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Moral injury and moral repair in war veterans: A preliminary model and intervention strategy

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ABSTRACT

Throughout history, warriors have been confronted with moral and ethical challenges and modern unconventional and guerilla wars amplify these challenges. Potentially morally injurious events, such as perpetrating, failing to prevent, or bearing witness to acts that transgress deeply held moral beliefs and expectations may be deleterious in the long-term, emotionally, psychologically, behaviorally, spiritually, and socially (what we label as *moral injury*). Although there has been some research on the consequences of unnecessary acts of violence in war zones, the lasting impact of morally injurious experience in war remains chiefly unaddressed. To stimulate a critical examination of moral injury, we review the available literature, define terms, and offer a working conceptual framework and a set of intervention strategies designed to repair moral injury.

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1. Introduction

Service members are confronted with numerous moral and ethical challenges in war. They may act in ways that transgress deeply held moral beliefs or they may experience conflict about the unethical behaviors of others. Warriors may also bear witness to intense human suffering and cruelty that shakes their core beliefs about humanity. What happens to service members who are unable to contextualize or justify their actions or the actions of others and are unable to successfully accommodate various morally challenging experiences into their knowledge about themselves and the world? Are they at risk for developing long-lasting psycho-bio-social impairment? Is there a distinct syndrome of psychological, biological, behavioral, and relational problems that arises from serious and/or sustained morally injurious experiences? Or, do existing disorders, such as posttraumatic stress disorder (PTSD), sufficiently explain the sequelae of what we term moral injury? And, can existing psychological treatments for combat and operational PTSD be effective or impactful?

In the first iteration of the PTSD construct (DSM-III) "guilt about surviving while others have not *or about behavior required for survival* (emphasis added)" was a symptom of PTSD. This was chiefly the result of the predominance of thinking about the phenomenology of Vietnam veterans and clinical care experience with veterans of war. Consequently, prior to the DSM-III-R, clinicians in VA settings arguably tackled moral conflict and guilt (e.g., Friedman, 1981). Since then, there has been very little attention paid to the lasting impact of moral conflict-colored psychological trauma among war veterans in the clinical science community. A possible reason for the scant attention is that clinicians and researchers who work with service members and veterans focus most of their attention on the impact of life-threat trauma, failing to pay sufficient attention to the impact of events with moral and ethical implications; events that provoke shame and guilt may not be assessed or targeted sufficiently. This explanation seems plausible given the emphasis on fear memories in evidence-based models of treatment (e.g., Foa, Steketee, & Rothbaum, 1989).

It is also possible that some clinicians believe that addressing ethical conflicts and moral violations is outside the realm of their expertise, preferring to recommend religious counseling instead. Care-providers may also not hear about moral injury because service members' or veterans' shame and concern about adverse impact or repercussions (e.g., being shunned, rejected, misunderstood) prevent disclosure. Mental health professionals may contribute to this; they may unknowingly provide non-verbal messages that various acts of omission or commission in war are too threatening or abhorrent to hear. Some may believe that treatment would excuse illegal or immoral behavior in some way. Others may veer from the topic to avoid the very thorny question about whether perpetration of violence should lead to diagnosable and potentially compensable PTSD.

Whatever the reasons for the scant attention paid to moral and ethical conflicts (after DSM-III), we argue that serious exploration is indicated because, in our experience, service members and veterans can suffer long-term scars that are not well captured by the current conceptualizations of PTSD or other adjustment difficulties. We are not arguing for a new diagnostic category, per se, nor do we want to medicalize or pathologize the moral and ethical distress that service members and veterans may experience. However, we believe that the clinical and research dialogue is very limited at present because questions about moral injury are not being addressed. In addition, clinicians who observe moral injury and are motivated to target these problems are at a loss because existing evidence-based strategies fail to provide sufficient guidance. Consequently, our goal is two-fold: We want to stimulate discourse and empirical research and, because we are sorely aware of the clinical care vacuum and need (especially in the Department of Defense), we offer specific treatment recommendations based on our conceptual model and a pilot study we are conducting in the Marine Corps.

Below, we first describe the potential morally injurious experiences in war, using the current wars in Iraq and Afghanistan as examples. Second, we review and summarize the research pertaining to events that have the potential to be morally injurious. Third, we discuss why existing conceptualizations of PTSD may not fully capture the different aspects of moral injury. Finally, we propose a working conceptual model, a set of assumptions that guide our treatment approach, and details about the treatment model.

There are three sets of important questions we will not be covering in detail in this article: (1) What military training, deployment length, battlefield context, leadership, rules of engagement, group processes, and personality factors moderate and mediate war-zone transgression?; (2) What aspects of military training (primary and secondary prevention strategies) help service members assimilate and accommodate various moral and ethical challenges, roles, and experiences?; and (3) What are the learning history, personality, religious beliefs, and social and cultural variables that moderate and mediate moral injury afterward? These complex research questions require an interdisciplinary approach (e.g., military, biological, philosophical, sociological and social psychological, legal, religious, mental health perspectives), and our intention is to offer a basic framework that can be used as a point of departure for future theory-building and research.

2. What might be potentially morally injurious in war?

Service members deployed to Iraq or Afghanistan have been exposed to high levels of violence and its aftermath. In 2003, 52% of soldiers and Marines surveyed reported shooting or directing fire at the enemy, and 32% reported being directly responsible for the death of an enemy combatant (Hoge et al., 2004). Additionally, 65% of those surveyed reported seeing dead bodies or human remains, 31% reported handling or uncovering human remains, and 60% reported having seen ill/wounded women and children who they were unable to help. The rates of exposure to violence and its aftermath remained high in a survey of soldiers in 2007 (Mental Health Advisory Team [MHAT-V], 2008).

Violence and killing are prescribed in war and encounters with the grotesque aftermath of battle are timeless and expected aspects of a warrior's experience. Still, the actions, sights, smells, and images of violence and its aftermath may produce considerable lasting distress and inner turmoil, comparable to consequences of direct life threat.

Morally questionable or ethically ambiguous situations can arise for service members in any type of warfare. However, counter-insurgency, guerilla warfare, especially in urban contexts poses greater risks. These types of wars involve unconventional features (e.g., an unmarked enemy, civilian threats, improvised explosive devices) that produce greater uncertainty, greater danger for non-combat troops, and generally greater risk of harm among non-combatants. Not surprisingly, a select field survey in theatre revealed that 27% of soldiers faced ethical situations during deployment in which they did not know how to respond (MHAT-V, 2008). Guerilla wars also expose service members to unpredicted and non-contingent violence and the aftermath of violence; experiences that fail to conform to schematic beliefs about warfare and roles for service members. Research has shown that for those who are unaccustomed or unprepared, exposure to human remains is one of the most consistent predictors of long-term distress (e.g., McCarroll, Ursano, & Fullerton, 1995).

Unconventional features of war may make it more difficult for service members to decide on the most prudent way to react towards non-combatants (or potential combatants) despite strong battlefield ethics training and the rules of engagement. For example, in 2003, 20% of soldiers and Marines surveyed endorsed responsibility for the death of a non-combatant (Hoge, et al., 2004), arguably due to the ambiguity of the enemy. Furthermore, 45% of the soldiers and Marines assessed with a field survey in Iraq in 2006 felt that non-combatants should be

treated with dignity and respect, and 17% of soldiers and Marines surveyed believed that non-combatants should be treated as insurgents (Mental Health Advisory Team [MHAT-IV], 2006). Also, using a similar methodology, in 2007, 31% indicated they had insulted or cursed at civilians, 5% indicated mistreating civilians, and 11% reported damaging property unnecessarily (MHAT-V, 2008).

