

Beyond Dyadic Interdependence: Romantic Relationships in an Uncertain Social World

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“Did you ever stop to think that you can’t leave for your job in the morning without being dependent upon most of the world? Before you finish eating breakfast in the morning, you’ve depended on more than half the world. This is the way our universe is structured. It is its interrelated quality. We aren’t going to have peace on earth until we recognize this basic fact of the interrelated structure of all reality.”

—*Christmas Sermon on Peace, 1967, Martin Luther King Jr.*

“We live within and beyond our own skin at the same time.”

—*Bonnie Badenoch*

“Nature compels us to recognize the fact of mutual dependence, each life necessarily helping the other lives who are linked to it. In the very fibers of our being, we bear within ourselves the fact of the solidarity of life.”

—*Albert Schweitzer*

From birth to death, humans exist socially connected to others (Baumeister & Leary, 1995). People are not only connected to those they hold dear, such as a spouse, child, cherished friend, or extended family (Murray et al., 2006), but to individuals and entities they might never meet, such as a reclusive neighbor, a political pundit spewing conspiracy theories, a deadlocked Congress, or a divisive Prime Minister (Holt-Lundstadt, 2018). As Martin Luther King Jr. pointed out, the ways in which our fates are entwined with others are not always obvious, but our fates are dependent on the actions of other individuals and collectives nonetheless.

On the upside, being able to count on the support of a romantic partner, the goodwill of friends, the communality of neighbors, or foresight of political leaders can strengthen immune responses (Cohen et al., 2015), attenuate physical pain (Master et al., 2009; Eisenberger et al., 2011; Wilson & Simpson, 2016; Yanagisawa et al., 2011), alleviate death anxiety (Cox & Arndt, 2012; Plusnin et al., 2018), facilitate personal goal pursuits (Feeney & Collins, 2015; Fitzsimons et al., 2015), make potential foes appear less physically intimidating in stature (Fessler & Holbrook, 2013), and lessen endemic government distrust (Goertzel, 1994; Holt-Lundstadt, 2018; Hudson, 2006; Lamarche, 2020; Murray, Lamarche et al., 2021). On the downside, the

potential to be disappointed or harmed by the selfishness of romantic partners, the disloyalty of friends, the carelessness of neighbors, or the fecklessness of political leaders creates tremendous vulnerability. People can be left unsure of their identity after a romantic breakup (Slotter et al., 2010), nursing a wounded ego after soliciting advice from a friend (Leary et al. 1995), infected with a life-threatening virus after sharing coffee with a convivial neighbor (Bai et al., 2020), stressed and distraught over a Presidential election (Blanton et al., 2012), or struggling financially after unexpected government cuts to valued social welfare programs (Hudson, 2006).

The personal and collective ties we share with others thus offer the potential for benefit as well as harm. Depending on the exigencies of the situation, a spouse might be supportive or critical, a friend might be congratulatory or jealous, or a President might be accommodating or obstructive (Murray et al., 2006). Recognizing this duality, Baumeister and Leary (1995) concluded that people are fundamentally motivated to belong – to feel included in *safe* social connections where others protect and care for them rather than hurt or exploit them.

Reflecting the importance of this motivation for human survival, people are equipped with regulatory systems for minimizing the risks of social connection (Kenrick et al., 2010). For instance, the *behavioral-immune (BI)* system motivates people to avoid others when they are potentially infected with contagious diseases (Bressan, 2021; Miller & Maner, 2011; 2012; Murray & Schaller, 2006; Olivera-La Rosa et al., 2020; Sawada et al., 2018; Tybur et al. 2020), whereas the *risk-regulation (RR)* system motivates people to avoid intimates who might reject or ostracize them (Cameron & Granger, 2019; Forest et al., 2015; Kane et al., 2012; Murray et al., 2002; Murray, Bellavia et al., 2003; Murray, Griffin et al., 2003).

