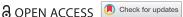




BASIC RESEARCH ARTICLE



Moral injury in UK armed forces veterans: a qualitative study

Victoria Williamson^a, Neil Greenberg of and Dominic Murphy^{a,b}

aKing's Centre for Military Health Research, Institute of Psychology, Psychiatry and Neuroscience, King's College London, London, UK; ^bResearch Department, Combat Stress, Leatherhead, UK

ARSTRACT

Background: Moral injury has been found to adversely affect US veteran mental health, and the mental health difficulties resulting from moral injury can be particularly challenging to treat. Yet little is known about the impact of moral injury on the well-being of UK armed forces (AF) veterans and how moral injury is currently addressed in treatment.

Objective: The aim of this study was to examine UK AF veterans' experiences of moral injury, and the perceptions and challenges faced by clinicians in treating moral injuryrelated mental health difficulties.

Method: Six veterans who reported moral injury exposure and four clinicians who had treated veterans with moral injury were recruited from Combat Stress. Semi-structured qualitative interviews were conducted and data were analysed using thematic analysis. Results: Moral injury was perceived by clinicians to be common in UK AF veterans and, where present, had a considerable negative impact on mental health. Clinicians reported a lack of a manualized approach for treating cases of moral injury and, instead, used a combination of several non-post-traumatic stress disorder (PTSD)-specific therapies. Providing treatment for morally injured veterans could be challenging given the limited number of sessions that clinicians were able to provide. Moreover, moral injury was thought to be poorly understood among UK AF veteran clinical care teams.

Conclusion: This study provides some of the first insight into the impact of moral injury on UK AF veteran well-being as well as clinician views of delivering psychological care following moral injury. These findings highlight that moral injury is experienced by UK AF veterans, and further examination of the prevalence of moral injury and whether current treatment approaches are appropriate and efficacious is needed.

Daño moral en veteranos de las Fuerzas Armadas del Reino Unido: un estudio cualitativo

Antecedentes: Se ha encontrado que el daño moral afecta negativamente la salud mental de los veteranos de EE. UU., y las dificultades de salud mental que resultan del daño moral pueden ser particularmente difíciles de tratar. Sin embargo, poco se sabe sobre el impacto del daño moral en el bienestar de los veteranos de las Fuerzas Armadas del Reino Unido (AF) y la forma en que actualmente se aborda el daño moral en el

Objetivo: el objetivo de este estudio fue examinar las experiencias de los veteranos de la FA del Reino Unido en cuanto al daño moral y las percepciones y desafíos que enfrentan los clínicos para tratar las dificultades de salud mental relacionadas con el daño moral Método: Se reclutaron seis veteranos que reportaron exposición a daño moral y cuatro clínicos que trataron a veteranos con daño moral del Combat Stress. Se realizaron entrevistas cualitativas semiestructuradas con datos analizados mediante análisis

Resultados: los clínicos consideraron que el daño moral era común en los veteranos de la FA en el Reino Unido y, cuando estaba presente, tenía un impacto negativo considerable en la salud mental. Los clínicos informaron la falta de un enfoque manualizado para el tratamiento de casos de daño moral y, en su lugar, utilizaron una combinación de varias terapias específicas no para el trastorno de estrés postraumático (TEPT). Brindar un tratamiento a los veteranos con daños morales podría ser un desafío, dado el número limitado de sesiones que pudieron proporcionar los clínicos . Además, se pensaba que el daño moral era poco conocido entre los equipos de atención clínica de veteranos de la FA del Reino Unido.

Conclusión: este estudio proporciona algunos de los primeros conocimientos sobre el impacto del daño moral en el bienestar de los veteranos de la FA en el Reino Unido, así como las opiniones de los clínicos sobre la prestación de atención psicológica después del daño moral. Estos hallazgos resaltan que los veteranos de la FA del Reino Unido experimentan un daño moral y un examen más profundo de la prevalencia del daño moral y si se necesitan los enfoques de tratamiento actuales apropiados y eficaces.

