INVESTIGATING THE MORAL MINDSET OF THE NARCISSIST

by

EDWARD V. CASCIO

(Under the Direction of Leonard L. Martin)

ABSTRACT

Subclinical narcissism is inherently relevant to morality and should thus predict certain aspects of moral judgment, especially when self-sacrifice and social concerns are involved. In two studies I sought to test whether: (a) narcissism moderates the relationship between morally-irrelevant contextual factors and moral judgment and (b) what respective roles self-enhancement and self-concern play in narcissists' moral judgments. The results of Study 1 indicated that the moral judgments of narcissists were differentially affected compared to those of non-narcissists by how "personal" or "impersonal" were the details of moral dilemmas if the dilemmas involved mortal risk to the self. Narcissists were more likely than non-narcissists to judge in favor of self-preservation if the dilemma was impersonal (involving remote initiation), but less likely to preserve the self if the dilemma was personal (involving close initiation). Study 2 was intended to test the mediational roles of self-enhancement and changes in moral emotion in producing this pattern of responses, but the failure to replicate the results of Study 1 curtailed this effort. Explanations for this replication failure are discussed along with implications for psychological and philosophical theories positing the influence of robust traits on moral judgment.

INDEX WORDS: Narcissism Moral Dilemma Moral Judgment Morality

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DEDICATION

To my cat, Figo. Hang in there, buddy!

ACKNOWLEDGEMENTS

I acknowledge the power of situations.

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INTRODUCTION

Judging the moral character of other people is an indispensible element of everyday interpersonal interactions. For example, when we are in need of help or assistance, it is beneficial to know who among our friends and relatives is most likely to help, and under what circumstances. Individuals do not always draw the same conclusions about what is moral, and they may even differ in the process they use to make their moral judgments (e.g., emotional versus rational). So, it is important to understand how different individuals make moral judgments.

In two experiments, I explored the possibility that individuals who differ in narcissism use different routes to arrive at different moral judgments. Consider that narcissists are more likely than non-narcissists to feel they deserve more than others. This sense of entitlement runs counter to moral mainstays such as "the golden rule." Narcissists are also more likely than non-narcissists to think of situations in terms of their significance for their self-worth and they are more likely to react emotionally when self-related issues are being considered. Thus, these differences, and others, may lead narcissists and non-narcissists to focus on different information when judging the morality of an act and to process that information in different ways. So, the two may arrive at different judgments about the morality of the act.

In this paper, I will briefly review some relevant aspects of narcissism along with some relevant aspects of the moral reasoning process and then integrate the two. Then, I discuss two studies that addressed some implications of this integration.

Individual Differences in Narcissism

Narcissism is an individual difference that reflects the dispositional tendency to regulate one's thoughts and behaviors in order to construct and continually augment an inflated view of self (Morf & Rhodewalt, 2001). This tendency can be referred to as narcissistic self-regulation (Morf & Rhodewalt, 2001). Individuals high in narcissism place undue importance on enhancing the positivity of the self. They also believe unjustifiably that they are better than most others on desirable traits like intelligence and attractiveness (Campbell, Rudich, & Sedikides, 2002), and they are constantly motivated to maintain these positive, though often illusory, feelings about the self (Campbell & Foster, 2007).

For ease of exposition, I will refer to individuals scoring high on this scale as "narcissists," and to those scoring low as "non-narcissists." This convenient binary distinction should not be taken literally, as narcissism scores lie on a continuum. In the context of this paper, the term narcissism will be used to refer to individuals with a high but subclinical or "normal" range of narcissism. The scale most commonly used to measure normal narcissism is the narcissistic personality inventory (NPI; Raskin & Terry, 1988).

The behavior of narcissists is understood in part in terms of their heightened attention to their self-image. Narcissists are poor at confronting the possibility that they are not as talented, successful, or socially desirable as they believe. Ego threats such as these lead to defensiveness (e.g., positive distortions; Kernis & Sun, 1994) and retaliatory aggressiveness (Bushman & Baumeister, 1998) on the part of narcissists. In addition, narcissists show a strong propensity to self-enhance (Sedikides, 1993). For example, following a task, narcissists rate their performance highly compared to non-narcissists (John & Robins, 1994). Overall, narcissists are more disposed than non-narcissists to view situations in terms of their self-esteem relevant aspects

(Campbell, Reeder, Sedikides, & Elliot, 2000; Robins & Beer, 2001; Paulhus, 1998). For narcissists, the significance of playing a game of horseshoes with friends, for example, might reside primarily in the outcome of the game (i.e., win or lose) and its implications for their sense of self-worth. For non-narcissists on the other hand, the significance of the game would more likely involve its communal features, such as the opportunity to socialize and have fun together with friends.

