

# Social Identity Reduces Depression by Fostering Positive Attributions

Social Psychological and  
Personality Science  
2015, Vol. 6(1) 65-74  
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sagepub.com/journalsPermissions.nav  
DOI: 10.1177/1948550614543309  
spps.sagepub.com



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## Abstract

Social identities are generally associated with better health and in particular lower levels of depression. However, there has been limited investigation of *why* social identities protect against depression. The current research suggests that social identities reduce depression in part because they attenuate the depressive attribution style (internal, stable, and global; e.g., “I failed because I’m stupid”). These relationships are first investigated in a survey (Study 1,  $N = 139$ ) and then followed up in an experiment that manipulates social identity salience (Study 2,  $N = 88$ ). In both cases, people with stronger social identities were less likely to attribute negative events to internal, stable, or global causes and subsequently reported lower levels of depression. These studies thus indicate that social identities can protect and enhance mental health by facilitating positive interpretations of stress and failure. Implications for clinical theory and practice are discussed.

## Keywords

depression, social identity, multiple group membership, attribution, failure, mental health

We cannot live only for ourselves.

A thousand fibers connect us with our fellow men.

—Herman Melville, *Moby Dick*

Humans have an innate need for social connections that are vital for health and happiness in life (Baumeister & Leary, 1995; Cohen & Wills, 1985). When this need is not met—when the “thousand fibers” in Melville’s (1851) quote are reduced to a few or none—people are at risk of reduced well-being and even mental illness. In fact, depression—the leading cause of disability worldwide (World Health Organization, 2012)—commonly arises when a person lacks social connections (Cacioppo, Hawkley, & Thisted, 2010; Cacioppo, Hughes, Waite, Hawkley, & Thisted, 2006). Although extensive prior work has documented the fact that social connectedness and social identities are critical to mental health and reduced rates of depression, it remains unclear *why* this is the case (Cruwys, Haslam, Dingle, Haslam, & Jetten, 2014; Jetten, Haslam, Haslam, Dingle, & Jones, 2014). We address this research gap in the present work. What exactly do social identities *do*, psychologically, that makes them so protective for mental health? In answering this question, we propose a novel mechanism through which social identities can protect people against depression, that is, reduced depressive attributions.

generally (Haslam, Jetten, Postmes, & Haslam, 2009; Jetten, Haslam, & Haslam, 2012) and against depression in particular (Cruwys et al., 2013; Cruwys, Haslam, Dingle, Haslam, et al., 2014; Cruwys, Haslam, Dingle, Jetten, et al., 2014). Social identity refers to that part of the self-concept that reflects the internalization of group memberships (Tajfel & Turner, 1979). This means that when the self is defined by a given social identity (e.g., “us Catholics,” “us psychologists,” and “us Australians”), we see other members of that group not as “other” but as part of who and what we are. Moreover, when groups are internalized in this way, they provide us with a sense of belonging, purpose, and direction and therefore have the capacity to enrich our lives—in particular, by providing a basis for bonding, support, companionship, and security (Haslam et al., 2009).

The psychological resources that social identity provides in turn have positive consequences for health and well-being (Jetten et al., 2012). Indeed, growing evidence suggests that social identities have an important role in preventing and resolving depression. For example, in a longitudinal study with a nationally representative sample of over 5,000 older adults,

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## Social Identity and Depression

A growing body of literature demonstrates that social identities are a key psychological resource that is protective for health

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Cruwys et al. (2013) found that possessing multiple group memberships protected against the development of depression, improved the likelihood of recovering from depression, and prevented depression relapse. Indeed, evidence suggested that each new social group an individual joined reduced their risk of relapse 4 years later by 24%. It is also worth noting that several studies provide evidence that it is primarily social isolation that leads to depression, with only limited evidence for the opposite causal pathway (Cacioppo et al., 2010; Iyer, Jetten, Tsivrikos, Postmes, & Haslam, 2009).