However, in depending on others, people risk exposing themselves to more than physical or emotional harm. They also risk having their very understanding of reality challenged by the

actions of others (Harmon-Jones & Harmon-Jones, 2012; Heine et al., 2006; Hardin & Higgins, 1996; Hogg & Belavadi, 2017; Jonas et al., 2014; Murray et al., 2017). For instance, a liberal might be bewildered by her spouse's unexpected tirade against critical race theory, a conservative might be nonplussed by a President's renewed imposition of a public-health mandate, a father might be taken aback by a teenager's inexplicable meltdown over a seemingly minor criticism, and a friend's deep dive into conspiratorial thinking may leave one mystified.

In this chapter, we examine how individuals cope with existential threats to the safety of social connection – those everyday experiences that suggest that people might not understand others or the reality others inhabit as well as they thought. We first describe the theoretical underpinnings of the social-safety system, the defensive system that restores the perception of safety to social connection in the face of the existential threat posed by unexpected behavior. In the second part of this chapter, we describe the current state of empirical research supporting the model. In concluding the chapter, we discuss how the social-safety's operation ultimately affects feelings of safety in the relational world and point to directions for future research.

The Social-Safety System

As the passages that opened this chapter capture, people live immersed in multiple layers of social connection. People not only share social connections with those they *personally* know (or love or loathe), but they also share social connections with those they will never personally know, but depend on nonetheless. Specifically, people share collective ties to others across *personal* (Feeney & Collins, 2015; Mikulincer & Shaver, 2003; Simpson, 2007) and *sociopolitical* relational worlds (Fiske et al., 2006; Hudson, 2006).

Personal relational worlds involve *close* others, such as a spouse, sibling, parent, child, in-law, friend, or valued coworker, that people can choose to nurture and value to a greater or

lesser degree (Feeney & Collins, 2015; Simpson, 2007). However, *sociopolitical* relational worlds involve relationships with *non-close* others, such as employer, teacher, fellow citizen, Congress, or President, that living as part of an organized society foists on people (Hudson, 2006). Despite dissimilarities in familiarity and volition, these relational worlds nonetheless share a defining feature: One's fate depends on the actions of others (Kelley, 1979).

For instance, depending on a spouse's advice and comfort can result in hurtful criticisms or reassuring praise, cultivating a teen's excitement for a family trip can court excitement or sullen indifference, and disclosing a secret to a friend can result in greater closeness or betrayed confidences. Similarly, depending on an employer for family leave can result in vacation days spent on a beach or taking one's children to doctors, trusting local governments to provide clean water can result in safe or tainted water supplies, and relying on fellow community members to vote sensibly can elect experienced politicians or Q-Anon followers to Congress.

Fortunately, people have some power to keep themselves safe from being hurt by the actions of others. However, to exercise this self-protective power, people need to be able to reliably anticipate how others are likely to behave and adjust their own behavior accordingly (Kelley, 1979; Tooby & Cosmides, 1996). For instance, Arya can better safeguard herself against being criticized, maligned, or misled by correctly anticipating when her spouse is motivated to be supportive (vs. critical), her friends are motivated to be congratulatory (vs. jealous), or a President is motivated to be honest (vs. duplicitous). In such situations, correctly anticipating the motivations and/or behavior of a family member, employer, or President provides Arya with reassuring evidence that she understands the reality they inhabit (Higgins et al., 2021). This understanding then allows her to adjust her behavior toward others by seeking advice when her

spouse is motivated to be supportive, sharing good news when her friend is motivated to be congratulatory, and being judiciously disbelieving when a President is likely to be duplicitous.

However, people often err when they try to forecast others' behavior because they naively assume that others perceive the same reality they perceive (Griffin & Ross, 1990; Peetz et al., 2022). This results in individuals, entities, or institutions behaving in ways that violate personal (e.g., "My spouse is a feminist just like me"), historic (e.g., "I've never seen my son enjoy vegetables") and/or normative (e.g., "Presidents should be prudent") expectations. For instance, people overestimate how positively and negatively others are likely to feel (Pollmann & Finkenauer, 2009), leaving them vulnerable to being bewildered by a spouse's ennui after a promotion or unsettled by an employer's nonchalance in the face of poor earnings. People also misjudge how much gratitude acts of kindness will elicit in others (Kuma & Epley, 2018), leaving them suspicious of a friend's glee over a small favor, puzzled when trading partners reject concessions, or flummoxed when Congress passes bipartisan bills.

