirituality,” “Spirituality is especially important because it answers many questions about the
meaning of life,” “Without my sense of spirituality, my life would be meaningless,” “It is important to spend time in private prayer/meditation,” 1 not strongly disagree, 9 strongly agree – (α = .902).

Uncertainty Boost and Prime

Participants were then randomly assigned to low or high uncertainty conditions. Because Chapman (2012) indicated a possible need to amplify the power of the uncertainty prime for online data collection, participants were given a boost before completing the uncertainty manipulation for their condition, which also provided a 60-second buffer between the prime and a potentially affirming identity. The boost was a one-minute-long word search with a matrix of letters for words reflecting certainty (e.g., trustworthy, safe, secure) or uncertainty (e.g., risky, unclear, questionable), which was pilot tested prior to the study.

When the 60 seconds ran out, participants continued to the uncertainty prime, which included the adverbs “very” and “most” to amplify the certainty or uncertainty asking to be documented. The prime asked participants to “Spend a minute or so thinking about aspects of your life and your experiences that make you feel very uncertain [certain] about yourself, your life, your future, and what kind of a person you are. Write a few sentences about those that make you feel most uncertain [certain] about yourself.” This priming method was adapted from previous studies successfully using a similar prime (e.g., Hogg et al., 2007; Hohman & Hogg, 2015; Hohman et al., 2017; Sherman et al., 2009).

Dependent Variables

The dependent variables were counterbalanced, allowing half of the participants to receive the measures for proxies of religious extremism first and the other half to receive the contextual religious social identification measure first.

Ingroup Clarity. Nine items reflected preference for ingroup clarity; five items measured clear group structure and intergroup boundaries, which are essential aspects of entitativity (Campbell, 1958; Lickel et al., 2000); and four items measured a clear and powerful group leader with a clear mission and opinions. The five clear group items were “How much do you prefer to belong to religious groups that possess a clear sense of unity among the group members,” “How much do you prefer to belong to a religious group that has clear boundaries for who is a member,” “How much do you prefer to belong to a religious group that has a clear structure for the duties of its members,” “How much do you prefer your religious group to have a clear hierarchical structure,” and “How much do you prefer to belong to a religious group that has a clear mission.” The four clear leader items were “How much do you prefer to belong to a religious group where you can clearly see who the leader is,” “How much do you prefer to belong to a religious group that has a powerful leader,” “How much do you prefer a religious leader who has clear opinions,” and “How much do you prefer a religious leader who has a clear mission,” 1 not very much, 9 very much (α = .916).

Ingroup Superiority. Two items reflected preference for ingroup superiority and ethnocentrism (r = .70). The items were “How much do you feel that your religion is better than other religions,” and “How much do you believe that your religious beliefs are the “Truth” and other religion’s beliefs are not,” 1 not very much, 9 very much (α = .821).

Member Similarity. Three items reflected preference for ingroup similarity and interdependence of members sharing a common fate, an essential aspect of entitativity (Campbell, 1958; Lickel et al., 2000). The items were “How much do you believe that members
within your religious group share a common fate,” “How much do you feel that everyone in your religious group has similar views,” and “How much do you believe that members within your religious group have common goals,” 1 not very much, 9 very much ($\alpha = .707$).

**Disliking Critics.** Three items reflected willingness to dislike critics of their religious group. The items were “How much would you dislike members of your religion who criticize your religion,” “How much would you dislike people of other religious groups who criticize your religion, and “How much would you dislike non-religious people who criticize your religion,” 1 not very much, 9 very much ($\alpha = .828$).

**Engaging Critics.** Three items reflected willingness to engage critics of their religious group. The items were “How much are you willing to discuss the "Truth" of your religious beliefs with someone whose beliefs differ from yours,” “How much are you willing to explain to people of other religious groups that their criticisms of your religion are unfounded,” and “How much are you willing to discuss the "Truth" of your religious beliefs with non-religious people,” 1 not very much, 9 very much ($\alpha = .846$).

**Contextual Religious Social Identification.** Six items adapted from various social identity measures (Hains et al., 1997; Hogg & Hains, 1996; Hogg et al., 1998; Hogg et al., 2007) asked participants how they felt at this moment regarding their religious group or community. These questions reflected feelings related to pride, identification, fitting well, strong ties, importance, and solidarity, 1 not very much, 9 very much - ($\alpha = .929$).

**Demographics and Debriefing**

Finally, participants completed a demographics scale consisting of an open-ended question asking about age and closed-ended questions asking about gender, ethnicity, highest level of education completed, religious preference, political orientation and affiliation, household
income level, and state residing. This was followed by a debriefing about the true nature of the study, after which participants were thanked for their time and provided a confirmation code to receive compensation through MTurk.

**Results**

Study 1 had one continuous predictor (religiosity) and one categorical predictor (uncertainty prime) with a planned covariate (spirituality). The key dependent variables were proxies of extremism, including ingroup clarity, ingroup superiority, member similarity, disliking critics, and engaging critics. Contextual religious social identification was also measured. Because one of the predictors was continuous, hierarchical multiple regressions were performed on mean-centered predictor variables with calculated interaction terms, which underwent simple slopes analyses if found significant (Aiken & West, 1991).

**Scale Assessment and Demographic Analyses**

Reliability and exploratory factor analyses with oblimin rotations were performed on the multi-item measures. As expected, two factors emerged for the religiosity composite scale. Spirituality accounted for 48.118% of the variance (Eigenvalue = 4.812) and religiosity accounted for 19.062% of the variance (Eigenvalue = 1.906). No loadings were less than .702 for their respective factors on the structure matrix. The factors have a significant positive correlation ($r = .427$).

As expected, five factors emerged from an exploratory factor analysis that included all the proxies of religious extremism. Ingroup clarity accounted for 38.290% of the variance (Eigenvalue = 7.658); all factor loadings were above .627. Disliking critics accounted for 11.273% (Eigenvalue = 2.255); all factor loadings were above .812. Engaging critics accounted for 9.780% (Eigenvalue = 1.956); all factor loadings were above .797. Member similarity
accounted for 5.259% (Eigenvalue = 1.052); all factor loadings were above .743. Ingroup superiority accounted for 5.143% (Eigenvalue = 1.029); all factor loadings were above .811.

As expected, one factor emerged for contextual religious social identification, accounting for 73.811% of the variance (Eigenvalue = 4.429); all factor loadings were above .818. For all multi-item measures, the skew and kurtosis were between -1 and 1. The reliabilities, means, SDs, and intercorrelations of the multi-item measures, along with the categorical predictor, are presented in Table 1.

The regressions of the predictors (religiosity and uncertainty) on the demographic variables (gender and political orientation) and spirituality yielded significant effects, indicating their potential use as covariates. Both religiosity ($\beta = -.093$, $t(496) = -2.096$, $p = .037$) and uncertainty ($\beta = .094$, $t(496) = 2.104$, $p = .036$) predicted gender, $R^2 = .017$, $F(2,496) = 4.265$, $p = .015$. Religiosity predicted political orientation ($R^2 = .014$, $F(2, 496) = 3.619$, $p = .028$; $\beta = -.116$, $t(496) = -2.606$, $p = .009$) and spirituality ($R^2 = .183$, $F(2, 496) = 44.455$, $p < .001$; $\beta = .427$, $t(496) = 10.524$, $p < .001$). These covariates were included in subsequent analyses.