One clue that social identification is at the heart of this process is that groups need to be psychologically important to an individual in order to reduce depression symptoms (Cruwys, Haslam, Dingle, Haslam, et al., 2014; Wakefield, Bickley, & Sani, 2013). For instance, high social identification with the army was associated with lower depression among soldiers (Sani, Herrera, Wakefield, Boroch, & Gulyas, 2012), and students who report high identification with an educational institution also report lower levels of depression (Bizumic, Reynolds, Turner, Bromhead, & Subasic, 2009; Brook, Garcia, & Fleming, 2008; Iyer et al., 2009). Similar effects were found in an intervention study that encouraged people with depression to join social groups: reductions in depression symptoms were most marked for those individuals with high (rather than low) levels of social identification (Cruwys, Haslam, Dingle, Jetten, et al., 2014).

Accumulating evidence thus points to the role of social identity as an active antidote to depression—both that *having* more social identities and that *identifying* more strongly with any particular social group protect against the condition. Yet while there is strong evidence for such effects, it nonetheless remains unclear exactly why joining social groups has this positive protective effect. Accordingly, there is clearly a need to explore mechanisms through which social identity might reduce depression.

Speaking to this issue, previous research has suggested that the relationship between social identity and depression might be mediated by social support (Haslam, O'Brien, Jetten, Vormedal, & Penna, 2005; Jetten et al., 2014; Sani, 2012), since a sense of shared social identity has been shown to be a basis for both the provision of help and its positive construal (e.g., Haslam, Reicher, & Levine, 2012; Levine, Prosser, Evans, & Reicher, 2005). However, given that just *thinking* about one's social identities has the capacity to improve well-being and resilience (e.g., Jones & Jetten, 2011), it would seem likely that candidate mediators will also be psychological and not (just) material. In this regard too, it is important to note that both theoretical and empirical works speak to the capacity for social identity to fundamentally restructure cognition (e.g., Turner, Oakes, Haslam, & McGarty, 1994). For example, studies have found that when individuals define themselves in terms of shared social identity (rather than as separate individuals; Turner, 1982), they are less paranoid, more empathic, and more cognitively engaged (Branscombe & Miron, 2004; Haslam et al., 2014; Reicher & Haslam, 2006). Other research has shown that social identity has a profound impact on the way

people interpret and explain the social world—as reflected in stereotypic attributions (Oakes, Haslam, & Turner, 1994; Oakes, Turner, & Haslam, 1991) and in cognitive processing more generally (e.g., McGarty, Yzerbyt, & Spears, 2002). A key question, then, is whether such cognitive restructuring might have implications for depression.

## Social Identity and Attribution Style

One hallmark of depression is a negative attribution style when generating causal explanations for events (Peterson & Seligman, 1984; Sweeney, Anderson, & Bailey, 1986; Weiner, Nierenberg, & Goldstein, 1976). Specifically, individuals with a depressive attribution style are more likely to attribute negative events to causes that are internal, stable across time, and influence many areas of their life (Abramson, Seligman, & Teasdale, 1978). Positive events are explained in the opposite way—as externally caused, transient, and situation specific. This pattern of thinking leads people to blame themselves for failure while denying credit for success (Sweeney et al., 1986).

A large body of evidence suggests that this depressive attribution style is causally related to depression (Chan, 2012; Peterson & Seligman, 1984; Sweeney et al., 1986). Therefore, if a person's depressive attribution style is altered so as to become more positive (i.e., external, transient, and specific), then depression symptoms should be reduced (Seligman et al., 1988). In line with other work showing that social identities serve to structure attributions (e.g., Oakes et al., 1991), it is therefore relevant to ask whether social identity might reduce depression by attenuating depressive attribution style.

There are several reasons for hypothesizing that this might be the case. First, a large body of research has shown that causal explanations can be altered by social factors. In particular, attribution style has been found to develop in response to social influences, such as children modeling their parents' explanatory style (Haines, Metalsky, Cardamone, & Joiner, 1999; Lau, Belli, Gregory, Napolitano, & Eley, 2012; Seligman et al., 1984). Moreover, once a depressive attribution style develops, it can still be modified, even in adults (Seligman et al., 1988). Speaking to this possibility, Klein, Fencil-Morse, and Seligman (1976) had depressed and nondepressed students complete unsolvable problems. Attributions for failure were manipulated by telling participants that most people succeeded on the task (inducing an internal attribution for personal failure) or that most people failed on the task (inducing an external attribution for personal failure). After experiencing failure, depressed individuals tend to perform poorly on subsequent tasks. However, inducing an external attribution of failure reduced the number of depressed individuals who adopted a depressive attribution style. More importantly, this external attribution eliminated subsequent poor performance among depressed individuals. In other words, simply being made aware that personal behavior was similar to that of other group members produced more positive attributions, reducing symptoms of depression and associated poor performance.