Further heightening the intensity of these challenges is the increased demands on current service members (and their families), such as longer and more frequent deployments. The cumulative anger and frustration about losses, sacrifices, and adversities may impact ethical decision making in some service members. For example, deployment length has been found to be associated with an increase in unethical behaviors on the battlefield within the first ten months of deployment (MHAT-V, 2008).

It is important to appreciate that the military culture fosters an intensely moral and ethical code of conduct and, in times of war, being violent and killing is normal, and bearing witness to violence and killing is, to a degree, prepared for and expected. Nevertheless, individual service members and units face unanticipated moral choices and demands and even prescribed acts of killing or violence may have a delayed but lasting psychosocial–spiritual impact (e.g., guilt and shame). For example, it makes sense that most service members are able to assimilate most of what they do and see in war because of training and preparation, the warrior culture, their role, the exigencies of various missions, rules of engagement and other context demands, the messages and behavior of peers and leaders, and the acceptance (and recognition of sacrifices) by families and the culture at large. However, once redeployed and separated from the military culture and context (e.g., with family or after retirement), some service members may have difficulty accommodating various morally conflicting experiences.

To summarize, the current wars may be creating an additional risk for exposure to morally questionable or ethically ambiguous situations. Many service members may mistakenly take the life of a civilian they believed to be an insurgent, be directly responsible for the death of enemy combatants, unexpectedly see dead bodies or human remains, or see ill/wounded women and children who they are unable to help. We are doing a disservice to our service members and veterans if we fail to conceptualize and address the lasting psychological, biological, spiritual, behavioral, and social impact of perpetrating, failing to prevent, or bearing witness to acts that transgress deeply held moral beliefs and expectations, that is, moral injury.

3. Research on military atrocities and killing

Although moral injury, per se, has not been systematically studied, there has been some research on acts of perpetration such as atrocities (i.e., unnecessary, cruel, and abusive harm to others or lethal violence) and killing. Several researchers have demonstrated that self-reports of atrocities are related to chronic PTSD in Vietnam veterans (e.g., Beckham, Feldman, & Kirby, 1998; King, King, Gudanowski, & Vreven, 1995; Yehuda, Southwick, & Giller, 1992). Moreover, the association between reports of atrocities and PTSD is considerably stronger than global reports of combat exposure and PTSD, in terms of very chronic PTSD among Vietnam veterans. Furthermore, researchers have shown that exposure to atrocities increases the risk for a variety of dysfunctional behaviors and problems, namely depression (Yehuda et al.), general indices of psychiatric distress (Fontana, et al., 1992) and suicidal behavior (Hiley-Young, Blake, Abueg, Rozynko, & Gusman, 1995).

Compared to witnessing atrocities, perpetration appears to be more problematic (Breslau & Davis, 1987; Fontana, Rosenheck, & Brett, 1992; Hiley-Young et al., 1995; Laufer, Gallops, & Frey-Wouters, 1984). Still, some research has suggested that witnessing atrocities in theatre is also associated with PTSD (e.g., Fontana et al.; Laufer, Brett, & Gallops, 1985). Failing to prevent atrocities and learning about atrocities might affect outcome as well; however, researchers have yet to examine the unique impact of these types of potentially injurious experiences.

Exposure to atrocities does not appear to be associated with hyperarousal problems, which makes sense conceptually because arousal difficulties arguably stem from high sustained fear due to life-threat. When researchers have broken PTSD symptoms into separate clusters, they generally have found that exposure to atrocities was only related to the reexperiencing (Beckham et al., 1998; Fontana et al., 1992; Henning & Frueh, 1997; Yehuda et al., 1992) and avoidance (Henning & Frueh; Laufer et al., 1985) clusters. Unfortunately, studies to date have not disaggregated cluster C into its conceptually distinct sub-components, namely, strategic avoidance (C1 and C2) and emotional numbing (C4–C6). Overall, the sub-cluster analyses suggest that morally injurious experiences are recalled intrusively and a combination of avoidance and emotional numbing may also be a consequence.

Other studies have also shown that prescribed killing and injuring others are associated with PTSD (Fontana & Rosenheck, 1999; MacNair, 2002). Killing, regardless of role, is a better predictor of chronic PTSD symptoms than other indices of combat, mirroring some of the results on atrocities. For example, MacNair found that Vietnam veterans who killed and experienced light combat had more PTSD symptoms than those who did not kill and experienced heavy combat. Among Vietnam veterans, killing was a significant predictor of PTSD symptoms, dissociation, functional impairment, and violent behaviors, after controlling for general combat exposure (Maguen, Metzler, et al., in press). Also, after controlling for combat exposure, taking another life was a significant predictor of PTSD symptoms, alcohol abuse, anger, and relationship problems among Iraq War veterans (Maguen, Lucenko, et al., in press).

Role and choice appear to be related to outcome as well. For example, Fontana et al. (1992) found that more active roles related to killing (i.e., being an agent of killing and failing to prevent killing) were more strongly related to PTSD, other psychiatric symptoms, and suicide than passive roles. Furthermore, active potentially morally injurious roles had significantly smaller associations with hyperarousal than being the target of life-threat.

Although reports of perpetration on check-lists covary with post-war symptomatology, the subjective responses to those acts are likely to be the more critical components in the etiological chain—in other words, the meaning that is attributed to actions and various attendant observations shapes the long-term response. Supporting this contention, Fontana et al. (1992) found that retrospective accounts of subjective distress related to acts of violence accounted for more variance in outcome. Likewise, Laufer et al. (1985) found that feelings of demoralization and guilt had much stronger correlations with PTSD than reports of combat exposure and participation in abusive violence. These findings are consistent with other research that underscores the importance of evaluating subjective responses to combat and operational stress (King et al., 1995).

Further underscoring the importance of subjective reaction to combat roles, Henning and Frueh (1997) found that combat-related guilt (chiefly indexed to various acts of omission or commission) was associated with reexperiencing and avoidance symptoms and a general measure of PTSD symptom severity. They also found that combat guilt accounted for 30% of the unique variance in a composite of reexperiencing and avoidance symptoms and 8% of the unique variance in overall PTSD severity. Moreover, after controlling for combat-related guilt, combat exposure and trait-related guilt were not related to outcome. Based on these findings, the authors concluded that combat guilt is largely responsible for reexperiencing and avoidance symptoms, but not arousal symptoms.

Marx et al. (submitted for publication) performed two path analyses examining the relationships between atrocity exposure,

guilt, PTSD, and major depressive disorder (MDD) with data from 1248 male Vietnam combat veterans with and without PTSD from a VA Cooperative Study. The guilt measure consisted of a 12-item subscale from the Laufer–Parson Inventory (Laufer, Yager, Frey-Wouters, & Donnellan, 1981) that addressed acts of commission and omission. Results indicated that guilt partially mediated the relationship between atrocity exposure and PTSD and the relationship between atrocity exposure and MDD. Another study also found that guilt partially mediated the relationship between the active participation roles (e.g., agent of killing) and loss of religious faith (Fontana & Rosenheck, 2004).

It appears that participation in atrocities and killing is chiefly implicated in reexperiencing and avoidance symptoms. Researchers have yet to fully evaluate other important outcomes, such as dysphoria and anhedonia (depression), general distress, relational and parenting difficulties, parasuicidal behavior, domestic violence, criminal behavior, and loss of spirituality and religious faith. It is also unclear whether demoralization, shame, and guilt fully or partially mediate the association between various conflictual acts and a variety of negative outcomes. The lasting psychological and social impact of witnessing unethical behaviors performed by others or witnessing intense human suffering remains insufficiently addressed. Extensive research is needed.