### Table 1: Reliabilities, means, SDs, and intercorrelations of the IVs and DVs

<table>
<thead>
<tr>
<th>Variable</th>
<th>$a$</th>
<th>$M$</th>
<th>$SD$</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
<th>9</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Religiosity (5 items)</td>
<td>0.84</td>
<td>4.44</td>
<td>1.86</td>
<td>-.43**</td>
<td>.03</td>
<td>.51**</td>
<td>.39**</td>
<td>.46**</td>
<td>.22**</td>
<td>.38**</td>
<td>.63**</td>
<td></td>
</tr>
<tr>
<td>2. Spirituality (5 items)</td>
<td>0.90</td>
<td>6.77</td>
<td>1.73</td>
<td>-.02</td>
<td>.41**</td>
<td>.39**</td>
<td>.38**</td>
<td>.14**</td>
<td>.43**</td>
<td>.51**</td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. Uncertainty</td>
<td>-</td>
<td>0.65</td>
<td>0.48</td>
<td>-.11*</td>
<td>.03</td>
<td>.01</td>
<td>.02</td>
<td>.05</td>
<td>-.02</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. Ingroup Clarity (9 items)</td>
<td>0.92</td>
<td>5.73</td>
<td>1.73</td>
<td>-.50**</td>
<td>.60**</td>
<td>.28**</td>
<td>.37**</td>
<td>.50**</td>
<td></td>
<td></td>
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</tr>
<tr>
<td>5. Ingroup Similarity (3 items)</td>
<td>0.92</td>
<td>5.01</td>
<td>2.36</td>
<td>-.43**</td>
<td>.33**</td>
<td>.42**</td>
<td>.44**</td>
<td></td>
<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>6. Member Similarity (3 items)</td>
<td>0.71</td>
<td>6.03</td>
<td>1.54</td>
<td>-.17**</td>
<td>.42**</td>
<td>.60**</td>
<td></td>
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<tr>
<td>7. Disliking Critics (3 items)</td>
<td>0.83</td>
<td>4.27</td>
<td>1.90</td>
<td>-.11*</td>
<td>.18**</td>
<td></td>
<td></td>
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<td></td>
</tr>
<tr>
<td>8. Engaging Critics (3 items)</td>
<td>0.85</td>
<td>5.58</td>
<td>2.10</td>
<td>-.46**</td>
<td></td>
<td></td>
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<tr>
<td>9. Religious Identification (6 items)</td>
<td>0.93</td>
<td>5.83</td>
<td>1.81</td>
<td>-</td>
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</table>

*Note: Means range between 1 (low) and 9 (high), except for Uncertainty, which is a binary variable with 0 (low) and 1 (high). N = 499, * $p < .05$, ** $p < .01$"
Preference for Religious Extremism

The malcontents in the middle hypothesis predicts low religiosity people experiencing high uncertainty to have greater preferences for the proxies of religious extremism than those experiencing low uncertainty. In contrast, high religiosity people experiencing low uncertainty will have greater preferences than those experiencing high uncertainty. To test these expectations, hierarchical regressions of religiosity and uncertainty with spirituality, gender, and political orientation added as covariates at step 1 were performed on each of the five measures for proxies of religious extremism: ingroup clarity, ingroup superiority, member similarity, disliking critics, and engaging critics.

Ingroup Clarity

At step 1, the covariates were regressed on ingroup clarity; this revealed significant effects, $R^2 = .243$, $F(3, 495) = 53.055$ $p < .001$. A significant positive relationship was observed between spirituality and ingroup clarity ($\beta = .387$, $t(495) = 9.552$, $p < .001$), and significant negative relationships were observed between gender and ingroup clarity ($\beta = -.112$, $t(495) = -2.787$, $p = .006$) and political orientation and ingroup clarity ($\beta = -.236$, $t(495) = -5.872$, $p < .001$). At step 2, adding religiosity and uncertainty explained significantly greater variance in ingroup clarity, $R^2 = .368$, $\Delta R^2 = .125$, $F(2, 493) = 48.586$, $p < .001$. Significant main effects emerged for religiosity ($\beta = .380$, $t(493) = 9.428$, $p < .001$) and uncertainty ($\beta = .088$, $t(493) = 2.437$, $p = .015$). At step 3, the addition of the interaction of religiosity and uncertainty revealed no significant increase in the amount of variance explained, $R^2 = .369$, $\Delta R^2 = .001$, $F(1, 492) = .935$, $p = .334$.

In contrast, the interaction of religiosity and uncertainty (with spirituality as a covariate) was significant on ingroup clarity in Chapman’s (2012) reanalyzed data, $R^2 = .528$, $\Delta R^2 = .019$,
\[ F(1, 158) = 6.368, \ p = .013. \] Analysis of simple slopes for the 2012 data revealed a steeper increase from low to high religiosity for low uncertainty \((\beta = .54, t(158) = 6.47, \ p < .01)\) than high uncertainty \((\beta = .29, t(158) = 3.51, \ p < .01)\). This suggests that high religiosity people increased—and low religiosity people decreased—preference for ingroup clarity when experiencing low uncertainty compared to high uncertainty, providing some confirmation for the malcontents in the middle hypothesis. Figure 1 plots the relationship between religiosity and ingroup clarity moderated by uncertainty for the reanalyzed data from 2012 and the present data. The side-by-side comparison illustrates a difference in the trends for high religiosity individuals.

Overall, people with high religiosity scored higher on preference for ingroup clarity than those with low religiosity. In 2012, scores for ingroup clarity were significantly lower under high uncertainty than low uncertainty for high religiosity people \((\beta = -.74, t(158) = -2.06, \ p = .04)\), whereas their preference did not differ in the present study \((\beta = .19, t(492) = 1.01, \ p = .31)\). In 2012, low religiosity people had a nonsignificant increase in preference for ingroup clarity from low to high uncertainty \((\beta = .53, t(158) = 1.50, \ p = .14)\), whereas their increase was significant in the present study, \((\beta = .44, t(492) = 2.42, \ p < .02)\). Taken together, these findings provide some support for the malcontents in the middle hypothesis.

**Ingroup Superiority**

At step 1, the covariates were regressed on ingroup superiority; this revealed significant effects, \(R^2 = .257, F(3, 495) = 57.177 \ p < .001\). A significant positive relationship was observed between spirituality and ingroup superiority \((\beta = .351, t(495) = 8.727, \ p < .001)\), and significant negative relationships were observed between gender and ingroup superiority \((\beta = -.119, t(495) = -2.992, \ p = .003)\) and political orientation and ingroup superiority \((\beta = -.297, t(495) = -7.452, \ p = .001)\). At step 2, adding religiosity and uncertainty explained significantly greater variance in
Ingroup clarity as a function of religiosity moderated by uncertainty (± 1SD) for data from 2012 and present

ingroup superiority, $R^2 = .304, \Delta R^2 = .047, F(2, 493) = 16.492, p < .001$. A significant main effect emerged for religiosity ($\beta = .242, t(493) = 5.709, p < .001$). At step 3, the addition of the interaction of religiosity and uncertainty revealed no significant increase in the amount of variance explained, $R^2 = .305, \Delta R^2 = .001, F(1, 492) = .886, p = .347$.

Although the interaction for ingroup superiority was not significant, the trend was in the direction of the malcontents in the middle hypothesis. Overall, high religiosity people had a greater preference for ingroup superiority. However, their preference decreased under high uncertainty, whereas those with low religiosity increased.
**Member Similarity**

At step 1, the covariates were regressed on member similarity; this revealed significant effects, $R^2 = .175, F(3, 495) = 35.026, p < .001$. A significant positive relationship was observed between spirituality and member similarity ($\beta = .373, t(495) = 8.804, p < .001$), and significant negative relationships were observed between gender and member similarity ($\beta = -.086, t(495) = -2.050, p = .041$) and political orientation and member similarity ($\beta = -.135, t(495) = -3.224, p = .001$). At step 2, adding religiosity and uncertainty explained significantly greater variance in member similarity, $R^2 = .271, \Delta R^2 = .096, F(2, 493) = 32.546, p < .001$. A significant main effect emerged for religiosity ($\beta = .349, t(493) = 8.064, p < .001$). At step 3, the addition of the interaction of religiosity and uncertainty revealed a marginally significant increase in the amount of variance explained, $R^2 = .275, \Delta R^2 = .004, F(1, 492) = 2.782, p = .096$.

Although the interaction for member similarity was only marginally significant, the trend was in the direction of the malcontents in the middle hypothesis. Overall, high religiosity people had a greater preference for member similarity. However, their preference decreased under high uncertainty, whereas those with low religiosity increased their preference.

**Disliking Critics**

At step 1, the covariates were regressed on disliking critics; this revealed significant effects, $R^2 = .052, F(3, 495) = 9.117, p < .001$. A significant positive relationship was observed between spirituality and disliking critics ($\beta = .109, t(495) = 2.412, p = .016$) and a significant negative relationship was observed between political orientation and disliking critics ($\beta = -.182, t(495) = -4.036, p = .001$). At step 2, adding religiosity and uncertainty explained significantly greater variance in disliking critics, $R^2 = .081, \Delta R^2 = .028, F(2, 493) = 7.551, p < .001$. A significant main effect emerged for religiosity ($\beta = .188, t(493) = 3.867, p < .001$). At step 3, the
addition of the interaction of religiosity and uncertainty revealed no significant increase in the amount of variance explained, $R^2 = .083$, $\Delta R^2 = .002$, $F(1, 492) = 1.210, p = .272$.