One way in which social identity could change such attributions is by shifting *attentional focus*. Depressed individuals have previously been found to have a self-focusing style such that they tend to focus internally—that is on their personal selves—following failure (Greenberg, Pyszczynski, Burling, & Tibbs, 1992). This focus on personal shortcomings leads to internal attributions for failure, causing depression (Greenberg et al., 1992; Romens, MacCoon, Abramson, & Pollak, 2011). In contrast, thinking about one's social identity shifts attention away from the self as an individual (Hogg & Williams, 2000; Turner & Onorato, 1999) and toward (generally positive) group memberships (Turner, 1982). Thus, when social identity is made salient, one's shortcomings as an individual may be less salient, reducing the chance of internal attributions for failure.

In addition to reducing internal attributions for failure, social identity may also facilitate internal attributions for success. This is important because, as a corollary to the patterns discussed earlier, depressed individuals have been found to lack the common (personal) self-serving attribution style in which credit is taken for personal success and blame is denied for personal failure (Greenberg et al., 1992; Seidel et al., 2012). Yet while depressed individuals typically fail to exhibit this form of self-serving bias, there is some evidence they still engage in a *group-serving* attribution bias (Dietz-Uhler & Murrell, 1998). For example, Schlenker and Britt (1996) found that depressed individuals had a depressive attribution style when explaining their own and strangers' experiences but that when attributing the same events for their close friends, they made positive attributions—apportioning credit for their successes and minimizing blame for their failures. This suggests that depressed individuals are capable of making positive attributions and that social identities may provide a cognitive platform for them to do so.

## The Present Research

The goal of the present research was to explore the interrelationships between social identity, depressive attributions, and depression. In line with the above-mentioned reasoning, we tested the following four core hypotheses:

**Hypothesis 1:** social identity would be associated with reduced depression,

**Hypothesis 2:** social identity would be associated with positive attribution styles,

**Hypothesis 3:** positive attribution styles would be associated with reduced depression, and

**Hypothesis 4:** a decrease in depressive attributions will mediate the protective effect of social identity on depression.

Importantly, while Hypothesis 1 is supported by previous social identity research (e.g., Cruwys, Haslam, Dingle, Haslam, et al., 2014; Cruwys, Haslam, Dingle, Jetten, et al., 2014; Reicher & Haslam, 2006; Sani et al., 2012) and Hypothesis 3 by a large body of prior work on depression (e.g., Peterson & Seligman, 1984; Sweeney et al., 1986; Weiner et al., 1976),

to our knowledge this is the first research to propose and test Hypothesis 2 and Hypothesis 4 and to explore the cognitive processes that mediate the relationship between social identity and mental health more generally.

For this purpose, we conducted two studies. The first was a survey study designed to explore the various relationships postulated in the above-mentioned hypotheses. The second was an experiment in which we manipulated social identity salience with a view to establishing its causal impact on attribution style and depression.

## Study 1

Study 1 surveyed final-year university students in the process of completing a major research thesis in psychology. This sample is at high risk of depression (Murphy, Gray, Sterling, Reeves, & DuCette, 2009; Stallman, 2010) and therefore particularly appropriate for investigating our hypotheses. Furthermore, questionnaires were completed during the week that students were submitting their research thesis, and for this reason the sample was expected to be under considerable acute stress. Social identity was operationalized in this study as multiple group memberships, in line with previous research suggesting that these act as a psychological resource that protects against depression (Cruwys et al., 2013; Iyer et al., 2009).