Indeed, narcissists tend to perform at their best when opportunities for self-enhancement prevail. Wallace and Baumeister (2002) found that the performance of narcissists - but not non-narcissists - was moderated by expectations regarding self-enhancement. Specifically, narcissists performed better when self-enhancement opportunity was high than when it was low. For example, in the first study, self-enhancement opportunity was manipulated by telling participants that practice would lead to a performance advantage on a subsequent task, and then placing participants in high and low practice conditions. In the second study, the self-enhancement opportunity manipulation involved giving participants rewards for performing better than 50% (low self-enhancement opportunity) or 95% (high self-enhancement opportunity) of earlier participants. In each case, narcissism and self-enhancement opportunity interacted to predict performance, such that the performance of narcissists, but not non-narcissists, was dependent on self-enhancement opportunity.

Heightened concern for self leads narcissists to focus less on the concerns of others, which is reflected in narcissists' more selfish, less communal orientations. In a competitive commons dilemma game, narcissists were more likely than non-narcissists to harvest shared resources for themselves in an unsustainable manner (Campbell, Bush, Brunell, & Shelton, 2005). In addition, narcissists do not self-enhance on traits reflecting a communal orientation,

such as morality (Campbell, Rudich, & Sedikides, 2002). Together, these studies suggest that narcissists are less communally oriented than non-narcissists.

Narcissists' preoccupation with self, along with their relative indifference to the concerns of others (i.e., non-communal orientation) suggests a potential link between narcissism and moral judgment. Specifically, the studies conducted by Wallace and Baumeister (2002) suggest that narcissists might view the significance of situations involving moral judgment in terms of the opportunities they present for self-enhancement. Therefore, rather than focusing specifically on the welfare of others, or the morally-relevant aspects of dilemmas or social situations, narcissists might be inclined to use moral judgment as a means to enhance the positivity of their self.

The objective of the present research is to examine empirically whether processes inherent to narcissistic self-regulation lead to differences in moral judgment and moral cognition. An initial step in this direction is collecting reactions to hypothetical moral dilemmas and noting any differences between those of narcissists and non-narcissists.

Moral Dilemmas

Research examining moral judgment and decision-making has traditionally employed written scenarios that present moral dilemmas. These are situations that require participants to make difficult life-or-death moral choices. For example, respondents may be asked whether or not, or to what extent, it is morally appropriate to sacrifice few lives in order to save many lives. One often used example is the *trolley case* (Fischer & Ravizza, 1992; Thomson, 1985).

You are at the wheel of a runaway trolley quickly approaching a fork in the tracks. On the tracks extending to the left is a group of five railway workmen. On the tracks extending to the right is a single railway workman. If you do nothing, the trolley will proceed to the left, causing the deaths of the five workmen. The only way to avoid the deaths of these workmen is to hit a switch on your dashboard that will cause the trolley to proceed to the right, causing the death of

the single workman. Would you hit the switch in order to avoid the deaths of the five workmen?

This particular version of the trolley case is the *bystander* version because the decision involves merely pulling a switch. The protagonist is not intimately involved in causing the death of the workers. Compare that version with the following:

A runaway trolley is heading down the tracks toward five workmen who will be killed if the trolley proceeds on its present course. You are on a footbridge over the tracks, in between the approaching trolley and the five workmen. Next to you on this footbridge is a stranger who happens to be very large. The only way to save the lives of the five workmen is to push this stranger off the bridge and onto the tracks below where his large body will stop the trolley. The stranger will die if you do this, but the five workmen will be saved. Would you push the stranger on to the tracks in order to save the five workmen?

This version is called the *footbridge* version and, in it, the protagonist must physically push a person onto the tracks if he or she wants to save the workers. Interestingly, from a utilitarian perspective, the two scenarios are the same. In each case, the protagonist can sacrifice one life to save five. This means that if individuals were focusing only on the outcome of the scenarios, they would respond the same way in the bystander and the footbridge versions of the trolley case. Of course, they do not.

Respondents are more likely to recommend sacrificing the one person to save the five workmen in the *bystander* version than *footbridge* version (Greene et al., 2001; Hauser et al., 2006). Such results suggest that individuals do not base their moral judgments on purely utilitarian concerns. Concerns that are only superficially related to the outcome (e.g., the protagonist's personal involvement with causing the death of the one) make a big difference in the moral decision individuals make. Such results have led some theorists to conclude that moral judgments may be largely irrational and emotional (e.g., Haidt, 2001).

Further evidence that contextual factors unrelated to the utilitarian outcome can influence moral decisions has been obtained by Bartels (2008). He focused participants' attention on either the moral rules (e.g., "Do no harm") or the moral consequences (e.g., the suffering of an innocent) implicated in a particular dilemma. When the moral rules were made salient, participants rendered judgments consistent with a deontological (i.e., rule-based) moral perspective, whereas when moral consequences were made salient, participants made relatively utilitarian moral judgments.

In a subsequent study, Bartels (2008) manipulated the vividness of the intervention involved in a moral dilemma. Specifically, all participants read a scenario in which suffocating an infant would save the lives on many. For some participants, the description of the suffocation was bland; for others, it was very vivid. Not surprisingly, an increase in the vividness led to a decrease in the likelihood of participant making a utility-based judgment. In other words, they were less likely to recommend suffocating the baby when the description of the suffocation was vivid rather than bland.