Although the interaction for disliking critics was not significant, the trend was in the direction of the malcontents in the middle hypothesis. Overall, high religiosity people had a greater willingness to dislike critics. However, their willingness decreased under high uncertainty, whereas those with low religiosity increased their willingness.

**Engaging Critics**

At step 1, the covariates were regressed on engaging critics; this revealed significant effects, $R^2 = .198$, $F(3, 495) = 40.693 p < .001$. A significant positive relationship was observed between spirituality and engaging critics ($\beta = .425$, $t(495) = 10.179, p < .001$), and significant negative relationships were observed between gender and engaging critics ($\beta = -.091$, $t(495) = -2.210, p = .028$) and political orientation and engaging critics ($\beta = -.084$, $t(495) = -2.029, p = .043$). At step 2, adding religiosity and uncertainty explained significantly greater variance in engaging critics, $R^2 = .238$, $\Delta R^2 = .040$, $F(2, 493) = 13.033, p < .001$. A significant main effect emerged for religiosity ($\beta = .220$, $t(493) = 4.978, p < .001$). At step 3, the addition of the interaction of religiosity and uncertainty revealed no significant increase in the amount of variance explained, $R^2 = .239$, $\Delta R^2 = .000$, $F(1, 492) = .082, p = .775$.

Although the interaction for engaging critics was not significant, the trend was in the direction of the malcontents in the middle hypothesis. Like ingroup clarity, high religiosity people had an overall greater willingness to engage critics, which did not change as uncertainty increased. People with low religiosity, however, showed a slight increase in their willingness as uncertainty increased.
Contextual Religious Social Identification

The malcontents in the middle hypothesis predicts low religiosity people experiencing high uncertainty to have higher religious identification those experiencing low uncertainty. In contrast, high religiosity people likely will not differ on religious identification regardless of their level of uncertainty. To test these expectations, hierarchical regressions of religiosity and uncertainty with spirituality, gender, and political orientation added as covariates at step 1 were performed on contextual religious social identification.

At step 1, the covariates were regressed on religious identification; this revealed significant effects, $R^2 = .278$, $F(3, 495) = 63.498$, $p < .001$. A significant positive relationship was observed between spirituality and religious identification ($\beta = .506$, $t(495) = 12.787$, $p < .001$), and significant negative relationships were observed between gender and religious identification ($\beta = -.088$, $t(495) = -2.251$, $p = .025$) and political orientation and religious identification ($\beta = -.095$, $t(495) = -2.410$, $p = .016$). At step 2, adding religiosity and uncertainty explained significantly greater variance in religious identification, $R^2 = .475$, $\Delta R^2 = .197$, $F(2, 493) = 92.433$, $p < .001$. A significant main effect emerged for religiosity ($\beta = .499$, $t(493) = 13.578$, $p < .001$). At step 3, the addition of the interaction of religiosity and uncertainty revealed no significant increase in the amount of variance explained, $R^2 = .475$, $\Delta R^2 = .000$, $F(1, 492) = .037$, $p = .847$.

Regardless of the level of uncertainty, low religiosity scored similarly low—and high religiosity scored similarly high—on contextual religious social identification. This trend did not differ much from the 2012 data reanalysis.
Ancillary Analyses

Although Chapman (2012) did not measure political orientation, its inclusion may be beneficial to understanding the relationship between religiosity and religious extremism. To test this possibility, hierarchical regressions of political orientation and uncertainty with religiosity added as a covariate at step 1 were performed on each dependent variable.

Overall, conservatives had greater preferences than liberals for the proxies of religious extremism and higher religious identification regardless of their level of uncertainty. Although most interactions were not significant, the trends tended to be in line with malcontents in the middle hypothesis. Both conservatives and liberals trended toward increasing their preference for ingroup clarity as uncertainty increased. Uncertainty level did not change either group’s preference for member similarity. Conservatives trended toward decreasing their willingness to dislike critics as uncertainty increased, whereas liberals trended toward increasing their willingness. Conservatives did not change their willingness to engage critics as their uncertainty increased, whereas liberals trended toward increasing their willingness. Both conservatives and liberals trended toward decreasing religious identification as uncertainty increased. Ultimately, the only significant interaction was on ingroup superiority.

At step 1, the covariates were regressed on ingroup superiority; this revealed a significant effect, $R^2 = .150, F(1, 497) = 87.425, p < .001$. A significant positive relationship was observed between religiosity and ingroup superiority ($\beta = .387, t(497) = 9.350, p < .001$). At step 2, adding political orientation and uncertainty explained significantly greater variance in ingroup superiority, $R^2 = .255, \Delta R^2 = .110, F(2, 495) = 36.785, p < .001$. A significant main effect emerged for political orientation ($\beta = -.334, t(495) = 8.570, p < .001$) but not for uncertainty. At step 3, the addition of the interaction of political orientation and uncertainty revealed a
significant increase in the amount of variance explained, $R^2 = .266$, $\Delta R^2 = .006$, $F(1, 494) = 4.176, p = .042$. Figure 2 plots the relationship between political orientation and ingroup superiority moderated by uncertainty.

The slopes from conservative to liberal significantly decreased under low uncertainty ($\beta = -.41, t(494) = -7.51, p < .010$) and high uncertainty ($\beta = -.25, t(494) = -4.68, p < .010$). The slope for low uncertainty was steeper ($\beta = -.41$) than high uncertainty ($\beta = -.25$), creating a crossover interaction where conservatives had higher preference scores under low uncertainty and liberals had higher preference scores under high uncertainty. However, the slopes from low to high uncertainty for conservatives ($\beta = -.37, t(494) = -1.37, p = .170$) and liberals ($\beta = .41, t(494) = 1.53, p = .130$) were not significantly different.

Figure 2

*Ingroup superiority as a function of political orientation moderated by uncertainty (± 1SD)*
The trends made by conservatives and liberals did not necessarily overlap with those made by high religiosity and low religiosity people, indicating they are tapping different aspects of the individual. As such, political orientation has a higher correlation with religious identification ($r = .198$), age ($r = .192$), and spirituality ($r = .186$) in the present study than it does with religiosity ($r = .117$).

**Discussion**

The promise of the new measures derived from Chapman’s (2012) reanalyzed data was supported as the trends were in the direction expected by the malcontents in the middle hypothesis. However, none of the interactions for the focal analyses were significant, which differed from the reanalyzed data that found a significant interaction for ingroup clarity. Comparisons were made with the 2012 data, indicating high religiosity individuals scored differently under high uncertainty than they had previously. In contrast, ingroup clarity preference for low religiosity individuals trended similarly to 2012 but with higher scores.

In the reanalyzed data, ingroup clarity scores for high religiosity individuals were significantly lower under high uncertainty, but in the present study, their ingroup clarity scores did not differ regardless of their level of uncertainty. This may be an example of a history effect between the data collected in 2012, before Obama’s second term in office, Trump’s election, and the United States Capitol insurrection on September 6, 2021. Because the present data were collected during the COVID pandemic, the uncertainty prime may not have been powerful enough to make people feel certain during a time of such uncertainty.

Another concern that carried over from the 2012 study was whether type of religiosity corresponded with political orientation, such that low religiosity was equivalent to liberal and high religiosity was equivalent to conservative. The ancillary analyses performed with political
orientation and uncertainty as predictors on the dependent variables illustrated that while they do have some correspondence, they are indeed tapping different aspects of the individual regarding their preference for religious extremism.

Aside from the contextual religious social identification measure, the trends for the dependent measures supported the directionality of the malcontents in the middle hypothesis. This study should be replicated when global uncertainty is not so incredibly high to see if the interaction between religiosity and uncertainty becomes significant.
CHAPTER 3

Study 2

The main focus of Study 1 was to determine the conditions under which individuals may be susceptible to and likely support religious extremism. In conditions of high uncertainty, it was predicted that individuals with low levels of religiosity would be more susceptible to religious extremism than individuals with high levels of religiosity. It is very likely that low religiosity individuals either do not already belong to a religious group or have a solid foundation in terms of understanding their religious group and its membership. During a time of high uncertainty, these individuals might lack a religious group with which they can identify to reduce said uncertainty. So, they may seek out a group to help alleviate their discomfort, which will likely be more extreme in beliefs, behaviors, and leadership than they would have sought to identify with during a time of low uncertainty (Hogg, 2014; Hogg & Adelman, 2013; Hogg et al., 2010b; Rast et al., 2012; Rast et al., 2013; van den Bos, 2009).