## Method

**Participants and Design.** An online questionnaire was administered to 139 final-year psychology students ( $M_{\text{age}} = 23.93$ ,  $SD = 5.07$ ; 115 female) from four universities. The questionnaire included measures of multiple group memberships, depressive attribution style, and depression symptoms. A range of other variables related to personality and mental health were also measured but do not relate to our hypothesis and will not be discussed further.

## Materials

**Multiple group memberships.** The Exeter Identity Transition Scale (Haslam et al., 2008) was used to gauge participants' involvement in multiple groups. The scale comprised 7 items (e.g., "I am active in lots of different groups"). Participants rated their agreement with each item on a scale from 1 (*not at all*) to 7 (*completely*),  $\alpha = .95$ .

**Depressive attribution style.** The Depressive Attributions Questionnaire (DAQ; Kleim, Gonzalo, & Ehlers, 2011) was used to measure depressive attribution style. This scale comprised 16 items across four related attribution areas (internal, stable, global, and perceived helplessness) such as "when bad things happen, I think it is my fault" on a 4-point scale from 0 (*not at all*) to 4 (*very strongly*),  $\alpha = .91$ .

**Depression symptoms.** The Centre for Epidemiological Studies Depression Scale (Radloff, 1977) was used to assess current levels of depression. Participants responded to 20 statements that asked how often they had experienced symptoms of

depression over the last week. Response options varied from 1 (*rarely or none of the time*) to 4 (*most or all of the time*),  $\alpha = .93$ .

## Results

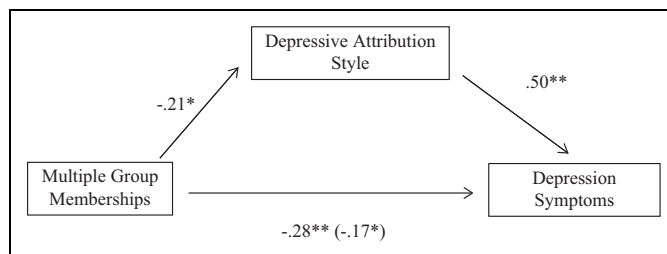
**Descriptives Statistics and Analytic Strategy.** The average level of depression was high ( $M = 18.43$ ;  $SD = 12.31$ ), exceeding the diagnostic cutoff of 16. Average depressive attribution style was also higher than previously reported norms ( $M = 31.01$ ;  $SD = 8.58$ , compared to  $M = 20.52$  in three studies by Kleim et al., 2011). Students reported a moderate level of involvement in groups ( $M = 4.02$ ;  $SD = 1.60$ ). This is similar to previous research with students transitioning to university (Iyer et al., 2009). Regression analyses were conducted to assess Hypotheses 1, 2, and 3.

**Hypothesis 1: Multiple group memberships protect against depression.** Results supported Hypothesis 1, with multiple group memberships significantly predicting depression scores,  $R^2 = .07$ ,  $F(1, 137) = 11.66$ ,  $\beta = -.28$ ,  $p = .001$ . Participants who reported having more group memberships tended to have lower levels of depression symptoms. Among those with an above average number of group memberships, 38% were above the cutoff for depression; however, among those with a below average number of groups, 65% met criteria for depression.

**Hypothesis 2: Multiple group memberships promote positive attributions.** Analyses also supported Hypothesis 2,  $R^2 = .05$ ,  $F(1, 137) = 6.47$ ,  $\beta = -.21$ ,  $p = .012$ . Participants with multiple group memberships had a more positive attribution style. Those with higher levels of multiple group memberships (1  $SD$  above the mean) scored 4 points lower on the DAQ than those with fewer group memberships (1  $SD$  below the mean).

**Hypotheses 3 and 4: Positive attributions mediate the protective effect of group memberships.** Regression analysis also supported Hypothesis 3. When entered in a second block following multiple group memberships, depressive attribution style significantly predicted depression symptoms,  $R^2_{\Delta} = .24$ ,  $F(1, 137) = 48.23$ ,  $\beta = .50$ ,  $p < .001$ . Among respondents who had a more positive attribution style (i.e., below the sample mean), 32% exceeded the cutoff score for depression, whereas among those with a more negative attribution style (above the mean), 70% met this cutoff. The impact of multiple group memberships also became less pronounced when depressive attribution style was entered in the model,  $\beta = -.17$ ,  $p = .018$ .