Finding Safety in the Face of the Unexpected

With our colleagues, we developed the model of the social-safety system illustrated in Figure 1. The system defends people against the potential threat that unexpected behavior poses to the collective safety of social connection. In outlining the daily operation of this system, we first explain when unexpected behavior poses a greater existential threat to the safety of social connection. We then explain the perceptual/cognitive defenses that restore the perception of collective safety to social connection in the face of such threats (Murray, Lamarche et al., 2021).

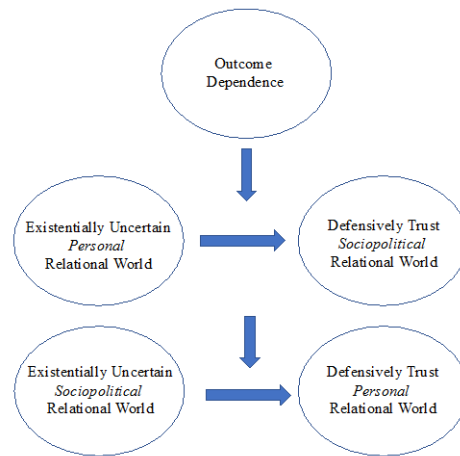


Figure 1. The Social-Safety System

Triggering a safety-threat. Reflecting its roots in interdependence theory (Kelley, 1979), the model contends that people are *more* strongly motivated to feel safe in social connection when their personal outcomes are *more* (vs. less) tied to the actions of others (Murray et al., 2006; Murray, Lamarche et al., 2021). Outcome dependence varies by *situation* because situations vary in their features (Kelley et al., 2003). For instance, Arya’s outcomes are more dependent on her husband’s actions when she needs a favor than when she does not need a favor. Arya’s outcomes are also more dependent on the actions of their neighbors when COVID-19 cases are rising (vs. falling) in her community (Murray, Seery et al., 2021). And her outcomes are more dependent on the actions of the populace when votes are being cast in more (vs. less) consequential elections (Blanton et al., 2012; Stanton et al., 2009; Trawalter et al., 2011).

Outcome dependence also varies by *person* because people differ in the extent to which they are more (vs. less) vulnerable being harmed by the actions of others. According to evolutionary theorists, people evolved to detect and seek out intimates they can reliably depend

upon – intimates who see them as indispensable or special – because loyal alliances afford protection against harm (Tooby & Cosmides, 1996). In modern life, people rely heavily on romantic partners to provide such protection (Arriaga et al., 2018; Feeney & Collins, 2015; Finkel et al., 2014; Murray & Holmes, 2011; Szepeswol & Simpson, 2019). This reliance leaves people who are *less* certain they can trust their romantic partner *more* vulnerable to harm than people who are *more* certain they can trust their romantic partner. For instance, people who are *less* certain they can trust their romantic partners are *more* readily hurt by their partner's transgressions, as compared to people who are certain they can trust their partner (Murray et al., 2003). People who are uncertain they can trust their romantic partner are also more readily agitated by the thought of physical pain or human mortality, suggesting they generally feel more vulnerable to the actions of others (Cox & Arndt, 2012; Plusnin et al., 2015).

The model further contends that outcome-dependence is not uniformly threatening. Instead, whether outcome-dependence feels more or less safe depends on existential certainty, which varies *situationally*. According to the model, when a spouse, friend, community, government institution, or President behaves *expectedly*, it provides reassuring evidence that one understands their reality. The resulting state of existential *certainty* makes it easier to believe one's power to keep oneself safe from harm in such situations (Harmon-Jones & Harmon-Jones, 2012; Heine et al., 2006; Hardin & Higgins, 1996; Hogg & Belavadi, 2017; Jonas et al., 2014; Kay et al., 2015; Murray et al., 2017). Conversely, when a spouse, friend, community, government institution or President behaves *unexpectedly*, it provides troubling evidence that one might *not* understand their reality. The resulting state of existential *uncertainty* makes it harder to believe in one's power to keep oneself safe from harm in such situations (Murray et al., 2018).