Recent research utilizing neuroimaging techniques has provided further support to the hypothesis that there are different types of moral reasoning (i.e., rational versus emotional). There is evidence that separate neural networks become differentially active when making make judgments about emotionally involving dilemmas compared to less emotionally involving g dilemmas, like the *bystander* case.

For example, Green et al. (2001) found that individuals are less likely to make the utilitarian choices when confronted with emotional dilemmas compared to unemotional ones. They also found activation in the emotion centers of the brain when individuals considered the emotional dilemmas, but found activation in areas associated with deliberative reasoning when

individuals considered non-emotional dilemmas. These findings suggest that emotion plays a more dominant role in moral judgment when the act in question is more personally involving (i.e., the protagonist have to push the person onto the tracks to save the five workers).

Other neuroimaging studies have supported and expanded upon the conclusions of Greene et al. (2001). The ventromedial prefrontal cortex is an area of the brain that is critical for generating emotions, particularly, social emotions such as guilt, shame, and compassion.

Damage to this area makes it less likely that individuals will respond emotionally in interpersonal situations. Koenigs et al. (2007) replicated the findings of Greene et al. Participants responded in a less utilitarian fashion to emotionally involving moral dilemmas – unless these participants had damage to their ventromedial prefrontal cortex. In other words, decreasing the emotion increased the utilitarian responding. Again, we see that moral reasoning may depend on an individual's personal involvement within the scenario and the emotion the person experiences to that involvement.

Further evidence for emotional interference in utilitarian moral judgment comes from a study by Valdesolo and DeSteno (2006). They had participants view either a comedic video clip or a neutral clip and then make recommendations regard both the *bystander* and *footbridge* case. Individuals in a neutral mood showed the usual reactions. They were more likely to recommend sacrificing the one for the many (i.e., utilitarian responding) with regard to the less involving *bystander* scenario than the more involving *footbridge* scenario. Participants in a positive mood, on the other hand, displayed utilitarian reasoning in response to both scenarios. The positive mood seems to have mitigated the negative emotional response to the more involving *footbridge* scenario allowing participants to respond to it in the same utilitarian way they respond to the uninvolving *bystander* scenario.

Moll et al. (2002) showed that scenes evoking moral emotions activate areas in the brain critical for social perception and behavior. Thus, social concerns may become more salient when individuals respond in emotional moral contexts, such as personal dilemmas. These social concerns may be the driving force behind differences in the ways in which people respond to personal and impersonal moral dilemmas.

In sum, there are lots of superficial, morally-irrelevant factors that bear on responses to moral dilemmas. Given what we know about narcissists, one such superficial factor should be concerns over self-positivity. The moral judgments of non-narcissists, on the other hand, should not be as susceptible to this influence.

Narcissism and Moral Judgment

Study 1 was designed to assess the role of narcissism in moral judgment. At least two outcomes seem possible. As noted earlier, narcissists are oriented toward self-enhancement (Farwell & Wohlwen-Lloyd, 1998) and personal gain at the expense of others (Campbell, Bush, Brunell, & Shelton, 2005). It is possible, therefore, that narcissists would make moral decisions that generally favor the self over others. For example, they might have more difficulty than non-narcissists in sacrificing the few to save the many if they are among the few. A second possibility stems from the tendency of narcissists to view situations in terms of their self-esteem relevant aspects (Campbell et al., 2000; Robins & Beer, 2001; Paulhus, 1998). It is possible that narcissists will make moral decisions they believe will allow them to look good in the eyes of others, even if this involves sacrificing the self. The hypothesis of study 1 is that concerns over self-interest and self-enhancement should affect the moral judgments of narcissists more than those of non-narcissists.

STUDY I

Participants completed a measure of narcissism and then read and responded to a set of moral dilemmas. These dilemmas differed in terms of their personal or impersonal implications and in terms of the degree to which the self was placed at risk in each, i.e., whether sacrificing few to save many entailed self-preservation (self condition) in addition to the other lives saved, or not (other condition). Specifically, participants responded to dilemmas in which they had to intervene directly to harm the few to save the many (i.e., personal) or could intervene indirectly (i.e., impersonal). This was a between-participants independent variable. Participants also responded to dilemmas in which their self was part of the equation (i.e., their decision to sacrifice the few for the many could save them) or was not part of the equation (i.e., their action could save the many but they were not among the many). This was a within-participants independent variable. Both of these variables reflect manipulations of what might be called superficial contextual factors. They are superficial in the sense that these factors do not change the utilitarian qualities (i.e., how many people die) of each scenario. The driving question of study 1 was: Will these superficial factors have different effects on narcissists and nonnarcissists? For example, will narcissists be more likely than non-narcissists to render moral decisions that favor self-preservation, or ones that will enhance their image in the eyes or others?