Chapman’s (2012) reanalyzed data found a significant interaction between religiosity and uncertainty on preference for ingroup clarity, including items reflecting a preference for clear and powerful leadership. In line with the malcontents in the middle hypothesis, individuals low in religiosity increased their preference for clear/powerful leadership as their uncertainty increased, which was the opposite trend for those high in religiosity. This trend for low religiosity people was also supported by Study 1.

Study 2 focused on the specific influence of leadership, testing the proposition that extreme religious leader rhetoric will be more influential under uncertainty, especially for those lower in religiosity. As in Study 1, participants first completed the religiosity composite scale to determine religiosity (continuous predictor) and spirituality (planned covariate). Second,
participants were experimentally primed with religious leader rhetoric (moderate, extreme) followed by the enhanced uncertainty prime (low, high) from Study 1 (categorical predictors). Finally, participants completed counterbalanced measures for religious leader endorsement and contextual religious social identification.

It was hypothesized that low religiosity people would strengthen their endorsement of the extreme religious leader as their uncertainty increased. Under low uncertainty, they were expected to endorse the moderate leader more strongly than the extreme religious leader, and increasing uncertainty was not expected to significantly change their endorsement. Further, their religious identification was expected to increase under high uncertainty, especially in the extreme religious leader rhetoric condition.

It was also hypothesized that high religiosity people would weaken their endorsement of a moderate religious leader as their uncertainty increased. Under low uncertainty, they were expected to endorse the extreme religious leader much less strongly than the moderate leader, and increasing uncertainty was not expected to significantly change their endorsement. Further, their religious identification was not expected to change as uncertainty increased, regardless of the religious rhetoric condition.

**Method**

**Participants and Design**

The data from 630 participants from the United States of America who were not adamantly non-religious were recruited from Amazon’s Mechanical Turk (MTurk) via CloudResearch.com as in Study 1. The sample size was determined by a power analysis using G*Power (power = .90, f = .20, p = .05). After data screening, 84 participants (13%) were dropped due to admission of adamant non-religiousness (48 participants or 8%) or incomplete or
incorrect responses to the uncertainty manipulation (36 participants or 5%), which follows Mason and Suri’s (2012) recommendation to remove “bad” data when using MTurk for data collection. The resulting dataset sample size was 546 (302 female, 236 male, 4 non-binary/third gender, 3 other, 1 missing) aged 19 to 75 ($M = 41.62, SD = 12.834$). Participants were predominately white (74.9%), followed by African-American (8.4%), Asian-American (7.2%), Hispanic (5.7%), and other (3.9%). Most participants were college-educated (16.7% had some college, 11.0% had a two-year degree, 42.9% had a four-year degree, and 19.1% had a graduate degree); only 10.3% had a high school education or less. Most participants indicated they were Christian (75.6%), and the remainder identified as other (8.6%), agnostic (8.6%), Buddhist (2.9%), Jewish (2.0%), Islamic (1.1%), and Hindu (1.1%).

As in Study 1, participants completed an online survey (hosted by Qualtrics) assessing religious feelings, beliefs, behaviors, and attitudes. Religiosity and spirituality were measured, extreme religious rhetoric and uncertainty were primed before participants completed the counterbalanced dependent variable measures. Compensation to participants was $1.00.

**Procedure and Materials**

Study 2 followed the same method as Study 1 to recruit participants through MTurk while limiting adamant non-religious respondents. Qualtrics hosted the online survey, which provided the same informed consent as Study 1. Participants who did not fit the study criteria were thanked for their time and interest.

**Religiosity Composite Scale**

After completing the informed consent, participants were directed to the survey (see Appendix B: Additional Measures for Study 2) to complete the 10-item religiosity composite scale used in Study 1 (religiosity subscale $\alpha = .927$; spirituality subscale $\alpha = .864$).
**Extreme Religious Leader Rhetoric**

Participants were randomly assigned one of two nearly identical videos. Each video presented excerpts from a speech purportedly given by an inspiring religious leader speaking with moderate (e.g., focus on diversity, openness, and love, 183 words) or extreme religious rhetoric (e.g., focus on ethnocentrism, rigidity, and violence, 174 words). Both videos were the same length (2 minutes, 43 seconds), showcasing a gesticulating speaker intercut with an audience and blurred beyond recognition as text layered over sentence by sentence to allow the viewer to read each sentence thoroughly. The viewer could not fast-forward or skip the video.

Both videos began with the prompt, “The following are excerpts from a speech by an inspiring religious leader to an American audience.” The “excerpts” that followed were statements derived from previously used vignettes that were pilot tested to provide accurate portrayals of moderate and extreme religious leaders (Blagg & Hogg, 2009). The speech did not reflect any religious group or community specifically, utilizing vague terms that should be inclusive of major religious groups and communities in the United States.

**Uncertainty Boost and Prime**

Participants were randomly assigned to receive the low or high uncertainty boost with corresponding low or high uncertainty prime utilized in Study 1.

**Dependent Variables**

The dependent variables were counterbalanced, so half of the participants received the religious leader endorsement questionnaire first, whereas the other half received the contextual religious social identification measure first.

**Religious Leader Endorsement Questionnaire.** A 14-item questionnaire was adapted from previous research on leadership and uncertainty (Blagg & Hogg, 2009; Rast et al., 2012).
The measure assessed three dimensions of leadership: support, trust, and fit/similarity. The four support items reflected effectiveness, representativeness, support, and favorability of the religious leader; the six trust items reflected different aspects of trust in the religious leader; and the four fit/similarity items reflected concerns about the religious leader and their perspective fitting within the religious group or community, 1 not very often or strongly disagree, 9 very often or strongly agree - (α = .985).

**Contextual Religious Social Identification.** The six-item measure from Study 1 was used (α = .956).

**Demographics and Debriefing**

The same demographics scale from Study 1 was used, followed by a debriefing about the true nature of the study. Finally, participants were thanked for their time and provided a confirmation code to receive compensation through MTurk.

**Results**

Study 2 had one continuous predictor (religiosity) and two categorical predictors (religious leader rhetoric and uncertainty primes) with a planned covariate (spirituality). The key dependent variables were religious leader endorsement and contextual religious social identification. Because one of the predictors was continuous, hierarchical multiple regressions were performed on mean-centered predictor variables with calculated interaction terms, which underwent simple slopes analyses if found significant (Aiken & West, 1991).

**Scale Assessment and Demographic Analyses**

Reliability and exploratory factor analyses with oblimin rotations were performed on the multi-item measures. As expected, the same two factors emerged for the religiosity composite scale as in Study 1. Spirituality accounted for 52.796% of the variance (Eigenvalue = 5.280) and
Religiosity accounted for 19.163% of the variance (Eigenvalue = 1.916). No loadings were less than .733 for their respective factors on the structure matrix. The factors have a significant positive correlation ($r = .464$).

For religious leader endorsement, a single factor accounted for 83.941% of the variance (Eigenvalue = 11.752); all factor loadings were above .817. The multi-item measures each had skew between -1 and 1 and kurtosis between -1.382 and 1, which is still well within the accepted realm of normal distribution. The reliabilities, means, SDs, and intercorrelations of the multi-item measures, along with the categorical predictors, are presented in Table 2.

