Belief in a just world and social dominance orientation: Evidence for a mediational pathway predicting negative attitudes and discrimination against individuals with mental illness

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1. Introduction

I was working in a solicitor’s as a trainee receptionist. I couldn’t tell my boss I had to see a psychiatrist every week, so I told him I was on a training scheme 1 day a week. When I had to tell him I was being taken into hospital, his reaction said it all. He sat back in his seat wanting to keep as far away from me as possible. As soon as mental illness is mentioned, people literally back off from you.

Jo, a person with a mental illness, as quoted by Thornicroft (2006, p. 54).

Negative attitudes toward people with mental illness are common in contemporary society. For example, studies carried out in cultures as diverse as Sri Lanka (Fernando, Deane, & McLeod, 2010), Jordan (Hamdan-Mansour & Wardam, 2009), the United Kingdom (Crisp, Gelder, Rix, Meltzer, & Rowlands, 2000), and the United States (Link, Phelan, Bresnahan, Steve, & Pescosolido, 1999) have shown that large proportions of populations agree with statements endorsing negative attitudes toward people with mental illness, including that such people are personally to blame for their illnesses, that they should just “pull themselves out” of their problems, and “have no self-control.” Some of these studies included health-care professionals in their samples, underscoring the severity of the problem.

Importantly, such negative attitudes have important consequences on intentions to behave and actual behavior. For example, in a 2006 survey, Pescosolido et al. (2010) found that more than 62% of respondents indicated an unwillingness to “work closely on a job” with a person suffering from schizophrenia, while 47% indicated such an unwillingness with regard to a person suffering from major depressive disorder. Negative attitudes can also lead to employment and housing discrimination (e.g., Weiss, Ramakrishna, & Somma, 2006), and lead people with mental illnesses to avoid seeking much-needed treatment for their disorders (e.g., Conner et al., 2010).

Perhaps due to the widespread existence of negative attitudes toward individuals with mental disorders and the far-reaching consequences of such attitudes, researchers have identified and studied a variety of variables that predict such negative attitudes. Some of this research has focused on social-structural variables, including demographics: for example, less-educated people, older people, males, and non-whites are more likely to hold negative attitudes toward individuals with mental disorders (e.g., Corrigan & Watson, 2007; Schwab, König, & Weiß, 1978). Other research has focused on personality variables. For example, people high in

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narcissism (Kemal, 2005) and neuroticism (Schwab et al., 1978) are more likely to hold such negative attitudes.

1.1. The current research

We sought to extend research on the personality antecedents of negative attitudes toward individuals with mental illness. Specifically, we explored the extent to which the belief in a just world (BJW) and social dominance orientation (SDO) might work in tandem, consistent with a causal model predicting negative attitudes toward individuals with mental illnesses as well as the self-reported likelihood that participants would engage in discriminatory behaviors against such individuals. Below, we describe these two individual-difference variables and our hypotheses concerning why and how they relate to negative attitudes and behavior toward individuals with mental illness.

1.1.1. Belief in a just world

Some people view the world as a just place, believing that good things come to those who deserve them and bad things come to those who do not (cf. Lerner, 1970; Lerner & Miller, 1978). As a consequence of this belief, people believe in a just world will often blame victims for bad outcomes instead of attributing blame to the actual perpetrator or simply to bad luck (cf. Furnham (2003) for a review). For example, those high in BJW have been shown to be at least in some cases, more likely to blame poor people for being poor (Cozarelli, Wilkinson, & Tagler, 2001), to blame the victims of spousal abuse for the abuse (Kristiansen & Giulietti, 1990), and to blame homosexuals for acquiring AIDS (Anderson, 1992).

It therefore seems likely that people high in BJW would be particularly prone to hold negative attitudes toward individuals with mental illness. If high-BJW individuals tend to blame victims, it would stand to reason that high-BJW individuals would blame the mentally ill in some way for their disorders. Such blame could thus manifest as negative attitudes toward these people. To our knowledge, only one study has tested this hypothesis. Räusch, Todd, Bodenhauser, and Corrigan (2010) assessed BJW, along with the extent to which respondents felt that individuals with a mental illness were responsible for their condition, were dangerous, and exemplified stereotypes about mental illness. Results were ambiguous: whereas the correlation between BJW and perceived self-responsibility approached (but did not reach) traditional levels of statistical significance, the other correlations did not. Thus, although ample theory supports an association between BJW and negative attitudes, no evidence to our knowledge supports such an association.