For instance, a spouse's unexpected behavior poses a greater threat to the safety of social connection when people are counting on their spouse for a specific sacrifice than when they are not. A neighbor's unexpected behavior also poses a greater threat to the collective safety of social connection when *rising* COVID-19 cases make people more dependent on their neighbors to keep them safe from infection than when falling COVID-19 cases make them less dependent. Similarly, a President's unexpected behavior poses a greater existential threat to the collective safety of social connection when being uncertain of a romantic partner's trustworthiness makes people more vulnerable to others. In highly outcome-dependent situations, experiencing *more* unexpected behavior makes salient the existentially-troubling possibility that one might not understand others or the reality they inhabit well enough to keep oneself safe.

Indeed, the model assumes that unexpected behavior poses *generalized* rather than localized threats to the safety of social connection in a given relational world. That is, when Arya's spouse behaves unexpectedly, Arya does more than wonder whether she really understands him. She might also wonder, however fleetingly, whether she actually understands anyone close to her. Why would existential uncertainty generalize in this way? Relationships within a given relational world are interconnected, both experientially and cognitively. Experiences depending on a spouse are bound up in experiences depending on children, in-laws, and family friends (Holt-Lundstadt, 2018; Mikulincer & Shaver, 2000). Similarly, experiences depending on fellow community members to behave in socially or legally prescribed ways are bound up in experiences depending on local, state, and federal officials and institutions (Anderson, 2010; Hudson, 2006). Because the experiences people have with others share these past and present interconnections, unexpected behavior on the part of one inhabitant of a given

relational world can put the motivations of *other* inhabitants in that relational world into question as well, threatening the safety of that relational world *as a whole*.

Defending against a safety-threat. To recap the “threat” side of Figure 1, ongoing experiences threaten feelings of *collective* safety in social connection when people are (1) *highly* outcome-dependent (i.e., highly vulnerable to others) and (2) *unable* to anticipate the behavior of the inhabitants of a specific relational world (i.e., highly existentially uncertain). The “defense” side of Figure 1 describes how people alleviate the resulting threat to the experience of safety.

Much as pain motivates reflexively withdrawing from its source, we contend that being highly outcome-dependent on the unexpectedly-behaving inhabitants of one relational world motivates people to psychologically escape this now riskier relational world (Cavallo et al., 2009; MacDonald & Leary, 2005; Murray et al., 2006). People typically escape threatening experiences by adopting the beliefs that can most readily, and compellingly, restore feelings of equanimity (Harmon-Jones & Harmon-Jones, 2012; Heine et al., 2006). When unexpected behavior alerts people to the possibility that they might *not* understand one relational world as well as they thought, the model contends that people can most readily convince themselves that they are still safe *nonetheless* by imposing caring and well-meaning intentions on the inhabitants of the *alternate*, more perceptually *pliable*, relational world (Zunda, 1990). Consistent with this logic, people can escape anxieties about being rejected by others seeing greater acceptance in the tabula rasa afforded by *new* acquaintances (Maner et al., 2007; Richman & Leary, 2009; Williams et al., 2000). They also escape anxiety about death by turning to those close relationship partners who best afford safety (Plusnin et al., 2018; Young et al., 2015).

Operating in conjunction in daily life, the social-safety system’s dual defenses link the experience of a threat to the safety of social connection in one relational world to its associated,

defense for making collective social connections feel safer nonetheless. Specifically, *personal-to-sociopolitical* threat-defense links the anxiety that one might understand the inhabitants of one's *personal* relational world well enough to protect oneself to the defensive inclination to impose understandable and benevolent motivations on the inhabitants of one's *sociopolitical* relational world. Conversely, *sociopolitical-to-personal* threat-defense links the anxiety that one might not understand the inhabitants of one's sociopolitical relational world well enough to protect oneself to the defensive inclination to impose understandable and benevolent motivations on the inhabitants of one's *personal* relational world. We detail and illustrate each defense in turn.

Personal-to-sociopolitical threat-defense. Through this threat-defense, people counteract the existential uncertainty posed by needing to depend on *intimates* who are behaving *unexpectedly* by defensively perceiving greater reason to trust in their *sociopolitical* relational worlds. For instance, people who are *less* certain they can trust their romantic partner could defend against the existential threat posed by a Liberal spouse bemoaning critical race theory, a college-aspiring teen eschewing finals for online gaming, or a friend gushing over for a small favor by defensively perceiving their neighbors, legislators, or President as *more* trustworthy, seeing the leaders and members of these collectives as being guided by unambiguously benevolent and well-intentioned concern for the welfare of others.