In order to test Hypothesis 4, a mediation analysis with 10,000 bootstrap samples was conducted (Hayes, 2013, model 4). Multiple group memberships were included as the predictor, with depression symptoms as the outcome variable. Depressive attribution style was entered as the mediator. The indirect effect (IE) of multiple group memberships was significant (IE =  $-.11$ , standard error [ $SE$ ] =  $.04$ , 95% confidence interval, CI [ $-.20$ ,  $-.02$ ]). In line with Hypothesis 4, a decrease



**Figure 1.** Depressive attribution style partially mediates the relationship between multiple group memberships and depression symptoms. All numbers are standardized coefficients.

Note.  $N = 139$ . \* $p < .05$ . \*\* $p < .001$ .

in depressive attribution style partially mediated the effect of multiple group memberships on lower levels of depression symptoms. The model is displayed in Figure 1.

We also tested the most plausible alternative mediation model, in which depressive attributions predicted reduced multiple group memberships via increased depression symptoms. This model did not provide a good fit to the data, as it explained only 8% of the variance (compared to 32% of the variance in the hypothesized model) and attribution style was not a significant direct predictor of multiple group memberships ( $\beta = -.09$ ,  $p = .377$ ). However, the IE of attribution style on multiple group memberships was significant (IE =  $-.13$ ,  $SE = .06$ , 95% CI [ $-.25$ ,  $-.02$ ]).

## Discussion

As hypothesized, participants with more group memberships had lower levels of depression (Hypothesis 1) and were less likely to make depressive attributions (Hypothesis 2). Moreover, depressive attributions were associated with higher depressive symptoms (Hypothesis 3) and partially mediated the relationship between multiple group membership and depression (Hypothesis 4). This study provides preliminary support for the proposition that social identity can reduce depression by attenuating depressive attribution style. In a sample of highly stressed students, the availability of multiple social identities protected against depression by encouraging a more positive attribution style.

Although an alternative model predicting lower group memberships through depression was also significant, this model was less powerful than our hypothesized model. Of course, with correlational data it is impossible to definitively determine causal ordering of variables. To address this limitation, we therefore conducted an experiment in which we manipulated social identity salience.

## Study 2

Study 2 investigated whether an experimental manipulation of social identity salience could reduce depressive attributions and negative mood following failure on a task. This design would allow us to more confidently infer the causal role of social identity in shaping depressive attributions. Negative

mood was used as an analogue of depression because it was not feasible to alter an individual's depression symptoms in an experimental context (for similar logic, see Klein et al., 1976; Spielberger, Ritterband, Reheiser, & Brunner, 2003).

Social identities were made salient by asking participants in three independent conditions to reflect on no groups (control), one group, or three groups that they belong to. Rather than investigating attributions during a period of high stress (as in Study 1), all participants in Study 2 experienced failure on a problem-solving task—a context in which, theoretically, depressive attributions are most problematic.

The study tested the same four hypotheses as in the previous study. More specifically, we anticipated that participants in the social identity conditions (one group or three groups) would have reduced negative mood (Hypothesis 1) and make more positive attributions (Hypothesis 2) than those in the control condition and that positive attributions would reduce negative mood (Hypothesis 3) and mediate the relationship between social identity salience and negative mood (Hypothesis 4).

## Method

**Participants and Design.** Participants were 88 undergraduate psychology students ( $M_{\text{age}} = 19.72$ ,  $SD = 3.86$ ; 55 females) who received partial course credit for their participation. Participants were randomly assigned to one of the three conditions (none vs. one vs. three groups) and identity salience was manipulated between subjects. After the manipulation, all participants completed a problem-solving task and received failure feedback before completing the dependent measures.

### Materials and Measures

**Identity manipulation.** In the control condition, participants did not complete a written reflection task. In the two other conditions, participants first read a short paragraph explaining what constitutes a social identity (adapted from Haslam, Oakes, Reynolds, & Turner, 1999). Participants in the one-group condition then listed one group they belonged to and wrote about “why this group is an important part of who you are.” Participants in the three-group condition completed the same exercise, listing three groups (Jones & Jetten, 2011). Most participants took less than 5 min to complete the task.