1.1.2. Social dominance orientation

SDO is another personality variable likely to predict negative attitudes toward individuals with mental illness. According to social dominance theory (e.g., Sidanius & Pratto, 1999), SDO is an individual-difference variable reflecting the motivation to endorse and perpetuate hierarchical relationships between groups in society, in which one's own group is dominant (or striving to be dominant). As such, high SDO should predict prejudice against a variety of traditionally marginalized groups. Research has supported this notion, demonstrating significant positive correlations between SDO and, among other beliefs, sexism (Sibley, Wilson, & Duckitt, 2007) and various forms of racism (Duckitt, 2001; Van Hiel & Mervielde, 2005).

Because individuals with mental illness might be thought of as constituting an “ingroup” competing with other social groups for resources and social standing, one would expect individuals high in SDO to hold more negative attitudes toward individuals with mental illness. Although no research to our knowledge has focused on that hypothesis, Phelan and Basow (2007) reported that individuals high in SDO were more likely than those low in SDO to report the desire to maintain “social distance” from characters in vignettes who were described as having symptoms of mental illness. Thus, as with BJW, although theory would support a correlation between SDO and negative attitudes and behaviors toward individuals with mental illness, no such research involving attitudes and behaviors exists to date.

1.2. A causal model?

In the current research, we initially assessed whether BJW and SDO correlate with negative attitudes against individuals with mental illness. But, perhaps more importantly, we go beyond exploring how BJW and SDO independently predict negative attitudes and discriminatory behaviors against individuals with mental illness: we instead test a causal model in which belief in a just world impacts social dominance orientation, which in turn causes negative attitudes, ultimately leading to self-reported intentions to engage in discriminatory behaviors against people with mental disorders. To support our argument for this double-mediated causal effect, we turn to two separate literatures. First, to support the idea that belief in a just world might impact social dominance orientation, which would subsequently impact negative attitudes toward individuals with mental illness, we draw upon Duckitt’s (2001) influential theory of ideology and prejudice. This theory posits that prejudice stems in part from stable, dispositive ideologies that are in turn predicated on social beliefs (i.e., worldviews). Most relevant to the present study is the portion of Duckitt’s theory pertaining to SDO, according to which SDO is an ideological personality variable that causes individuals to harbor prejudiced attitudes. Duckitt’s research demonstrates that the effect of SDO on prejudice is distally rooted in a worldview depicting life as a “competitive jungle” in which individuals and groups must struggle against one another in a ruthless battle for superiority. Such a worldview causes individuals to become concerned with their ingroups’ standing in the social order – hence, SDO – which contributes to the development of prejudice, typically directed toward members of outgroups. In other words, prejudice can be partly understood as an outcome of a personality process in which individuals’ general worldviews influence their SDO.

Based on Duckitt’s theory, then, we reasoned that the link between BJW (a general social worldview) and negative attitudes toward individuals with mental disorders might be mediated by SDO. Specifically, we predicted that BJW would be a causal antecedent to SDO because, like competitive-jungle beliefs, the belief that the world is a place where people get what they deserve should lead individuals to be more concerned with their own social standing (i.e., to affirm their “goodness”; cf. system justification, Jost, Banaji, & Nosek, 2004), and therefore higher in SDO.

Whereas Duckitt’s research provides evidence for the first two mediational paths in our proposed model, research on attitudes and behavior provides evidence for the third. A wealth of evidence has shown that, given appropriate conditions, attitudes are an important cause of behavioral intention. Perhaps the most well-known and well-supported theory in this context is Ajzen’s (1991) Theory of Planned Behavior. This model proposes that the most proximal cause of behavior is intention to behave (see also Fishbein & Ajzen, 1975). And one of the three proximal causes of such intentions is attitudes toward the behavior. Thus, consistent with this line of research (for meta-analytic reviews, cf. Cooke & Sheeran, 2004; Glasman & Albarracin, 2006), we proposed that attitudes toward those with mental disorders would lead to self-reported intentions to behave in a discriminatory manner against such people.

To test our model, we conducted two separate research projects. Our pilot research was conducted to identify a series of
behavioral-intention items to be used as the discrimination variable in the main study. Our main study, in turn, used these behavioral-intention items to test our proposed causal chain.

2. Pilot research

A total of 103 individuals from the United States participated in one of two studies titled “A Brief Survey Dealing with Personality” via the Amazon Mechanical Turk website in exchange for US$0.10 (see Burmester, Kwang, and Gosling (2011) for a detailed description of participant recruitment and demographics, as well as evidence regarding the validity of research using this data-collection service). Participants were asked to indicate on a 5-point scale (1 = very likely and 5 = very unlikely) the likelihood that they would engage in a variety of behaviors toward a person “with a psychological disorder.” We selected for use in the main study the four items that yielded means closest to the midpoint (3.00) and distributions that most closely approximated a normal distribution.