Sociopolitical-to-personal threat-defense. Through this threat-defense, people counteract the existential uncertainty posed by high outcome-dependence on *unexpectedly-behaving sociopolitical* relational worlds by defensively perceiving greater reason to trust in their *personal* relational worlds. For instance, people who feel especially dependent on the actions of government could defend against the existential threat posed by a President tweeting about the girth of his “nuclear button”, good employment numbers triggering stock sell-offs, or a

struggling business going on a hiring spree by defensively perceiving their family members and friends as *more* trustworthy, seeing these intimates as being transparently guided by unambiguously benevolent and well-intentioned concern for others' welfare. Consistent with this logic, people acutely threatened by national economic uncertainty report more trust in the good intentions of people they know (Navarro-Carrillo et al., 2018). People primed to think their country is doing poorly also report more trust in their partner and in marriage (Day et al., 2011).

Empirical Examples of the Social-Safety System in Operation

In our research on the social-safety system, we rely on naturalistic daily diary and longitudinal study designs so that we can capitalize on unexpected events as they happen in the *real* world. Accordingly, we report findings drawn from two daily diary studies conducted during the initial years of the Trump administration (Murray, Lamarche et al., 2021), an 8-week longitudinal study of the 2018 U.S. Midterm election (Murray, Lamarche et al., 2021; Murray, Seery et al., 2021), and a 3-week longitudinal study of the initial months of the COVID-19 pandemic in the United States (Murray, Seery et al., 2021). In all of these studies, we required participants to be involved in live-in romantic relationships. Given this constraint, most were married for more than a decade and had an average of two children still at home. In the daily diary studies, participants provided online daily reports each day for 9-10 consecutive days. In the midterm election study, participants provided once-weekly online reports for each of the 6 weeks preceding the 2018 U.S. midterm election, the day after the midterm election, and one week after the election. In the COVID-19 study, participants provided reports every other day for three weeks. We provide the evidence for *personal-to-sociopolitical* and *sociopolitical-to-personal* threat-defense in turn.

Personal-to-Sociopolitical Threat-Defense

When people exhibit this threat-defense, they counteract the existential uncertainty posed by depending on unexpectedly-behaving intimates (i.e., the *threat*) by perceiving greater reason to trust in *sociopolitical* relational worlds (i.e., the *defense*). We examined these dynamics in one daily diary study and the 2018 midterm election study. In these studies, we expected people to defensively trust *more* in the *sociopolitical* relational world when they were (1) *highly outcome-dependent* and (2) existentially-confused by the *unexpected* behavior of their intimates.

The daily-diary study. In this study, we operationalized *outcome-dependence* through differences between *people* – that is, through individual differences in expressions of romantic trust (i.e., “I can trust my romantic partner completely”; “I can always count on my romantic partner to be responsive to my needs and feelings”; “My romantic partner is always there for me”). As in prior research, we expected participants who were *less* certain they could trust their romantic partners to be more outcome-dependent or vulnerable to being harmed by others (Murray et al., 2006), sensitizing them to the threat posed by unexpected behavior. We operationalized intimates’ *unexpected behavior* through daily “yes” responses to 6 items that asked participants to indicate whether their romantic partner or child(ren) had said or done anything “out-of-the-ordinary”, “they did not expect”, or anything that “did not make sense” that day. We operationalized *trust in the sociopolitical relational world* through daily expressions of faith that the Trump administration was a trustworthy steward of the nation, which we captured through the daily value participants personally placed on political conservatism and their trust that the (Republican) federal government was doing a good job (Murray, Lamarche et al., 2021).

Because the data had a nested structure (i.e., day within person), we used multilevel analyses to test our hypotheses. These analyses revealed that participants who were less certain

they could trust their romantic partner (i.e., *high* outcome-dependence) reported *greater* faith that Republican government's actions secured the country's welfare on the days after family members behaved *more* unexpectedly than usual (i.e., *high* existential threat to safety) as compared to days their family members behaved *less* unexpectedly (i.e., *low* existential threat to safety). However, people who were already certain they could trust their romantic partner evidenced no such compensatory effect (i.e., *low* outcome-dependence).

