



## Original article

## Negative emotions towards others are diminished in remitted major depression

R. Zahn<sup>a,b,\*</sup>, K.E. Lythe<sup>b</sup>, J.A. Gethin<sup>b</sup>, S. Green<sup>b</sup>, J.F.W. Deakin<sup>c</sup>, C. Workman<sup>c,b</sup>, J. Moll<sup>d</sup><sup>a</sup> Institute of Psychiatry at King's College London, Department of Psychological Medicine, Centre for Affective Disorders, London, SE5 8AZ, United Kingdom<sup>b</sup> The University of Manchester and Manchester Academic Health Sciences Centre, School of Psychological Sciences, Neuroscience and Aphasia Research Unit, Manchester, M13 9PL, United Kingdom<sup>c</sup> The University of Manchester and Manchester Academic Health Sciences Centre, Institute of Brain, Behaviour and Mental Health, Neuroscience and Psychiatry Unit, Manchester, M13 9PL, United Kingdom<sup>d</sup> Cognitive and Behavioral Neuroscience Unit, D'Or Institute for Research and Education (IDOR), 22280-080, Rio de Janeiro, RJ, Brazil

## ARTICLE INFO

## Article history:

Received 6 October 2014

Received in revised form 1<sup>st</sup> December 2014

Accepted 2 February 2015

Available online 6 March 2015

## Keywords:

Moral emotions

Attributional style

Major depressive disorder

Vulnerability

Self-blame

Overgeneralization

## ABSTRACT

**Background:** One influential view is that vulnerability to major depressive disorder (MDD) is associated with a proneness to experience negative emotions in general. In contrast, blame attribution theories emphasise the importance of blaming oneself rather than others for negative events. Our previous exploratory study provided support for the attributional hypothesis that patients with remitted MDD show no overall bias towards negative emotions, but a selective bias towards emotions entailing self-blame relative to emotions that entail blaming others. More specifically, we found a decreased proneness for contempt/disgust towards others relative to oneself (i.e. self-contempt bias). Here, we report a definitive test of the competing general negative versus specific attributional bias theories of MDD.

**Methods:** We compared a medication-free remitted MDD ( $n = 101$ ) and a control group ( $n = 70$ ) with no family or personal history of MDD on a previously validated experimental test of moral emotions. The task measures proneness to specific emotions associated with different types of self-blame (guilt, shame, self-contempt/disgust, self-indignation/anger) and blame of others (other-indignation/anger, other-contempt/disgust) whilst controlling for the intensity of unpleasantness.

**Results:** We confirmed the hypothesis that patients with MDD exhibit an increased self-contempt bias with a reduction in contempt/disgust towards others. Furthermore, they also showed a decreased proneness for indignation/anger towards others.

**Conclusions:** This corroborates the prediction that vulnerability to MDD is associated with an imbalance of specific self- and other-blaming emotions rather than a general increase in negative emotions. This has important implications for neurocognitive models and calls for novel focussed interventions to rebalance blame in MDD.

Crown Copyright © 2015 Published by Elsevier Masson SAS. All rights reserved.

## 1. Introduction

Excessive self-blame and feeling worthless compared to others are symptoms of major depressive episodes across cultures [37]. One influential view is that vulnerability to MDD is due to a proneness to experience higher levels of negative emotions and lower levels of positive emotions in general [43]. Negative emotionality models of MDD, however, do not distinguish self-blaming emotions (e.g. guilt, shame, self-contempt/disgust,

self-indignation/anger) from emotions related to blaming others (i.e. other-blaming emotions, such as indignation/anger and contempt/disgust towards others). In contrast, blame attribution models posit that MDD vulnerability arises from the tendency to make overgeneralised internal rather than external attributions of causal agency for negative events [2,24]. Self-blaming attributions are closely linked with increasing self-blaming emotions and decreasing other-blaming emotions [45]. Attributional models therefore predict a relative increase in self-blaming emotions in MDD with relatively decreased other-blaming emotions. Previous research investigating the attributional model in MDD, however, has not probed emotions [6,5], which is needed to demonstrate the link between attributions and depressive symptoms [4]. Whether MDD vulnerability is associated with an overall increase in

\* Corresponding author. Institute of Psychiatry at King's College London, Department of Psychological Medicine, Centre for Affective Disorders, London, SE5 8AZ, United Kingdom.

E-mail address: [roland.zahn@kcl.ac.uk](mailto:roland.zahn@kcl.ac.uk) (R. Zahn).

negative emotions or with decreases on some negative emotions has widespread implications for the understanding of the pathophysiology of MDD vulnerability.

In order to determine the role of different self-blaming feelings in the psychopathology of MDD, their distinctive qualities and social functions need to be considered. Shame was demonstrated to entail losing other people's esteem [20], which explains its importance for social comparison and competition [16]. Its attribution to one's character traits is thought to make it particularly maladaptive [23]. Indeed, shame-proneness is reliably associated with mild depressive symptoms in people with no mental health diagnoses [23]. In contrast, guilt was associated with a failure to act according to internalised moral standards and duties [20]. Interestingly, increased dutifulness and a sense of responsibility are important personality traits in people with melancholic depression [42], as is inappropriate guilt (DSM-IV-TR, American Psychiatric Association, [3]). Scores on the Interpersonal Guilt Questionnaire (IGQ-67, [31]), which captures overgeneralised forms of empathy-based guilt, were elevated in symptomatic [33] and remitted [18] MDD. However, by focussing on shame and guilt, other types of self-blaming feelings have gone largely unexplored.