METHOD

Participants

Eighty-six male and female participants were recruited from the Research Pool of the University of Georgia Psychology Department. Participants volunteered in exchange for course credit.

Materials

Narcissism. I measured narcissism using the Narcissistic Personality Inventory (NPI, Raskin & Terry, 1988). This scale comprises 40 pairs of self-descriptions. Each of these pairs has a narcissistic and non-narcissistic option. Participants choose the statement that best describes them. Total narcissism is computed by summing up responses to the 40 items. Each narcissistic statement (e.g., "I think I am a special person") corresponds to 1 point. Therefore, higher scores specify higher narcissism.

Moral Judgment Task. The 48 dilemmas I used in this task (24 impersonal, 24 personal) were borrowed from Moore, Clark, and Cain (2008). I only included the critical scenarios used by these authors and excluded their filler items. The dilemmas were further differentiated across impersonal and personal conditions according to whether or not the self is placed at risk (*self-risk* dilemmas) or not (*other-risk* dilemmas).

An example of an impersonal scenario involving a self-preservation component (self condition) along with the response scale used in all cases, follows:

You and five other people are trapped in a burning building. There is only one emergency exit through which all of you could escape to safety, but it is blocked

by burning debris. You notice another person in the hallway leading to the exit who has been injured but is about to crawl to safety through a small hole at the bottom of the exit door. You and the five people behind you do not have time to climb through the small hole. The hallway's emergency system puts out fire by eliminating oxygen from the hall and you can activate the system by pressing a nearby button. The fire will go out, but the injured person will suffocate and die. However, if you do not do this, you and the five people behind you will die. Is it appropriate for you to activate the system in order to save yourself and the other five people?

Following Bartels (2008), participants responded to each scenario using a 4-point scale with anchors ranging from -2 (no) to +2 (yes). Participants' responses were summed to produce a total morality variable. Higher numbers reflected the disposition to make utilitarian moral judgments as evidenced by a greater willingness to sacrifice few to save many.

The instructions included at the outset of the moral judgment task read as follows: "Read each scenario carefully and then provide a response based on your reaction to each one. Please answer these questions based on what you really think you would do. When making these judgments, completely disregard the legality of the action in question. Remember that your responses are completely confidential, so please be honest in your responses."

Procedure

Participants participated in groups of 6 or less. All of the materials used in Study 1 were presented on a computer monitor. When participants arrived at the experimental session, they were seated in a medium-sized room in front of computers separated by styrofoam dividers. The experimenter obtained informed consent and then proceeded to give a brief overview of the study. Participants were instructed to follow all directions carefully and, once they finished the two separate parts of the study, to wait quietly in their seats until everybody else finished.

Following this, participants began working on the questionnaires comprising part I of the study, which included the Narcissistic Personality Inventory (NPI, Raskin & Terry, 1988). Once participants were finished with part I of the study they proceeded directly to part II: the moral judgment task. When all participants had finished both parts of the study, they were fully debriefed and thanked for their participation.

RESULTS

The hypothesis of study 1 was that the moral judgments of narcissists would be more subject to the influence of self-interest and self-enhancement than non-narcissists. To assess the role of narcissism in moral decision-making, I first computed two summary variables, one for total narcissism, and another for total morality. I computed the narcissism variable (NARC) by summing up participants' responses to each of the 40 items. Higher scores reflected greater narcissism. I also summed up participants' responses to compute the total morality variable (MORALITY). Each item in the moral judgment task had a 4-point scale, with higher responses indicating greater willingness to sacrifice one life for the sake of many. Thus, higher MORALITY scores reflected more Utilitarian moral judgments. SCENARIO CONDITION represented the third variable of interest (1 = impersonal, 2 = personal). In addition, I computed an interaction term reflecting the interaction of scenario condition and total narcissism by multiplying them together (NARCxSCENARIO CONDITION). Finally, I summed participants' responses to dilemmas in the self-risk and no self-risk conditions, which yielded a SELF-PRESERVATION variable and an OTHER-PRESERVATION variable, respectively.

In order to analyze the individual and combined effects of SCENARIO CONDITION and NARC on moral judgment, I first conducted a series of regression analyses on the dependent variable of MORALITY. In the Kernis Lab tradition, I did not zero-center any of the variables.

In the first step of the regression, I regressed MORALITY on NARC and SCENARIO CONDITION. In step 2, I regressed MORALITY on NARCxSCENARIO CONDITION. In the

main effects model, there was a significant main effect of SCENARIO CONDITION on MORALITY (β = -13.317, t(83) = -4.762, p < .00). Participants were more likely to recommend sacrificing a few to save many in the impersonal dilemma than in the personal dilemma. This replicates previous findings (e.g., Hauser et al., 2006) by showing that participants were more willing to sacrifice the few if the sacrifice could be accomplished without close, physical contact on their part. NARC failed to predict MORALITY (p = .10) and NARCxSCENARIO CONDITION did not predict MORALITY (β = -.214, t(83) = -.557, p = .579). In short, narcissism had no effect on moral judgment either as a main effect or in interaction with dilemma-type. MORALITY was collapsed across other types of dilemmas, though (e.g., self-risk versus no-self-risk).