4. What aspects of existing theory might explain moral injury?

Service members face moral and ethical conflicts and may struggle with how to manage their lasting impact. Going forward, should we conceptualize the aftermath of these conflicts as adjustment disorder or PTSD? Or, do issues of morality deserve special attention? To help address these questions, we review the prominent theories of PTSD and gauge their applicability to our conceptualization of moral injury.

Social-cognitive theories of PTSD delineate how traumatic events clash with existing schemas that people hold about themselves and the world (Horowitz, 1976, 1986; Janoff-Bulman, 1985, 1989; McCann & Pearlman, 1990). Basic fundamental assumptions that may be altered by a traumatic event include beliefs that the world is benevolent, the world is meaningful, and the self is worthy (e.g., Epstein, 2003; Janoff-Bulman, 1989). If an individual is unable to assimilate the traumatic event with prior knowledge and assumptions, intrusions and avoidance problems ensue. Intrusions, in the form of memories and nightmares are accompanied by extreme arousal and distress, motivating the individual to avoid thoughts and memories (and situations that trigger recall) of the trauma. Although avoidance strategies may temporarily alleviate distress, they tend to interfere with accommodation of and, by extension, recovery from the traumatic experience. Furthermore, traumatic events may alter generalized self-schemas pertaining to themes of safety, trust/dependency, esteem, independence, control, and intimacy, negatively impacting the individual's functioning in his or her daily life (e.g., McCann & Pearlman).

Similar to social–cognitive theories of PTSD, we argue that moral injury involves an act of transgression that creates dissonance and conflict because it violates assumptions and beliefs about right and wrong and personal goodness. How this dissonance or conflict is reconciled is one of the key determinants of injury. If individuals are unable to assimilate or accommodate (integrate) the event within existing self- and relational-schemas, they will experience guilt, shame, and anxiety about potential dire personal consequences (e.g., ostracization). Poor integration leads to lingering psychological distress, due to frequent intrusions, and avoidance behaviors tend to thwart successful accommodation.

The social–cognitive model needs to be expanded to account for the impact of moral injury. Whereas beliefs related to self-efficacy and competency to cope with life-threatening events have been the focus of social constructivist models (e.g., Benight & Bandura, 2004), the altered beliefs about the world and the self caused by moral injury are likely to be deeper and more global. For example, an individual with moral injury may begin to view him or herself as immoral, irredeemable, and un-reparable or believe that he or she lives in an immoral world.

Moral injury may also share some of the avoidance elements as described within the two-factor theory of PTSD (e.g., Keane, Fairbank, Caddell, Zimering, & Bender, 1985), which posits that PTSD develops from an initial phase of fear acquisition through classical conditioning processes and is further maintained through instrumental avoidance behaviors. During the traumatic event, various cues become associated with "intense fear, helplessness, or horror" and acquire the capacity to evoke strong emotional responses on subsequent occasions when the traumatic event is no longer occurring. Quickly, individuals learn to avoid these cues, but the avoidance prevents natural extinction from occurring.

Moral conflict and dissonance arguably creates severe peri- or post-event emotional distress (e.g., shame and guilt), which causes motivation to avoid various cues that serve as reminders of the experience. Although functional in the short run, avoidance thwarts corrective learning experiences (e.g., learning that the world is not always an amoral place, that the person can do good things, that others still accept them), maintaining the negative psychosocial impact of moral conflict. These aspects of moral injury seem consistent with the two-factor theory of PTSD. However, the two-factor theory of PTSD is based on conceptualizing the trauma as an unconditioned fear stimulus and symptoms as conditioned responses to fear. Events associated with moral injury are not chiefly based on fear, but other affects and cognitions, such as shame. Whether these experiences can be extinguished naturally or by therapeutic means is an empirical question.

The enduring negative emotional distress related to moral injury may also be partially explained by emotional-processing theory (Foa et al., 1989; Foa & Riggs, 1993). The emotional-processing theory of trauma proposes that pre-trauma schemas, the memory of the event, and the memory of experiences prior to the event can interact and interfere with the emotional-processing of the trauma, leading to the development of chronic PTSD. Although many negative events are emotionally reexperienced, the frequency and intensity of the emotions usually decrease naturally (i.e., via extinction). Yet, if the individual does not allow himself or herself to remember and experience the emotions associated with the event, extinction and habituation are disrupted and decreases in the emotions' frequency and intensity do not occur, resulting in PTSD. The emotional consequences of moral injury (e.g., shame and guilt) are, at least, partly maintained through non-confrontation of the event and/or the meaning of the event. However, it is unlikely that a lack of extinction/habituation is the mechanism that maintains the emotional distress associated with moral injury.

The cognitive model of PTSD may also be useful in partly explaining the impact of moral injury. The cognitive model (e.g., Ehlers and Clark, 2000) posits that PTSD develops when traumatic events produce a sense of constant threat through excessively negative appraisals and data-driven processing (getting stuck in sensory details), resulting in strong perceptual priming and poor elaboration (i.e., the event is not given a complete context in time and place) and that PTSD is maintained by a series of problematic behavioral and cognitive strategies. A feature of moral injury that may be consistent with the cognitive model of PTSD is the importance of negative appraisals and attributions about the transgression that serve to create and maintain the lasting psychosocial consequences of moral injury (such as shame and dysphoria).

Some recent models of PTSD have attempted to specify vulnerabilities that explain why some develop the disorder and others do not (Elwood, Han, Olatunji, & Williams, 2009; Charuvastra & Cloitre, 2008). Vulnerabilities are specific diatheses that manifest under

conditions of stress and trauma (e.g., Bowman & Yehuda, 2004). Elwood et al. posited four cognitive vulnerabilities (based on Ehlers & Clark, 2000) related to the development and maintenance of PTSD: (1) *negative attributional style* (i.e., consistently attributing negative events to internal, stable, and global causes); (2) *rumination* (i.e., repetitively and passively thinking about negative emotions, precipitators of negative emotions, symptoms of distress, and the meaning of distress); (3) *anxiety sensitivity* (i.e., fear and anxiety about unexpected fear-related experiences); and (4) *looming maladaptive style* (i.e., biased interpretations about present and future threat). Of these, negative attributional style and rumination appear to be germane to moral injury. We discuss the role of attributions in detail later in this paper. A ruminative style may foster greater distress, withdrawal, and reinforce destructive beliefs (e.g., of being unforgiveable).

Charuvastra and Cloitre (2008) described how social bonds are a vulnerability factor for PTSD, which is highly relevant to moral injury. Social support resources, perceived or actual, are one of the most robust predictors of chronic PTSD. Although less discussed, the absence or withdrawal of supports is especially damaging. Social support before and after the morally injurious event is likely to influence the related psychosocial impact. However, compared to those suffering from PTSD, those who suffer from moral injury may be more reluctant to utilize social supports, and it is possible that they may be actually shunned in light of the moral violation. Charuvastra and Cloitre underscored how exposure to human-generated traumatic events (typically interpersonal trauma) result in more toxic impact and distress than exposure to harm alone because human-generated events represent a breakdown of social norms in addition to diminished expectations of safety. Because morally injurious events are almost always human-generated, the breakdown of the social contract is as germane. However, to date, the social bond impact of perpetration and transgression have not been addressed.

In sum, prevailing theories of posttraumatic adaptation only partially explain the development and maintenance of moral injury. This is to be expected; theories of PTSD attempt to explain the long-term phenomenology of individuals *harmed by others* (and other unpredictable, uncontrollable, and threatening circumstances) and have not considered the potential harm produced by perpetration (and moral transgressions) in traumatic contexts. Consequently, moral injury requires an alternative (but also complementary) model.