**Failure paradigm.** The failure paradigm was presented to participants as a four-question problem-solving task (following Carver & Scheier, 1982; Klein et al., 1976; Welch & Huston, 1982). The task involved four unsolvable questions developed in accordance with previous attribution research (e.g., Mikulincer, 1989; Koole, Smeets, vanKnippenberg, & Dijksterhuis, 1999). The test was collected from participants after 5 minutes. All participants received a score of 0 out of 4, provided in writing after a brief delay ostensibly to allow time for marking.

**Failure manipulation check.** Participants were asked to rate their performance on the problem-solving task, on a scale ranging from 1 (*very poor*) to 7 (*excellent*).

**Current mood.** The Positive and Negative Affect Scale (Watson, Clark, & Tellegen, 1998) was used to measure current mood. Participants were given a list of emotions and asked to rate “the extent to which you feel this way right now, that is, at the present moment” on scales ranging from 1 (*very slightly or not at all*) to 5 (*extremely*),  $\alpha = .88$ . The 10-item negative subscale was of central interest.

**History of depression.** Individuals with a history of depression are more likely to display depressive attributions (Garber & Flynn, 1998; Giles, Etzel, & Biggs, 1989). To explore whether this moderated the hypothesized model, participants' history of depression was measured by asking them to respond “yes” or “no” to the item “Have you ever been bothered for most of two weeks either by feeling down, depressed or hopeless, or by little interest or pleasure in doing things?” (Wulsin, 2012).

**Depressive attribution style.** As in Study 1, this was measured by means of the DAQ (Kleim et al., 2011,  $\alpha = .93$ ).

**Identity manipulation check.** The item “I see myself in terms of my group memberships” was used to assess the impact of the identity manipulation. Response options ranged from 1 (*do not agree at all*) to 7 (*agree completely*). Participants in the social identity conditions (one group and three groups) were expected to give higher responses than those in the control condition.

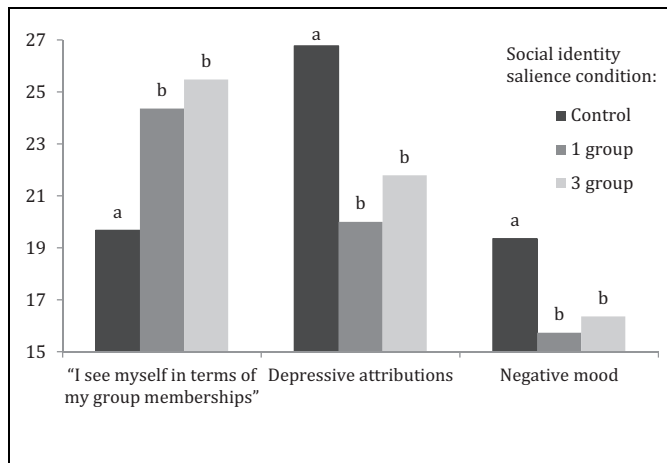
A final open-ended question asked what participants thought the experiment was about. This question was included as a potential exclusion criterion.

## Results

Four participants were excluded because they indicated strong suspicion regarding the veracity of their failure feedback. The final sample included 88 participants (control,  $n = 31$ ; one group,  $n = 29$ ; and three groups,  $n = 28$ ). A high number of participants (59.1%) responded “yes” to the question assessing previous depression history.

As can be seen in Figure 2, for all variables of interest the one- and three-group conditions together differed significantly from the control but were statistically no different from one another. As mediation requires that categorical predictor variables have no more than two levels in each analysis (Hayes, 2013), we therefore collapsed the two social identity conditions in the analyses that follow.

**Manipulation Checks.** On average, participants rated their performance on the problem-solving task as 1.27 ( $SD = 0.81$ ) on a 7-point scale, suggesting that the failure paradigm was successful. The social identity manipulation check was also successful. Participants in the combined social conditions reported thinking about themselves in terms of group memberships ( $M_{\text{1 group}} = 3.48$ ;  $M_{\text{3 groups}} = 3.64$ ) more than participants in the control condition ( $M_{\text{control}} = 2.81$ ),  $t(86) = -2.09$ ,  $p = .039$ . The social identity conditions did not differ from one another,  $t(55) = -0.36$ ,  $p = .723$ .