The regressions of the predictors (religiosity, uncertainty, and leader rhetoric) on the demographic variables (age, education level, political orientation, income) and spirituality yielded significant effects, indicating their potential use as covariates. Leader rhetoric predicted age ($R^2 = .016, F(3, 540) = 2.924, p = .033; \beta = -.059, t(540) = -1.377, p = .012$). Religiosity predicted education level ($R^2 = .016, F(3, 541) = 2.907, p = .034; \beta = -.059, t(540) = -1.377, p = .012$), political orientation ($R^2 = .035, F(3, 542) = 6.515, p < .001; \beta = -.176, t(542) = -4.165, p < .001$), and spirituality ($R^2 = 2.15, F(3, 542) = 50.780, p < .001; \beta = .466, t(542) = 12.270, p < .001$). Both religiosity ($\beta = .094, t(541) = 2.214, p = .027$) and uncertainty ($\beta = -.574, t(541)$)

<table>
<thead>
<tr>
<th>Variable</th>
<th>$\alpha$</th>
<th>$M$</th>
<th>$SD$</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Religiosity (5 items)</td>
<td>0.93</td>
<td>4.41</td>
<td>2.00</td>
<td>.46**</td>
<td>- .01</td>
<td>- .04</td>
<td>.22**</td>
<td>.71**</td>
<td></td>
</tr>
<tr>
<td>2. Spirituality (5 items)</td>
<td>0.86</td>
<td>6.72</td>
<td>1.99</td>
<td>-</td>
<td>.05</td>
<td>.01</td>
<td>.12**</td>
<td>.58**</td>
<td></td>
</tr>
<tr>
<td>3. Leader Rhetoric</td>
<td>-</td>
<td>0.48</td>
<td>0.50</td>
<td>-</td>
<td>.02</td>
<td>- .36**</td>
<td>- .01</td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. Uncertainty</td>
<td>-</td>
<td>0.34</td>
<td>0.47</td>
<td>-</td>
<td>- .08</td>
<td>- .10*</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. Leader Endorsement (14 items)</td>
<td>0.99</td>
<td>4.58</td>
<td>2.52</td>
<td>-</td>
<td>-</td>
<td>- .21**</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. Religious Identification (6 items)</td>
<td>0.96</td>
<td>5.75</td>
<td>2.17</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td></td>
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</tr>
</tbody>
</table>

Note: Means range between 1 (low) and 9 (high), except for Extreme Rhetoric and Uncertainty, which are binary variables with 0 (low) and 1 (high).

$N = 546, * p < .05, ** p < .01$
predicted income ($R^2 = .029, F(3, 541) = 5.414, p < .001$). These covariates were included in subsequent analyses.

**Religious Leader Endorsement**

The malcontents in the middle hypothesis predicts high religiosity people experiencing low uncertainty will report the highest religious leader endorsement scores for a leader espousing less moderate rhetoric, but that preference will fall away under high uncertainty. It is also expected that low religiosity people experiencing uncertainty will prefer a moderate over an extreme religious leader, but to a lesser extent than those with high religiosity. Under high uncertainty, they will increase their preference for the extreme religious leader but not the moderate. To test these expectations, a hierarchical regression of religiosity, leader rhetoric, and uncertainty with spirituality, age, education, political orientation, and income added as covariates at step 1 was performed on religious leader endorsement.

At step 1, the covariates were regressed on religious leader endorsement; this revealed a nearly significant effect, $R^2 = .011, F(5, 537) = 2.192, p = .054$. A significant negative relationship was observed between spirituality and religious leader endorsement ($\beta = -.138, t(537) = 3.082, p = .002$); no other effects were significant. At step 2, adding religiosity, leader rhetoric, and uncertainty explained significantly greater variance in religious leader endorsement, $R^2 = .183, \Delta R^2 = .175, F(3, 534) = 38.590, p < .001$. Significant main effects emerged for religiosity ($\beta = .190, t(534) = 4.167, p < .001$), leader rhetoric ($\beta = -.371, t(534) = -9.451, p < .001$), and uncertainty ($\beta = -.078, t(534) = -1.975, p = .049$). At step 3, the addition of the two-way interactions between the predictors revealed a marginal increase in the amount of variance explained, $R^2 = .189, \Delta R^2 = .011, F(3, 531) = 2.492, p = .059$. At step 4, the addition of the three-way interaction between religiosity, leader rhetoric, and uncertainty revealed a significant
increase in the amount of variance explained, $R^2 = .189$, $\Delta R^2 = .009$, $F(1, 530) = 6.338$, $p = .012$.

As expected, the three-way interaction significantly predicted religious leader endorsement, $\beta = .098$, $t(530) = 2.518$, $p = .012$.

Figure 3 plots the relationship between religiosity and religious leader endorsement moderated by uncertainty within moderate and extreme religious leader rhetoric. Analysis of simple slopes revealed a significant increase in the endorsement of the moderate religious leader on the slope from low to high religiosity under low uncertainty ($\beta = .31$, $t(530) = 3.00$, $p < .010$), indicating high religiosity people experiencing low uncertainty scored higher than low religiosity people. However, the slope did not change under high uncertainty ($\beta = -.02$, $t(530) = -0.20$, $p = .840$), indicating their endorsement fell away, such that low and high religiosity people scored moderate leaders the same when experiencing high uncertainty. As expected, high religiosity people endorsed the moderate religious leader lower under low than high uncertainty, but low religiosity endorsed the moderate the same regardless of uncertainty.

For an extreme leader, the slope from low to high religiosity increased endorsement under low ($\beta = .27$, $t(530) = 2.56$, $p = .010$) and high uncertainty ($\beta = .43$, $t(530) = 4.14$, $p < .010$), although the slope was steeper for high uncertainty. This indicated that high religiosity people endorsed the extreme leader more overall, but their endorsement was greater when experiencing high uncertainty, whereas low religiosity people had lower endorsement for the extreme leader under high uncertainty. This finding was in opposition to the malcontents in the middle hypothesis prediction that low religiosity people would have greater endorsement of the extreme religious leader when experiencing high uncertainty than low uncertainty, but they would not differ their endorsement for the moderate religious leader regardless of their level of uncertainty.
Contextual Religious Social Identification

The malcontents in the middle hypothesis predicts low religiosity people experiencing high uncertainty to have higher religious identification than those experiencing low uncertainty. In contrast, high religiosity people likely will not differ on religious identification regardless of their level of uncertainty. To test these expectations, a hierarchical regression of religiosity, leader rhetoric, and uncertainty with spirituality, age, education, political orientation, and income added as covariates at step 1 was performed on contextual religious social identification.
At step 1, the covariates were regressed on religious identification; this revealed significant effects, $R^2 = .340$, $F(5, 537) = 55.261, p < .001$. A significant positive relationship was observed between spirituality and religious identification ($\beta = .588, t(537) = 15.989, p < .001$), and a significant negative relationship was observed between age and religious identification ($\beta = -.083, t(537) = -2.311, p = .021$); no other effects were significant. At step 2, adding religiosity, leader rhetoric, and uncertainty explained significantly greater variance in religious identification, $R^2 = .583, \Delta R^2 = .244, F(3, 534) = 104.003, p < .001$. Significant main effects emerged for religiosity ($\beta = .565, t(534) = 17.264, p < .001$) and uncertainty ($\beta = -.079, t(534) = -2.800, p = .005$); no other main effects were significant. At step 3, the addition of the two-way interactions between the predictors revealed no significant increase in the amount of variance explained, $R^2 = .584, \Delta R^2 = .001, F(3, 531) = .270, p = .847$. At step 4, the addition of the three-way interaction between religiosity, leader rhetoric, and uncertainty revealed no significant increase in the amount of variance explained, $R^2 = .584, \Delta R^2 = .000, F(1, 530) = .037, p = .847$.

Although this finding went against the malcontents in the middle hypothesis, the results were the same as those found in the 2012 study and Study 1.

**Ancillary Analyses**

As in Study 1, ancillary analyses were conducted with political orientation in place of religiosity to assess the benefits of its inclusion in understanding the relationship between religiosity and religious extremism. To test this possibility, hierarchical regressions of political orientation, leader rhetoric, and uncertainty with religiosity added as a covariate at step 1 were performed on each of the dependent variables.
Religious Leader Endorsement

At step 1, the covariate was regressed on religious leader endorsement; this revealed a nearly significant effect, $R^2 = .047$, $F(1, 544) = 26.555$, $p < .001$. A significant positive relationship was observed between religiosity and religious leader endorsement ($\beta = .216$, $t(544) = 5.153$, $p < .001$). At step 2, adding political orientation, leader rhetoric, and uncertainty explained significantly greater variance in religious leader endorsement, $R^2 = .182$, $\Delta R^2 = .136$, $F(3, 541) = 29.968$, $p < .001$. Significant main effects emerged for political orientation ($\beta = .080$, $t(541) = 2.010$, $p = .045$) and leader rhetoric ($\beta = -.358$, $t(541) = -9.183$, $p < .001$), and a marginal main effect emerged for uncertainty ($\beta = -.066$, $t(541) = -1.707$, $p = .088$). At step 3, the addition of the two-way interactions between the predictors revealed a marginal increase in the amount of variance explained, $R^2 = .208$, $\Delta R^2 = .026$, $F(3, 538) = 5.833$, $p < .001$. The two way interaction between political orientation and leader rhetoric significantly predicted religious leader endorsement ($\beta = -.150$, $t(538) = -3.889$, $p < .001$); no other two-way interactions were significant. At step 4, the addition of the three-way interaction between religiosity, leader rhetoric, and uncertainty revealed a significant increase in the amount of variance explained, $R^2 = .214$, $\Delta R^2 = .006$, $F(1, 537) = 3.883$, $p = .049$. The three-way interaction significantly predicted religious leader endorsement, $\beta = -.076$, $t(537) = -1.971$, $p = .049$.