5. Basic concepts

Before further describing our concept of moral injury, it will be instructive to review some basic concepts that inform our model and intervention approach.

5.1. What are morals?

The majority of individuals have a strong moral code that they use to effectively navigate through their lives. Morals are defined as the personal and shared familial, cultural, societal, and legal rules for social behavior, either tacit or explicit. Morals are fundamental assumptions about how things should work and how one should behave in the world. For example, the implicit belief that "the world is benevolent" stems from the expectation that others will behave in a moral and just manner. Another tacit assumption is that "people get what they deserve"; thus, if someone does not act within the accepted moral code, a punishment should ensue.

Morality has been studied in the context of human development (e.g., Kohlberg, 1981), group processes, such as altruism and prosocial behavior (e.g., Eisenberg & Miller, 1987), and ethics (Miller, 2003). From an evolutionary psychology perspective, moral behaviors are functional because certain primitive drives and instincts (e.g., aggression) may be destructive to the group and the culture. This process was well articulated by Freud (1930/2005) in *Civilization and Its Discontents*. A good deal of human suffering was argued to arise from the lasting impact of punishment and withdrawal of love and support in the aftermath of various acts of transgression developmentally. The aversive learning experiences from powerful others (parents, teachers, leaders) leads to self-censure and moral comportment, as well as the expectation that others should conform to moral standards, and if they don't, they should be punished.

5.2. Are there unique emotions related to moral beliefs?

Moral emotions, both self-focused and other-focused, serve to maintain a moral code. Morality-related emotions are driven by expectations of others' responses to perceived transgression. Embarrassment may encourage adherence to broadly or locally accepted moral standards by prompting individuals to act in conciliatory ways so as to win approval or inclusion (e.g., Keltner, 1995). Positive emotions such as self-oriented pride and other-oriented gratitude also shape moral behaviors.

Most research has focused on the experience of self-oriented negative moral emotions, such as shame and guilt and how they influence moral behavior (see Tangney, Stuewig, & Mashek, 2007). Guilt is a painful and motivating cognitive and emotional experience tied to specific acts of transgression of a personal or shared moral code or expectation. Guilt, unlike shame, is associated with a decreased likelihood of participating in risky or illegal behavior and often results in the making of amends.

Shame involves global evaluations of the self (e.g., Lewis, 1971), along with behavioral tendencies to avoid and withdraw. Therefore, it results in more toxic interpersonal difficulties, such as anger and decreased empathy for others, and these experiences can, in turn, lead to devastating life changes. Generally, research has shown that shame is more damaging to emotional and mental health than guilt (see Tangney et al., 2007). Consequently, shame may be a more integral part of moral injury.

5.3. The effect of shame on social behavior and connection

Shame is fundamentally related to expected negative evaluation by valued others. It is, therefore, not surprising that individuals respond to shame with a desire to hide or withdraw. The non-verbal and verbal communication behaviors related to shame in interpersonal contexts function to inhibit interaction and communication with others (Izard, 1977; Keltner & Harker, 1998). A number of researchers suggest that shame behavior in relationships serves to reduce anger in others and elicit greater sympathy (Gilbert & McGuire, 1998; Keltner, 1995; Keltner & Harker, 1998). In this way, one who commits a transgression can minimize or avoid condemnation and rejection and elicit greater sympathy and support. However, shame due to serious acts of perpetration or acts of omission in traumatic circumstances is likely to lead to extensive withdrawal, which in turn exacerbates shame (e.g., expectations of censure and rejection are reinforced).

5.4. Self-forgiveness

A good deal of research has shown that interpersonal forgiveness, that is, forgiving *others* who have transgressed, helps people adapt and recover from various social harms. Less studied, but no less important from the vantage point of preventing wrongdoing and helping transgressors, is the process of self-forgiveness, which is a means of obviating self-condemnation and shame and a vehicle for corrective action. Hall and Fincham (2005) define self-forgiveness as "a set of motivational changes whereby one becomes decreasingly motivated to avoid stimuli associated with the offense, decreasingly motivated to retaliate against the self (e.g., punish the self, engage in self-destructive behaviors, etc.), and increasingly motivated to act benevolently toward

the self" (p. 622). Self-forgiveness conceptually entails acknowledging the event, accepting responsibility for it, experiencing the negative emotions associated with it (e.g., Hall & Fincham; Holmgren, 2002), devoting sufficient energy to heal (Fisher & Exline, 2006), and committing to living differently in the future (Enright, 1996). Hall and Fincham (2008) have shown that feelings of guilt, conciliatory behaviors, and the perception of forgiveness from others affected self-forgiveness over time.

In terms of adaptation to behaviors required in war, Witvliet, Phipps, Feldman, and Beckham (2004) found that lack of self-forgiveness was related to PTSD symptom severity in Vietnam veterans. The converse of self-forgiveness, self-condemnation, has also been shown to be associated with depression and general anxiety (Maltby, Macaskill, & Day, 2001; Mauger et al., 1992), dispositional shame, poor psychological well-being, and self-punishment (Fisher & Exline, 2006).

6. Working conceptual model

To stimulate a dialogue about moral injury, we offer the following working definition of potentially morally injurious experiences: *Perpetrating, failing to prevent, bearing witness to, or learning about acts that transgress deeply held moral beliefs and expectations.* This may entail participating in or witnessing inhumane or cruel actions, failing to prevent the immoral acts of others, as well as engaging in subtle acts or experiencing reactions that, upon reflection, transgress a moral code. We also consider bearing witness to the aftermath of violence and human carnage to be potentially morally injurious.

Moral injury requires an act of transgression that severely and abruptly contradicts an individual's personal or shared expectation about the rules or the code of conduct, either during the event or at some point afterwards (see Fig. 1). The event can be an act of wrongdoing, failing to prevent serious unethical behavior, or witnessing or learning about such an event. The individual also must be (or become) aware of the discrepancy between his or her morals and the experience (i.e., moral violation), causing dissonance and inner conflict.

In the case of a severe act of transgression, for most service members, the event is, by definition, incongruent and discrepant with fundamental beliefs and assumptions about how the world operates or how an individual or group should be treated (or at odds with military training and rules of engagement). The context and others' reactions may moderate the degree to which the event is initially dissonant or conflictual. However, we argue that many service members will eventually experience dissonance and face the task of reconciling their discomfort and expectations of social condemnation, censure, and rejection (see Higgins, 1987), if not literal punishment. If a severe and abrupt discrepancy occurs between self- and other schemas and the transgression, the psychological process of reconciling discrepant ways of seeing the self and the world creates emotional turmoil and distress, and the accommodation process can consume psychological and emotional resources (e.g., Lee, Scragg, & Turner, 2001; McCann & Pearlman, 1990). If the service members feel remorse about various behaviors, they will experience guilt; if they blame themselves because of perceived personal inadequacy and flaw, they will experience shame. Guilt responses are temporarily functional because they increase motivation to correct behavior or to find ways of correcting harmful ways of construing the experience, for example, by conferring with peers.

We posit that the type of attributions made about moral violation greatly affects outcome (cf. Weiner, 1985). If the attribution about the cause of a transgression is *global* (i.e., not context dependent), *internal* (i.e., seen as a disposition or character flaw), and *stable* (i.e., enduring; the experience of being tainted), these beliefs will cause enduring moral emotions such as shame and anxiety due to uncertainty and the expectation of being judged *eventually*. If these aversive emotional and psychological experiences lead to withdrawal (and concealment) then the service member is thwarted from corrective and repairing experience (that otherwise would temper and counter attributions and foster *self-forgiveness*) with peers, leaders, significant others, faith communities (if applicable), and the culture at large (see Fig. 1).