3. Main study

3.1. Method

A total of 280 individuals from the United States participated in “A Brief Survey Dealing with Personality” via the Amazon Mechanical Turk website for US$0.70. The first section of the survey consisted of the four behavioral-intention items selected from the pilot research. Participants were asked:

1. Consider that your car’s brakes needed servicing. How likely is it that you would allow a person with a psychological disorder to repair the brakes on your car?

2. Consider that you were speaking with a person with a psychological disorder. How likely is it that you would share personal information about your life during the conversation?

3. Consider that you learned that your child’s elementary school teacher has a psychological disorder. How likely is it that you would want to transfer your child into another class?

4. Consider that your child was invited to a friend’s house to play and you learned that the parent who would be supervising the play-date has a psychological disorder. How likely is it that you would allow your child to go play at that friend’s house?

To eliminate the midpoint as a response option, we provided participants with a 6-point scale (1 = very likely and 6 = very unlikely) for each behavioral-intention item.

Following these questions, participants completed the Opinions About Mental Illness Scale (Cohen & Struening, 1962), a well-used measure of negative attitudes toward those with mental illnesses (e.g., “There is something about mental patients that makes it easy to tell them from normal people”), the Just World Scale¹ (Rubin & Peplau, 1975; e.g., “By and large, people deserve what they get”), and the 16-item Social Dominance Orientation scale (Pratto, Sidanius, Stallworth, & Malle, 1994; e.g., “Some groups of people are simply not the equals of others”).

3.2. Data reduction

To calculate participants’ behavioral-intention scores, the items were coded such that higher scores indicated greater intention to engage in discriminatory behaviors (Item 3 was reverse-coded); composite scores were created ranging from a possible low of 4 to a possible high of 24 (Cronbach’s α = .73). Next, composite scores for BJW (α = .74), SDO (α = .94), and negative attitudes (α = .90) were calculated, with higher numbers indicating higher beliefs in BJW and SDO, and more-negative attitudes toward individuals with mental disorders.

3.3. Results

3.3.1. Initial analyses

Means and standard deviations for the four behavioral-intention items are presented in Table 1. As shown in Table 2, both BJW (r = .15, p = .01) and SDO (r = .48, p < .001) were significantly correlated with attitudes, such that people higher in BJW and higher in SDO held more negative attitudes toward individuals with mental illness.

3.3.2. Primary analysis

The data were submitted to the two-step mediational analysis, shown in Fig. 1 (cf. Hayes, Preacher, & Myers, 2011; Preacher & Hayes, 2004). This analysis provides estimates of path coefficients and significance tests for specified mediational models, as well as estimates of indirect effects. Results supported the hypothesized causal model: BJW impacted SDO (β = 3.12, p = .002), SDO impacted negative attitudes (β = 8.72, p < .001), and negative attitudes impacted intention to engage in discriminatory behaviors (β = 6.42, p < .001). As indicated by the dashed lines in Fig. 1, none of the three alternative causal links approached significance (all ts < 1.26, ps > .21). Furthermore, the direct (nonmediated) effect of BJW on discriminatory behaviors when controlling for the two mediators was nonsignificant (β = −.18, p = .86), providing further evidence for mediation.

To corroborate this finding using a different analytic strategy, we also conducted two separate mediational analyses, each following Baron and Kenny’s (1986) recommendations. The first analysis tested the BJW–SDO–attitude path. BJW predicted negative attitudes, t(278) = 2.58, β = .15, p = .01, and SDO, t(278) = 3.12, β = .18, p = .002. SDO predicted negative attitudes, t(277) = −8.72, p < .001; and critically, the effect of BJW on negative attitudes was eliminated when controlling for SDO, t(277) = 1.26, β = .07, p = .21. The second analysis tested the SDO–attitude–behavioral intention path. SDO predicted behavioral intention, t(278) = 2.72, β = .16, p = .007, and attitudes, t(278) = −9.10, β = −.48, p < .001. Attitudes predicted behavioral intention, t(277) = −6.38, β = −.40, p < .001; and critically, the effect of SDO on behavioral intention was eliminated when controlling for attitudes, t(277) = −.50, β = −.03, p = .62.

3.3.3. Alternative analysis

To further test the hypothesized mediational chain, we submitted the data to an alternative analysis, in which SDO served as the first (exogenous) variable, BJW and attitudes served, in order, as the mediator variables, and behaviors served as the final (endogenous) variable. Results indicated a direct effect of SDO on behaviors, even when controlling for the mediators, r = 2.72, p = .007, as well as no mediational effect of BJW on attitudes.