Recall that narcissists are more likely than non-narcissists to focus on the self. As a result, narcissists may be more likely to consider self-risk in their moral judgments. Their moral judgments may also be more likely to be influenced by the chances for self-enhancement in the situation. Ironically, the latter considerations may make narcissists more likely to sacrifice themselves – if they believe that doing so will enhance their esteem in the eyes of others.

To examine this question, I conducted regression analyses similar to those described above except that now the sum of participants' responses to dilemmas that involved self-risk (SELF-PRESERVATION) served as the dependent variable instead of MORALITY. In these analyses, I held constant the effect of the condition in which the self was not placed at risk (OTHER-PRESERVATION) by entering participants' judgments in this condition as a covariate in the model. Thus, I regressed SELF-PRESERVATION on OTHER-PRESERVATION, NARC, SCENARIO CONDITION, and NARCxSCENARIO CONDITION.

The results showed no main effect of NARC or SCENARIO CONDITION on participants' judgments of dilemmas in which their self was at risk. However, there was an NARCxSCENARIO CONDITION interaction (β = -.277, t(83) = -2.859, p < .01). To explore the nature of this interaction, I plotted the predicted values for SCENARIO CONDITION and NARC one standard deviation above and below the means. The predicted values graph can be seen below in Figure 1.

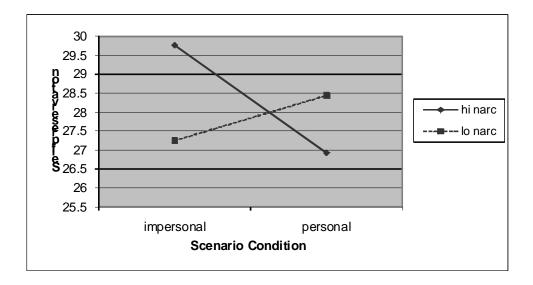


Figure 1. Predicted Values for Narcissism X Condition Interaction on Self-preservation

A test of the significance of these slopes revealed that narcissists were significantly more likely to preserve the self in impersonal scenarios than in personal scenarios (β = -3.225, t(81) = -2.850, p < .01). The same was not true for non-narcissists, who did not differ in terms of self-preserving moral judgments between personal and impersonal conditions (β = 1.366, t(81) = 1.225, p > .05).

DISCUSSION

The results showed that narcissists' judgments were affected by the self-relevance of the dilemma (was their life being saved by the action?) as well as by the personal or impersonal nature of the dilemma (were they personally involved in harming the few to save the many?). More precisely, the personal or impersonal nature of the dilemma made a difference, but only when the dilemmas were also self-relevant.

What accounts for this pattern? One possibility is that narcissists may have ascribed high significance to the social desirability of their moral judgments in the personal condition compared to non-narcissists. In the impersonal condition, narcissists may have allowed themselves to indulge their own material self-interest by judging in favor of self-preservation. We can speculate based on the findings of Moll et al. (2002) - that moral emotions activate areas in the brain critical for social perception and behavior - that narcissists in the personal condition, where moral emotions were presumably activated, interpreted the significance of these emotions in terms of their self-enhancement opportunity. That is, to the extent that these emotions were activated, narcissists were heavily influenced by societal proscriptions forbidding utilitarian responding. Adhering to the dictates of these salient social norms appeared attractive to narcissists in the personal condition due to the self-enhancement opportunity associated with behaving in socially desirable ways. Conversely, since moral emotions are less involved in impersonal moral scenarios, narcissists felt more convinced that they could make self-preserving moral judgments without incurring self-esteem threatening social disapproval.

In other words, when a moral dilemma involving risk to the self does not involve a chance to enhance their standing in the eyes of others, narcissists seem to base their decisions on the inclination to preserve their own life. When they believe their decisions can enhance their standing in the eyes of others, they make decisions that allow them to enhance the self -- and this may paradoxically include sacrificing the self. Study 2 was designed to test these explanations for the Study 1 findings.

STUDY II

In Study 2, I measured the extent to which narcissists and non-narcissists regarded self-sacrifice as an act that could potentially enhance the positivity of the self. The reasoning for Study 2 proceeded as follows: If the pattern of narcissists' opinions about the self-enhancement potential of the different dilemmas tracks their moral judgments regarding the different dilemmas, then there is evidence that narcissists' propensity to preserve the self is driven by self-esteem concerns (Campbell et al. 2006; Campbell &Foster, 2007).

In addition, given the link between mood and moral judgment (Greene et al., 2001, 2004; Valdesolo & DeSteno, 2006), it seemed possible that affective factors may explain the pattern observed in Study 1. If narcissists did "key in" on the aspects of these scenarios related to self-risk by focusing on their self-esteem relevant qualities), then that may have triggered an emotional response. Thus, they might react more emotionally to the different dilemmas than the non-narcissists. This, in turn, might account for the differences in their moral judgments.