**Figure 2.** Mean effects of social identity salience condition on the social identity manipulation check, depressive attributions, and negative mood.

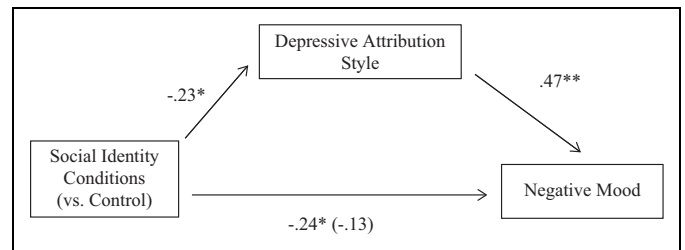
Note. Columns with "a" are significantly different from combined "b" within each variable at  $p < .05$ . Responses to "I see myself in terms of my group memberships" were scaled (multiplied by 7) so that all three variables could be presented in the same graph.

**Hypothesis 1 and Hypothesis 2: Social Identity and Positive Attributions Protect Against Depression.** Supporting Hypothesis 1, negative mood was significantly lower in the combined social identity conditions ( $M_{1 \text{ group}} = 15.73$ ;  $M_{3 \text{ groups}} = 16.36$ ) than in the control condition ( $M_{\text{control}} = 19.35$ ),  $t(86) = 2.13$ ,  $p = .036$ . The social identity conditions did not differ from one another,  $t(55) = -.36$ ,  $p = .722$ .

Supporting Hypothesis 2, depressive attributions were significantly lower in the combined social identity conditions ( $M_{1 \text{ group}} = 20.00$ ;  $M_{3 \text{ groups}} = 21.79$ ) than in the control condition ( $M_{\text{control}} = 26.77$ ),  $t(86) = 2.14$ ,  $p = .036$ . Depressive attributions were no different across the two social identity conditions,  $t(55) = -.54$ ,  $p = .592$ .

**Hypothesis 3 and Hypothesis 4: Positive Attributions Mediate the Protective Effect of Social Identities.** Confirming Hypothesis 3, depressive attributions significantly predicted negative mood when controlling for social identity salience,  $\beta = .45$ ,  $p < .001$ . The collapsed social identity conditions no longer significantly predicted negative mood with attributions in the model,  $\beta = -.12$ ,  $p = .206$ . A mediation analysis with 10,000 bootstrap samples was conducted to test Hypothesis 4 (Hayes, 2013, model 4), as presented in Figure 3. Supporting Hypothesis 4, the IE was significant (IE =  $-.11$ ,  $SE = .06$ , 95% CI  $[-.25, -.02]$ ), indicating that depressive attribution style fully mediated the effect of social identity on negative mood.

To investigate whether history of depression moderated the effect of social identity on depressive attribution style, a sensitivity analysis was conducted in which history of depression was included as a moderator (Hayes, 2013, model 7). The moderation path was nonsignificant ( $\beta = -.12$ ,  $p = .246$ ), suggesting that social identity salience was protective against



**Figure 3.** Depressive attribution style mediates the relationship between social identity salience and negative mood. All numbers are standardized coefficients.

Note.  $N = 88$ .  $*p < .05$ .  $**p < .01$ .

depressive attributions both for participants with and without a history of depression.

## Discussion

As hypothesized, an experimental manipulation of social identity salience reduced negative mood (Hypothesis 1) and depressive attributions (Hypothesis 2). Depressive attribution style predicted negative mood (Hypothesis 3), and this fully mediated the protective benefits of social identity salience (Hypothesis 4). These findings point to the causal role of social identity in promoting a more positive attribution style and thus protecting mental health.

Interestingly, there was no difference between the one-group and three-group salience conditions in terms of their capacity to buffer depressive attributions in the face of failure. It is also worth noting that the effect sizes in the mediational models are highly similar to those found in Study 1, despite the different measures and methodology used in the two studies. Finally, having a history of depression did not moderate the effect of social identity on depressive attributions. This suggests that social identification reduces depressive attributions regardless of whether or not an individual has experienced depression in the past.