Figure 4 plots the relationship between political orientation and religious leader endorsement moderated by uncertainty within moderate and extreme religious leader rhetoric. Analysis of simple slopes revealed a significant increase in endorsement of the moderate religious leader on the slope from conservative to liberal under high uncertainty ($\beta = .37$, $t(537) = 4.35$, $p < .010$), but marginal for low uncertainty ($\beta = .12$, $t(537) = 1.64$, $p = .100$). For conservatives, the slope from low to high uncertainty significantly decreased in endorsement of
the moderate leader ($\beta = -1.22$, $t(537) = -3.01$, $p < .01$), but there was no difference in endorsement for the extreme leader ($\beta = 0.06$, $t(537) = .15$, $p = .88$). Conservatives under low uncertainty had much greater endorsement of the moderate over the extreme religious leader, but there was no difference in endorsement under high uncertainty. For liberals, the slope from low to high uncertainty did not differ in endorsement of the moderate ($\beta = .04$, $t(537) = .08$, $p = .93$) or extreme religious leader ($\beta = -.35$, $t(537) = -.86$, $p = .39$). Liberals had much greater endorsement of the moderate over the extreme religious leader regardless of uncertainty.

Figure 4

Religious leader endorsement as a function of political orientation moderated by uncertainty (± 1SD) and religious leader rhetoric (± 1SD)
Conservatives acted like those with high religiosity, decreasing their endorsement of the moderate religious leader from low to high uncertainty. In contrast, liberals did not act like those with low religiosity; rather, they endorsed the moderate much higher than conservatives. As in Study 1, political orientation taps aspects that differ from religiosity, which is also supported by a nonsignificant correlation between the two variables ($r = .044$). As for the extreme leader, conservatives and liberals did not differ on their endorsement when experiencing low ($\beta = -.04$, $t(537) = -0.49$, $p < .620$) or (to a lesser extent) high uncertainty ($\beta = -.13$, $t(537) = -1.43$, $p < .150$). However, the trend indicates conservatives increased endorsement for the extreme religious leader under high uncertainty, whereas liberals decreased their endorsement.

**Contextual Religious Social Identification**

At step 1, the covariates were regressed on religious identification; this revealed significant effects, $R^2 = .502$, $F(1, 544) = 549.446$, $p < .001$. A significant positive relationship was observed between religiosity and religious identification ($\beta = .709$, $t(544) = 23.440$, $p < .001$). At step 2, adding political orientation, leader rhetoric, and uncertainty explained a marginally greater variance in religious identification, $R^2 = .508$, $\Delta R^2 = .006$, $F(3, 541) = 2.153$, $p = .093$. A significant main effect emerged for uncertainty ($\beta = -.070$, $t(541) = -2.307 p = .021$); no other main effects were significant. At step 3, the addition of the two-way interactions between the predictors revealed no significant increase in the amount of variance explained, $R^2 = .513$, $\Delta R^2 = .005$, $F(3, 538) = 1.733$, $p = .159$, but a two-way interaction between political orientation and leader rhetoric significantly predicted religious identification ($\beta = .065$, $t(538) = 2.168 p = .031$). At step 4, the addition of the three-way interaction between religiosity, leader rhetoric, and uncertainty revealed no significant increase in the amount of variance explained,
$R^2 = .507, \Delta R^2 = .000, F(1, 537) = .383, p = .536$, and the two-way interaction between political orientation and leader rhetoric remained significant, ($\beta = .064, t(537) = 2.097, p = .036$).

Figure 5 plots the relationship between political orientation and religious social identification moderated by religious leader rhetoric. Analysis of simple slopes revealed a significant decrease in religious identification on the slope from conservative to liberal for moderate religious leader rhetoric ($\beta = -.09, t(537) = -2.28, p = .020$). Conservatives had a much higher religious identification than liberals when exposed to moderate religious leader rhetoric.

Figure 5

*Religious social identification as a function of political orientation moderated by religious leader rhetoric (±1SD)*
However, when exposed to extreme religious leader rhetoric, the slope did not differ for conservatives or liberals ($\beta = .03, t(537) = .68, p = .500$). For conservatives, the trend for religious identification was greater for the moderate religious leader than the extreme religious leader ($\beta = -.24, t(537) = -1.30, p = .200$). For liberals, religious identification was marginally greater for the extreme religious leader than the moderate religious leader ($\beta = .31, t(537) = 1.68, p = .090$), which was the opposite trend for low religiosity people.

**Discussion**

The malcontents in the middle hypothesis was partially supported. High religiosity individuals significantly decreased endorsement of the moderate religious leader but did not significantly change their endorsement of the extreme religious leader under high uncertainty. It was expected that high religiosity people would have the greatest endorsement for the moderate candidate when they are less uncertain, which was also found. The same finding was discovered in the ancillary analyses for conservatives. Under high uncertainty, high religiosity people endorsed moderate and extreme leaders similarly, indicating a moderate leader is not preferred during a time of uncertainty, but they do not necessarily want an extreme leader either.

The malcontents in the middle hypothesis was not supported for low religiosity people. Rather than increasing their endorsement of the extreme religious leader when experiencing uncertainty, they reduced endorsement. The same pattern occurred for liberals. However, liberals also had a marginal increase in their contextual religious social identification following the extreme religious leader rhetoric, whereas conservatives and those with low religiosity had a nonsignificant decrease; high religiosity showed no difference. This finding provides further evidence that religiosity and political orientation are two different aspects of an individual that often result in similar outcomes.
Additionally, liberals differed from low religiosity people in their endorsement of the moderate leader, although they both decreased endorsement for the extreme religious leader from low to high uncertainty. That result was contrary to the malcontents in the middle hypothesis, which predicted low religiosity people to increase their endorsement of the extreme leader when experiencing high uncertainty. There are several reasons why the hypothesis may not have been supported in the present data.

First, religiosity is a complex thing to measure, and there may be other aspects to consider for further study. The present studies assessed the impact of political orientation, finding comparable but differing effects on the dependent variables. Second, the data was collected online at the end of the summer in 2021 amid a global pandemic, within a year of the January 6th Insurrection at the US Capitol Building, and less than two years since Donald J. Trump sat in the White House. All of these things potentially caused great uncertainty for many people. Trying to prime certainty when feelings of uncertainty are so prevalent is problematic, especially with the lack of control online studies offer. Although the priming method was adapted from several previously successful studies (Hogg, Sherman, et al., 2007; Hohman & Hogg, 2015; Hohman et al., 2017; Sherman et al., 2009), the current conditions may have swamped the uncertainty prime, causing it to be underpowered by killing the effect of the variable in this context, which already has a small effect on group identification ($r = .18$) as reported in a recent meta-analysis (Choi & Hogg, 2019). Third, comparing the reanalyzed data collected in 2012 with the present data may indicate a history effect. Between that time, Obama had a second term, Trump “won” the 2016 election, and a lot of divisiveness grew, especially politically, which has severely polarized groups. As such, people may be more attuned to clear and powerful leadership or sensitive to such explicit extreme rhetoric.
Overall, the results are promising for the malcontents in the middle hypothesis. The present study provides some support for the predictions related to people with high religiosity, but not for the main prediction for those with low religiosity. However, that result may be an outlier, given the time period and manner data was collected. Even so, the study would benefit from another data collection, especially when times are less uncertain.
CHAPTER 4

General Discussion

Because extremist religious groups often endorse and promote aggression and violence against others, identifying those susceptible to such radicalization is paramount to stopping potential acts of terrorism. According to uncertainty-identity theory (Hogg, 2000, 2007, 2012), people experiencing uncertainty are motivated to alleviate the discomfort it causes by increasing their identification with a group. If a group is not readily available, then they will likely seek a new one, which may be potentially more extreme (Hogg et al., 2010b); highly entitative and ethnocentric, foster socialization and homogeneity, promote populism (Gøtzsche-Astrup & Hogg, 2020); and espouse ideological orthodoxy through the rhetoric of a powerful, authoritative leader (Hogg, 2014, 2021; Horgan, 2016; Sageman, 2014; Wilner & Dublouoz, 2010).