The aim of Study 2 was, first, to replicate the interaction effect of condition and narcissism observed in Experiment 1. on context-dependency in self-preservation (henceforward, context-dependency). The second aim was to measure judgments of self-enhancement potential and moral emotions as mediators of that relationship. If narcissists' moral judgments are driven in large part by self-enhancement concerns, then narcissists, but not non-narcissists, would judge self-preservation worthy of acclaim and admiration to the same extent that they decided in favor of it. This means that narcissists would judge self-preservation to have very little self-

enhancement potential in the impersonal condition, and much more such potential in the personal condition, whereas the self-enhancement judgments of non-narcissists would not track their moral judgments as closely. In addition, I expected narcissists to evince emotional reactions corresponding to their self-enhancement judgments. Specifically, I predicted that narcissism would be positively associated with higher moral emotion change scores resulting from the between-participants manipulation of whether or not the dilemmas have personal implications, and that these changes in moral emotion would mediate the relationship between the interaction of dilemma-type (personal or impersonal) and context-dependency.

METHOD

Participants

Sixteen male and 86 female participants were recruited from the Research Pool of the University of Georgia Psychology Department. Participants volunteered in exchange for course credit. Three participants were excluded from the analyses for failure to follow study instructions.

Materials

Moral emotions. I used three items to measure participants' moral emotional state at three separate time points. (At each measurement interval, two filler items were also included.) I included the three self-conscious emotions described in Haidt's (2003) taxonomy of other-condemning (contempt, anger, disgust) and self-conscious (shame, embarrassment, guilt) moral emotions. (The filler items were excitement and confidence.) Participants were asked to rate the extent to which they were experiencing the aforementioned emotions on a 5-point scale with anchors ranging from 1 (very slightly or not at all) to 5 (extremely).

Self-enhancement judgments. I used one item to measure the extent to which participants considered their moral judgments unique and special (*To what extent do you agree that your response reflects how the average person would respond?*) and another item to assess the extent to which the act in question would bolster participants' sense of moral superiority (*To what extent do you agree that performing this act would make you feel morally superior?*).

Participants responded to each item on a 5-point scale with anchors ranging from 1 (not at all) to

5 (very much so). Participants responded to both of these items each time they respond to one of the 24 moral scenarios, which were exactly the same as the ones used in Study 1.

Procedure

The initial part of the procedure for Study 2 closely resembled the initial part of Study 1. Participants ran through the study in groups and completed all of the measures on computer monitors separated by Styrofoam dividers. Once the experimenter obtained informed consent, he or she provided a brief overview of the study, noting that the study had two parts.

At that point, participants began working on part I of the study. Part I comprised the NPI, a basic demographic questionnaire, and the time 1 measure of moral emotion. Once participants finished Part I, they moved directly on to part II. Part II was composed of the time 2 measure of moral emotion, followed by the moral judgment task, followed by the time 3 measure of moral emotion. The moral judgment task was identical to the one used in Study 1. Time 2 moral emotion was measured once participants completed all of the self dilemmas. Time 3 moral emotion was measured once participants completed all of the other dilemmas. When participants had finished both parts of the study, they were fully debriefed and thanked for their participation.

RESULTS

As in Study 1, I computed summary variables for total narcissism (NARC), moral judgments when the self was placed at risk (SELF-PRESERVATION), and moral judgments when the self was not placed at risk (OTHER-PRESERVATION), and moral judgments across personal and impersonal conditions (MORALITY). I also computed an interaction term reflecting the interaction of SCENARIO CONDITION and NARC (NARCXSCENARIO CONDITION). Then I computed two separate moral emotion difference scores for each of the three moral emotions (guilt, embarrassment, shame) that reflected the difference between the time 1 and time 2 measurement (EMOT1) and the time 2 and time 3 measurement (EMOT2). These difference scores represented potential mediators of the effect found in Study 1. In addition to these emotional changes, I expected judgments of the self-enhancement potential of moral judgments to mediate the Study 1 effect. I used two items to measure these judgments of self-enhancement potential and summed participants' responses to each one, which yielded two self-enhancement summary variables (ENHANCE1 and ENHANCE2).

In all Study 2 analyses, DILEMMA CONDITION represented the main independent variable, NARC the moderator, and SELF-PRESERVATION the main dependent variable. The self-enhancement measures (ENHANCE1 and ENHANCE2), as well as the moral emotion difference scores (EMOT1 and EMOT2), represented the potential mediators of the potential interaction effect of condition and narcissism on SELF-PRESERVATION.

First, I regressed MORALITY on SCENARIO CONDITION. As in previous research, as well as Study 1, a significant main effect emerged when I regressed MORALITY on SCENARIO CONDITION (β = 7.642, t(96) = 3.305, p < .00) such that participants were more likely to give utilitarian responses in the impersonal condition compared to the personal condition. That is, participants were more likely to sacrifice one life to save many if the dilemma did not involve direct initiation and close physical contact.