ARTICLE HISTORY

Received 2 August 2018 Revised 1 November 2018 Accepted 10 December 2018

KEYWORDS

Moral injury; veteran; military: mental health treatment: clinician

PALABRAS CLAVE

daño moral: veterano: militar; tratamiento de salud mental; clínico

道德创伤; 退伍老兵; 军队; 心理健康治疗; 临床医

HIGHLIGHTS

- Moral injury was perceived by clinicians to be common in UK veterans and exposure could detrimentally impact veteran mental health.
- Psychological treatment for moral injury included an amalgamation of several non-PTSD specific approaches, including responsibility pie charts and compassion-focused therapy.
- Treating moral injury was challenging for clinicians because limited number of treatment sessions they could offer, the lack of a manualized approach for treatment, and a perception that moral inuiury was poorly understood by veteran clinical care teams.

CONTACT Victoria Williamson 🔯 Victoria.williamson@kcl.ac.uk 📵 Kings Centre for Military Health Research, Institute of Psychology, Psychiatry and Neuroscience, King's College London, 10 Cutcombe Road, London SE5 9RJ, UK

英国武装部队退伍军人的道德创伤:一项定性研究

背景:已发现道德创伤对美国退伍军人的精神健康产生不利影响,治疗因道德创伤导致 的精神健康问题尤其具有挑战性。然而,关于道德创伤对英国武装部队(AF)退伍军人 幸福感的影响以及目前如何处理道德创伤,我们还知之甚少。

目的:本研究的目的是检查英国AF退伍军人的道德创伤经历以及临床医生在治疗道德创 伤相关心理健康问题方面的看法和面临的挑战。

方法: 从战争应激机构(Combat Stress)中招募了6名报告道德创伤暴露的退伍军人和4 名治疗过患有道德创伤的退伍军人的临床医生。使用专题分析对半结构化定性访谈的数 据进行分析。

结果:临床医生认为道德创伤在英国AF退伍军人中很常见,并且在目前情况下对心理健 康产生了相当大的负面影响。临床医生报告,由于缺乏用于治疗道德创伤病例的指导手 册,只能使用几种非创伤后应激障碍(PTSD)特异的疗法的组合。鉴于临床医生能够提 供的治疗次数有限,为道德受伤的退伍军人提供治疗可能具有挑战性。此外,在英国AF 退伍军人临床护理团队中,人们对道德创伤的了解甚少。

结论:这项研究提供了一些关于道德创伤对英国AF退伍军人幸福感的影响的初步见解, 以及临床医生对道德创伤后提供心理护理的看法。这些研究结果强调英国AF退伍军人经 受了道德创伤,需要进一步考查道德创伤的发病率,以及目前的治疗方法是否合适和有

1. Introduction

Exposure to potentially morally injurious experiences, defined as 'perpetrating, failing to prevent, bearing witness to, or learning about acts that transgress deeply held moral beliefs and expectations' (Litz et al., 2009, p. 700), can lead to significant distress. Individuals who experience moral injury may report negative self-attributions, strong negative emotions including disgust, anger, and distress, as well as high levels of guilt and shame (Frankfurt & Frazier, 2016; Litz et al., 2009). These cognitive and emotional states can contribute towards self-isolation and mental health problems, including post-traumatic stress disorder (PTSD), selfinjury, substance abuse, and depression (Frankfurt & Frazier, 2016; Litz et al., 2009; Williamson, Stevelink, & Greenberg, 2018).

The largest body of evidence for moral injury and its negative impact on well-being stems from studies conducted with US service personnel and veterans (Currier, McCormick, & Drescher, 2015; Drescher et al., 2011; Williamson et al., 2018). Research has found that morally injurious experiences can typically be classified into three distinct categories: perpetration (e.g. being unable to aid civilians due to rules of engagement, killing/injuring in combat), witnessing (e.g. witnessing the mistreatment of non-combatants by others) and betrayal by others (e.g. betrayal by an officer, friendly fire) (Bryan, Bryan, Morrow, Etienne, & Ray-Sannerud, 2014; Bryan et al., 2016). Experiencing psychological difficulties following exposure to potentially morally injurious events it thought to be relatively common, with research in US veterans finding military-related moral injury to be a significant predictor of PTSD and alcohol abuse (Maguen et al., 2010). Previous studies suggest that some treatment approaches for moral injury-related mental health disorders may be insufficient (Drescher et al., 2011). Typical treatment for PTSD, for example, may not adequately address all negative sequelae present in those with moral injury (Litz et al., 2009; Maguen & Burkman, 2013). In fact, some treatments approaches, such as prolonged exposure, could potentially be harmful in cases of moral injury and exacerbate patient reactions of shame, disgust and guilt (Maguen & Burkman, 2013).