## General Discussion

Previous research has established a reliable link between social identity and reduced depression, yet up to this point there has been no clear evidence of the process by which this effect might occur. To address this, we explored the possibility that a novel mechanism is implicated in this so-called "social cure" effect—testing the idea that social identity acts to reduce depression by promoting a more positive attribution style in which blame for failure is minimized.

Correlational and experimental studies provided support for our hypotheses. In Study 1, having multiple group memberships was associated with reduced depression. In Study 2, the manipulated salience of social identity (one or three groups vs. a control) served to reduce negative mood. In both cases, the effects of social identity were mediated by reduced depressive attributions. Although Study 1 showed *multiple* group memberships were associated with reduced depression, Study 2 showed

that the salience of even one social identity was enough to have this effect.

At a theoretical level, these findings confirm the capacity for social identity to structure both cognition and perception (Turner et al., 1994). The social identity approach, and in particular self-categorization theory, is a cognitive model that posits that as individuals' sense of self shifts to the collective level, their thoughts, feelings, and behaviors are filtered through this collective lens (Turner & Oakes, 1997). However, the focus of past research has predominantly been on the affective and behavioral consequences of social identity, rather than on the cognitive and perceptual consequences (with some notable exceptions, e.g., Abrams, Wetherell, Cochrane, Hogg, & Turner, 1990; Haslam et al., 1999; Oakes et al., 1994). Therefore, the present research is important not only because it elucidates a mechanism for the protective benefits of social identity but also because it provides evidence for the impact of social identity on the way people perceive and understand the world. Specifically, when individuals self-define in terms of their social identity (or identities), they are more robust in the face of stress (Study 1) and failure (Study 2), partly because they are less likely to believe that the cause of this negative event is something internal, stable, and global (e.g., "I'm just not good enough"). This research adds to the growing body of work elucidating the positive benefits of social identity, particularly for mental health, which acts as a counterpoint to the traditional focus of social identity research on negative consequences such as discrimination and prejudice.

In addition, these findings have implications for clinical psychology. Although attributions are a central concept in our understanding of the development of depression (Gladstone & Kaslow, 1995; Sweeney et al., 1986), very few studies have investigated the origins and development of attribution styles. Our findings demonstrate that attribution styles are not a "set in stone" individual difference but are responsive to even quite subtle experimental manipulations. This dovetails with other findings that simple interventions, such as affirmations, can modify attributions and subsequent mental health outcomes (Peden, Rayens, Hall, & Beebe, 2001). This was true not only for low-risk participants but also for those who reported a history of depression. As the success of many therapeutic approaches hinges on the malleability of attributions (e.g., cognitive-behavior therapy; Beck, 2011; Kovacs & Beck, 1978), our findings are thus encouraging for psychotherapists.

## Conclusion

The present studies suggest that social identity ameliorates depression not only because belonging to groups makes people feel good. Instead they support the claim that social identity has this impact because it restructures the way people understand the world and, in particular, the way they interpret failure. This has important implications for clinical practice, as it suggests not only that attribution styles can be changed, but also that they can be modified through *social*, not just clinical, means.

Indeed, rather than focusing clinical energies on trying to alter depressive attributions in the abstract, these findings suggest that fostering meaningful social connections may instead be a more fruitful means of improving a person's explanatory style and mental health. A growing body of research supports such an approach (Cruwys et al., 2013; Cruwys, Haslam, Dingle, Jetten, et al., 2014), and it is also apparent that efforts to boost the availability of social identities could prove less expensive and time consuming than traditional forms of psychotherapy. In short, as observed by Captain Ahab in *Moby Dick*, it appears there is much to be gained from focusing less on living life "only for ourselves," and more on strengthening the social fibers that serve to make that life meaningful and purposive.

## Declaration of Conflicting Interests

The author(s) declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

## Funding

This research was partially funded by an Australian Research Council Laureate Grant no. FL110100199 (see <http://www.arc.gov.au/>). The funders had no role in study design, data collection and analysis, decision to publish, or preparation of the manuscript.

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