Therefore, experiencing uncertainty is likely the catalyst to becoming a religious extremist (Hogg et al., 2010a).

However, susceptibility to religious extremism may also depend on one’s level and type of religiosity. Research suggests that religiously weak individuals (i.e., those who lack religious literacy but identify strongly with their religion) are more likely to engage in extreme violence (Wilner & Dublouoz, 2010; Urooj & Tariq, 2015). These low religiosity people engaged in strengthening their religious identification may be susceptible to the radicalization processes of extreme groups (Gartenstein-Ross & Grossman, 2009). Further, Chapman’s (2012) reanalyzed data indicated lower religiosity people increased—and high religiosity people decreased—preferences for proxies of religious extremism when experiencing high uncertainty and controlling for spirituality. This finding informed the primary “malcontents in the middle” hypothesis for both Study 1 and 2, which predicts that low religiosity people will increase their
preferences for religious extremism under high uncertainty, whereas high religiosity people will decrease.

Study 1 utilized measures derived from Chapman’s (2012) master’s thesis to examine how religiosity and uncertainty affect people’s preferences for religious extremism and feelings of religious identification. Participants completed the religiosity composite scale and were primed with uncertainty (low, high) before reporting on their preference for five proxies of religious extremism and contextual religious social identification.

Although the interactions were not significant, the trends were in the direction suggested by the malcontents in the middle hypothesis. Comparisons were made with Chapman’s (2012) reanalyzed data, indicating high religiosity individuals scored differently under high uncertainty than they had previously. In the reanalyzed data, high religiosity individuals significantly reduced their preference for ingroup clarity under high uncertainty, but in the present study, level of uncertainty did not change their preference for ingroup clarity. In contrast, ingroup clarity preference scores for low religiosity individuals trended similarly to their 2012 counterparts, except their scores were higher. Overall, there was a consistent trend of low religiosity people increasing their preferences for the proxies of religious extremism under high uncertainty.

Study 2 addressed the finding in Chapman’s (2012) master’s thesis that preference for a clear and powerful leader increased under high uncertainty for low religiosity people, but not for those high in religiosity. Adding to the design of Study 1, participants were primed with extreme religious leader rhetoric (low, high) between the religiosity composite and uncertainty prime before reporting on their endorsement of the religious leader and contextual religious social identification.
Although there was a significant three-way interaction between religiosity, religious leader rhetoric, and uncertainty on the endorsement of the religious leader, the main result of interest was contrary to the prediction of the malcontents in the middle hypothesis. Low religiosity participants did not increase their endorsement of the extreme leader as uncertainty increased. This unexpected finding may be due to heightened awareness of and concern over extreme religious rhetoric since the January 6, 2021 insurrection at the US Capitol building. In contrast to the proxies for religious extremism in Study 1, the extremism expressed in the leader rhetoric prime of study 2 was explicit. In the feedback section, nine participants in the high uncertainty and extreme rhetoric condition commented about their dislike of the extreme religious leader.

In line with the malcontents in the middle hypothesis, low religiosity people did not differ on their endorsement of the moderate leader, regardless of their uncertainty level. Additionally, high religiosity people did not increase their endorsement of an extreme leader from low to high uncertainty, although they did significantly decrease their endorsement of a moderate.

Not wanting a moderate leader when experiencing uncertainty is supported by the literature. During uncertain times, people tend to want leaders who are more directive or autocratic than democratic (Hogg, 2005, 2007; Rast et al., 2013; Schoel et al., 2011) because they are likely perceived as having greater clarity and sense of direction than democratic or moderate leaders (Hogg & Adelman, 2013). However, in light of the lack of support for an extreme leader’s rhetoric in Study 2, espousing explicit extremist views before the individual has bought into the group may be detrimental to recruitment. As such, extremist groups radicalize people by providing feelings of belongingness and affiliation, increasing group identification through innocuous means progressively toward the acceptance and perpetration of violence.
toward others, prior to the revelation of an ideology that accepts violence (Crenshaw, 1986; 1988; Wilner & Dublouloz, 2010).

**Limitations and Future Directions**

The major limitations of the present studies are the time and manner of data collection. Chapman’s (2012) reanalyzed data indicates the possibility of a history effect between the data collected online prior to Obama’s second term in office, Trump’s election, and the January 6th insurrection, and the data collected online at the end of summer 2021 during the global COVID pandemic. In the time between, America faced growing divisiveness and polarization between both political and religious groups that is pervasive and everpresent. For example, little pause about the legitimacy of the 2020 election has come from Donald Trump’s camp since vacating the White House. Instead, he has become the de facto leader of the MAGA cult (Franks & Hesami, 2021), religious extremists who combine Trump politics and conservative American Christianity in the guise of “true patriotism.” Through conspiracies and explicit extreme rhetoric, which is echoed from the soapboxes and pulpits of his most fervent supporters and shared across all forms of media, he emboldens the prejudices of his followers, especially if his ideas are not immediately rebuked (Newman et al., 2021). This day-to-day prevalent representation of extreme rhetoric is likely problematic for collecting data on the topic of religious extremism.

Although online data collection is a convenient, fast, and less expensive manner of collecting a great deal of data (Buhrmester et al., 2011), it lacks the control of in-person experimentation, which may be necessary to overcome these pervasive influences. Additionally, attempting to prime uncertainty in an online study is hard enough without such factors in play. A recent meta-analysis found that the uncertainty prime produced a small effect ($r = .18$) on group identification (Choi & Hogg, 2019), explaining why uncertainty might not have affected the
contextual religious social identification measures in the present studies. During a time of great uncertainty, the prime may not be powerful enough to make participants feel less uncertain, especially if they are not giving complete attention to the experiment. To be sure, eliminated data due to incorrect answers to the uncertainty prime prompt were generally participants writing about uncertainty rather than certainty, which was the opposite case in 2012.

Finally, religiosity is a complex construct to measure, and there may be other aspects to consider. For example, Study 1 and 2 assessed the impact of political orientation, finding comparable but differing effects on the dependent variables. This was a concern that carried over from Chapman’s (2012) master thesis, whether the level of religiosity corresponded with political orientation, such that low religiosity was equivalent to liberal and high religiosity was equivalent to conservative. The ancillary analyses illustrated that while religiosity and political orientation have some correspondence, they tap different aspects of the individual’s preference for religious extremism.

Overall, the results provided some support for the malcontents in the middle hypothesis. The trends indicated low religiosity people preferred proxies of religious extremism under high uncertainty while those with high religiosity did not. As for the endorsement of an extreme religious leader, the rhetoric may have been too explicit to garner support. Adding a less explicit but extreme condition in a future study may provide different results. Finally, future studies should consider replicating the present studies in an in-person setting or online when global uncertainty is not so incredibly high.
REFERENCES


APPENDICES

Appendix A

Measures for Study 1

Religiosity Composite Scale (Study 1 and 2)

Please answer the following questions by clicking the spot below the corresponding number.

From 1 (Strongly Disagree) to 9 (Strongly Agree)

1. I find comfort in my spirituality.

2. I find strength in my spirituality.

3. Spirituality is especially important because it answers many questions about the meaning of life.

4. Without my sense of spirituality, my life would be meaningless.

5. It is important to spend time in private prayer/meditation.

6. I attend religious services more than most people I know.

7. Besides religious services, I often take part in other activities at my religious center.

8. I feel that it is very important to offer my talents to my religious community.

9. I go to my religious center because it is a place where I can make good friends.

10. Being a member of my religion allows me to establish myself as a person in the community.
Uncertainty Boost (Study 1 and 2)

You now have 60 seconds to identify 10 words in the following word search. Please enter your answers below. When the time runs out, you will automatically move on to the next section.