Despite the pernicious impact of moral injury on veteran well-being found in previous studies, there is a lack of research exploring the index of the types of events that can cause moral injury in UK armed forces (AF) veterans and how moral injury affects veteran well-being. Moreover, as a definitive approach to treating veterans with moral injury is currently lacking, it is unclear how clinicians experience providing psychological care to morally injured UK AF veterans. The treatment approaches that clinicians utilize and the challenges that they face in delivering moral injury treatment are also unknown. A richer understanding of moral injury experiences and treatments in UK AF veterans may inform clinical practice and ensure that appropriate treatment and support are available to those with mental health problems following moral injury in the future.

We conducted a pilot study utilizing in-depth qualitative interviews with help-seeking veterans and clinicians who provide psychological treatment to UK AF service personnel and veterans. This article thus aimed to explore moral injury as a concept, veterans' experiences of moral injury, and clinicians' experiences of and challenges faced in providing psychological treatment to UK AF veterans following moral injury.

2. Method

2.1. Setting

This study was conducted at Combat Stress (CS), a national charity which provides psychological interventions for UK AF veterans, including treatment for PTSD. The study received approval from the Combat Stress Research Committee. All participants gave informed consent for participation.

2.2. Participants

Between January and February 2018, six veterans were recruited following attendance at CS. Veteran participants were eligible for the study if they were aged 18 years or above. Participants were identified by the clinical care team as having experienced moral injury following discussion of the veteran's military experiences during psychological assessments. The following exclusion criteria were applied: inability to speak English, current suicidal ideation or self-harm, or currently dependent alcohol misuse. Potential participants were recruited by attempting to make telephone contact with them. Three attempts were made to elicit a response. Of the 11 eligible veteran patients approached, six opted to participate. It was not possible to make contact with the remaining five patients.

Clinician participants were recruited by sending emails to all therapists responsible for providing trauma therapy. Clinicians were informed about the study and invited to participate. Inclusion criteria were being currently employed by CS and having provided trauma therapy to at least one veteran over the previous 6 months whom the clinician felt has suffered a moral injury. Four clinicians consented to participate.

2.3. Qualitative interview schedule

Interviews were conducted by a research assistant who had training and experience in qualitative methods. Interviews were conducted by telephone and lasted for 35 minutes on average. The researcher did not have any contact with participants before study initiation. We developed the interview schedule based on the research questions in collaboration with colleagues as part of an international consortium aiming to design and validate a measure of military moral injury (Yetrian et al., Under review). Veteran interview questions focused on their own experiences of moral injury, the impact of moral injury on their well-being, and their perceptions of their psychological treatment. Clinician interview questions focused on their perceptions of moral injury experienced by the UK AF veterans seen in treatment, how moral injury can impact their patients' overall well-being, the approaches utilized in treatment to address moral injury-related psychological issues, and the challenges faced in delivering treatment to their patients following moral injury. Interviews were audio-recorded and transcribed verbatim. Following the qualitative interview, demographic information was collected from each participant.

2.4. Analysis

We used NVivo V.10 (http://www.qsrinternational. com/products_nvivo.aspx) to conduct thematic analysis. We utilized the following steps: reading and rereading the data, producing codes, searching for and developing early themes, and revising and classifying themes (Braun & Clarke, 2006). An inductive analytical approach was utilized, with initial codes and themes proposed by VW. A reflexive journal was kept throughout data analysis in an effort to recognize the potential influence of the researcher's prior experiences, thoughts and assumptions, as well as prevent premature or biased interpretations of the data. To ensure reliability, transcripts, codes, and themes were reviewed by authors VW and DM, with any disagreements between authors resolved following re-examination of the data and discussion. We conducted peer debriefing, and feedback regarding data interpretation was sought from coauthor NG.

3. Results

3.1. Descriptive information

Of our veteran sample, all participants were male, with a mean age of 48.6 years (range 26-59 years), and had served in the British Army (range 5-24 years of service). All participants reported combat exposure and had been deployed an average of four times (range 1-9 times) to Afghanistan, Northern Ireland, the Gulf, Sierra Leone, Bosnia, Kosovo, Iraq, or the Falklands. On average, the clinician participants had worked in clinical practice for 16 years (range 4-29 years) and three were male.