Next, I tested whether the Study 1 interaction effect would replicate. In the first step of the regression, I regressed MORALSELF on MORALOTHER (in order to hold this variable constant), SCENARIO CONDITION, and NARC. In step 2, I regressed MORALSELF on NARCxSCENARIO CONDITION. This test did not provide support for the hypothesized interaction effect (β = .069, t(96) = .456, p = .649).

Having initially found no support for the interaction effect of condition and narcissism (NARCxSCENARIO CONDITION) on SELF-PRESERVATION found in Study 1, I tested a few hypotheses in order to explain this failure to replicate. My first conjecture was that gender differences may have obscured this relationship. Since the Study 1 and Study 2 samples were very different in terms of gender composition (38% male, 62% female vs. 16% male, 84% female), this seemed like a distinct possibility. Also, gender correlated with all of the moral judgment summary variables: MORALITY (r = .300, p < .01), SELF-PRESERVATION (r = .259, p < .05), and OTHER-PRESERVATION (r = .293, p < .01). Males were more likely than females to make Utilitarian responses. Running the model again while controlling for gender did not alter the null result for the interaction effect of condition and narcissism (NARCxSCENARIO CONDITION) on SELF-PRESERVATION ($\beta = .065$, t(96) = .427, p = .670).

Another possibility I considered was that the additional self-enhancement items included in the Study 2 moral judgment task led to less engagement on the part of participants, which in turn led to less carefully considered responses. These self-enhancement items made the moral judgment task longer and more repetitive than in Study 1. Thus, it is possible that the inclusion of the two self-enhancement items after each moral judgment led to participant distraction, or even frustration. In order to test this supposition, I created variables reflecting participants' response to only the initial moral dilemma out of the entire sequence of 24 dilemmas. Running the same analysis should have then provided evidence in support of or against this conjecture. I regressed SELF-PRESERVATION (first response only) on OTHER-PRESERVATION (first response only), SCENARIO CONDITION, NARC, and NARCXSCENARIOCONDITION. This yielded no support for the idea that participant fatigue or disengagement explained the replication failure ($\beta = .007$, t(98) = .223, p = .824).

Since the hypothesized interaction effect of narcissism and scenario condition (NARCXSCENARIOCONDITION) on SELF-PRESERVATION was not supported, I could not examine the potential mediational role of self-enhancement judgments (ENHANCE1 and ENHANCE2) and changes in moral emotion (EMOT1 and EMOT2). So, at this point, I tested a few ancillary hypotheses. One outcome that would have been essential for the emotion change scores (EMOT1 and EMOT2) to mediate the effect found in Study 1 would be for narcissists to experience greater changes in emotion than non-narcissists as a result completing the moral judgment task. It was still possible to test whether that was the case. First, I tested whether NARC was associated emotion change scores (EMOT1 and EMOT2). No significant correlations emerged. I also looked at change scores for each of the five emotions separately and no correlations emerged here either. Second, I tested another secondary hypothesis that would have

had to be confirmed in order to find mediation. This was whether NARC was associated with ENHANCE1, ENHANCE2, or both. This relationship would be expected given the greater tendency of narcissists to enhance the positivity of the self. Specifically, I tested whether narcissists were more likely than non-narcissists to strongly agree or disagree with the two selfenhancement statements (To what extent do you agree that your response reflects how the average person would respond? and To what extent do you agree that performing this act would make you feel morally superior?) that proceeded each moral judgment item. Here a positive relationship did emerge between narcissism and ENHANCE1 (r = .249, p < .05) but not ENHANCE2 (r = .124, p = .227). Finally, I tested the relationship between self-enhancement scores (ENHANCE1 and ENHANCE2), changes in moral emotion (EMOT1 and EMOT2), and MORALITY. The only relationships that emerged were between ENHANCE1 (To what extent do you agree that your response reflects how the average person would respond?) and MORALITY (r = .392, p < .01), MORALOTHER (r = .279, p < .05), and MORALSELF (r = .279), and MORALSELF (r = .279), and MORALSELF (r = .279). .444, p < .01). That is, participants who responded in more Utilitarian ways felt that their responses were less likely to coincide with how the average person would respond. However, this relationship may simply reflect a perceived normative proscription against Utilitarian responding rather than self-enhancement, per se. This interpretation is supported by the lack of a relationship between moral judgments and scores on ENHANCE2 (To what extent do you agree that performing this act would make you feel morally superior?).

DISCUSSION

The results of Study 1 and Study 2 support the previously found effect of personal or impersonal dilemma-type on moral judgment (e.g., Greene et al., 2001). Participants were more likely to sacrifice one to save many when the act involved in this sacrifice did not require close physical contact. This provides further evidence that moral judgment is "irrational" because it is determined by factors that do not seem morally-relevant, such as the degree of physical contact involved. The present studies provide further support for this irrationalist interpretation of moral judgment and decision-making.