The more time passes, the more service members will be convinced and confident that not only their actions, but *they* are unforgiveable. In other words, service members and veterans with moral injury will fail to see a path toward renewal and reconciliation; they will fail to forgive themselves and experience self-condemnation. The behavioral, cognitive, and emotional aftermath of unreconciled severe moral conflict, withdrawal, and self-condemnation closely mirrors the reexperiencing, avoidance, and emotional numbing

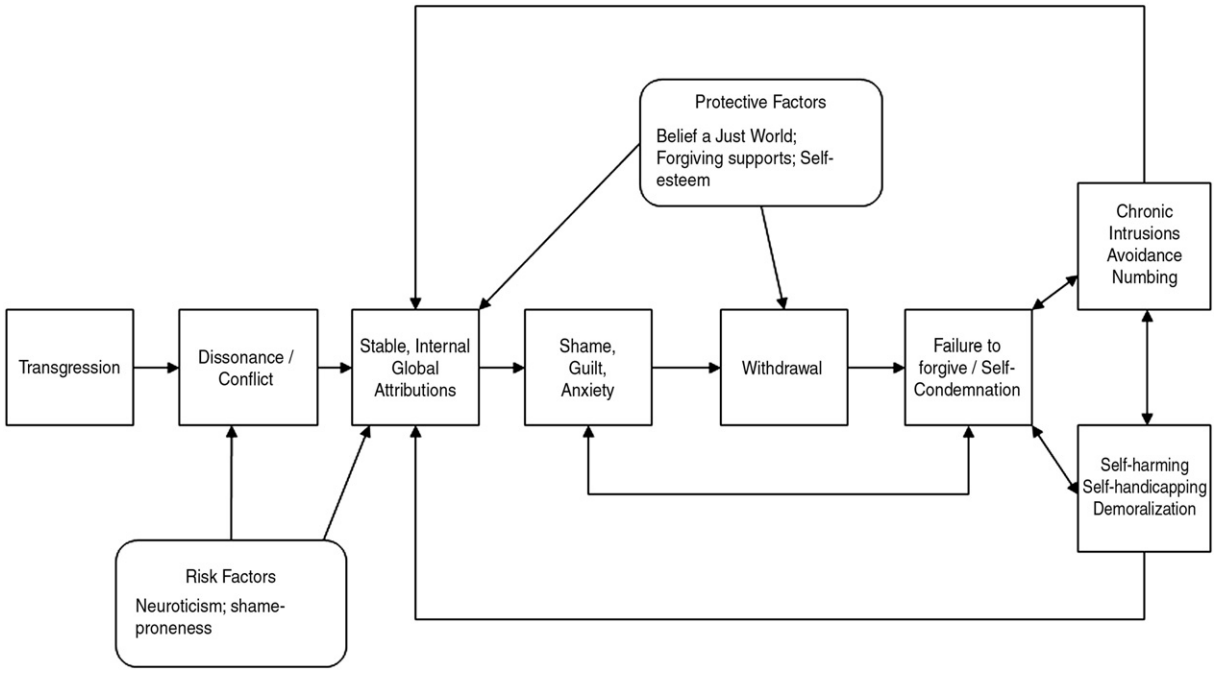

Fig. 1. Working causal framework for moral injury.

symptoms of PTSD. The psychological imperative to reconcile morally incongruent or discrepant experience (i.e., moral violation or conflict) leads to reexperiencing and other intrusive mental activity (e.g., Rachman, 1980). Arguably, intrusive (automatic and unbidden) psychological- and emotional-processing of moral violation is partly functional because it reminds the person that they need to do something about their inner conflict. If the person accommodates the experience and attributes the event in a specific (i.e., highly context [war] dependent), not stable (i.e., time-locked), and external (e.g., a result of exigencies and extraordinary demands) way, this reduces conflict and fosters moral repair; successful integration of the moral violation into an intact, although more flexible, functional belief system.

Reexperiencing may consist of the painful recall (thoughts, images) of moral violation with concurrent self-condemnation and aversive emotions (e.g., anxiety about potential social censure or condemnation, shame, dysphoria). Reexperiencing morally injurious experience is aversive because, among other things, it weakens and destabilizes self-esteem and tarnishes relational expectations (e.g., by reducing worthiness or increasing expectations of censure). Consequently, service members and veterans distance themselves and withdraw from others and they fail to avail themselves of opportunities for corrective, disconfirming interpersonal experience (e.g., unconditional love, life affirmation). Thus, expectations of being tainted by moral transgression and being unworthy of forgiveness can come full circle (this feedback loop is depicted in Fig. 1). In the worst case, service members with moral injury suffer in isolation, feeling helpless and hopeless.

Chronic collateral manifestations of moral injury may include: *self-harming behaviors*, such as poor self-care, alcohol and drug abuse, severe recklessness, and parasuicidal behavior, *self-handicapping behaviors*, such as retreating in the face of success or good feelings, and *demoralization*, which may entail confusion, bewilderment, futility, hopelessness, and self-loathing. Most damaging is the possibility of enduring changes in self and other beliefs that reflect regressive over-accommodation of moral violation, culpability, or expectations of injustice. This may occur because each reexperiencing and avoidance instance leads to new learning affecting the strength and accessibility of underlying schemas, which, over time, become ingrained and rigid and resistant to countervailing evidence.

Some vulnerability factors for PTSD applicable to moral injury were described above; however, other individual difference factors may increase the likelihood of moral injury, including shame proneness and neuroticism. Shame proneness has the most empirical support. Research has consistently linked the dispositional tendency to experience shame to decreased empathy for others, increased focus on internal distress, and increased psychopathology (see Tangney et al., 2007). Also, the tendency to experience shame has been associated with remorse, self-condemning thoughts, and lower well-being (Fisher & Exline, 2006), variables germane to moral injury.

Neuroticism (negative affectivity) has been shown to be negatively associated with self-forgiveness (e.g., Maltby et al., 2001; Ross, Hertenstein, & Wrobel, 2007). In fact, compared to openness, conscientiousness, extraversion, and agreeableness, neuroticism has the strongest relationship to self-censure (Leach & Lark, 2004; Ross, Kendall, Matters, Wrobel, & Rye, 2004).

In terms of possible protective factors, prisoners (putative transgressors) with just world beliefs are more likely to feel that their punishment is justified and are less likely to act out and cause disciplinary problems (Dalbert & Filke, 2007; Otto & Dalbert, 2005). Moreover, prisoners with just world beliefs are more likely to view their future goals as attainable (Otto & Dalbert). This finding has been replicated with young adults in assisted-living housing (Sutton & Winnard, 2007). Viewing goals as attainable and the expectation that justice is balanced (i.e., that transgressions have consequences *and* redress and repair are possible) are especially important in light of moral injury because they may increase the motivation to seek out opportunities for renewal and redemption.

Also, researchers have found that self-esteem mediates the relationship between belief in a just world and self-forgiveness (Strelan, 2007). We posit that self-esteem (i.e., expectations of self-worth and personal agency) is a protective factor against the development of moral injury; these beliefs reduce the likelihood of global causal attributions and increase motivation for corrective action.