3.2. Results of thematic analysis

As shown in Table 1, two overarching themes and six sub-themes emerged from the data, reflecting veterans' experiences of moral injury, their experiences of psychological treatment, and clinicians' perceptions of providing care. Anonymous participant comments are provided to illustrate our findings and all participants have been assigned a pseudonym by the researchers.

Table 1. Themes and subthemes following thematic analysis.

Themes and subthemes

Experiences of moral injury Types of morally injurious events Frequency of moral injury Impact of moral injury on mental health Perceptions of and engagement in treatment for moral injury Treating moral injury-exposed veterans Psychological treatment as beneficial Challenges of delivering treatment for moral injury

3.3. Experiences of moral injury

3.3.1. Types of morally injurious events

Morally injurious events reported by veterans related either to their own actions or to the actions of those they served with. The nature of the morally injurious events included: disrespecting dead bodies, mistreating civilians or captured enemy combatants, being ordered to break rules of engagement, and beliefs that command gave negligent orders or did not adequately supply troops.

Clinician 4: Well there's certainly [patients] ... who had to shoot a child. One who was laden and strapped with explosives, approaching the gates of Bastion and ... the issue was being high-fived by his colleagues for taking the shot ... for this particular chap, [his] wife wants to have a child and ... he couldn't consider that as [he thought] 'how could I possibly be a father to a child, I'm a murderer.'

Veteran 2: The most distress is from Kosovo where I witnessed ... children being murdered and women being raped ... [and] families being bombed out of houses and that's had a profound effect on me ... we had people screaming and saying help us and the windows were boarded up, so it was pre-planned and we just couldn't get to them We tried our best but I feel like I was helpless to do anything and I was our platoon sergeant, so I was in charge of our platoon. And, I've got serious guilt trips, you know ... you constantly go over in your head did you do the best you could?

3.3.2. Frequency of moral injury

Exposure to military-related morally injurious events was considered by clinicians to be a common experience. When asked to describe the proportion of personnel/veterans they have treated who report exposure to morally injurious events, clinicians held that 10-13% of their veteran patients reported that they had committed transgressive acts, while 50-65% had witnessed transgressive behaviour of others or experienced a perceived betrayal. According to veterans and clinicians, particular vulnerability to mental health problems following exposure to potentially morally injurious events was associated with younger age at the time of the event, exposure to multiple traumatic events, and more senior rank (i.e. senior officers were more likely to have moral injury due to feelings of personal responsibility for events). In addition, both clinicians and veterans perceived that moral injury-associated psychological distress seemed to increase on leaving the AF.

Interviewer: What percentage of the veterans or service members that you have worked with have reported witnessing these types of moral injuries?

Clinician 1: I think maybe half, around 50% ... and it's not just those who are on the frontline who are affected, it could be anyone. If a war plan fails, if the rules of engagement fail, everything falls apart, anybody can feel responsible and experience a moral injury.

3.3.3. Impact of moral injury on mental health

Following veterans' experiences of moral injury, significant psychological distress was consistently reported. According to veterans and clinicians, symptoms of PTSD were common, including intrusive symptoms (e.g. flashbacks, nightmares, intrusive thoughts of the event) and dissociation. Emotional numbness, suicidal ideation, self-harm, excessive rumination, and negative appraisals of themselves (i.e. self-loathing, shame, and guilt for the event) and others (e.g. other people are untrustworthy) were also prevalent. Feelings of worthlessness reportedly contributed to poor self-care, with many veterans engaging in risky behaviours or selfneglect (e.g. poor hygiene and wearing inappropriate clothing).

Clinician 1: They don't care for themselves. They would prefer to be dead; although perhaps not actively suicidal, they'd be quite happy if they weren't alive. So, it's pretty emotionally numb and negative ... they neglect their own health and looking after themselves, so they become very obese, they smoke a lot and drink a lot and take risks and have car crashes, for example.

Veteran 2: When I hear children screaming, I start to get serious flashbacks ... I don't get a decent night's sleep. I get flashbacks, fireworks go off and [I've] gotta put [my] headphones on. That's just that. Someone threw a banger [firework] one time and I just flipped.