<table>
<thead>
<tr>
<th>Table 1</th>
<th>Descriptive analyses for four behavioral-intention items.</th>
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<tr>
<td>M</td>
<td>SD</td>
</tr>
<tr>
<td>1</td>
<td>Car’s brakes</td>
</tr>
<tr>
<td>2</td>
<td>Share information</td>
</tr>
<tr>
<td>3</td>
<td>Transfer child</td>
</tr>
<tr>
<td>4</td>
<td>Allow play-date</td>
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</tbody>
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Note. Scores ranged from a score of 1, indicating lowest perceived likelihood to engage in discriminatory behavior to 6, indicating highest perceived likelihood to engage in discriminatory behavior. Item 3 was reverse-coded for analysis.

¹ Due to experimenter error, one of the 20 items, “Students almost always deserve the grades they receive in school” was not included in the instrument.
4. Discussion

A wealth of research has demonstrated that negative attitudes and behaviors against individuals with mental illness are widespread and impactful. Whereas a host of prior research has explored the extent to which various personality and demographic variables individually predict such processes, we tested the extent to which a double-mediational model could successfully explain the relation between two important personality variables, negative attitudes, and intent to engage in discriminatory behaviors. At one level, the research is the first to demonstrate that BJW and SDO do indeed predict negative attitudes against individuals with mental illness. More importantly, however, our results are consistent with the causal model in which BJW impacts SDO, which impacts negative attitudes, which in turn impacts intent to discriminate.

4.1. Implications

Research has established (or suggested) several personality-based covariates of prejudice toward individuals with mental illness. The present findings add two variables to this research: BJW and SDO. Additionally, evidence from prior research suggested that BJW and SDO might predict prejudice against individuals with mental illness (e.g., Phelan & Basow, 2007; Rüsch et al., 2010), ours is apparently the first to explicitly test such a link. The model we proposed and tested is an initial attempt to which a double-mediational model could successfully explain the relation between two important personality variables, negative attitudes, and intent to engage in discriminatory behaviors. At one level, this research is the first to demonstrate that BJW and SDO do indeed predict negative attitudes against individuals with mental illness. More importantly, however, our results are consistent with the causal model in which BJW impacts SDO, which impacts negative attitudes, which in turn impacts intent to discriminate.

4.2. Limitations and directions for future research

Short of a true experimental design, it is not possible to make definitive causal inferences (cf. Preacher & Hayes, 2004), and so our model’s causal pathways should be interpreted cautiously. However, we tested an alternative model that swapped BJW and SDO, and this model did not fit the data. Moreover, SDO is typically considered an antecedent to a variety of prejudices (Sidanius & Pratto, 1999). On an a priori basis, it seems that domain-general attitudes (e.g., SDO) would be more likely to influence domain-specific ones (e.g., attitudes toward a particular group) than vice versa. Finally, a great deal of experimental research has demonstrated causal effects of attitudes on behavioral intention (cf. Petty, Haugtvedt, & Smith, 1995). Taken together, we believe these points provide compelling support for the causal paths our model specifies.

In the present research, both attitudes and behavioral intention were assessed toward the non-specific category of people with mental illness. That is, neither the items on the Opinions About Mental Illness Scale nor the behavioral-intention items gauged responses to individuals with any specific mental illness but rather individuals with mental illnesses in general. Of course, mental illnesses exist on wide continua of severity, prognosis, and amenability to treatment, among other factors. An important direction for future research would therefore be to assess the extent to which the causal chain we found generalizes to different types of mental illnesses. That is, would the same pattern of results hold for schizophrenia or dysthymia as it did for general mental illness in the current research?

An additional general direction for future research would be to explore moderators of the mediational process for which we found evidence. For example, it might be that younger people, for whom ideology and stances on social issues are less crystallized (e.g., Sears, 1986), may fail to show the associations demonstrated in the current research. It might also be that the causal model would fail among populations from regions in which stigma against individuals with mental illness is extremely common. In addition, it is possible that participants who are highly knowledgeable about mental illness would demonstrate stably low levels of negativity, independent of personality variables like BJW or SDO. Finally, exploring the extent to which a person is likely to engage in socially desirable responding (either due to dispositional or situational factors) would be an interesting line of research.

4.3. Conclusion

Decades of research have documented the prevalence of negative attitudes toward and discrimination against people with mental illness. The present research suggests that such attitudes are not simply correlates of socioeconomic, demographic, or personality factors, but instead at least in part the result of a cascade of effects in which individuals’ general beliefs about the world influence their stable, motivated personality traits, which in turn mold their attitudes and behavioral intentions. We hope this research, by suggesting the possible utility of understanding and perhaps changing “upstream” personality variables, will provide...
potentially useful insight to scientists and practitioners whose goal is to reduce the stigma associated with mental illness.

References