However, it was initially hypothesized that individual differences in narcissism might qualify this main effect. And indeed, Study 1 supported the moderating role of narcissism in the relationship between dilemma-type (personal or impersonal) and the tendency to sacrifice the one when it meant saving oneself (self-preservation). When dilemmas were personal, narcissists were less likely than non-narcissists to sacrifice another in order to save themselves (i.e., self-preservation was low). When dilemmas were impersonal, narcissists were more likely to sacrifice another in order to save themselves (i.e., self-preservation was high). Furthermore, it seemed that this pattern of findings was consistent with two facets of narcissism - self-enhancement (Farwell & Wohlwen-Lloyd, 1998) and self-concern (Campbell, Bush, Brunell, & Shelton, 2005) - which could explain the results. The reasoning went that in the personal condition, narcissists may have perceived an opportunity for self-enhancement that could only be pursued by sacrificing the self. This is because, in light of the finding of Moll et al. (2002), the

personal condition could have activated areas in the brain that were critical for social perception and behavior. Thus, narcissists in the personal condition, where moral emotions were presumably activated, interpreted the significance of these emotions in terms of their social significance which, for narcissists, is often synonymous with self-enhancement. In the impersonal condition, on the other hand, narcissists may have failed to perceive any obvious opportunity for self-enhancement, and thus reverted to a purely self-preserving strategy.

In order to assess these conjectures, in Study 2 I sought to test two mediators of the Study 1 effect. First, if narcissists' self-enhancement concerns drove the Study 1 effect, then narcissists should have regarded their moral judgments as morally exceptional. I tested this self-enhancing judgment using two items which, in subsequent analyses, were entered separately as mediators of the Study 1 effect. Second, I measured changes in moral emotion as another mediator that should have been responsive to the interaction of narcissism and scenario condition. The reasoning involved here was that moral emotions such as shame and guilt (Haidt, 2003) might be differentially affected between narcissists and non-narcissists by responding to dilemmas in the personal and impersonal conditions. These changes in moral emotion were expected to run parallel to differences in self-enhancement.

The results of Study 2 did not replicate the narcissism by condition interaction effect observed in Study 1. This casts serious doubt on the validity of the Study 1 effect. Also, this failure to replicate scrapped plans to test for mediation since there was no interaction effect of which to find mediators. In the remainder of this manuscript, I will rehash and elaborate upon a few of the potential reasons Study 2 failed to replicate Study 1 mentioned earlier. In addition, assuming the null hypothesis, I will explain how these results compare with current findings and theory in moral psychology research.

As previously mentioned, the gender composition of the samples used in Studies 1 and 2 may have contributed to the disparate findings. The Study 1 sample was composed of 90 participants, 34 of whom were male and 56 of whom were female (38% male, 62% female). In Study 2, the sample consisted of 102 participants, 16 of whom were male and 86 of whom were female (16% male, 84% female). In both samples, gender correlated with Utilitarian moral judgments such that males were more likely than females to sacrifice one life to save many. Thus, the greater proportion of females in the Study 2 sample could have led to responses dissimilar to Study 1 on the main dependent variables (MORALITY, MORALSELF, and MORALOTHER).

A second possibility is that differences in the point in the semester during which data were collected for the two studies created sample variation along important moral dimensions. The data for Study 1 were collected towards the end of the semester, during which time the somewhat less diligent students usually rush to satisfy their research requirement. In contrast, the data for Study 2 were collected towards the beginning of the semester, and were thus potentially obtained from more diligent participants. In sum, the sample for Study 2 was likely composed of more conscientious participants than that of Study 1. Thus, the results of Study 2 could have been influenced by accidental factors more than those of Study 1.

Yet a third possibility is that the Study 1 effect occurred by accident and should thus be completely discounted. Assuming the null hypothesis, the data from both studies provide additional evidence supporting the universality of moral judgments that involve the sort of fictitious moral dilemmas used in the present research. Other research supports the idea that moral judgments share a universally common thread. O'Neill and Petrinovich (1998) concluded that there may be an evolved human tendency to share similar moral intuitions. In their study,

gender, ethnicity, age, and religion failed to predict moral intuitions in relation to the sort of moral dilemmas we have been considering. In addition, neither education level nor national affiliation predicts these moral judgments (Hauser et al., 2007). More studies should be conducted in order to determine the extent to which narcissism impacts moral judgment, as the present studies do not supply any firm conclusions in this regard.

And in general it is an interesting question to what extent individual differences impact supposedly universal patterns of moral judgment. Recent philosophical perspectives appeal to some notion of "character psychology" in moral judgment (Kamtekar, 2004; Solomon, 2003). On the other hand, empirical work in moral psychology consistently demonstrates the situational nature of moral decisions (Darley & Batson, 1973; Isen & Levin, 1972; Mathews & Canon, 1975). Examining the role of morally-relevant individual difference variables in moral judgment could be a promising means of informing this debate.

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