To manage their distress following moral injury, veterans engaged in several potentially maladaptive coping strategies. Many engaged in numbing behaviours, such as becoming very involved in work to avoid thinking about the event, substance misuse, and avoiding sounds, sights, or smells that triggered memories of the event. Veterans also avoided discussing the event because of concerns that others may not understand their experience or would subsequently view them as a terrible person. It was often challenging for clinicians to disentangle such maladaptive coping strategies from those commonly present in cases of PTSD. In cases where veterans had perpetrated or witnessed the transgressive act, they attempted to compensate or atone for the morally injurious experience by being heavily involved in caring roles, engaging in selfharm as a punishment, or setting very rigid rules of right and wrong which, when broken by the veteran, produced very harsh self-judgement and prolonged distress.

Clinician 2: It was a cultural thing, he drank quite a lot in the military but also just to manage that he'd been doing this job that he really believed in and suddenly he was confronted with this fact that they were murdering innocent people ... He had a lot of self-esteem problems about himself which he pushed away through drink.

3.4. Perceptions of and engagement in treatment for moral injury

3.4.1. Treating moral injury-exposed veterans

Clinicians reported that treatment for moral injury first involved taking a veteran's trauma history. This required careful probing of how the veteran made sense of the trauma(s) and whether they felt that their ethical/moral beliefs had been violated. Fearbased treatments, such as prolonged exposure, were not perceived by clinicians to be effective in addressing veteran distress in cases of moral injury as they could potentially result in 're-shaming' or may not adequately address moral injury-related negative appraisals.

Clinician 3: What I would do is spend less time re-living the event ... as in eyes closed imaginal exposure because that principle there - that works for extinguishing the fear - but for someone who is ashamed, it's actually counterintuitive because it's just re-shaming them and making them go over and over something and each time they imagine it. It just creates more shame.

Instead, clinicians used a variety of adapted approaches that were not specific to PTSD treatment to help veterans to reframe the morally injurious experience. For example, clinicians used responsibility pie charts, compassion-focused therapy (Gilbert, 2010), and imagery re-scripting (Holmes, Creswell, & O'Connor, 2007). Clinicians reported using such treatments to target several key maladaptive responses and appraisals, in particular veteran feelings of guilt, shame, and worthlessness. Treatment also often focused on helping the veteran to have a more balanced view of who was responsible for the event and to forgive themselves or others. Another aim of treatment as reported by clinicians was to reduce the veteran's excessive rumination of the event as this was thought to maintain their symptoms of shame and guilt, as well as challenge their negative appraisals of the world, the self, and others (e.g. 'I am a bad person' or 'other people cannot be trusted').

Clinician 4: We've used responsibility pies and challenged their guilt and I suppose working with people who think they're a murderer or have committed an act, its less about getting them to not feel guilt, but to get a more balanced perspective on the part they played.

3.4.2. Psychological treatment as beneficial

Psychological treatment was reportedly experienced by all veterans to be helpful. Many veterans felt that following treatment they had a better understanding of their psychological symptoms and felt equipped to cope with any ongoing symptoms. For example, veterans felt that they now had effective strategies to cope with nightmares or anxiety. Veterans discussed that treatment helped them to make sense of the morally injurious event more adaptively. Following treatment, veterans reported feeling able to now

appraise the event as not being entirely their fault and accepted that it was natural to be psychologically affected by morally injurious experiences. In some cases, family members were included in treatment and offered psycho-education sessions. Their inclusion was reportedly very helpful as this improved the family member's awareness of the veteran's psychological symptoms, helped veterans to feel their distress was understood by others, and facilitated the provision of social support.

Veteran 6: I went to see Combat Stress ... and they diagnosed two things, one was moral injury and one was post-traumatic grief. Once I had a handle on what they were and then the psychiatrist gave me ways to deal with it, I'm in a much better position now, the moral injury doesn't bother me so much ... It's natural that you are affected with the things that you see in the past ... I find it much easier to contain [my feelings] now ... and realize that actually ... there's nothing I can do about it, it's not my fault ... I'm in a far better place now than I was a year ago.