**Low Uncertainty Word Search**

```
| W S K G K R X I J M F I | TRUSTWORTHY |
| A O R V N I A T R E C K | PREDICTABLE |
| I T R U S T W O R T H Y | STABLE      |
| E R U C E S Z E M S D G | SECURE      |
| Q H A S S E R T I V E M | CLEAR       |
| B E L B A T C I D E R P | SAFE        |
| S M Y T C N V L H M X I | ASSERTIVE   |
| T O U R C Z K L E G H H | CERTAIN     |
| A S A N G U I N E A Z V | SANGUINE    |
| B B C I Q E S N Q L R V | SATISFIED   |
| L X E F S A F E X C H Z |             |
| E D S A T I S F I E D R |             |
```

**High Uncertainty Word Search**

```
| Q U E S T I O N A B L E | RISKY |
| L P R E C A R I O U S S | AMBIGUOUS |
| P Z Q I E W X J X S U E | VAGUE |
| B M W O U C Q S J O U R | UNCLEAR |
| T N G J G X V I U E N U | INSECURE |
| P S H N A I U G G L C C | QUESTIONABLE |
| V U A Q V N I Y L B E E | PRECARIOUS |
| O R J N C B E K B A R S | WAVERING |
| A E I L M T V S C I T N | UNCERTAIN |
| Z F E A O K V I K R A I | VARIABLE |
| W A S X I V A R Y A I T |             |
| R W A V E R I N G V N X |             |
```
Uncertainty Prime (Study 1 and 2)

Please read through the prompt carefully and respond in the space below.

**Low Uncertainty Condition**
Spend a minute or so thinking about aspects of your life and your experiences that make you feel very certain about yourself, your life, your future, and what kind of a person you are. Write a few sentences about those that make you feel most uncertain certain about yourself.

**High Uncertainty Manipulation**
Spend a minute or so thinking about aspects of your life and your experiences that make you feel very uncertain about yourself, your life, your future, and what kind of a person you are. Write a few sentences about those that make you feel most uncertain about yourself.

**Contextual Religious Social Identification (Study 1 and 2)**

Read the questions about your religious group or community and indicate how you feel *at this moment* on the scale below by clicking the spot below the corresponding number.

“At this moment…”

From 1 (Not Very Much) to 9 (Very Much)

1. … how much pride do you feel being a member of your religious group or community?
2. … how much do you feel you strongly identify with your religious group or community?
3. … how much do you feel you fit well into your religious group or community?
4. … how much do your feel you have strong ties to your religious group or community?
5. … how much solidarity do you feel you have with other members of your religious group or community?
6. … how much do you feel your religious group or community is important to your sense of who you are?
Proxies of Religious Extremism (Study 1 only)

Please answer the following questions by clicking the spot below the corresponding number.

From 1 (Not Very Much) to 9 (Very Much)

**Ingroup Clarity**
1. How much do you prefer to belong to religious groups that possess a clear sense of unity among the group members?
2. How much do you prefer to belong to a religious group that has clear boundaries for who is a member?
3. How much do you prefer to belong to a religious group that has a clear structure for the duties of its members?
4. How much do you prefer your religious group to have a clear hierarchical structure?
5. How much do you prefer to belong to a religious group that has a clear mission?
6. How much do you prefer to belong to a religious group where you can clearly see who the leader is?
7. How much do you prefer to belong to a religious group that has a powerful leader?
8. How much do you prefer a religious leader who has clear opinions?
9. How much do you prefer a religious leader who has a clear mission?

**Ingroup Superiority**
1. How much do you feel that your religion is better than other religions?
2. How much do you believe that your religious beliefs are the “Truth” and other religions’ beliefs are not?

**Member Similarity**
1. How much do you believe that members within your religious group share a common fate?
2. How much do you feel that everyone in your religious group has similar views?
3. How much do you believe that members within your religious group have common goals?

**Dislike Critics**
1. How much would you dislike members of your religion who criticize your religion?
2. How much would you dislike people of other religious groups who criticize your religion?
3. How much would you dislike non-religious people who criticize your religion?

**Engage Critics**

1. How much are you willing to discuss the "Truth" of your religious beliefs with someone whose beliefs differ from yours?

2. How much are you willing to explain to people of other religious groups that their criticisms of your religion are unfounded?

3. How much are you willing to discuss the "Truth" of your religious beliefs with non-religious people?
Demographics (Study 1 and 2)

1.) What is your age? __________

2.) What is your gender? (optional)
   __ Male
   __ Female
   __ Non-binary/third gender
   __ Prefer to self-describe: (specify) __________________________________________

3.) What racial/ethnic category best identifies you?
   __ American Indian or Alaskan
   __ Asian/Asian-American
   __ Black/African-American
   __ Hispanic/Latin(a-o)/Chicano(a-o)
   __ Native Hawaiian and other Pacific Islander
   __ White/European-American
   __ Multiracial or Other: (specify) __________________________________________

4.) What is your highest level of education?
   __ Less than high school
   __ High school/GED
   __ Some college
   __ 2-year college degree (AA/AS)
   __ 4-year college degree (BA/BS)
   __ Graduate degree

5.) What is your religious preference?
   __ Agnosticism
   __ Atheism
   __ Buddhism (specify school or denomination below)
   __ Christianity (specify denomination below)
   __ Hinduism
   __ Islam (specify school or branch below)
   __ Judaism (specify branch below)
   __ Other: (specify) __________________________________________

6.) How much do you consider yourself either conservative or liberal?

   From 1 (Very Conservative) to 9 (Very Liberal)

7.) What is your political affiliation (ex. Democrat, Green, Republican, if other, please specify)?

   __________________________________________

8.) What is your household income level?
   __ Less than $25,000
8.) What income bracket do you fall in?

- $25,000 to $34,999
- $35,000 to $49,999
- $50,000 to $74,999
- $75,000 to $99,999
- $100,000 to $124,999
- $125,000 to $149,999
- $150,000 or more

9.) What State do you live in?
____________________________________________

10.) MTurk workers, please provide your Worker ID here.
____________________________________________
Appendix B

Additional Measures for Study 2

Extreme Religious Leader Rhetoric

The following are excerpts from a speech by an inspiring religious leader to an American Audience.

**Low Extreme (Moderate) Condition**
Not only true believers will find their peace in the hereafter, my friends. Today, we can be in an era of peace without violence. If we show love to those who do not believe as we do, who themselves have a sense of truth, we can unite together in the message of our Most High.

Our scriptures are a gift from the Most High, but they are neither infallible nor unchangeable. They offer guidance for us, but they are not the only truth among humanity. Within them, we read that our Truth is like other truths, and our Way is like other ways, leading to peace and love. If we follow these instructions discerningly, we will be faithful and fruitful evermore.

There are people all around the world who have heard about this Truth, yet they still turn their backs from it. Such people are blinded, but they will still be able to find peace in the hereafter, as they are all children of the Most High. They must seek the Truth for themselves, but it is upon us to lovingly encourage them.

**High Extreme (Extreme) Condition**
Only true believers will find their peace in the hereafter, my friends. Today, we are not in an era of peace but of violence. It is US against THEM, and you all must be armed and ready to battle against those who might tempt us and lead us astray from the message of our Most High.

Our scriptures are a gift from the Most High, infallible and unchangeable. They offer the only true guidance for all of humanity. Within them, we read that our truth is the only Truth, and that our way is the only Way. If we follow these instructions unfailingly, we will be faithful and fruitful evermore.

There are people all around the world who have heard about this Truth, yet they still turn their backs from it. Such people are blinded and will not find peace in the hereafter but be plagued as insignificant in the sight of the Most High. They are less than human until they believe in the Truth, and they are certainly the lowest among us.
Religious Leader Endorsement Questionnaire

Now imagine your religious community is looking for a new religious leader. Think back to the excerpts you read from the inspiring religious leader in the video. Please complete the following items with that religious leader in mind. Indicate how you feel on the scale by clicking the spot below the corresponding number.

From 1 (Strongly Disagree) to 9 (Strongly Agree)

1. This religious leader will be a very effective leader.
2. This religious leader will represent the interests of my religious community very well.
3. I would be a strong supporter of this religious leader, if they were the leader of my religious community.
4. This religious leader is a favorable choice as leader of my religious community.
5. I will trust this religious leader absolutely.
6. I think this religious leader will do the right things.
7. I think this religious leader is trustworthy.
8. I think this religious leader will be very committed to my religious community.
9. This religious leader wants the best for my religious community.
10. This religious leader will strive to benefit everyone in my religious community.
11. This religious leader’s perspective matches the positions of my religious community very well.
12. This religious leader fits my conception of an ideal leader for my religion.
13. I strongly support this religious leader’s worldview and vision of my religion.
14. My religion should move in the direction of this religious leader’s perspective.