7. Working clinical care model

7.1. Assumptions

Several assumptions guide our intervention approach and selection of specific strategies. First, inherent in our working definition of moral injury is the supposition that anguish, guilt, and shame are signs of an intact conscience and self- and other-expectations about goodness, humanity, and justice. In other words, injury is only possible if acts of transgression produce dissonance (conflict), and dissonance is only possible if the service member has an intact moral belief system. Consequently, underlying and core repertoires are available to experience and self-judgment but they become less accessible due to the consequences of moral injury (i.e., shame, withdrawal). Worse, there is conflict, confusion, and black-and-white thinking about whether one can be good and moral and deserving of a fulfilling life after having severely transgressed standards of conduct. Accordingly, service members and veterans who earnestly seek care are struggling, but still capable of reclaiming goodness and moral directedness, and forgiveness and repair is possible in all cases.

Second, there are two routes to moral repair and renewal: (a) psychological- and emotional-processing of the memory of the moral transgression, its meaning and significance, and the implication for the service member, and (b) exposure to corrective life experience. The former is a necessary pre-condition and a formative and constructive process. In other words, we assume that service members and veterans have not disclosed and thought deeply, in a sustained manner, about what they did (or failed to do). Accordingly, there are aspects of the experience that need to be uncovered and fully acknowledged (and shared) and tacit and ill-formed negative appraisals and meanings need to be elucidated and articulated. The optimal condition for such a process to occur is a raw and emotional reliving and recounting, the core element of exposure therapy (e.g., Foa, 2006). As in the case of exposure therapy for life-threat and high fear events (Foa & Kozak, 1986), a core corrective feature is breaking through experiential avoidance (e.g., Barlow, Allen, & Choate, 2004), which in the case of moral injury entails shame and expectations of mortification and rejection. Once fully and poignantly exposed, dire and negative beliefs and expectations can be examined and challenged. The second corrective element, exposure to corrective life experience, entails increasing the accessibility of positive judgments about the self by doing good deeds and positive judgments about the world by seeing others do good deeds, as well as by giving and receiving care and love. This counters self-expectations of moral inadequacy and the experience of being tainted by various acts.

Third, because beliefs about moral transgressions and violations tend to be very rigid and resistant to disconfirmation, and service members and veterans are typically highly convinced and confident that they are unforgivable and only deserve to suffer, we assume that they need to have an equally intense real-time encounter with a countervailing experience. Consequently, after processing the transgression and dialoguing about its implication for the service member in the presence of an unconditionally supportive and caring therapist, we ask service members to dialogue in imagination with a benevolent moral authority or provide advice to a hypothetical service member who is similarly stuck (service members are prone to be good leaders, likely to offer habilitative and encouraging advice to peers). The idea is

to get service members and veterans to articulate ideas about the capacity to do good and to talk about being forgiven and the need for self-forgiveness, even if they don't initially accept these ideas. This concept is related to a pilot study targeting shame in women with Borderline Personality Disorder (Rizvi & Linehan, 2005). Rizvi and Linehan found that compelling individuals to engage in "opposite action" (engaging in the opposite action of what shame would suggest doing, that is approaching rather than withdrawing) resulted in a significant reduction in shame. This study suggests the need for interventions to counter withdrawal and avoidance when treating maladaptive shame.

Finally, this process takes time, there is no quick fix. In the ideal case, service members and veterans will use therapy to get clear about what happened, what it means to them moving forward, what they need to do to repair and renew, and as means of priming the process of forgiveness and hopefulness.

7.2. Specific treatment strategies

Certain potentially morally injurious experiences account for a greater variance in chronic posttraumatic stress symptoms than traditional indices of combat exposure. Reasons for the increased influence of morally relevant stressors may stem from the lack of existing structures to mitigate initial acute distress and symptoms about transgression and moral conflict (in theatre and post-deployment) and limitations in current treatment approaches.

As we have stated, the field tends to conceptualize the lasting potentially damaging exposures in war through the lens of direct life-threat and personal loss. Arguably, built-in, natural, and organization-based opportunities to heal and recover from these two classes of events reduce the risk for long-term damage. For example, because extinction learning is hard-wired, high fear and conditioning resulting from life-threat events may be healed if service members sustain sufficient unreinforced exposure to conditioned cues. We are also hard-wired to recover from loss; if service members avail themselves of opportunities to reattach and reengage positively (or reacquire social resources) their grief will heal naturally. Conversely, there seems to be fewer built-in opportunities to heal from moral injuries. It is difficult to correct a core belief about a personal defect (Tangney et al., 2007) or a destructive interpersonal or societal response, especially when these contingencies lead to a pervasive withdrawal from others.

Also, empirically validated treatments for other syndromes, such as PTSD and depression, may not sufficiently redress moral injury. For example, traditional exposure treatment, which is commonly used to address fear and anxiety-based PTSD symptoms, may not be the optimal treatment because moral injury arguably does not stem from conditioned processes that respond to exposure and response prevention. Repeated exposure to a morally conflictual experience, without additional components, could lead to iatrogenic effects (Foa & Meadows, 1997), especially for those experiencing shame. In other words, we argue that repeated raw exposure to a memory of an act of transgression without a strategic therapeutic frame for corrective and countervailing attributions, appraisals, and without fostering corrective and forgiveness-promoting experiences outside therapy would be counterproductive at best and potentially harmful.

Cognitive models (e.g., *cognitive-processing therapy*; CPT; Resick et al., 2008) fail to provide sufficient specific strategies and heuristics to target moral injury, and cognitive therapy assumes that distorted beliefs about moral violation events cause misery, which may not be germane. In the case of morally injurious events, judgments and beliefs about the transgressions may be quite appropriate and accurate. We appreciate the usefulness of basic cognitive therapy strategies, such as getting patients to monitor their experience, increasing awareness and predictability of trigger contexts, their biased constructions of those contexts, and helping them to be strategic and effortful in generating alternative ways of construing (and experimenting with the more helpful and balanced ways of thinking). We considered modifying this approach to foster corrective learning outside of therapy in our intervention model. We determined that the most efficient use of time in between sessions was to foster reparation, reengagement, and reconnection (i.e., to foster behavioral success experience). In any event, in our approach we do challenge service members to think of alternative perspectives and ways of construing the implication of the moral violation and we use Socratic questioning. However, in contrast to CPT (and other cognitive therapies), we employ real-time emotion-focused event-processing (in imagination) and experiential strategies as core vehicles to reveal tacit toxic attributions and constructions and to prime countervailing constructions.

We are piloting a modified CBT, designed to address the three principal injurious elements of combat: life-threat trauma, traumatic loss, and moral injury with Marines redeployed from the Iraq and Afghanistan wars (Steenkamp et al., in press). Below, we summarize the approach that targets moral injury, which includes the following elements: (1) A strong working alliance and trusting and caring relationship; (2) preparation and education about moral injury and its impact, as well as a collaborative plan for promoting change; (3) a hot-cognitive (e.g., Greenberg & Safran, 1989; Edwards, 1990), exposure-based processing (emotion-focused disclosure) of events surrounding the moral injury; (4) a subsequent careful, directive, and formative examination of the implication of the experience for the person in terms of key self- and other schemas; (5) an imaginal dialogue with a *benevolent* moral authority (e.g., parent, grandparent, coach, clergy) about what happened and how it impacts the patient now and their plans for the future or a fellow service member who feels unredeemable about something they did (or failed to do) and how it impacts his or her current and future plans; (6) fostering reparation and self-forgiveness; (7) fostering reconnection with various communities (e.g., faith, family); and (8) an assessment of goals and values moving forward. Although these steps are presented in a sequential order, we realize that there will be substantial overlap in their application; some steps are intended to occur throughout the entire treatment.