3.4.3. Challenges of delivering treatment for moral

Some clinicians reported concerns regarding the provision of moral injury treatment to AF veterans. Clinicians reported that the treatment supplied in cases of moral injury exposure was an amalgamation of various therapies (e.g. responsibility pie charts and compassion-focused therapy) and that there was no single, manualized approach for addressing the psychological difficulties resulting from moral injury. When asked about the major challenges of working with personnel/veterans to address moral injury, clinicians described that, unlike PTSD, experiences of moral injury could be reportedly poorly understood in clinical practice and additional action was needed to improve clinical awareness of moral injury and its impact on mental health.

Clinician 1: I think clinicians need to be better educated on the whole concept of moral injury ... It should be part of training in military psychiatrists and psychologists to look for these issues and I don't think people are trained well enough.

Clinician 1: I've not used a manualized approach, what I've tended to do is take a careful history ... looking at ethical beliefs even before the traumatic event ... When you do the therapy ... I would then be trying to use a lot of compassion focused therapy and CBT [cognitivebehavioural therapy] techniques and look to see how the individual can express their feelings ... and talk about it in fair detail to allow them in a supportive environment to express and forgive themselves. I think it needs to be non-judgemental and directive.

In delivering treatment to moral injury-exposed veterans, clinicians described experiencing resourcerelated challenges to providing care. Some clinicians reported that fully addressing moral injury-related distress and symptoms was challenging in the limited number of sessions provided by CS. Clinicians were also conscious of the potential impact of their heavy caseload on their relationship and rapport with clients. To effectively treat moral injury, given the constellation of shame, worthlessness, and symptoms, a strong rapport with patients was considered essential, as a rushed or disingenuous manner could result in poorer treatment outcomes. Finally, treating veterans with both PTSD and moral injury who presented with high levels of guilt, shame, and self-loathing could be particularly distressing for some clinicians who often empathized greatly with their patients' experiences and poor quality of life.

Clinician 3: All these techniques will only work if it's done within a trusting therapeutic relationship, with someone who has core values of genuineness, empathy, warmth because that in itself can be, can have such a corrective effect for their experiences of mistrust, betrayal, abuse and in believing that people in an expert role can't help ... So you can have the best techniques in the world but if they're applied by somebody who the veteran perceives as disingenuous, or cold or rushed for time because they have another ten appointments to get through, then it's not going to work.

4. Discussion

This exploratory pilot study aimed to examine the concept and experience of moral injury in UK AF veterans. We identified six subthemes relating to the experiences, frequency, and psychological treatment of moral injury and the challenges faced by clinicians in providing care to UK AF veterans following moral injury.

Moral injury was perceived by clinicians to be fairly common among UK veterans, with three distinct types of transgressive events often experienced (i.e. perpetration, witnessing, and betrayal by others). This presentation and index of events is consistent with previous research in US veterans (Bryan, Bryan, Morrow, Etienne, & Ray-Sannerud, 2014; Bryan et al., 2016). Moreover, moral injury exposure appears to be common among US veterans seeking help for mental health problems (Currier, Holland, & Malott, 2015; Drescher et al., 2011; Frankfurt & Frazier, 2016), a view shared by the clinicians providing treatment for this UK AF veteran group. This suggests a need for future large-scale studies to examine the prevalence of and index events causing moral injury in UK veterans to better understand the scale of its occurrence, with direct comparisons made between US and UK findings to further our theoretical understanding of the concept of moral injury.

A key theme that emerged from the data was the considerable negative impact of moral injury on veterans' mental health, with symptoms including flashbacks, suicidal ideation, feelings of worthlessness, and poor self-care. Maladaptive coping strategies, such as avoidance, were also often used by veterans to manage their distress. Such responses may reflect veteran PTSD or depressive symptoms but could alternatively be a distinct feature of moral injury itself. These findings are consistent with previous studies of military-related moral injury, with the most common symptoms associated with moral injury found to be intrusive thoughts, intense negative appraisals (e.g. shame, guilt, disgust), and self-deprecating emotions (Drescher et al., 2011; Litz et al., 2009). A recent metaanalysis of the impact of moral injury on mental health highlighted the lack of non-US research on the impact of moral injury on mental health (Williamson et al., 2018), and thus our findings contribute to the literature by providing preliminary evidence of the detrimental impact of moral injury on the mental health of UK veterans.