The 2018 midterm election study. As we did in the daily diary study, we indexed *outcome-dependence* through individual differences in expressions of romantic trust. However, the midterm election study also allowed us to index outcome-dependence *situationally*. With each passing week during the 2018 midterm election season, the public became increasingly aware of the eventual electoral result – Democrats gaining control of the House and Republicans retaining the Senate. Because neither party gained unilateral control of Congress on election day, we expected *not* knowing whether one's preferred party would ultimately wield enough power over the country's governance *in the future* to make the risks of having one's fate tied to the votes cast by fellow community members more salient to partisans of both stripes. Therefore, we expected participants to be more keenly aware of their dependence on the collective populace to cast the "right" votes *after* the election than before the election.

We operationalized the daily *unexpected behavior* of intimates through "yes" responses to 8 items that asked participants to separately indicate whether their romantic partner or child had said or done anything "out-of-the-ordinary", anything "they did not expect", or anything that "did not make sense" and whether *they themselves* had any thoughts or feelings about their romantic partner or children "they did not expect to have" that day. We operationalized *trust in the sociopolitical relational world* through sympathy for the brand of Republicanism President

Trump routinely Tweeted. Namely, each week, we asked participants to report how much they personally (1) distrusted the media (e.g., “The mainstream media cannot be trusted”), (2) distrusted progressivism (e.g., “American society needs to be radically restructured”, reversed, “The structure of American society needs to change”, reversed), and (3) favored economic (e.g., “fiscal responsibility”, “business”) over social conservatism (e.g., “the family”, “religion”). We targeted the relative priority of economic over social conservatism as a metric of sympathy for President Trump because perceiving such an economic bias in his policies made Trump more sympathetic and appealing to swing voters in the 2016 federal election (Silver, 2019).

Multilevel analyses revealed the expected operation of the social-safety system. After the results of the election were known (i.e., *high* outcome-dependence), participants who were less certain they could trust their romantic partner (i.e., *high* outcome-dependence) reported significantly *greater* faith that Republican government’s actions secured the country’s welfare on the days after family members behaved *more* unexpectedly than usual (i.e., high existential threat to safety) as compared to days their family members behaved *less* unexpectedly (i.e., low existential threat to safety). However, these compensatory effects were not evident well in advance of the election (i.e., *low* outcome dependence), nor were they evident when people were certain they could trust their romantic partner (i.e., *low* outcome dependence).

Of course, it is relatively easy for participants who are motivated to find safety in the *sociopolitical* relational world to profess greater trust in the Republican-led government. To provide an even more telling test of the social-safety system’s power, we asked participants to report how they voted. Even though voting is strongly partisan in nature, these data nevertheless revealed a shift in voting preferences, but only when people needed to find *greater* safety in the *sociopolitical* world to defend against unexpected behavior in their *personal* relational world.

Specifically, participants who were *less* certain they could trust their romantic partner (i.e., *high* outcome-dependence) were *more* likely to cast votes for Republican candidates when their family members behaved *more* unexpectedly in the five weeks preceding the midterm (i.e., *high* existential uncertainty), as compared to less certain participants whose family members behaved *less* unexpectedly in the five weeks preceding the midterm (i.e., *low* existential uncertainty). In other words, the defensive need to trust and find safety in the Trump administration in the face of unexpectedly behaving family members predicted voting in Republicans to support it.

In sum, findings from both studies suggest that participants defensively professed *greater* trust in the safety of their *sociopolitical* relational worlds when they were (1) *highly outcome-dependent* and (2) existentially-confused by the unexpected behavior of their intimates.

Sociopolitical-to-Personal Threat-Defense

When people engage in this threat-defense, they counteract the existential uncertainty posed by *high* outcome-dependence on *unexpectedly-behaving* sociopolitical relational worlds (i.e., the *threat*) by perceiving greater reason to trust in their intimates (i.e., the *defense*). We examined this threat-defense in the daily diary studies, the 2018 midterm election study, and our 3-week study of the initial period of the COVID-19 pandemic in the United States. We expected people to defensively trust *more* in *personal* relational world when they felt (1) *highly outcome-dependent*, but (2) existentially-confused by the *unexpected* behavior of *sociopolitical* agents, whether the behavior of government leaders or fellow members of the U.S. community.