7.2.1. Step one: Connection

Because of the sensitive and personally devastating and disorienting nature of moral injury, a strong and genuinely caring and respectful therapeutic relationship is critical. It is likely that the patient has not disclosed the event(s) to anyone else because of shame and the expectation of censure, disgust, and disdain, a dynamic which is at the core of moral injury. Without trust, details, responses, and meaning elements will remain hidden, and in order to promote healing, concealment needs to be avoided at all costs. To encourage disclosure, the therapist must portray unconditional acceptance and the ability to listen to difficult and morally conflicted material without revulsion (e.g., Haley, 1974).

In preparation for working with service members and veterans who report excessive and unnecessary violence, it is important that therapists imagine, ahead of time and in detail, the range of possible acts of gratuitous violence and figure out how to tolerate this kind of material while being able to genuinely embrace and accept their patients. The genuine relationship of the therapist to the patient and the story he or she is telling will be a critical component of how the event comes to be experienced. The therapist will need to model, implicitly and explicitly, the idea of acceptance.

Any expression of disgust or fear from the therapist, even to elements of the narrative unrelated to the patient's role, will be experienced as condemnation. Detachment, while understandable, is not therapeutic. Even if the patient is retelling acts of perpetration, a therapist must find within the story or the person the elements around which true empathic connection can be summoned. It is

essential that therapists familiarize themselves with some of the horrible things that people do and witness in war. Closely reviewing these kinds of events while imagining sitting with the perpetrator will give therapists a chance to have and examine their feelings of horror and condemnation without harming an actual patient. This type of preparation will also provide therapists with the opportunity to examine their feelings of judgment and desire to create distance in order to move into a place where they can imagine caring for someone who has done morally questionable acts.

7.2.2. Step two: Preparation and education

At the beginning of treatment, patients need a model or plan of action to guide the difficult work ahead. They need to hear that approaching psychologically painful content is both possible and crucial in promoting a healthier life and that shameful material can be shared without condemnation. Patients need to appreciate that concealment and avoidance, although understandable, is maladaptive, as it not only narrows the repertoire of wellness behaviors, it restricts exposure to corrective and reparative experiences. In addition, patients need to be educated about the impact of moral injury and various elements of the treatment plan. This should be a careful and collaborative process.

7.2.3. Step three: Modified exposure component

In this context, exposure is operationalized as a real-time sustained consideration of particularly upsetting deployment experiences that will unearth or reveal harmful and unforgiving beliefs so that they can be processed (reconsidered and changed). The basic mechanics of exposure therapy apply (see Foa & Rothbaum, 1998) and we assume that it will be helpful to patients to have their eyes shut so that they can be less constrained by the relational aspect of sharing (e.g., direct eye-contact). Throughout the process, the therapist needs to be fully engaged and directive to encourage, support, prompt, provoke, and cue the patient to process particularly painful elements so that meanings, needs, and motivations can be discovered and examined.

The goal of the exposure is to foster sustained engagement in the raw aspects of the experience and its aftermath. Extinction of strong affect from repeated exposure is not the primary change agent, rather focused emotional reliving is a necessary pre-condition to change; service members and veterans will be unable to reconsider harmful beliefs stemming from deployment unless they "stay with the event" long enough for their beliefs to become articulated and explicitly discussed.

Step three (exposure) is done in tandem with steps four and five described below. There is considerable latitude about how much exposure (and steps 4–5) to do over time. By default, exposure should be used each session to focus attention and activate poignant and salient emotions about the experience, setting the stage for examination of meaning and implication (step four) and corrective discourse (step five). Over time, the exposure should be briefer and may become unnecessary if the patient is able to sufficiently uncover a full complement of thoughts, appraisals, attributions, and meanings about the transgression (they are able to go to step four without step three).

7.2.4. Step four: Examination and integration

An important step in self-forgiveness, reclaiming a moral core and a sense of personal worth, that is, reducing the toxic psychological and relational impact of morally injurious experiences, is the examination of maladaptive beliefs about the self and the world. These beliefs are examined with the aim of promoting the development of new, more constructive meanings, or at least a dialogue about the possibility and implication of alternative habilitative constructions.

The therapist asks about what the event means for service members or veterans, in terms of their view of themselves and their future (identification and exploration of schema changes). The therapist explicitly inquires about the service member's attributions about what caused the transgression and explores themes of globality/specificity, stability/instability, and internality/externality. Maladaptive interpretations about stability (e.g., "this event will forever define me"), a lack of appreciation of the unique context and contingencies in war, and severe self-condemnation ("I am evil," "I am worthless," "I can never forgive myself," "I don't deserve to live or to have a decent life") are explored.

Therapists should help service members and new veterans to process the event in a way so that accommodation, *but not over-accommodation*, can occur. Rather than coping with a morally injurious event by denying it or excessively accommodating it, what is needed is a new synthesis—a new way to view the world and the self in it that takes into account the reality of the event and its significance without giving up too much of what was known to be good and just about the world and the self prior to the event (and what can be revealed in the future).

One vehicle is to help the person appreciate the time-locked context-specificity of his or her responses to combat and to work towards accepting an imperfect self. For example, a service member may believe that because he killed a civilian he is a cruel and sadistic person. Therefore, the goal would be to challenge the validity of (e.g., evidence for) extremity and rigidity and encourage the understanding that even if a particular act is "bad" or "wrong", it is still possible to move forward and create a life of goodness and value. *One does not need to accept the act to accept the imperfect self that committed the act*.

An avenue for challenging rigid beliefs about the self is to separate the individual's overall worth from a particular act. Killing a civilian while in a war zone does not mean the service member is an outright cruel and sadistic person; individual events (even if they go against one's personal morals) do not necessarily or wholly define a person. Thus, the goal is for individuals to reclaim good parts of themselves and to examine and accept—but not be defined by—what they did, what they saw, what others did, and so forth.

It is important to appreciate that holding onto the idea of a moral self or a moral code may require that a bad act be judged as such. In other words, maintaining a sense of morality is likely to preclude an easy forgiveness of a bad act and this is not something to be contested. Rather, the goal is to help the service member or veteran to move toward an appreciation of context and the acceptance of an imperfect self.

While processing and dialoguing about the meaning and implication of events, it is also important for individuals to be able to express remorse and to reach their own conclusions about the causes of the events, albeit with guidance from the therapist. Psychotherapists are often too eager to relieve guilt, and, thereby, undermine the patient's need to feel remorseful (Singer, 2004). Therapists should not assume that they have enough knowledge or credibility to offer judgments about how understandable a given morally injurious experience may be, given the unique context of war or that service members and veterans did not have a choice, per se, and so forth. This may invalidate service members' and veterans' thoughts and beliefs about the event or be distracting or annoying. The goal is to help patients consider more useful and contextual appraisals. Service members and veterans may first need the experience of telling another person about the event, without it being excused, and still be viewed as a person of value.

7.2.5. Step five: Dialogue with a benevolent moral authority

In service of promoting new growth-promoting and hope-inducing learning, our treatment model employs a modification of an empty-chair dialogue in imagination with a caring and benevolent moral authority. The goal is to have patients verbalize what they did or saw, how it has affected them, and what they think should happen to them (or others) over their life course as a result, to someone who does not want them to suffer excessively and who feels that forgiveness and reparation is possible.

Patients are guided through an imaginary conversation with another person who they have great respect for and who can weigh in as a relevant and generous moral authority. The requirement is that the service member or veteran thinks of someone who has always had his or her back and who has been and will be in his or her corner no matter what. If the patient cannot think of someone, he or she is asked to dialogue with a service member or veteran who he or she cares about. In this context, the patient is asked to provide guidance and recommendations for moving forward to someone who is convinced that he or she is irredeemable and deserves to suffer.