Clinicians often reported that treating moral injuryexposed veterans could be challenging. Difficulties included the limited number of sessions they were able to provide, the lack of a manualized approach for treating moral injury, and the perception that moral injury was generally poorly understood among UK AF veterans' clinical care teams. This is notable given that moral injury was perceived to be an important issue among UK veterans who seek help for their mental health, and indicates a need to raise awareness of the condition among clinical care teams and other organizations that support veterans. Clinicians also experienced difficulties disentangling the maladaptive coping strategies used by morally injured veterans (e.g. discussion avoidance, numbing symptoms) from those commonly present in cases of PTSD. As it stands, there is no validated treatment approach for moral injury. Some promising interventions are currently being developed, such as the 'impact of killing', which uses a CBT approach to address aspects including self-forgiveness and the physiology of killing responses (Maguen et al., 2017), and 'adaptive disclosure', where patients engage in experiential exercises involving imaginal conversations with a forgiving moral authority (Litz, Lebowitz, Gray, & Nash, 2017). In the present study, clinicians used a combination of several validated approaches with the aim of addressing specific maladaptive appraisals and responses (e.g. guilt, shame, rumination). However, whether this method is helpful to veteran recovery in the long term is unknown. Additional research is needed to explore the presentation and treatment needs of UK veterans on a larger scale to ensure that morally injured veterans are reliably identified and that the care offered is effective and appropriate. At present, it is unclear whether the incorporation of validated approaches, such as compassion-focused therapy, into existing interventions for moral injury would improve patient outcomes or whether the development and

validation of a treatment manual for moral injury in a UK AF context is needed. Moreover, treating veterans who have experienced moral injury appears to be potentially distressing for clinicians. While it was beyond the scope of this study to examine secondary trauma effects, future studies should further explore how clinicians are impacted by providing treatment to morally injured samples and whether any additional support or supervision is required in cases of patient moral injury.

5. Strengths and limitations

This study has several strengths and weaknesses. Among the strengths was the inclusion of veterans and clinicians who had experienced or treated a range of morally injurious events. Furthermore, the relatively small number of cases also allowed for indepth analysis and thematic saturation was achieved (Crouch & McKenzie, 2006; Marshall, 1996). Among the weaknesses is the limited diversity of the sample (e.g. all British Army veterans) and the recruitment of mostly males. Future studies could include the perspectives of female veterans. In addition, data for this exploratory study were collected from a treatmentseeking sample and the views of veterans who were not successful in accessing treatment for their adjustment difficulties were not included. As participating veterans were recruited from a clinical service that specializes in the provision of PTSD treatments, it is recommended that future studies include veterans who are likely to have a wider range of primary diagnoses and/or comorbid disorders. Finally, as moral injury exposure is not unique to service personnel and veterans, inclusion of the views of clinicians who provide psychological intervention to other similarly exposed groups, such as police or journalists (Williamson et al., 2018), in future research would further our theoretical understanding of moral injury and its treatment.

6. Conclusion

This exploratory pilot study provides some initial evidence of the impact of moral injury of UK AF veterans' well-being, as well as the experiences and challenges faced by clinicians in providing psychological treatment to UK AF veterans following moral injury. The results expand on previous research examining the impact of moral injury on US veterans (Bryan et al., 2014; Bryan et al., 2016; Drescher et al., 2011) and provide insight into the clinician perspective of delivering psychological care following moral injury. Future research is needed to examine the prevalence of events that result in moral injury across the spectrum of UK AF veterans, whether help-seeking or not, to ensure that adequate support is available. Such studies will also provide valuable information relevant to active service personnel who are likely to continue to be exposed to potentially morally injurious events. Our findings also highlight the symptoms targeted by clinicians in treatment of moral injury-associated illnesses (e.g. guilt, shame, worthlessness) and the lack of a single, manualized treatment for moral injury-associated illnesses. This suggests a need for not only an examination of whether the treatment currently provided for mental health problems following moral injury is effective but also the development of a standardized approach for treatment of any moral injury component in UK veterans suffering from mental health disorders, which should help to improve clinicians' confidence in the care they deliver to those affected by moral injury.

Acknowledgement

The authors would like to thank Rachel Ashwick for her assistance with data collection.