The daily diary studies. As we did before, we operationalized *outcome-dependence* through differences between *people* – that is, through individual expressions of romantic trust. We then turned to two *real-world* indicators to operationalize *unexpected behavior* on the part of government leaders in the *sociopolitical* relational world. Specifically, we categorized the

expectedness of *government* behavior each day through (1) the Chicago Board Options Exchange Volatility Index, an economic marker of political instability¹ and (2) the Google searches of people living in the same zip code as the participant, assuming that Google searches that day would capture existential uncertainty about unexpected government behavior. For instance, the news cycle in the first study included Trump tweeting threats of nuclear war with North Korea and impugning the FBI director. So, we tracked how often people in the same zip code as the participant searched for “uncertainty”, “North Korea”, “Trump lies”, “Comey”, and “terrorism,” assuming that more frequent searches would capture greater collective existential anxiety about these presumably unexpected behaviors. We operationalized *trust in personal relational worlds* through perceptions of love and acceptance from immediate family members (e.g., “my partner made me feel especially loved”; “my child expressed love and affection toward me”) and the daily quality of these family relationships (from “terrible” to “terrific”).

Multilevel analyses revealed that participants who were *less* certain they could trust their romantic partner (i.e., *high* outcome-dependence) reported greater trust or faith in the benevolent motivations on days after the sociopolitical world behaved *more* unexpectedly, as captured by spikes in the VIX or Google-search activity (i.e., *high* existential threat to safety), as compared to days when sociopolitical powers behaved *less* unexpectedly (i.e., low existential threat to safety). However, people who were already certain they could trust their romantic partner evidenced no such compensatory effect (i.e., *low* outcome-dependence). In sum, participants defensively

¹ Derived from the behavior of financial traders, the VIX is a daily economic indicator that tracks uncertainty in national and international events by forecasting greater volatility in the stock market over the next 30 days (Bloom, 2014).

professed *greater* trust in the safety of their *personal* relational worlds when they were (1) *highly outcome-dependent* and (2) existentially-confused by *unexpected* government behavior.

The midterm election and pandemic studies. The midterm election and pandemic studies allowed us to operationalize both outcome-dependence and expectedness *situationally*. In the midterm study, we again operationalized *outcome-dependence* through knowledge of the election's results in the midterm study. As we explained earlier, we expected participants to feel *more* keenly dependent on fellow community members to vote the "right way" after the election resulted in a divided Congress (i.e., *high* outcome-dependence) than before (i.e., *low* outcome-dependence). In the pandemic study, we operationalized *outcome-dependence* through the total number of COVID-19 cases in the United States. We expected participants to feel *more* keenly dependent on their fellow community members to keep them safe from infection on days when the total number of U.S. cases increased *more* than usual (i.e., *high* outcome-dependence), as compared to *less* than usual (i.e., *low* outcome-dependence).

We operationalized expectedness through the *consistency* between one's personal view of President Trump's stewardship and popular consensus. We did this by tracking the percent of social media posts mentioning the President that were *negative* on each assessment day. We then used political partisanship to define (1) days when U.S. citizens *more often* posted negative comments mentioning Donald Trump as *more* unexpected for conservatives, given the positive reality of his stewardship most conservatives perceived and (2) days when U.S. citizens *less often* posted negative comments mentioning Donald Trump as *more* unexpected for liberals, given the *negative* reality of his stewardship most *liberals* perceived. We operationalized *trust in personal relational worlds* through participants reporting (1) the daily quality of their relationships with their romantic partners and children (from "terrible" to "terrific") and (2) daily

doubt and conflict in these familial relationships, which we reversed, such that higher scores captured greater daily happiness, and thus safety, within these family relationship bonds.