In the first phase, the goal is to get the patients to disclose the transgression, articulate their attributions and how they have been feeling about themselves since the experience, and what they think should happen to them in their life course as a result (their plans and goals in light of their moral injury). To enhance engagement and the intensity of the exchange, patients are also encouraged to share their remorse and sorrow and what they would like to do to make amends if they could. After the patient sits with the emotions arising from this exercise, the therapist asks him or her to verbalize what the moral authority figure would say to him/her after hearing all of this. If necessary, the therapist is instructed to introduce content that is forgiveness-related, tailored to the specifics of the case. At the end, the therapist elicits feedback about the experience, by asking questions such as "What was that like for you?" and "What are you going to take from this?" This process may need to be repeated during multiple sessions.

7.2.6. Step six: Reparation and forgiveness

During the preparation and education step, the therapist introduces the idea that in order to repair moral injury, the service member or veteran needs to find decency and goodness and ways of doing good deeds as a vehicle to self-forgiveness and repair. In simple terms, this is couched as *making amends*. To amend something means, literally, to change. Making amends means drawing a line between past and present and in some way changing one's approach to how he or she behaves and acts so that one moves towards the positive, towards better living. During the treatment, the therapist employs concrete and detailed patient-generated and realistic and doable behavioral task assignments in service of this goal.

Therapists need to be mindful that this idea of making amends can sometimes be taken to an extreme; patients can come to feel that they must focus their lives only on activities that will "right their wrong." The idea of righting a wrong is usually a poor idea because it is typically not possible. In general, the idea is not to try and fix the past, but rather to draw a firm line around the past and its related associations, so that the mistakes of the past do not define the present and the future and so that a pre-occupation with the past does not prevent possible future good. Making reparations can help morally injured service members or veterans begin to reconnect with their values, as well as allow them to feel like a contributing member of society.

7.2.7. Step seven: Fostering reconnection

By the end of successful therapy, the patient has had a positive experience of accessing painful material in the presence of a caring other, demonstrating that it is possible, and perhaps healing, to disclose thoughts and feelings, no matter how disturbing. However, if patients fail to use their therapy experience to connect or reconnect with important people in their lives and become less dominated by beliefs that they are not worthy of caring and loving relationships, gains will not last. Veterans and service members need to improve their relationships with others and, more importantly, with themselves as relational demands arise over their life course.

Patients are strongly encouraged to seek positive and healing relationships outside of therapy. This process needs to be framed, planned, and structured in a way that will increase the probability of success and exposure to corrective experience. Patients should generate a list of the people in their world who are (or were) important to them and who have (or had) a positive influence in their lives. The individuals (or groups) should be arranged in a hierarchy based on the expectations of difficulty in relating *in light of the moral injury*. The patient should be encouraged to move up the hierarchy incrementally and systematically and learn something useful and growth-promoting in each instance.

Patients may want advice about whether they should share what they did or saw or failed to do. Because many people do not know what to say about such things, and their reactions may be difficult to predict or interpret, guidance will be needed. Significant others may not know what to say, or they may have good intentions of helping, but are ultimately unhelpful. A dialogue might be awkward, if not destructive. It is important to tell patients to remember that they are not responsible for others' feelings or what they "do" with their feelings. However, it is up to the patients to make sure their relationships are a useful and positive force in their life. It might mean that patients will have to tell people exactly what they need from them, so that family and friends do not end up feeling like they have no idea what to do or say. A conversation about preparing for moments of possible self-disclosure is important before therapy ends.

Therapists may also want to establish a dialogue about spirituality, which, if defined as "an individual's understanding of, experience with, and connection to that which transcends the self" (Drescher, 2006, p. 337) supports the underlying theme of the treatment. The goal is to find ways of revealing the full impact and implication of the morally injurious experience in terms of self-construction, setting in motion the possibility of transcendence. That is, not being defined by the experience, and correcting the wounds by not succumbing or being that construction of the self (e.g., only possible of doing bad things), through subsequent mindful and purposeful experience moving forward. This framework is consistent with mindfulness approaches to trauma care (e.g., Follette, Palm, & Pearson, 2006). In the context of moral injury, forming connections with positive cultures and groups may be an optimal vehicle for transcendence—being part of something and being accepted by a group helps construct meaning and purpose that transcends the self. Consequently, patients should be encouraged to engage in group activities and spiritual communities (e.g., a church; Drescher, Smith, & Foy, 2007). Forgiveness within religious and spiritual frameworks is potentially instrumental in alleviating guilt, shame, and demoralization. For example, Witvliet et al. (2004) found that veterans who fail to forgive themselves and have punitive religious beliefs (e.g., thinking that a higher power is inflicting punishment or withdrawing love) have worse mental health outcomes.

7.2.8. Step eight: Planning for the long haul

The therapy should end with an extensive conversation about what patients will take with them from the work they have done and their plans for the future. The therapist should specifically assess values and goals moving forward. In other words, what would patients like to see for themselves and the people they care about over the long haul, in light of their values? If therapy has been helpful, these values should be thematically useful, positive, hopeful, and relational. As is the case with serious and sustained combat and operational trauma, there should be the expectation that there will be challenging times ahead—periods where the moral injury becomes more the figure than the ground. As a result, it is important to plan for times when the person is at risk for being defined by the moral injury.

8. Conclusion

We have devoted extra attention to two potentially morally injurious acts: atrocities and killing. Because research is very limited, our focus on these two acts arose out of necessity rather than intention. Ideally, we would have also examined the repercussions of

learning about the unethical behaviors of others and bearing witness to intense human suffering and cruelty. We believe that an exclusive focus on depraved acts of commission greatly confines the discourse—it is counterproductive to assume that atrocities and gratuitous killing are the only potentially morally injurious experiences in war.

Rather than limiting investigation to these two acts, we recommend a thorough evaluation of many different types of morally conflictual elements of service. In our view, the critical elements to moral injury are the inability to contextualize or justify personal actions or the actions of others and the unsuccessful accommodation of these potentially morally challenging experiences into pre-existing moral schemas, resulting in concomitant emotional responses (e.g., shame and guilt) and dysfunctional behaviors (e.g. withdrawal).

The inability to contextualize, justify, and accommodate acts is likely to lead to long-lasting impairment (i.e., moral injury) due to the lack of built-in and contextual salutogenic factors and the presumed inapplicability of current treatments. Accordingly, many researchers have found that atrocities and killing are better predictors of chronic posttraumatic stress symptoms than combat exposure (e.g., Beckham et al., 1998; Fontana & Rosenheck, 1999; King et al., 1995; MacNair, 2002; Yehuda et al., 1992). Also, Fontana and Rosenheck (2004) suggest that veterans with high combat exposure are more likely to seek VA services due to guilt and loss of faith than PTSD or lack of social support.

What is needed, then, is multi- and, ideally, interdisciplinary research. Moral injury in service members and veterans appears to be a distinct phenomenon warranting its own line of inquiry and development of special intervention strategies. The first step is psychometric development. We need to generate instruments that can reliably and validly assess moral injury. Our working definitional structure should serve as a guide in item selection, emphasizing content validity, and as a means of fostering construct validation. Researchers should also expand measures of combat and operational exposures to include a full range of potentially morally injurious experiences (these would need to be psychometrically validated as well, emphasizing temporal stability). Once content valid measures are developed and validated, the next step is epidemiological. The questions that need to be addressed are: How prevalent is moral injury among service members and new veterans? What are the psychosocial and military context (e.g., leadership, cohesion, morale) predictors of moral injury or successful navigation of various transgressions in the context of combat and operational challenges? Finally, we need randomized controlled trials of interventions that specifically target moral injury in veterans of war.

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