We hypothesized that self-contempt/disgust is of particular relevance to MDD [18], because it entails the devaluation of one's character [14] like shame, but is related to violations of internalised moral duties [20] like guilt. Self-hate, a construct closely related to self-contempt/disgust, was increased in current [33] and remitted [18] MDD. Studies into self-disgust have used observer-rated measures [46] and questionnaire-assessed self-disgust in healthy populations that were associated with higher levels of depressive symptoms [34,38]. One study using a questionnaire measure collapsing disgust towards one's physical appearance and personality showed high scores in a small sample of current MDD and other mental health conditions including borderline personality disorder (BPD) [21]. A further recent study separated experimentally induced personal and physical self-disgust and found physical self-disgust to be more relevant in BPD compared with MDD [1]. So far, there has been only our previous pilot study in remitted MDD to probe self-contempt/disgust, a moral form of self-disgust [18].

Although, a number of studies have demonstrated increased proneness to self-blaming emotions in MDD [16,33,15,7,41], their results are nevertheless compatible with an overall increase in negative emotions. This is because negative emotions that entail blaming others were not assessed. In order to probe the alternative predictions made by the blame attribution vs. the negative emotionality model of MDD, a direct comparison of self-blaming and other-blaming emotions is needed. Overgeneralised self-blaming attributions, as claimed by the blame attribution model, are predicted to lead to a reduction in other-blaming as well as an increase in self-blaming emotions. So far, only our previous pilot study has taken this approach to show a relative reduction in emotions related to blaming others compared with self-blaming emotions in remitted MDD [18].

Furthermore, investigations of proneness to self-blaming emotions have usually relied on questionnaire measures of the underlying emotions as hidden constructs by asking for the hypothesized behavioural consequence of the emotion (e.g. hiding/withdrawal for shame and reparative action for guilt). This was to avoid relying on participants' subjective intuitions about emotions. This approach was based on the assumption that people are imprecise in distinguishing emotions such as shame and guilt [40]. Recent work on the neural basis of moral emotions [26], however, has revealed that participants show distinctive neural signatures associated with stimuli subjectively reported as evocative of a particular moral emotion [49,17] and that

subjectively reported shame and guilt exhibit partly distinct neural changes in remitted MDD [36]. Further support for a subjective approach to emotions comes from anthropological evidence of the transcultural ubiquity of distinct moral emotions [12] that must rely on transculturally stable conceptual underpinnings [27].

Here, we used a previously validated task of high reliability [18,51], the Value-Related Moral Sentiment Task (VMST), to measure proneness to experience experimentally induced self- and other-blaming moral emotions. We compared control individuals with no personal or family psychiatric history to individuals with remitted MDD, thereby revealing vulnerability traits rather than correlates of depressive states [8]. Patients with remitted MDD reliably show increases on measures of overall negative emotionality [30] and have a highly increased risk of developing future major depressive episodes compared with people with no personal history of MDD [10]. The stimuli for the VMST are based on previous normative studies [49,48] and allowed us to directly compare self- (guilt, shame, self-contempt/disgust, self-indignation/anger) and other-blaming emotions (indignation/anger towards others, contempt/disgust towards others). Furthermore, this test allowed us to control for the intensity of negative emotions by obtaining additional ratings of stimuli during the task.

Based on the results of our previous pilot study [18], we tested the hypotheses that:

- individuals with remitted MDD show a bias towards self-blaming relative to other-blaming emotions (self-blaming emotional bias) rather than an overall increase in negative emotions;
- this self-blaming emotional bias is detectable when comparing contempt/disgust towards self and others;
- and contempt/disgust towards others is reduced in remitted MDD.

## 2. Methods

### 2.1. Participants

This paper reports two analyses. For our first analysis, we used an independent sample of participants recruited for this study to determine reproducibility of our earlier findings of increased self-contempt bias in a previous sample [18]. The second analysis draws on pooled data from both samples in order to increase the power for a model to directly compare the importance of different moral emotions.

This study was approved by the South Manchester NHS Research Ethics Committee. All participants gave written informed consent after the procedures had been fully explained, and were compensated for time and travel costs. Participants were recruited using online and print advertisements as part of the UK Medical Research Council-funded "Development of Cognitive and Imaging Biomarkers Predicting Risk of Self-Blaming Bias and Recurrence in Major Depression" project. Initial suitability was assessed with a phone pre-screening interview of 707 volunteers (for exclusion reasons see Table 1) to select participants to be seen by a senior psychiatrist (RZ) and assessed using the Structured Clinical Interview-I for DSM-IV [13]. Current co-morbid axis-I and relevant past axis-I disorders were excluded (see [Supplemental Material for full inclusion and exclusion criteria and assessment details](#)).

Eighty-four medication-free participants with MDD remitted for at least six months and 42 control participants with no history of or first-degree relatives with MDD were independently enrolled for the current study and included in the data analysis. The groups

Download English Version:

<https://daneshyari.com/en/article/4183721>

Download Persian Version:

<https://daneshyari.com/article/4183721>

[Daneshyari.com](https://daneshyari.com)