Disclosure statement

Dominic Murphy is a paid employee of Combat Stress. Neil Greenberg is a trustee of Forces in Mind Trust and Walking with the Wounded and the lead for military and veterans' health with the Royal College of Psychiatrists. VW has no conflicts of interest to declare.

Funding

This research received no specific funding.

ORCID

Neil Greenberg (b) http://orcid.org/0000-0003-4550-2971

References

Braun, V., & Clarke, V. (2006). Using thematic analysis in psychology. Qualitative Research in Psychology, 3(2), 77–101. Bryan, A. O., Bryan, C. J., Morrow, C. E., Etienne, N., & Ray-Sannerud, B. (2014). Moral injury, suicidal ideation, and suicide attempts in a military sample. Traumatology, 20(3), 154-160.

Bryan, C. J., Bryan, A. O., Anestis, M. D., Anestis, J. C., Green, B. A., Etienne, N., ... Ray-Sannerud, B. (2016). Measuring moral injury: Psychometric properties of the moral injury events scale in two military samples. Assessment, 23(5), 557-570.

Crouch, M., & McKenzie, H. (2006). The logic of small samples in interview-based qualitative research. Social Science Information, 45(4), 483-499.

Currier, J. M., Holland, J. M., & Malott, J. (2015). Moral injury, meaning making, and mental health in returning veterans. Journal of Clinical Psychology, 71(3), 229-240.

Currier, J. M., McCormick, W., & Drescher, K. D. (2015). How do morally injurious events occur? A qualitative analysis of perspectives of veterans with PTSD. Traumatology, 21(2), 106.

- Drescher, K. D., Foy, D. W., Kelly, C., Leshner, A., Schutz, K., & Litz, B. (2011). An exploration of the viability and usefulness of the construct of moral injury in war veterans. *Traumatology*, 17(1), 8–13.
- Frankfurt, S., & Frazier, P. (2016). A review of research on moral injury in combat veterans. Military Psychology, 28 (5), 318-330.
- Gilbert, P. (2010). An introduction to compassion focused therapy in cognitive behavior therapy. International Journal of Cognitive Therapy, 3(2), 97-112.
- Holmes, E. A., Creswell, C., & O'Connor, T. G. (2007). Posttraumatic stress symptoms in London school children following September 11, 2001: An exploratory investigation of peri-traumatic reactions and intrusive imagery. Journal of Behavior Therapy and Experimental Psychiatry, 38(4), 474-490.
- Litz, B. T., Lebowitz, L., Gray, M. J., & Nash, W. P. (2017). Adaptive disclosure: A new treatment for military trauma, loss, and moral injury. New York: The Guildford Press.
- Litz, B. T., Stein, N., Delaney, E., Lebowitz, L., Nash, W. P., Silva, C., & Maguen, S. (2009). Moral injury and moral repair in war veterans: A preliminary model and intervention strategy. Clinical Psychology Review, 29(8), 695-706.

- Maguen, S., & Burkman, K. (2013). Combat-related killing: Expanding evidence-based treatments for PTSD. Cognitive and Behavioral Practice, 20(4), 476-479.
- Maguen, S., Burkman, K., Madden, E., Dinh, J., Bosch, J., Keyser, J., ... Neylan, T. C. (2017). Impact of killing in war: A randomized, controlled pilot trial. Journal of Clinical Psychology, 73(9), 997–1012.
- Maguen, S., Lucenko, B. A., Reger, M. A., Gahm, G. A., Litz, B. T., Seal, K. H., ... Marmar, C. R. (2010). The impact of reported direct and indirect killing on mental health symptoms in Iraq war veterans. Journal of Traumatic Stress, 23(1). doi:10.1002/ jts.20434
- Marshall, M. N. (1996). Sampling for qualitative research. Family Practice, 13(6), 522-526.
- Yeterian, J., Berke, D., Carney, J., McIntyre-Smith, A., St. Cyr, K., King, L., ... Litz, B.; Members of the Moral Injury Outcomes Project Consortium. (Under review). Development of a moral injury outcomes scale: Rationale, study design, and preliminary findings. Journal of Traumatic Stress.
- Williamson, V., Stevelink, S. A. M., & Greenberg, N. (2018). Occupational moral injury and mental health: Systematic review and meta-analysis. The British Journal of Psychiatry, 212(06), 339-346.