Multilevel analyses revealed that on days when the election results were known (i.e., *high* outcome-dependence), *liberals* reported greater family relationship happiness on days when popular sentiment toward President Trump was *less negative* than usual (i.e., *high* existential uncertainty for liberals) than *more negative* than usual (i.e., *low* existential uncertainty for liberals). However, *conservatives* reported greater family relationship happiness on days when popular sentiment toward President Trump was *more negative* than usual (i.e., *high* existential uncertainty for conservatives) than *less negative* than usual (i.e., *low* existential uncertainty for conservatives). Similarly, on days when COVID-19 cases spread *more rapidly* (i.e., *high* outcome-dependence), *liberals* reported greater family relationship happiness on days when popular sentiment toward President Trump was *less negative* than usual (i.e., *high* existential uncertainty for liberals) than *more negative* than usual (i.e., *low* existential uncertainty for liberals). However, *conservatives* reported greater family relationship happiness on days when popular sentiment toward President Trump was *more negative* than usual (i.e., *high* existential uncertainty for conservatives) than *less negative* than usual (i.e., *low* existential uncertainty for conservatives). No such compensatory effects emerged for liberals or conservatives in either study on days when the election results were unknown or U.S. COVID-19 cases spread less rapidly (i.e., *low* outcome-dependence).

In sum, we found evidence for *sociopolitical-to-personal* threat-defense in all four studies. Participants defensively professed *greater* trust in the safety of *personal* relational worlds on days when they were highly *outcome-dependent* (i.e., vulnerable to others) and existentially-confused by government leaders and community members behaving unexpectedly.

Looking Forward

The findings that we have reviewed in this chapter suggest that people look to *alternate* relational worlds for safety when they need to count on others (i.e., *high* outcome-dependence) in a given relational world, but cannot anticipate or foresee how others are likely to behave (i.e., *high* existential uncertainty). For instance, when Arya questions her spouse's trustworthiness or fears a rapidly circulating virus, *not* being able to anticipate the behavior of her President or fellow community members threatens the collective safety of social connection, motivating her to perceive greater evidence of safety in her family relationships (i.e., *sociopolitical-to-personal* threat-defense). However, *not* being able to anticipate the behavior of her spouse or children motivates her to perceive greater evidence of safety in her relationship with her government or fellow community members (i.e., *personal-to-sociopolitical* threat-defense).

Of course, the evidence that people engage in these defenses in daily life does not address the question of whether the defense "works." While we do not yet have a definitive answer, the initial evidence points to their effectiveness. For instance, we took advantage of a longitudinal study of newlywed couples to examine whether newlyweds who were *more* likely to find greater reason to be happy in their marriage on days when the VIX spiked fared better over time than newlyweds who were *less* likely to evidence this defense. For people who married *less* than completely certain they could trust their new spouse, being *more* likely to find happiness in their marriage on days when the VIX spiked was protective. Namely, being able to find greater safety in their marriage on days when the world behaved more unpredictably helped strengthen their trust in their partner and the security of their marriage over time (Murray, Lamarche et al., 2021).

Nevertheless, there is still more that we need to understand in delineating how people find a sense of safety in the collective relationships that surround them. For instance, future

research might broaden the collective relational world to group or out-group members. On days when children or romantic partners behave acutely unexpectedly, perhaps people impose greater safety on the *sociopolitical* world by believing more in stereotypes that depict in-group members as warm and disbelieving stereotypes that depict out-group members as hostile. They might also profess greater than usual faith in the importance of religion in their lives. Future research should also examine the social-safety system's operation in different political contexts. The studies we presented were conducted during Trump administration, which confounds the motivation to believe in the prevailing sociopolitical powers with conservative thinking. In this context, people had to believe in right-wing ideology and policy (no matter how personally foreign they normally found it) to impose safety on the sociopolitical world. In a Democratic-led administration, people might instead need to believe in more left-wing ideology and policy (no matter how personally foreign they normally find it) to impose safety on the sociopolitical world.

Conclusion

There is no escaping the solidarity of life. Indeed, the way people think about the ties they share with those closest to them is intricately bound up in the way they think about the collective ties they share with people and the institutions they will never meet. In recognizing that interdependence extends beyond the dyad, the proposed model of the social-safety system sheds new light on how people sustain a sense of safety in their collective ties to others, allowing them to better reap the potential benefits of these relationships.

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